International Labour Organization

Transition to Formality and Structural Transformation

Challenges and Policy options

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Les constructeurs sur fond bleu
Maquette
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Léger Fernand (1881-1955)

Localisation : Biot, musée national Fernand Léger

Preface

Informal employment is one of the most challenging features of labour markets today. While the reduction in informal employment is clearly recognized as part of the Sustainable Development Goals (Target 8.3), our latest review shows that progress in the relevant indicator (Indicator 8.3.1 on proportion of informal employment in non-agriculture employment) has been painfully slow. The incidence of informality remains high, affecting 61 percent of workers worldwide, and is much higher in low-income countries where most workers cannot afford being unemployed. This slow progress is also disappointing, given the widespread expectation that recent solid economic growth in some parts of the developing world would accelerate the creation of new formal jobs.

Facilitating transition to formal employment is not an easy task for many reasons. At the heart of this difficulty lies the complex nature of informality. Indeed, informality has multifaceted dimensions, which includes economic, political, social, and labour market factors. Informality is not just about self-employed and informal enterprises but is often found in formal enterprises as well. Informality is typically related to low productivity but also finds its way in high productivity sectors. Informality is not just a feature of developing countries but is increasingly found in advanced countries with most sophisticated digital technology. Thus, our policy responses need to be designed and implemented in a way to address this complex linkage of various factors. Partial or isolated policy actions risk producing only partial and short-lived results.

This is why the ILO Recommendation (No. 204) concerning the Transition from the Informal to the Formal Economy calls for "an integrated policy framework to facilitate the transition to the formal economy", which combines a wide range of relevant policies in a coherent way. It also suggests that such policy framework should be "included in national development strategies or plans". In addition, given the diverse and evolving nature of situation concerning informal employment, the Recommendation No 204 stresses the importance of developing context- and time-specific measures.

This book demonstrates how this integrated approach can be developed in practice, drawing on recent research and policy experience. While it recognizes the importance of facilitating structural transformation for inclusive growth as a necessary condition for sustainable transition to the formal economy, it also highlights the role of regulation and institutions in improving employment outcomes towards formal employment. In this context, the book examines "new forms of informality" in developed countries, and how our policies can be improved to respond to new evolving realities. Another original contribution of this edited volume is the analysis of how best to organize informal workers in different environments. It presents promising and innovative practices from Asia and Africa and offers valuable perspectives on how similar initiatives can be taken in other countries.

It is time for the global community to redouble its efforts to tackle informality. It is hoped that this book, edited by two leading experts, Iyanatul Islam and Frédéric Lapeyre, will provide timely and relevant analysis and insights to our collective efforts to strengthen policy actions to deliver decent work for all.

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Acknowledgement

This book is an outcome of the Global Knowledge Sharing Forum on Transition to Formality organized by the International Labour Organization, 25-29 November 2019, at the International Training Centre, Italy. This event provided a unique knowledge sharing and learning platform to review promising practices on the transition from the informal to the formal economy, as well as to engage in constructive dialogue and debate on the future of policy frameworks to tackle informal employment.

The Forum was associated with a call for papers "Writing on informality" that aimed at promoting evidence-based research on the informal economy and encourage academic publications on the way out of informality. Most of the papers presented in the book were written for the Forum and selected by a Scientific Committee; we are very thankful to its Members: Florence Bonnet, Christina Behrendt, Coumba Diop, Christine Hofmann, Sher Verick and Judith van Doorn. Those papers also benefitted greatly from the lively debates among the 42 participants of the Forum. The diversity of profiles and the high level of expertise and experience of the participants provided solid ground for in-depth discussion, knowledge sharing and collective learning process. Some other papers were commissioned by the ILO as part of its research programme on "Transition from the informal to the formal economy", which followed the adoption of a new International Labour Standard tackling the challenge of formalization, Recommendation no.204 in 2015.

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Colin Williams is professor at Sheffield University, UK. His broad research interests are in re-theorising the nature of economic development and investigating the implications for public policy. Spatially, his interests range across the full spectrum from local and regional economic development in the UK through to the restructuring of western economies, post-socialist societies and the third (majority) world. Much of his work focuses upon rethinking the meanings of 'economic' and 'development,' which directly feeds into the work of the Centre for Regional Economic and Enterprise Development (CREED). His particular research interest is in studying the magnitude and character of the informal economy and evaluating different public policy approaches and initiatives for tackling this sphere.

Frédéric Lapeyre is Senior Coordinator for Transition to Formality at the Employment Policy Department, International Labour Organization. He hold a Ph.D. in Development Studies from the Catholic University of Louvain and a Master of Art in Development Economics from Ecole des Hautes Etudes en Sciences Sociales (Paris). He was previously Professor at the Catholic University of Louvain, Chairman of the Belgium Post-Graduate School of Development Studies, assistant professor at the Geneva Graduate School of Development Studies and Fulbright Research Fellow at Brown University (Watson Institute for International Studies) and Harvard University (Minda de Gunzburg Center for European Studies). He has written extensively on development and employment related issues. His main recently published works include *Securing Livelihoods – Informal Economy Practices and Institutions* (Oxford University Press: 2013); *Politiques publiques et pratiques de l'économie informelle en Afrique Subsaharienne*

(Academia : 2014) ; *The contributions of the United Nations to Development Theory and Practices* (Indiana University Press: 2004); *Poverty and Exclusion in a Global World*, (Palgrave: 2004); « La grande colère des faits : Quelles perspectives de déterritoria-lisation-reterritorialisation des acteurs de l'économie infor-melle » in I. Yepez, S. Charlier et A. Lemaitre (dir), *Le développement revisité* (Presse Universitaire de Louvain : 2018); *La formalisation vue d'en bas: Enjeux pour la transition vers l'économie formelle* (Academia: 2019).

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Santosh Mehrotra has an MA in Economics from the New School for Social Research, New School University, New York (1981), and Ph.D. in Economics from Cambridge University, UK (1985). He was Associate Professor at the Jawaharlal Nehru University, New Delhi 1988-91. From 1991 to 2006, he spent 15 years working for two UN agencies – UNICEF and UNDP (Chief economist of UNDP's global Human Development Report (2002-05), New York; led the research programme on developing countries at UNICEF's global research institute, *the Innocenti Research Centre*, Florence, Italy (1999-2002). He returned to India in September 2006 as a head of the Rural Development Division, and then head of the Development Policy Division, Planning Commission (till August 2009). He authored several chapters of India's 11th Five Year Plan (2007-2012), and the 12th Five Year Plan. Team leader, second national Human Development Report (Oxford, 2011). He held a three-year posting as Parkin Visiting Professor at the Centre for International Development, Faculty of Social Sciences, Bath University, UK (2010-13).

Jürgen Schwettmann has been working in international development cooperation for over forty years, specializing in cooperative development, the social and solidarity economy, rural development, rural finance, and in policies aiming at formalizing the informal economy. He was an official of the International Labour Organization (ILO) for 28 years, holding different positions, including Director of the Partnerships and Development Cooperation Department (Geneva), Deputy Regional Director for Africa (Addis Ababa), Director of the ILO Office for East Africa (Dar es Salaam), Chief of the ILO Cooperative Branch (Geneva), and Regional Advisor on Cooperatives for Eastern, Southern and Central Africa (Kinshasa and Yaoundé). Before joining the ILO, he served as rural finance advisor for the German technical assistance agency GIZ in Cameroon, and as management advisor to coffee-marketing cooperatives in Cameroon. After retiring from the ILO in October 2015, Mr Schwettmann works as an independent consultant for various multilateral and bilateral development cooperation agencies, including the ILO and the International Fund for Agricultural Development (IFAD). He holds degrees in banking, business administration and software engineering.

Reema Nanavaty is leader of the Self-Employed Women's Association (SEWA), where she has been active since 1984. Elected as its fourth General Secretary in 1999, Ms Nanavaty has taken SEWA's membership to new heights, making it the single largest union of informal sector workers. She has helped establish thousands of women workers' federations, associations, cooperatives, museums, retail chain companies, trade facilitation centres, digital clinics and management schools across India as well as in Nepal, Sri Lanka and Afghanistan, in areas ranging from traditional handicrafts, agriproducts, sustainable livelyhoods and rural enterprise to forestry, water harvesting, solar energy and green finance. Reema oversees 4813 self-help groups (SHG), 160 cooperatives and 15 economic federations, pan India including 16 states, and also in 7 South-Asian countries, focusing on women's economic empowerment by building women owned enterprises, building women led supply chains, introducing modern ICT-based tools and facilitating Green-Energy initiatives and livelihoods. Reema is currently member of the Advisory Council on Gender of the World Bank Group. She was also members of International Labour Organization's High-Level Global Commission on the Future of Work. In recognition of her work, in 2013 she was decorated with India's national honour, Padma Shri.

Mansi Shah has been working with SEWA since over 10 years as a Senior Technical Coordinator in Rural Economic and Development sector. She is program manager for the Future of Work activities at SEWA. Under the guidance of SEWA's director Reema Nanavaty, Mansi has orchestrated and lead several workshops and roundtable conferences with poor women workers from informal economy; especially with women from fragile and conflict affected areas like Sri Lanka, Afghanistan, Myanmar as well as Indian states like Kashmir and north-eastern states like Sikkim, Nagaland and Meghalaya to understand the challenges and issues faced by women from these areas and understand their perspective of "Future of Work". She has also extensively worked, consolidating and documenting various projects implemented for grassroot women thus bringing out the challenges / issues faced by these poor women workers in their lives and livelihoods. She has studied their lives, their experiences and their success stories. She has designed and implemented various campaigns, initiatives and programs to achieve full-employment and self-reliance under SEWA's guidance.

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Introduction to the book

Iyanatul Islam and Frédéric Lapeyre

How does one tackle the pervasive incidence of informality in the developing world? To some, the answer lies in reducing the regulatory and fiscal burden on the business community. This will entice and incentivize opportunistic economic actors to engage productively with the formal economy. Otherwise, they will continue to operate 'in the shadows' as a way of avoiding and evading government regulations and taxes to the detriment of inclusive growth.

To others, most notably the ILO, the informal economy is not merely a shadowy area but one where millions across the world are trapped in low-income, low-productivity activities. The fundamental challenge is to find means and ways to facilitate a sustained transition of people and resources from low productivity activities in the informal economy to its much more productive formal counterpart. This is a classic example of structural transformation, but one that occurs along the formal-informal divide. Some estimates suggest that the boost to productivity – hence to growth – can be rather large, given the considerable productivity gap between the informal and formal segments of a typical developing economy. In addition, this form of structural transformation is inclusive, because it has the potential to reduce poverty and income inequality by mitigating inter-sectoral disparities.

If, as argued, the transition to formality is a prime example of inclusive structural transformation, how does one bring that about? This is where it is necessary to go beyond the regulatory reform agenda. Such an agenda is useful, but inadequate in tackling the challenge of fostering structural transformation. As a first step, the regulatory reform agenda would need to be broadened to create an enabling environment for the private sector by promoting financial inclusion and investment in basic infrastructure, including health and education. Beyond such essential steps, it is necessary to enact and implement sector-specific policies. To advocates of 'premature deindustrialization', a proven route to structural transformation in the form of a sustained reduction in informality is to nurture and nourish a manufacturing-led growth strategy. To others, one would need a more eclectic approach, given that not many nations have the requisite endowments to successfully pursue such a growth strategy led by the manufacturing sector. Viable alternatives in such cases include agricultural diversification and service sector-led growth. The many and varied examples in different parts of the developing world (floating farms in Bangladesh, cut flowers in Ethiopia, the tourism industry in Morocco, the IT industry in India – to cite a few country-specific experiences) suggest that the eclectic approach to the transition to formality via the route of structural transformation creates a wide range of opportunities for many low- and middle-income economies. One can tap into these opportunities by deploying multiple policy instruments –fiscal incentives, selective credit allocation, education and training policies etc.–, but it is essential for the government to forge a partnership with the private sector and civil society. Such a partnership would need to be guided by a clear vision of priority sectors that are worthy of support and aid.

Integrated strategies are important because the transition to formality requires inclusive structural transformation. This is beyond the competence of individual enforcement authorities. A whole government approach is instead needed that would firstly, address the structural economic and social determinants of informality, secondly, join-up strategy and operations across labour, tax and social security laws and fully involve social partners, and thirdly, utilise the full range of available policy measures. In many countries, there is a fragmented and uncoordinated approach across the multifarious government bodies responsible for the transition to formality, limited integration of social partners, and an incomplete range of implemented policy measures. The result is lack of a joined-up, whole government approach. The first chapter, by Frédéric Lapeyre and Colin Williams, will address these challenges and investigate the policy issues related to coordination and institution building required to develop an integrated strategy and promote structural transformation towards transition to formality.

The first part of the book (chapters 2 to 5) will tackle the challenge of inclusive structural transformation. In chapter 2, Iyanatul Islam demonstrates that low productivity of informal sector's economic units (either MSEs or own-account workers) is a structural characteristic of low and middle-income countries, which cannot be addressed in isolation from inclusive structural transformation and employment strategies. The past few decades have shown that the conventional macroeconomic framework or de jure pro-business reforms have not been particularly effective in enabling governments, in most developing countries, to make significant progress towards the attainment of more and better jobs. In this light, Iyanatul Islam argues that the agenda of the transition to formality should not be reduced to a case of improving the business climate, including enhancing labour market flexibility. This would be contrary to the spirit and substance of the ILO's notion of the transition to formality, which embraces a holistic policy agenda and tethers it to the goal of fostering 'inclusive' structural transformation (as envisaged in Recommendation 204).

Godfrey Kanyenze in chapter 3, shows the urgency of generating productive employment in Sub-Saharan Africa in the context of population dynamics. He stresses that it is necessary to look to enhancing within-sector productivity growth, especially in agriculture. Such strategy should entail elimination of the most binding constraints to higher productivity and reorganization of work, technological change and promoting higher skill levels amongst the poor.

In chapter 4, Albert Park and Du Yang provide an accurate measurement of different informal employment types in urban China by analysing data from recent household surveys conducted in six large Chinese cities in 2010 and 2016. They apply definitions of informality consistent with international standards set by the ILO, based mainly on whether workers have a labour contract or access to key social insurance programs. The data indicate that changes in the economic and demographic structures, ageing population and domestic migration, influence the level of informal employment as well as the quality of informal employment. Despite these relatively low rates of informal employment, there remains a difference in the propensity for informal employment of residents and migrants, reflecting historically unequal treatment of the two groups and design features of current social insurance programs that make them unattractive to mobile, migrant workers.

Reflecting on a historically specific period, Santosh Mehrotra argues in chapter 5 about India that, much as informality in work has not declined over the last two decades when India's GDP growth rate has increased sharply, other favourable labour market developments have been afoot that bode well. Since 2004-05 the structural shifts in employment, significant increase in rural wages, increase in per capita consumption expenditure and, therefore, a sharp decline in absolute numbers of the poor, as demonstrated by the National Sample Surveys of 2009-10 and 2011-12, have sparked an underlying process that has promoted inclusive growth. On the other hand, whether these favourable labour market developments will be sustained over time remains an open question, given the recent growth slow-down in India.

The second part of the book (chapters 6 to 8) is dedicated to the role of organizing informal economy workers and entrepreneurs with a view to facilitating transition to formality and structural transformation. Jürgen Schwettman in chapter 6 emphasizes the importance of organization building in the informal economy. There is ample evidence that informal economy organizations do already exist everywhere, in all economic sectors, and in diverse forms and manifestations. The informal economy is organized, but its organizations are often not recognized and have no seat at the table where laws and policies affecting them are negotiated. He provides some good practices from different countries and show the importance of inclusive social dialogue mechanisms.

In chapter 7, Reema Nanavaty and Mansi Shah show, based on years of experience in organizing and empowering rural women through SEWA, that women are the best agents to engineer change and address new aspects of development in a society. With Indian agriculture becoming more and more unsustainable due to the increasingly frequent and intense climate shocks and market shocks, the problems of a farmer are getting closely intertwined with the challenges her family faces. In such situations, if armed with the right tools and technology, women are best placed to tackle these problems and work towards economic and social security of their families. The chapter presents the successful implementation, adoption and sustained use of SEWA's various technological initiatives, and reaffirms that "technology when put in the hands of the poor, they know exactly how to use it to their benefit".

In chapter 8, Lesogo Moshikaro and Mbofholowo Tsedu highlight the various routes to becoming an artisan in South Africa and the importance of organizing the artisan sector. They provide an in-depth analysis of the Artisan Recognition of Prior Learning (ARPL) model implementation aiming at integrating individuals into recognised training and ultimately formal employment. Additionally, the chapter makes recommendations to effectively implement the ARPL model and improve outcomes for skilled unqualified artisans.

The third and last part of the book (chapters 9) is on Policy Challenges of Newer Forms of Informality. In chapter 9, Colin Williams and Frédéric Lapeyre show that over the past few decades, there has been recognition that the 'standard employment relationship' (SER) of formal, full-time and permanent waged employment is becoming ever less the standard relationship. Given that the SER has been the key vehicle for allocating rights and social protection, its diminution poses challenges for the operation of regulatory frameworks and raises issues regarding working conditions, rights and benefits. This chapter addresses, with a focus on European Union, the implications of two specific new forms of informality, namely dependent self-employment and the platform economy, in terms of what coordination mechanisms and regulatory frameworks are required to tackle them. It ends with some reflections on the implications of those newer forms of informal employment for the future of work.

To conclude, if this book encourages wider recognition that facilitating the transition to formality requires inclusive structural transformation, not least by addressing the wider structural drivers of informality and building the institutions and strategies required to do so, then it will have achieved one of its objectives. If this book also stimulates individual countries to explore how this might be attained in their specific context and attempt to do so, then it will have fulfilled its broader purpose. What is certain, however, is that the responsibility for tackling informality and facilitating the transition to formality can no longer be assigned by governments to enforcement bodies, such as labour inspectorates and tax administrations. Although these institutions can play a key role in facilitating formalisation, a much broader whole government approach is required that will not only address the structural economic and social determinants of informality, but also integrate join-up strategy and operations across labour, tax and social security law, fully involve social partners, and utilise the full range of policy measures available.

Chapter 1

Designing effective policy and coordination frameworks for transition to formality

Frédéric Lapeyre and Colin C Williams

The transition from informal to formal economy is of strategic significance for hundreds of millions of workers and economic units around the world that are working and producing in precarious and vulnerable conditions with many of them being trapped in poverty, insecurity and acute decent work deficits. Policy makers, academics, workers' and employers' organizations now acknowledge that the high incidence of the informal economy is a major challenge for sustainable development. Therefore, the development of knowledge of what works in different contexts and the dissemination of that knowledge are essential to support national dialogue processes and action. While several member states have a proven record of developing effective legal and policy frameworks for formalization, with sustained efforts for policy coherence and coordination, many others have only recently embarked on similar paths or are starting to consider the possibility of doing so. There is considerable demand from policy makers at country level for evidence-based practical knowledge about effective policy and coordination frameworks for facilitating the transition to formal economy.

The International Labour Organization labour standard adopted in 2015 – Recommendation no.204 on *Transition from the Informal to the Formal Economy* – is built on the belief that there is need for an integrated strategy, which targets not only those working in the informal economy, but also the pattern of growth. An integrated strategy is important because the transition to formality requires both targeted policies and much broader multidimensional policies to promote inclusive structural transformation. This is beyond the competence of individual enforcement authorities. A whole government approach is instead needed that would firstly, address the structural economic and social determinants of informality, secondly, join-up strategy and operations across labour, tax and social security laws and fully involve social partners, and thirdly, utilise the full range of available policy measures.

Developing joined-up integrated formalization strategies calls for policy coherence, institutional coordination, capacity building and social dialogue. And comparative analyses show that integrated strategies should combine the following policy pillars:

- Macroeconomic, trade, industrial, tax, sectoral and infrastructure policies that promote employment, enhance productivity and facilitate structural transformations;
- Policies that address transversal drivers of informality, such as the lack of a social protection floor, weak labour market institutions, low productivity and problem of access to finance, skills and infrastructure;

- Policies that target specific categories of economic units (e.g. MSEs), groups of workers (e.g. domestic work, self-employed), and types of informality (e.g. undeclared work in formal enterprises).

The starting point of this chapter is the recognition that, in many countries, there is too often a fragmented and uncoordinated approach across the multifarious government bodies responsible for facilitating the transition to formality, weak integration of social partners, and a limited range of implemented policy measures. The result is lack of a coordinated, joined-up whole government approach. Therefore, the aim of this chapter is to set out the coordination and institution building required for developing and managing an integrated strategy to facilitate the transition to formality, and how this will vary in different contexts. To achieve this aim, answers are sought to the following questions:

- **Institution-building to facilitate the transition to formality.** What institution-building is required to facilitate the transition to formality? How is the prevalence of the informal economy related to the level of development (measured by various formal institutional and structural-economic as well as social conditions)? What implications does this have for the institution-building required to facilitate the transition to formality?
- **Developing joined-up integrated strategy.** How can countries develop a joined-up integrated strategy? Who are the key stakeholders? What coordination mechanisms are required? What are the practical steps that countries can take to design and implement an integrated strategy and develop effective cooperation? How might these vary according to the level of development of the country? What concrete examples and good practices exist at the level of strategy, operations and data mining, analysis and sharing?
- **Policy measures to facilitate the transition to formality.** What policy measures are required to facilitate the transition to formality? How is the character of the informal economy (self-employment in the informal sector, wage-employment in the informal sector, etc.) related to the level of development (measured by various formal institutional and structural economic as well as social conditions)? What implications does this have for the policy framework required to facilitate the transition to formality at various levels of development (low-, middle- and high-income countries)?
- **Implications of new forms of informality (e.g., dependent self-employment, the platform economy).** What coordination mechanisms and regulatory frameworks are required to tackle new emergent forms of informality? What concrete examples and good practices are there to deal with dependant self-employment? And how can informality in the platform economy be tackled?

While the diversity of national circumstances and characteristics, legislation, policies, and capacities calls for tailored policy frameworks based on specific national diagnostic and priority setting processes, the chapter will point out a number of guiding principles and identify a range of policy areas that need to be addressed and combined for effective policy making with a view to facilitating the transition to formality. Direct controls, that deter engagement in informality by increasing the risks of detection and penalties (i.e. ‘sticks’), can be used as along with incentives to make formality easier and more beneficial (i.e. ‘carrots’). However, informality is not always a purely rational economic decision for employers and workers, thus merely ensuring that the costs outweigh the benefits is insufficient. Informality also results from formal institutional failings that lead to the misalignment of state morale and civic morale. Therefore, there is also a need to change civic morale through educational and awareness-raising campaigns about the benefits of formality. Civic morale, however, is unlikely to change without improvements in the formal institutions, requiring more inclusive structural transformation as identified above.

1.1 The multiple faces of informality: A challenge for policy makers

The first step towards designing effective interventions to facilitate transitions to formality is to recognize the heterogeneity of the informal economy, the many different categories of work involved and the various drivers that lead to both the growth of the informal economy and the informalization of the formal economy (ILO, 2014). Beyond statistics, the heterogeneity of the informal economy needs to be analysed in terms of the specific processes that generate and/or maintain informality. It is important to distinguish between, on the one hand, recent informalization processes linked to trends in the global economy or to the transformation of the world of work due to the digitalization of the economy and, on the other, the resilience of informal petty production of goods and services for local markets, which is still an important feature of everyday life for a large number of people (Hillenkamp, Lapeyre and Lemaitre, 2013).

Meanwhile, it is crucial to acknowledge that workers in the informal economy differ widely in terms of income (level, regularity, seasonality), employment status (employees, employers, own-account workers, casual workers, domestic workers), sector (trade, agriculture, industry), type and size of enterprise, location (urban or rural and formal or informal sector economic units), social protection (social security contributions) and employment protection (type and duration of contract, annual leave protection). Economic units in the informal economy also demonstrate a vast diversity of characteristics about degree of compliance with laws and regulations, or level of productivity, among others. Addressing informal employment requires for policy makers to recognize such heterogeneous sets of workers and economic units and calls for the implementation of coordinated measures adapted to the specific characteristics of the different groups, the contingencies to be covered and the national context.

In 2003, the Seventeenth International Conference of Labour Statisticians (17th ICLS) adopted “Guidelines concerning a statistical definition of informal employment”. Paragraph 3 of the ICLS Guidelines defines “informal employment”, which is a job-based definition, as the total number of informal jobs, whether carried out in formal sector enterprises, informal sector enterprises or households, during a given reference period. These comprise: own-account workers and employers employed in their own informal sector enterprises; contributing family workers, irrespective of whether they work in formal or informal sector enterprises; employees holding informal jobs, whether employed by formal sector enterprises, informal sector enterprises or as domestic workers employed by households; members of informal producers' cooperatives; and own-account workers engaged in the production of goods exclusively for own final use by their household (ILO, 2012, 2013). In addition, as Figure 1 displays, the 90th International Labour conference in 2002, as well as Recommendation No.204 in 2015, provide a description of the informal economy referring to all economic activities of workers and economic units that are – in law or in practice – not covered or insufficiently covered by formal arrangements (ILO, 2002, 2015).

Figure 1. Typology of workers in the Informal Economy:

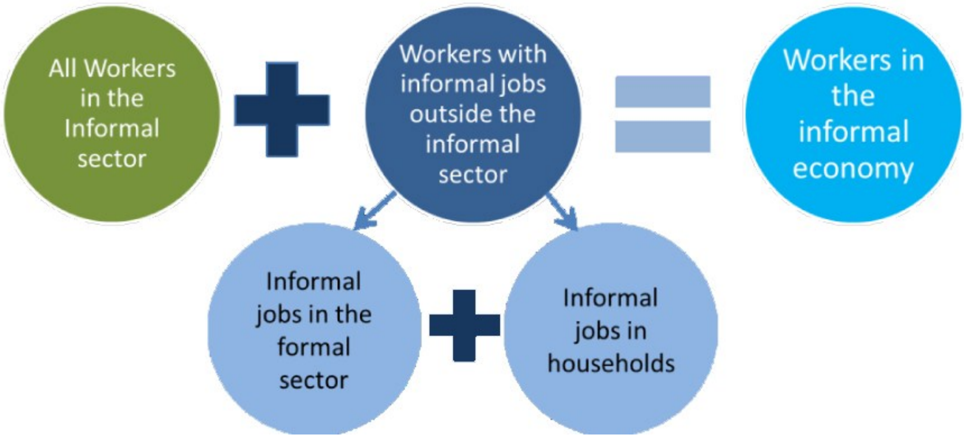
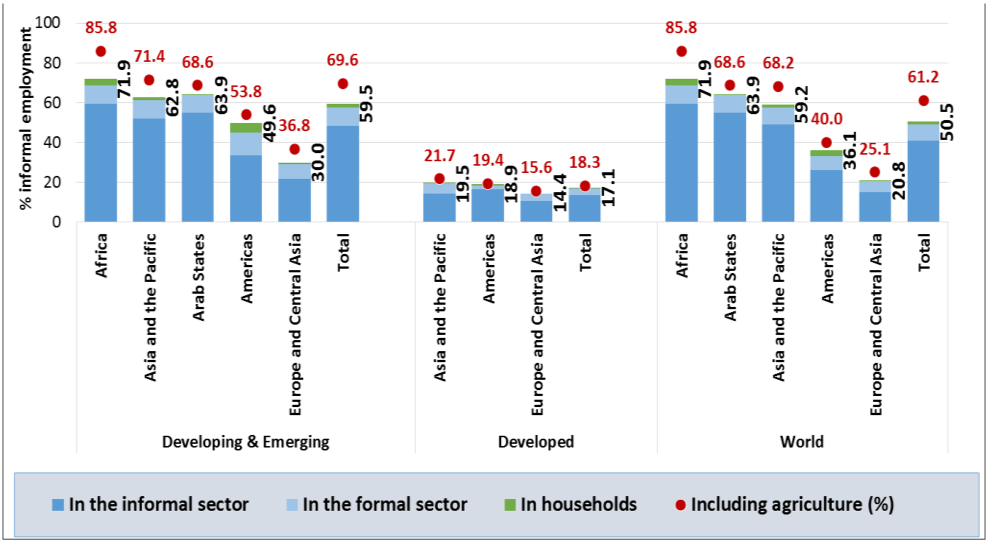


Figure 2 shows the distribution of informal employment between the formal and informal sectors. It demonstrates that policies aiming at employment formalization should not only focus on the informal sector, as a significant part of employees in the formal sector are also undeclared and deprived of the benefits entailed to formal jobs.

Figure 2. Typology of workers in the Informal Economy by region



Note: based on 118 countries representing 90 percent of global employment and estimated missing values. Estimates for 2016. Harmonized definition of informal employment (no registration or no complete set of accounts to define the informal sector and informal employment among own-account workers and employers; no social security gained through employment or, in case of missing, neither annual paid leave, nor paid sick leave to define informal employment among employees; all contributing family members are in informal employment). Limited number of countries for the Arab States, not displayed on this graph. Source: ILO calculations based on national household surveys.

Source: ILO (2018c)

Figure 2 shows not only that the share but also the characteristics of the informal economy are strongly linked to the degree of economic and institutional development of a country.

In **low-income economies**, in particular in Sub-Saharan Africa, informal employment accounts for 80 to 90% of total employment. Contributing family workers, including farming households and the self-employed in agriculture and petty trading, make up most of the informal economy. As defined above, the majority of such undertakings fall outside regulation rather than being non-compliant. Informality manifested in the form of large informal sectors implies, in most of the cases, a relatively low level of formal organisation in the economy, with the resultant drag on productivity.

In **middle-income economies** with relatively mature social security systems, informal employment in formal enterprises and households is a sizeable share of total informal employment, while self-employment is smaller than in low-income economies. Informal employment in formal enterprises can result from either non-compliance (usually in the form of unregistered salaried work), or the existence of forms of employment that are unregulated or unprotected. Employment-linked social security coverage is more extended in high and middle-high income countries than in low-income economies. Micro and small enterprises along with the agriculture sector often remain largely informal. Indeed, in certain countries (most of Latin American as well as India) the service sector is largely informal and fragmented with very low productivity growth on average.

In **high-income economies**, self-employment represents a much smaller share of total employment and is often covered by social security. Undeclared employees, employees who are not entitled to labour benefits or covered by social security schemes, and workers for whom part of the activity is not declared (e.g. envelope payments) represent an important manifestation of informal employment. In developed countries, the main legislative thrust seeks to address illegal employment (of irregular migrants) and undeclared work. In some countries, atypical or disguised forms of employment represent important sources of growth in informal employment in the formal sector.

What implications does this have for the policy framework required to facilitate the transition to formality at various levels of development (low-, middle- and high-income countries)? It suggests that policies targeting informal self-employment (e.g., formalisation support and advice) will be of greater importance in less developed economies, while policies targeting dependent self-employment or undeclared work in formal sector enterprises will be more significant in more developed economies.

1.2 The need for an integrated strategy

Policy makers should combine and coordinate different policy packages within an integrated strategy, which should aim at facilitating the transition path to the formal economy through:

Formalization of economic units

- Registration of economic units
- Increased compliance
- Extended application of labour and social security regulation

Formalization of jobs

- Extended application of labour regulation
- Extended coverage of social security
- Registration of employment relationships
- Registration of own-account workers

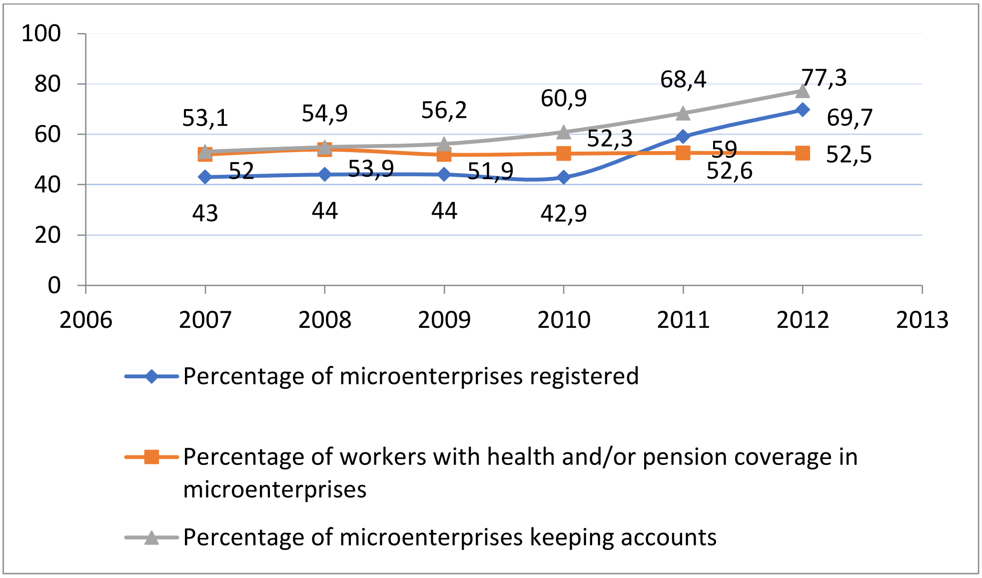
Productive job creation in the formal economy

- Most new entrants have access to employment in the formal economy
- Higher formal employment intensity of growth.
- Inclusive growth pattern

These policy areas are interrelated but are not the same. They all comprise different dimensions that need to be addressed by the integrated strategy, through coordinated policies. What is important in an integrated strategy is to not delink the different components of the strategy. Combatting the informal economy without providing alternatives in the formal economy for those operating in the informal economy will not be effective. Targeted policies focusing on the informal economy are not enough. Pro-employment macroeconomic policies and an enabling environment for sustainable formal enterprises are crucial for creating job opportunities in the formal economy. The problem of mass informality is rooted in poor governance and the inability of current growth patterns to create enough formal jobs to absorb all those who want to work (either new entrants or those trapped in the informal economy).

Although the challenge of formalizing employment, through extending social protection coverage to those currently in the informal economy, is deeply linked to the formalization of economic units – i.e. registration with the tax authority –, it is not a sufficient condition. Formalizing economic units through appropriate incentives as well as legal and regulatory reforms for SMEs will not lead automatically to the formalization of jobs unless there is an appropriate compliance mechanism and an enforcement system in place to ensure that formalization of economic units and formalization of jobs go hand in hand. Figure 5 illustrates such risks of delinking in the example of Colombia.

Figure 3. Trends in microenterprises formalization in Colombia, 2007-2012

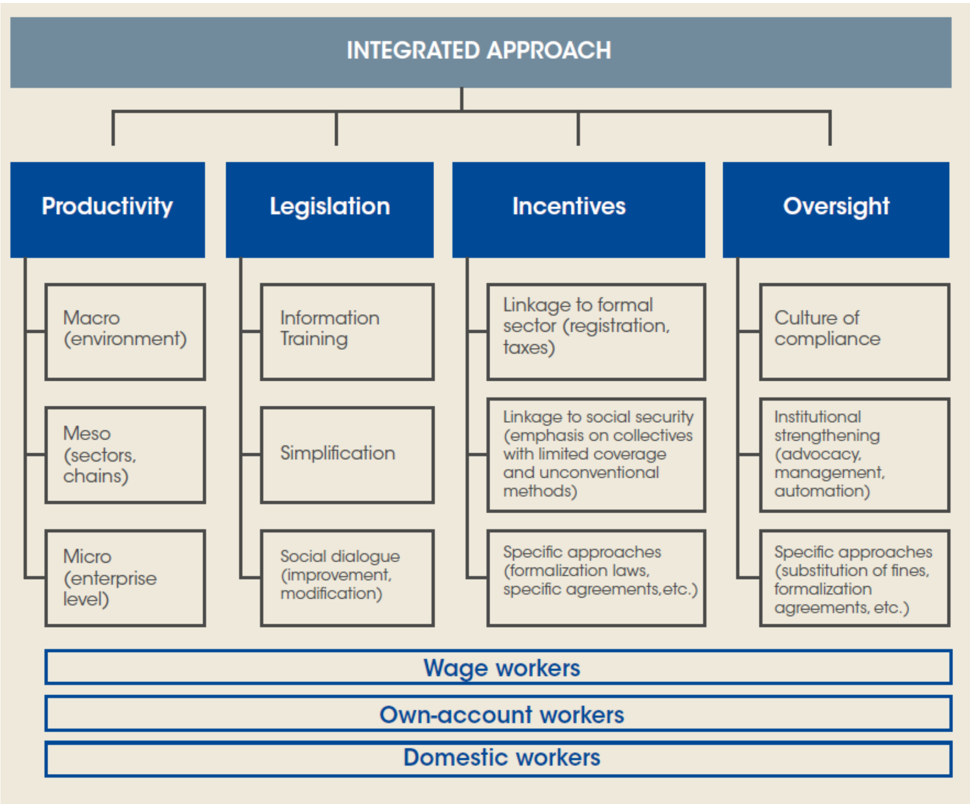


Source: ILO, Policies for the formalization of micro and small enterprises in Colombia, FORLAC; Notes on Policies for the Formalization of Micro and Small Enterprises, ILO: Regional Office for Latin America and the Caribbean, 2014. Authors based on data from DANE and ILO.

The integrated approach to transition to formality builds on the shared understanding that interventions are more effective when they are combined to tackle different drivers of informality, enabling them to address the diversity as well as the scale of the informal economy. Evidence indicates that the greatest reduction in informality rates occurs when the set of instruments used is more comprehensive and well-coordinated.

A growing number of countries are implementing such an integrated approach. In Latin America and the Caribbean, the ILO FORLAC programme[1] shows that countries which have successfully reduced informal employment combined at least four main policy areas to facilitate the transition to formality (see Figure 4).

Figure 4. Public policies to support the transition to formality in Latin America and the Caribbean: Toward an integrated approach

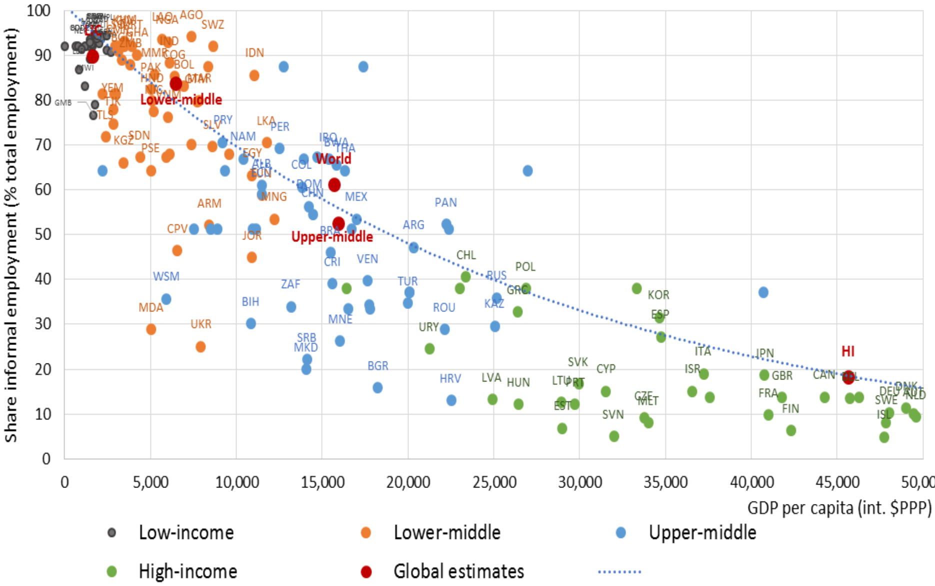


Source: ILO, 2014, Thematic Labour Overview: Transition to Formality in Latin America and the Caribbean (Lima: ILO)

Finally, Figure 5 below illustrates a strong relationship between the level of economic development (as measured by per capita GDP) and the level of informal employment[2]. However, a vertical rather than horizontal reading of that graph points out that not all patterns of growth have the same impact on the level of informal employment, and that both economic structure and policy frameworks do matter, as countries with similar level of GDP per capita can have very different levels of informal employment.

[1] http://www.ilo.org/americas/temas/econom%C3%ADa-informal/lang--es/index.htm
[2] This relationship is also reviewed in chapter 2 of this volume.

Figure 5. Policy frameworks do matter for formalization



Source: Florence Bonnet (ILO) based on ILO estimates.

Experience in many countries has demonstrated the potential of policy interventions to restructure the pattern of growth towards inclusive growth and employment formalization, as was the case in Argentina and Brazil in the 2000s. Curbing the spread of informality at country level means, first and foremost, making employment a central concern of economic and social policies, promoting employment-friendly macroeconomic frameworks and supporting productive sectors of the economy with high employment multipliers.

Considering the labour market situation in most developing countries, exit from informality should be treated as a long-term objective, associated with other transformations of the real economy, the complexity of which goes far beyond the formal-informal dichotomy.

1.3 Towards inclusive structural transformation

Widespread underemployment and informality are structural characteristics of developing countries' economies rather than a peripheral problem that can be addressed in isolation from mainstream development strategies (Iyan Islam will discuss extensively this issue in Chapter 2). The past few decades have shown that the conventional macroeconomic framework has not been particularly effective in enabling governments, in most developing countries, to make significant progress towards more and better jobs, which are key elements of the development agenda, especially in Africa.

It is widely agreed that economic development results from the dynamic of change from an economy dominated by low productivity and subsistence agriculture to a predominantly urban and higher productivity economy led by the industrial and service sectors. Transition to formality is greatly impacted by such structural change as demonstrated by the experience of East and South East Asian Countries, where a rapid expansion of both manufacturing sector and wage employment played a crucial role in employment formalization.

However in many low income countries, especially in Africa, the analyses regarding last decades show that much as there is a significant shift of the labour force out of low productivity agriculture, most of the workers fail to join higher productivity sectors (in particular industry) finding employment in low productivity service sectors (mainly low wages/income services such as small scale retail sector and other urban informal economy activities characterized by the dominance of low productivity microenterprises and own account workers) (Fox, Thomas and Haines, 2017; Rodrik, 2012).

From this perspective, it is crucial to promote in low and middle-low countries some integrated strategies aiming at: i) promoting non-farm employment creation, in particular wage-employment, in higher productivity industrial and services enterprises; and ii) improving agricultural productivity especially in small-scale subsistence farming. This would require: i) upgrading and modernizing small-scale subsistence farming, which would greatly facilitate the transition to formality and decent work; ii) promoting forward and backward linkages between agriculture, industry and services; and iii) developing government initiatives and public investment to provide SMEs with access to infrastructure, markets, technologies and credit to take advantage of value chain opportunities.

For the success of such integrated strategies, high-quality physical, digital and social infrastructures, including high quality public services, are fundamental prerequisites. Moreover, increasing productivity in agriculture and service sectors to support a positive transformation of the employment structure will need directing more investment towards digital infrastructure to support technological changes in small scale farming, and develop high value-added services.

The ILO Global Commission Report’s policy recommendations (2019a) and the ILO Centenary Declaration (2019b) reaffirm the key role of structural transformation to tackle the challenge of decent work and transition to formality. A policy makers’ priority is to formulate and implement context-specific structural transformation policies intended to:

- Develop those productive sectors, which promise major employment and decent work opportunities in the future. This has obvious strategic importance. And whilst every country will face different circumstances, there are clearly some area, which have transformative significance for the development of formal employment, including: the green economy – the jobs that will come from the transition to an environmentally sustainable future; the care economy – so important now that many of our societies are ageing and others require us to focus more on the care of our young people; the rural economy, where it is too easily forgotten that a very large proportion of the world's population is employed (i.e. special attention needs to be paid to the role of the structural transformation of small farming, taking into account the very significant effects of agricultural technology on development and decent work); and investment in quality physical and digital infrastructure, especially in rural areas. It is very important to consider the impact on formal employment as well as on gender equality as core criteria of policy making in developing these sectors.

- Generate the appropriate conditions and an enabling environment to achieve a high rate of in situ formalization by addressing the structural drivers of informality and obstacles to formalization, especially for SMEs and self-employed. The experience of the Latin America shows that the largest part of formalization was observed in the same job. Around 30% of new formal workers in Brazil and Peru, and 40% in Argentina, Ecuador and Paraguay became formal employees in the same job (in situ formalization). Electrification, rural roads, and other private and public investments in physical and digital infrastructure as well as appropriate technologies have a significant impact on private productivity, earnings of small-scale producers and the security of livelihoods. Promoting productivity gains, technological change and access to market are especially important, because it will ultimately determine the opportunity to transit from the informal to the formal economy for most informal economic units and self-employed. Among other important components, one can point out good use of global supply chains, up-grading value chains, developing backward and forward linkages associated to growth sectors, promoting skills, and extending the social protection coverage.

The policy challenge is to move from job creation in the informal economy to significantly upgrading the scope and pace of creating decent work opportunities across the economy. Such pro-employment growth policies require targeted sectoral interventions within a clear productive transformation strategy. This approach poses a number of fundamental questions to policy makers:

1. *What should be the priority sectors for potential job creation?*
2. *What are the main binding constraints to the development of targeted sectors and value chains?*
3. *What key policies, measures and reforms could increase labour and decent work intensity of growth?*

Sectors that are important for growth may not be the most important for employment retention and creation, which is critical given the employment challenge faced by many countries. The whole dynamics of economic growth and job creation are crucially dependant on the structure of the economy (i.e. economic activities being developed). Thus, future investment in priority sectors should not be assumed *ipso facto* to produce benefits for the economy and employment, as there is no automatic trickledown effect but rather many competing paths with very different impact on formalization.

To support such dynamic of change, there is a crucial need to produce: i) evidence based policy guidelines to engage in inclusive structural transformation; and ii) employment impact assessment tools to demonstrate how appropriate and effective structural transformation policies (targeting both the structure of the economy and the structure of employment) can promote transition from the informal to the formal economy.

1.4 Institution-building to facilitate the transition to formality

In institutional theory (Baumol and Blinder, 2008; Denzau and North, 1994; North, 1990), institutions are defined as the rules of the game that prescribe what is socially acceptable and govern behaviour. In all societies, two types of institutions exist: formal institutions (i.e., laws and regulations) that set out the legal rules of the game and prescribe 'state morale', and informal institutions, which are the unwritten, socially shared rules about what is acceptable so far as citizens, workers and entrepreneurs are concerned, and prescribe 'civic morale' (Denzau and North, 1994; Helmke and Levitsky, 2004).

From this institutionalist perspective, formal economic activity adheres to the formal institutional prescriptions set out in the laws and regulations. Informal economic activity, in contrast, occurs outside of formal institutional prescriptions but adheres to the norms, values and beliefs of informal institutions (Godfrey, 2011; Kistruck *et al.*, 2015; Siqueira *et al.*, 2016; Webb *et al.*, 2009; Welter *et al.*, 2015; Williams and Gurtoo, 2017; Williams, 2017), while criminal activity takes place outside both the formal institutional prescriptions as well as the socially shared rules of what is acceptable.

In recent years, this institutional approach has made major advances in explaining the prevalence of the informal economy. The informal economy has been shown to be more prevalent when the failings of formal institutions lead to the formal 'rules of the game' (state morale) differing from what citizens view as socially acceptable (civic morale) (Dau and Cuervo-Cazurra, 2014; Godfrey, 2015; Webb *et al.*, 2009; Williams and Shahid, 2016; Williams *et al.*, 2017). The greater this misalignment of state morale and civic morale in a country, the greater the prevalence of the informal economy (see Williams, 2017). As Williams (2017) outlines, these formal institutional failings are of four types:

(i) **formal institutional inefficiencies, or resource misallocations by formal institutions** - these arise either from the lack of modernised government organisations (i.e., the lack of procedural and distributive justice and fairness) and/or due to formal institutions acting in a corrupt manner to protect or maximise economic rents for elites, or when state capture occurs by such elites, resulting in the majority not receiving a fair share in return for their contributions, or suffering from overly burdensome taxes, registration and licensing regulations and costs;

(ii) **formal institutional voids and weaknesses –** which institutional voids and weaknesses lead to informality and which do not, has been subject to much debate. The majority view the informal sector to result from exclusion from the formal sector because of too little state intervention, but others view participants in the informal sector as voluntarily deciding to exit the formal sector because of too much state interference;

(iii) **formal institutional powerlessness -** expressed in a lack of not only capacity to enforce policies (Webb *et al*., 2009) but also of ability to incentivise adherence to the formal rules. From this perspective, power means the ability to get somebody else to do something that they were not before going to do, in the way in which you want them to do it. Formal institutions lack power because they are unable to encourage businesses, workers and citizens to adhere to the formal rules (i.e., the laws and regulations) using either enforced compliance (i.e., 'sticks' and 'carrots') or voluntary compliance, and/or

(iv) **formal institutional instability and uncertainty –** due to for example continuous changes in the formal 'rules of the game' (Levitsky and Murillo, 2009; Williams and Shahid, 2016) about what is acceptable, which leads to rejection of the continuously changing formal rules of the game by the population in favour of their own more stable unwritten socially shared rules.

It is very important then to evaluate the relationship between these various types of formal institutional failure and the prevalence of the informal economy, as they are reported on Table 1. To evaluate whether a significant bivariate correlation exists between the level of informality and these formal institutional conditions, Spearman's rank correlation coefficient is used due to the non-parametric nature of the data.

Table 1. Formal institutional conditions associated with informality

	No. of countries	Share of informal employment in total employment (total)	Share of informal self-employment[1] in total informal employment	Share of informal employees in total informal employment
I. FORMAL INSTITUTIONAL RESOURCE MISALLOCATIONS AND INEFFICIENCIES				
1. Lack of modernisation of government				
Reliability of police services	100	-0.553***	-0.028	0.062
Efficiency of government spending	100	-0.198**	-0.238**	0.146
2. Formal institutions acting in a corrupt manner				
Irregular payments and bribes	100	-0.743***	-0.094	0.235**
Diversion of public funds	100	-0.441***	-0.148	0.169*
Favouritism by government officials	100	-0.280***	-0.137	0.127
Corruption Perceptions Index	110	-0.747***	-0.081	0.159
Control of Corruption	111	-0.741***	-0.071	0.163
Corruption (doing business)	100	0.525***	0.052	-0.133
% of firms expected to give gifts in meetings with tax officials	86	0.571***	0.074	-0.138
% of firms expected to give gifts to public officials 'to get things done'	85	0.420***	0.286***	-0.293***
II. FORMAL INSTITUTIONAL VOIDS AND WEAKNESSES				
GDP per capita	110	-0.890***	-0.177*	0.358***
Human Development Index (HDI)	111	-0.925***	-0.127	0.300***
Social Progress Index (SPI)	100	-0.929***	-0.132	0.304***
Burden of government regulation	100	0.008	-0.138	0.058
No. of procedures required to start a business	100	0.373***	-0.126	0.044
Time required to start a business	100	0.409***	-0.153	0.068
Inefficient government bureaucracy	100	-0.477***	-0.020	0.171*
Tax rates	100	-0.275***	0.195*	-0.177*
Tax regulations	100	-0.452***	0.021	0.007
Restrictive labour regulations	100	-0.654***	-0.099	0.292***
Total tax rate	100	0.043	0.110	-0.044
Tax revenue to GDP ratio	56	-0.294**	0.132	-0.127
Total expenditure (% of GDP)	61	-0.703***	0.227*	-0.049
Taxes on goods & services (% of revenue)	99	0.059	0.094	-0.173*
Revenue (excluding grants)	101	-0.647***	0.110	0.016
Tax revenue	100	-0.446***	0.166*	-0.082
Social contributions (% of revenue)	97	-0.711***	0.017	0.074
Expense of government as a % of GDP	100	-0.688***	0.107	0.029
Poverty gap at national poverty lines (%)	56	0.416***	0.310**	-0.259*
Poverty gap at $1.90 a day	107	0.791***	0.121	-0.283***
GINI index	107	0.503***	-0.154	0.154
III. FORMAL INSTITUTIONAL POWERLESSNESS				
Rule of Law	111	-0.781***	-0.040	0.163*
Government Effectiveness	111	-0.827***	-0.127	0.256***
Regulatory Quality	111	-0.821***	-0.044	0.186*
Public trust in politicians	100	-0.289***	-0.113	0.079
IV. FORMAL INSTITUTIONAL INSTABILITY AND UNCERTAINTY				
Policy instability	100	0.031	0.075	-0.107
Government instability/coups	100	0.063	-0.031	0.027
Transparency of government policymaking	100	-0.412***	-0.188*	0.231**

[1] Employers and own-account workers combined
Significant at *** p<0.01, ** p<0.05, * p<0.1.
Strength of the Spearman's correlation coefficient: 0.00-0.19 very weak, 0.20-0.39 weak, 0.40-0.59 moderate, 0.60-0.79 strong, 0.80-1.0 very strong.

The finding is that the share of informal employment in total employment is significantly higher when there are:

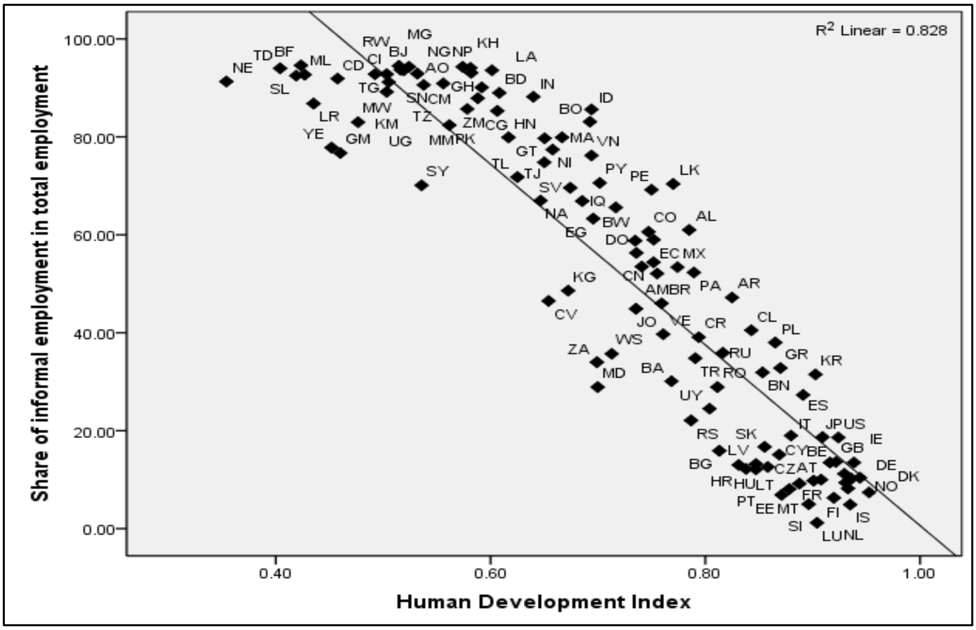
- Greater formal institutional resource misallocations and inefficiencies manifesting in:
    - the lack of modernisation of government (measured by the reliability of police services and the efficiency of government spending);
    - higher levels of corruption (indicated by multiple indicators of both perceived and actual levels of corruption).
- Greater formal institutional voids and weakness manifesting in:
    - lower levels of development (measured using GDP per capita, the Human Development Index and Social Progress Index);
    - burdensome regulations3;
    - lower (not higher) tax rates;
    - lower government expenditure and lower expenditure on social contributions;
    - higher levels of poverty.
- Greater formal institutional powerlessness manifesting in:
    - lower levels of perceived rule of law, government effectiveness, regulatory quality and public trust in politicians; and
- Greater formal institutional instability and uncertainty manifesting in:
    - low transparency of government policymaking.

These results therefore support the view that wider structural transformation is required to address the level of informality.

Figure 6 graphically portrays the strongest significant correlation, namely the one between the share of informal employment in total employment and the Human Development Index (HDI). The HDI was developed to emphasise how people and their capabilities should be key criteria of development, not economic growth alone. The HDI thus provides a summary measure of average achievement on key dimensions of human development: a long and healthy life, being knowledgeable and have a decent standard of living.

[3] Note that the burden of government regulation and its correlation with the incidence of informality is statistically insignificant, while restrictive labour market regulations are associated with *lower* degree of informality. These are contrary to a priori relationships between regulations and informality.

Figure 6. Relationship between the share of informal employment in total employment and Human Development Index



Source: Authors based on UNDP data.

To facilitate the transition to formality, these findings suggest that countries need to:

- Reduce formal institutional resource misallocations and inefficiencies by:
  - modernising government, e.g. improving the reliability of services and the efficiency of government spending;
  - reducing corruption.
- Tackle formal institutional voids and weakness by:
  - increasing GDP per capita;
  - improving the dimensions of human development, including a long and healthy life, being knowledgeable and have a decent standard of living;
  - improving the dimensions of social progress, including basic human needs, rights and education;
  - raising (not lowering) tax rates;
  - increasing government expenditure, especially, on social contributions, and
  - lessening the depth and incidence of poverty.
- Abate formal institutional powerlessness by:
  - improving the perceived rule of law, government effectiveness, regulatory quality and public trust in politicians; and
- Diminish formal institutional instability and uncertainty by:
  - enhancing the transparency of government policymaking.

1.5 Developing integrated policy frameworks

For policy makers the objective is to facilitate the transition from the informal to the formal economy rather than fight the informal economy as such, or harass informal economy actors. One key reason, especially in developing countries, is that most micro and small businesses start up or operate partially or fully in the informal economy (ILO, 2013; Autio and Acs *et al*., 2013; Fu, 2015). To pursue the eradication of such entrepreneurial ventures would therefore result in eradicating precisely the entrepreneurship and enterprise culture that the government, through other measures, fosters to facilitate economic development and growth (see Williams, 2017).

This objective of formalising the informal economy, rather than eradicating it, has significant implications for enforcement authorities. Until now, many enforcement authorities have pursued the strategic objective of reducing the informal economy. To pursue this, labour inspectorates, for example, often set a target of how many inspections they will conduct; what proportion of all inspections should identify the informal economy, and what level of fines they should generate each year.

However, if the objective is to facilitate the transition to formality, strategic objectives and key performance indicators (KPIs) need to reflect this. The strategic objective of enforcement authorities, such as labour inspectorates, should be to formalise the informal economy. Therefore, a core KPI should be the number of labour relations that are formalised each year, rather than the number of informal work cases detected and punished. Indeed, if governments are successful in formalising the informal economy, then the measure of success would be zero identification of informal work during inspections, rather than a high level of detections.

Although the precise strategic objectives and targets will need to be tailored to reflect national contexts, it is important that all enforcement authorities set targets for tackling the informal economy in a process that is: (i) not too complicated and time consuming; (ii) informed by systematic analyses of the informal economy, and (iii) involves regional/local units in a way that allows them to mutually agree on the extent to which they can contribute to achieving national targets, given local circumstances. Additional targets can also be developed at local level to address local issues, although mechanisms will be required to avoid setting too many additional targets at the local level that can lead to confusion and a lack of focus. These targets can be well communicated to all relevant levels of the organisation. Responsibilities for all these activities should be clearly defined to ensure accountability.

Enforcement authorities can then translate these targets into key performance indicators (KPIs) that are specific, measurable in a generally accepted manner, achievable, realistic and time bound (SMART) (e.g., a KPI might be to increase the number of formalised labour relations by 5 percent per annum). Furthermore, these KPIs can be well communicated and broken down to all relevant levels (regional/local offices, teams/employees). The KPIs will be measured at all relevant levels of the organisation and systematically compared with predefined targets. In doing so, key performance indicators can be adjusted for regional and/or local external factors. Responsibilities for all these activities should be again clearly defined to ensure accountability.

For transparency purposes, it is also important for an enforcement authority to share its performance measurement results indicating the achievement rate of its KPIs in a standard and easily understood format and at agreed time intervals. Different channels could be used to communicate such KPI achievement results, including reports and face-to-face information an individual or team level. The time interval should be short enough to enable useful current feedback, but also long enough ensure high data quality. There could then be a transparent and forward-looking management-by-objectives strategy with clearly described responsibilities. Furthermore, achievement reporting could be followed up by a cascaded system of top-down and bottom-up dialogues throughout the organisation, strictly based on performance indicators. In doing so, all relevant members of staff could be involved, and the main characteristics of these performance dialogues would be respect and fairness; open dialogue; empowerment; reward, and recognition. Decisions taken in the dialogue should be directly and fully implemented, monitored, assessed and (if necessary) revised. Responsibilities for all these activities should again clearly defined to ensure accountability.

1.5.1 What policy measures are required to facilitate the transition to formality?

To facilitate the transition to formality, on the one hand, there are direct tools, which ensure that benefits of operating in the formal economy outweigh the costs of working in the informal economy. These involve deterrence measures that increase the costs of non-compliance ('sticks') and/or formalisation incentive measures that make formality more beneficial and easier ('carrots'). On the other hand, there are indirect tools. These shift away from using 'sticks' and 'carrots' focusing instead on dealing with the formal institutional failings to repair the social contract between the state and its citizens in order to foster a high-trust, high-commitment culture.

Direct controls, therefore, seek to reduce the costs and increase the benefits of formality. Viewing the non-compliant as rational economic actors who engage in informality when the pay-off is greater than the expected cost of detection and punishment, the objective is to change the cost/benefit ratio for those participating or considering participation in the informal economy (e.g., Allingham and Sandmo, 1972; Hasseldine and Li, 1999; Richardson and Sawyer, 2001). This can be achieved in two ways:

- *Deterrence measures* detect and punish non-compliant behaviour. This is achieved by firstly, raising the perceived or actual likelihood of detection and/or secondly, increasing the penalties and sanctions for those caught. This approach thus seeks behaviour change by using 'sticks' to punish non-compliant behaviour.
- *Formalisation incentive measures* seek to make it easier to undertake, and reward, compliant behaviour. To achieve this, one can use either:
    - Supply-side incentives to make it easier and/or more beneficial for businesses and workers to operate in the formal economy; or
    - Demand-side incentives targeting their customers with rewards for using formal goods and services.

The problem with using these direct tools is that those operating in the informal economy are not always rational economic actors purely calculating the costs and benefits. They can also be social actors who engage in the informal economy, because there is lack of alignment between their own morality and the laws and regulations, e.g. due to a lack of trust in the state and what it strives to achieve.

Indirect controls seek to deal with the formal institutional failings and repair the social contract between the state and its citizens so as to create a high-trust, high-commitment culture (Alm et al., 1995; Torgler, 2003; Wenzel, 2002). The intention is to pursue voluntary commitment to compliant behaviour, rather than force citizens to comply using threats, harassment and/or incentives (Kirchler, 2007; Torgler, 2007, 2011). To align civic morality with state morality, one can implement either of the following:

- *Change the informal institutions* - to change the norms, values and beliefs of citizens regarding the acceptability of informal work, in order for them to be aligned with the laws and regulations, one can use awareness raising campaigns and educational initiatives about the costs of informality and benefits of formality.
- *Change the formal institutions* – this is particularly important in societies in which there is a lack of trust in government, e.g. due to public sector corruption, or in societies where citizens do not believe that they receive back from government what they expect. This can involve either:
    - Changes in the internal *processes* of the formal institutions to enhance the perception amongst citizens that there is procedural and distributive fairness and justice, and/or
    - Changes in the *products* of formal institutions by pursuing wider economic and social developments (e.g., increased social expenditure levels, more effective social transfers).

Table 2 provides a list of the policy initiatives available to institutions, including the full range of direct and indirect tools for formalising the informal economy.

Table 2. Policy measures for formalising the informal economy

Approach	**Tools**	**Policy initiatives**
Direct controls: deterrents	Improved detection	Data mining, matching and sharing Improved risk assessment methods Efficient workplace inspections Registration prior to first day at work Use of peer-to-peer surveillance (e.g. telephone hotlines to inform about abuses / cases) Certification of business, certifying payments of social contributions and taxes Use of mandatory ID in the workplace

		Supply chain responsibility
	Improved penalties	Increase sanctions Non-compliance lists ('blacklists')
	Increased perception of risk	Advertise penalties Advertise effectiveness of detection
Direct controls: formalisation incentives	Supply-side incentives	Simplification of compliance Direct tax incentives (e.g., exemptions, deductions) Indirect tax incentives (e.g., VAT reductions) Support and advice on formalisation Society-wide amnesties Individual amnesties for voluntary disclosure Notification letters Advisory inspections Compliance ('white') lists Free record-keeping software to businesses Fact sheets on record-keeping requirements Free advice/training on record-keeping
	Demand-side incentives	Targeted direct tax incentives (e.g. income tax reduction / subsidy) Targeted indirect taxes (e.g. VAT reductions) Service vouchers Initiatives for customers to request receipts (e.g. lottery for receipts) 'Black box' cash registers
Indirect controls	Change employers', workers' and customers' attitudes (informal institutions)	Education to improve tax/social contributions/labour law knowledge (e.g. production of leaflets on responsibilities) Normative appeals Awareness raising of benefits of declared work and costs of undeclared work to suppliers and/or purchasers
	Change state (formal institutions)	Measures to improve the procedural and redistributive fairness and justice of government bodies Wider economic and social developments

Source: Extended from ILO (2016a)

Facilitating the transition to formality is not a matter of choosing between either direct or indirect policy measures. Direct and indirect policy measures are not mutually exclusive. Both can be used. For example, governments may target key country-level macro-economic and social conditions that impact directly the prevalence of the informal economy, change the organisational culture of government departments, such as tax offices and labour inspectorates, towards a more customer-oriented approach, and introduce public awareness raising campaigns on the benefits of formality, whilst simplifying regulatory compliance for business start-ups and introducing incentives for employers, workers and customers to operate in the formal economy (e.g. amnesties, tax deductions). Sanctions for those failing to comply along with improvements in the ability to detect those operating in the informal economy may be also used.

The debate, therefore, is not about which set of tools should be used. Instead, the key issue is which policy measures of each approach are most effective in what context, and what is the most effective way of combining and sequencing them to facilitate formalisation. There are two alternative approaches to **combining these direct and indirect tools**:

- *Responsive regulation* - this envisages a regulatory pyramid, sequenced from the least intrusive indirect controls at the bottom to be used first, to the most intrusive direct controls at the top. The idea is that, in most cases, an authority does not need to pursue the coercion option at the top of the pyramid to win compliance. Instead, it can start with the indirect tools at the bottom of the pyramid and if these fail to prompt behaviour change in some groups, then the level of intrusiveness escalates up the pyramid until it reaches the intervention that elicits the desired response (Braithwaite, 2002, 2009). The outcome is that policy measures are temporally sequenced. In the first instance, indirect controls are used to facilitate voluntary self-regulated compliance, followed by persuasion using incentives and only then punitive measures for those still failing to comply (Braithwaite, 2009; Job et al., 2007). The Australian government for example has adopted this 'responsive regulation' approach, as has Her Majesty's Revenue and Customs authority in UK.
- *Full toolbox operationalisation model* - this argues that citizens abide by the law either because they fear detection and fines due to the power of authorities (**enforced compliance**) or because they feel a commitment to be honest, because they have trust in the authorities (**voluntary cooperation**). When there is effective enforced compliance as well as high voluntary cooperation (i.e., both power and trust), the informal economy is small. When there is ineffective enforced compliance and little voluntary cooperation, the informal economy is more extensive (Alm and Torgler, 2011; Alm et al., 2012; Kastlunger et al., 2013; Khurana and Diwan, 2014; Kirchler et al., 2008; Kogler et al., 2015; Muehlbacher et al., 2011a, b; Prinz et al., 2013; Williams, 2014a; Williams and Horodnic, 2017).

Growing evidence indicates that the concurrent use of voluntary and enforced compliance is the most effective approach. Kogler *et al.* (2013) report an experiment on how changing perceptions of the power of authorities and citizens' trust in authorities influence compliance in four countries: Austria, Hungary, Romania, and Russia. The finding is that intentions to declare taxes honestly were highest in all countries if the authorities were described as powerful and trustworthy. Evasion was high if both power and trust were at a minimum. In addition, perceptions of high power boosted enforced compliance, whereas high trust was related to strong voluntary cooperation. Kogler *et al*. (2015), moreover, find that perceptions of procedural and distributive justice predict the level of voluntary compliance.

Williams and Horodnic (2017), meanwhile, examining 28 European countries, find that combining both direct and indirect controls is the most effective means of promoting formality. However, when the asymmetry between formal and informal institutions is low, deterrence measures have little impact on the level of informality, and it is only when the gap between formal and informal institutions widens that raising the level of deterrents has greater impacts. Moreover, increasing the perceived risks of detection in such contexts is more effective at promoting formality than increasing the perceived punishments.

This recognition that both effective enforced compliance and high voluntary cooperation are essential for tackling the informal economy is not only being used more widely, exemplified in its adoption by 30 countries that are members of the European Platform Tackling Undeclared Work (Williams, 2016), but is also resulting in the adoption of some innovative policy measures.

Conventionally, for example, penalties have been used to deter participation in informality. However, an example from Greece shows how penalty systems can also be used to facilitate the transition to formality (see Box 5).

Box 1. Designing penalty systems to facilitate the transition to formality, Greece

To facilitate the transition to formality, Greece has redesigned its penalty system. The fine for employers is set at 10,500 euros for each informal employee. However, the employer can hire and formally register the informal employee within 10 days to have the fine decreased as follows: 7,000 euros if they hire the employee for 3 months; 5,000 euros if they hire the employee for 6 months, and 3,000 euros if they hire the employee for 12 months.

Outcomes

In 2017, before the new sanctions system, only 32 percent of detected informal workers were hired formally by the employer. Two-thirds were hired on a part-time basis and only one-third full-time.

For the period August 2018 - February 2019, since the new sanctions system has been introduced, 45 percent of detected informal employees have been hired by the employer, all of them on a full-time basis. Of those hired formally, 91 percent have been hired for 12 months, 3 percent for 6 months, and 6 percent for 3 months.

The innovative aspect of this penalty system, therefore, is that it is designed to encourage the transition to formality, rather than simply to punish informality.

To improve the risk of detection, meanwhile, most countries use workplace inspections. Modern enforcement authorities are increasingly using data mining and matching to identify high-risk businesses for inspection, complementing the qualitative judgements with the experience and local knowledge of inspectors (European Platform Tackling Undeclared Work, 2017). However, this requires the development of effective risk assessment tools to detect potentially non-compliant businesses (European Platform Tackling Undeclared Work, 2018). Such risk assessment of businesses using data mining and matching, moreover, can be used not only to help targeted inspections but also for preventative purposes, such as to target advice and support, awareness raising campaigns and notification letters (see Williams, 2018, 2019).

Besides improving sanctions and the perceived or actual risk of detection so as to facilitate the transition to formality, authorities can also improve the benefits of formalisation. To do so, either supply- or demand-side incentives can be used.

Supply-side incentives promote the transition to formality by making legitimacy beneficial and easier for employers and workers. Simplifying compliance to make it easier to operate formally is one common initiative in this regard (see Box 6).

Box 2. Simplification of employment for seasonal workers, Hungary

The *2010 Simplified Employment Act (Egyszerűsített foglalkoztatási törvény)* in Hungary was introduced to make it easier for seasonal and temporary employment to be conducted in the formal economy. Before this Act, employers had to manually complete in duplicate an official attendance sheet with 18 pieces of information for every seasonal worker in a 'Temporary Work Booklet'. This booklet was a breeding ground for labour infringements, because employers engaged in erasing and rewriting contracts, e.g. by using special inks that could be erased using heat on the paper.

From 2010, the Simplified Employment Act introduced electronic registration stating the exact data and time of registration. Since 2017, a mobile app has been used. This enables the simplified work contract to be notified either by a simple text message (SMS) or online via the Client Gate System after they are registered and in the system (https://ugyfelkapu.magyarorszag.hu/). All obligations are fulfilled by entering two codes into the text message or into the Client Gate System.

This makes formal labour relations much easier, and workers can be easily unregistered if they do not turn up. There is also a database for inspectors making it easy to detect infringements.

Further information:
https://ec.europa.eu/social/BlobServlet?docId=21457&langId=en

The innovative aspect of this penalty system, therefore, is that it is designed to encourage the transition to formality, rather than simply to punish informality.

Another supply-side initiative used by modern enforcement authorities derives from behavioural economics and seeks to 'nudge' behaviour towards compliance using notification letters. Notification letters are post or email communications from enforcement agencies to companies or workers, providing information on applicable legal obligations and systems of control in place (Williams, 2019). These have been widely used by tax authorities. An initiative in Canada found that friendly nudge letters collected 12 percent more taxes owed than the standard punitive letter (Beeby, 2017). In Costa Rica, meanwhile, firms who had not submitted an income tax declaration received from the tax authority either (i) no email, (ii) a behaviourally informed email (personalised including a deterrence message and a direct web link), or (iii) the same email but with examples of transactions of the firm. While 11.5 percent of businesses receiving no email submitted declarations, 32.5 percent of those sent a behaviourally informed email did so. Including third-party information in the email increased declaration rate to 34.2 percent of businesses. These notification emails also significantly increased the tax filing rate of the businesses receiving them in the following tax year, with no further communication (Brockmeyer et al., 2016). They are now also starting to be used in labour inspectorates, for instance in Estonia, Lithuania and Spain (see Williams, 2019).

Besides making it easier and/or beneficial for suppliers to operate formally, demand-side incentives make it easier and/or beneficial for those who might potentially purchase from the informal economy to use the formal economy. Initiatives include the use of service vouchers, electronic payment systems to reduce cash usage, receipts lotteries, and consumer labelling initiatives (Williams, 2018). Again, examples exist of conventional deterrence measures being modified in a way that provides incentives for consumers to purchase from the formal economy (see Box 7).

Box 3. 'Black box' cash registers, Slovenia

In Slovenia, a conventional deterrent measure has been designed so that purchasers are incentivised to purchase in the formal economy. Like other countries, certified cash registers, which automatically report transactions to the tax administration, have been introduced. In 2018, 54,213 taxpayers were using fiscal cash registers, that issued 1,019,669,639 invoices (2.8 million per day).

What is innovative in Slovenia is that purchasers can electronically check whether the invoice has been verified, using a 'Check the invoice' app to scan the code on the invoice. To incentivise purchasers, those doing so are automatically entered into a receipt lottery with a prize fund which pays up to 25,000 euros.
The outcome is that the number of offences detected have increased from 1,978 in 2016 to 3,135 in 2018, resulting in fines totalling 2.9 million euros in 2016 and 5.9 million euros in 2018.

Besides providing incentives to encourage formality, there has been recognition that informality is not always a purely rational economic decision. Non-compliance often results from a lack trust in the state and/or a lack of understanding of the benefits of compliance (see Williams, 2018). Education and awareness raising campaigns can therefore play a key role in promoting the transition to formality.

The use of education and awareness raising regarding the benefits of formality (and costs of informality) has become increasingly popular among enforcement authorities (see Williams, 2018). Having learnt lessons from marketing campaigns more widely, celebrity endorsement has been sometimes used by tax and labour administrations in their marketing campaigns. An early example was the Internal Revenue Service in the USA in 2007. During the tax filing season, they sponsored a rap video contest, with an award of $25,000 for the best tax video. The contest was introduced with a rap video called Turbo Tax Mojo by Vanilla Ice (available at http://www.youtube.com/watch?v=eMudXTz4NuQ), which urged people to pay their taxes on time and to use Turbo Tax to do so.

More widely, there is accumulating evidence and practical advice available on how to plan and execute an awareness raising campaign. Box 8 provides useful advice on how to do so from EU-OSHA (European Union information agency for occupational safety and health) when conducting campaigns in the field of safety and health at work, but which are easily applied to marketing campaigns on the benefits of formality.

Box 4. Planning an awareness raising campaign: a step-by-step guide

1. **Deciding objectives.** Before you develop the specific message of your campaign, and the necessary supporting arguments, you need to have a clear goal in mind. Read more
2. **Choosing a title.** To have a chance at making an impact on the people you want to reach, your title should be as short and simple as possible and relevant to your target audience. Read more
3. **Selecting the audience.** Knowing your target audience and age range will determine your campaign and the tools needed. Read more
4. **Timing**. Timing is a key factor in any campaign, both in terms of when to launch the campaign and the campaign duration. Read more
5. **Geographic area**. Choose which sectors or geographic area will be included. Read more
6. **Message**. Think carefully about the main campaign message and what you are trying to communicate through your campaign. Read more
7. **Branding your campaign**. A catchy slogan, a striking logo and campaign branding can be used to grab your audience's attention. Read more
8. **Reaching your audiences**. Most campaigns involve several media, from press releases and magazine articles to posters and direct mail shots. Read more
9. **Define** your expected results. Communication is most effective when it is related to something practical and tangible.

Source: http://toolkit.osha.europa.eu/how-to-run-a-campaign/plan-your-campaign/

A final policy approach is to seek to modernise enforcement authorities by making them more customer-friendly and approachable, to improve trust in government and, therefore, prevent participation in the informal economy. Box 9 details how the State Labour Inspectorate in Latvia recognised the need to shift it strategic approach away from detecting and punishing participation in the informal economy and towards facilitating the transition to formality.

Box 5. Modernising a labour inspectorate: a case study of Latvia

The Latvian State Labour Inspectorate, recognising the need to switch from detecting and punishing non-compliance to pursuing the transition to formality, has developed a new strategy for 2018-2019 and changed its strategic objectives. This has some broader key lessons for labour inspectorates across the world.

The labour inspectorate has recognised that the traditional Key Performance Indicators (KPIs) of the number of inspections undertaken and the proportion of identified informality cases are no longer relevant if their objective is to formalise the informal economy. A high number of detected cases in inspections is rather a measure of the labour inspectorate's failure to formalise the informal economy.

Previously, therefore, their KPIs were the number of inspections conducted and the effectiveness indicator of the number of instances of informal labour identified (set at 25 percent of inspections). In the new strategy, the labour inspectorate has adopted new pilot KPIs, which include:

- the number of legitimised labour relations (using 2018 as a base and then seeking a 10 percent increase in 2019), and
- the number of advice/support consultations provided (with enterprises selected from two sectors where the informal economy is prevalent as pilots).

An initial finding is that in 76 percent of the cases where informal work was encountered, the persons received a formal labour agreement or had been registered with the State Revenue Service.

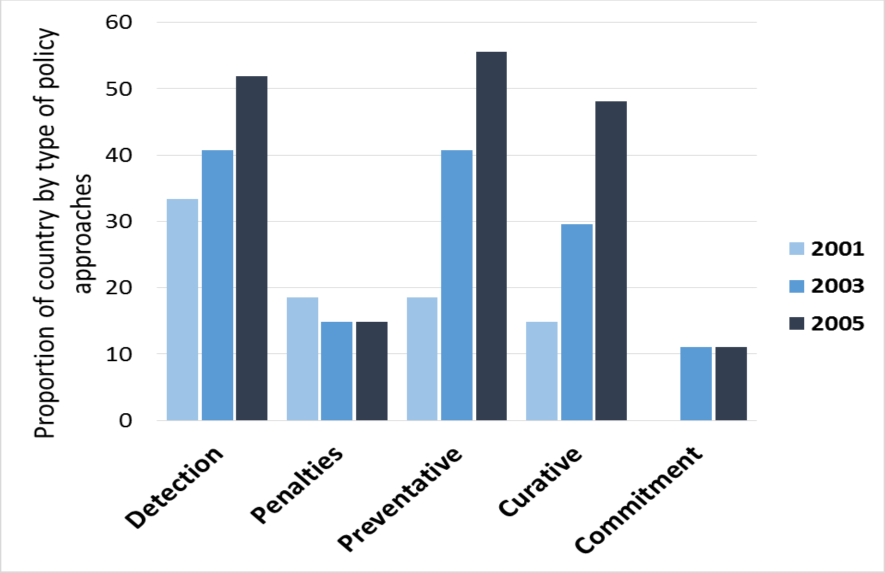
Further information:
https://ec.europa.eu/social/BlobServlet?docId=21461&langId=en

1.5.2 The need for new compliance systems and mechanisms

Multi-stakeholder and integrated strategies should be based on a balanced approach through the implementation of new compliance systems and mechanisms combining incentives with deterrence and sanction measures. The ILO Recommendation No.204 is clear on the need for member states to take appropriate measures, including a combination of preventive measures, law enforcement and effective sanctions, to address tax evasion and avoidance of social contributions, labour laws and regulations. Where appropriate, the barriers to the transition to the formal economy should be reduced and measures to promote anticorruption efforts and good governance should be taken. Especially for SMEs, there is a need to provide incentives for, and promote the advantages of, effective transition to the formal economy, including improved access to business services, finance, infrastructure, markets, technology, education and skills programmes, and property rights. However, any incentive should be intended to facilitate the effective and timely transition from the informal to the formal economy. That is why compliance mechanisms and enforcement bodies are so important for an integrated strategy to be effective. Compliance mechanisms should be therefore revised according to the drivers of informalization in in such a way as to promote the transition to formality and not only to sanction those operating informally.

In Europe and Latin America, there are some major changes in compliance mechanisms in a way to facilitate the transition from the informal to the formal economy taking into account the need to ensure opportunities for income security, livelihood and entrepreneurship of those currently trapped in the informal economy. As regards fighting undeclared work in European Union, one can see a significant evolution in the mix of interventions combining deterrence measures with preventive and curative measures (see Figure 7).

Figure 7. Approaches used to tackle undeclared work in EU27 (2001-2005)



Source: Eurofound, 2013, Tackling undeclared work in 27 European Union Member States and Norway - *Approaches and measures since 2008* (Dublin: Eurofound)

At the level of operations, meanwhile, it is traditionally the case that different enforcement bodies conduct separate inspections in an uncoordinated manner. A more business-friendly and effective approach could be to engage in greater coordination, e.g. by conducting joint and concerted operations. To shift in this direction, each enforcement authority could be given a target of conducting a share of its inspections as joint or concerted operations.

At the level of data mining, analysis and sharing, problems often exist in enforcement authorities sharing data with each other. A way forward could be the conclusion of bilateral or multilateral agreements with other enforcement authorities on the issue of data mining, analysis or sharing. Box 6 provides a Finnish example of how the traditional problems with data sharing have been overcome by creating one central unit that provides data mining and analysis service to all government ministries involved in tackling the informal economy.

Box 6. Data sharing: Grey Economy Information Unit (GEIU), Finland

The Grey Economy Information Unit (*Harmaan talouden selvitysyksikkö*), a specialist unit within the Finnish tax administration, gathers information and conducts investigations on the informal economy. The unit is authorized to keep a database in the spirit of the Data Protection Directive (95/46/EC,1995), containing information necessary for the preparation of reports (at individual, sectoral or national level) for all authorities involved in tackling the informal economy. This permanent structure removes barriers and limits to the exchange of information between authorities.

The GEIU combines and synthesizes data from existing databases in a register, as well as other information held by various authorities, in order to support operational actions against the informal economy. Currently, there are 21 authorities with permission to request reports from the GEIU. Compliance reports are automatically delivered to the information system of the requesting authority.

Source: https://ec.europa.eu/social/BlobServlet?docId=18511&langId=en

For many enforcement authorities, however, the problem is not so much data sharing or analysis, but rather gaining access to data on businesses and employment records. To be effective, therefore, a data mining objective of all enforcement authorities is to develop a support structure that enables and informs inspections, such as a data mining IT system, which has inter-operability with the databases of other Ministries involved in tackling the informal economy, thus enabling effective data mining and sharing. This structure includes the collection and storage of comprehensive and high-quality, up-to-date individual-level data about customers. The data needs to be made available to all relevant levels of the organisation, including inspectors. A cross-government ICT infrastructure should be in place to actively support the implementation of standardised processes. The design and architecture of the ICT infrastructure will reflect the operational needs of the enforcement bodies and be updatable without prohibitively high effort. Responsibilities for all these activities can be clearly defined to ensure accountability.

In sum, if these developments are pursued at the levels of strategy, operations, and data mining, analysis and sharing, then more effective joined-up cooperation between the multifarious institutions involved in facilitating the transition to formality will be made possible.

1.6 Policy coherence and coordination

Implementing the various types of structural transformation and multidimensional policies, that are needed to tackle informality, is beyond the competence of the individual enforcement authorities traditionally seen as responsible for addressing informality (e.g., labour inspectorates, tax administrations). Instead, a joined-up cross-government integrated approach towards formalising the informal economy is required. Addressing both the challenges of an integrated policy framework and formal institutional failings requires a whole government approach for policy coherence and coordination.

For this to be implemented, there is a need for both an integrated policy framework – either a law, an action plan, a roadmap or national formalization strategy – and a central coordinating body within government to take responsibility for overseeing and coordinating the strategy on formalising the informal economy.

Box 7. Policy coherence through a new legal framework: The case of Mexico and Colombia[4]

In Mexico, on July 22nd of 2013, the Program for Labour Formalization was adopted by law. It set up a framework through which 32 federal states, the Mexican Institute for Social Security (IMSS) and the Secretariat of Labour and Social Welfare (STPS) would coordinate actions in order to include informal and unregistered workers in the social security system, especially those workers from medium and large firms. An innovative feature of this plan was that it had a quantitative goal: in 2013 the goal was to formalize two hundred thousand workers. The Plan included, in particular, the following components: i) interinstitutional coordination among the IMSS and the STPS, the labour authorities of the federal states and the employers' organizations, in order to establish concerted actions for employers to register undeclared employees in the IMSS ; ii) voluntary registration of some specific categories of workers in the IMSS, according to article 13 of the Social Security Law; and iii) improvement of compliance with Federal labour laws through public contracts, and issuance or renewal of permits and licences (at state, federal or municipal levels) for some economic activities (telecommunications, mining, energy, financial services, transport, fuel commercialization and distribution). This initiative was later extended through the strategy "*Crezcamos Juntos*" (Let's grow together), created in 2014, which integrated new actions in the Special Tax Regime for SMEs (*Régimen de Incorporación Fiscal*) intended to: i) combat informality; ii) innovate in the generation of incentives for those you can't get out from the informal economy, such as the Special Tax Regime (Régimen de Incorporación Fiscal) and the Special Regime for access to Social Security; and iii) improve communication at all levels, across the country, so as to disseminate the benefits of formality and establish an environment that enables informal economy operators to engage in the transition to formality process. The *Crezcamos Juntos* strategy also included the successful single tax system adopted in Argentina and Brazil, which links a simplified and more appropriate tax regime for MSEs to access to some social protection benefits such as a health insurance, a pension scheme or access to housing.

[4] We are grateful to Vicky Leung and Juan Chacaltana for their valuable inputs to that Box.

Colombia adopted in 2010 a new law (*Ley de Formalización y Generación de Empleo, No. 14*29), which aimed at formalizing informal jobs and businesses, creating more jobs in the formal economy and strengthening the income generating capacities of workers operating in the informal economy, the unemployed, and small entrepreneurs. This law covers six main areas related to formalization: i) business development programmes; ii) temporary relief of the regulatory burden for small firms; iii) incentives for the creation of jobs for groups facing certain barriers to employment; iv) regulation of worker cooperatives; v) streamlining of procedures; and vi) establishing a national observatory on employment demand. In terms of business development programs, the Government (led by the Ministry of Trade, Manufacturing and Tourism) committed itself to reviewing existing programmes and designing new instruments of business development, as necessary, in order to create a package of benefits for companies that formalize their activity. With a view to reducing the regulatory burden of small firms employing up to 50 employees and holding total assets worth no more than 5,000 minimum wages, the Law introduces size-related contribution rates and exemptions from income taxes (indefinite character), parafiscal contributions, business registration fees (to be used only by companies benefiting from the Law until the end of 2014), and contributions to the Solidarity and Guarantee Fund (Fondo de Solidaridad y Garantía, FOSYGA). Similar incentives were also put in place by local governments, including specific tax reduction and elimination of fees related to new business registration.

Joined-up integrated strategy requires a high-level government body, which has the competence to address the full range of formal institutional conditions that are necessary to facilitate the transition to formality. It also needs to involve high-level social partners and other stakeholders. Once the key stakeholders with whom institutions involved in facilitating formality need to develop partnerships have been identified, then the coordination mechanisms must be considered. These coordination mechanisms involve three functional levels: strategy; operations; and data mining, analysis and sharing.

An example of a country having implemented this is Azerbaijan, where the Commission on the Regulation and Coordination of Labour Relations, chaired by the Deputy Prime Minister, and whose Secretariat is based in the Ministry of Labour and Social Protection of the Population of the Republic of Azerbaijan, has been established to coordinate and join-up strategy. In 2017, a coordinated cross-government Action Plan for the prevention of informal employment in the Republic of Azerbaijan was elaborated and approved by Order nr.3287, dated 9 October 2017, issued by the President of the Republic of Azerbaijan The Plan covered 36 policy areas.

In Latvia, similarly, a high-level Shadow Economy Combating Board oversees the development of a coordinated and integrated strategic approach. This consists of the Prime Minister, the Minister of Economics, the Minister of Finance, the Minister of Internal Affairs, the Minister of Welfare, the Minister of Transport, the Minister of Justice, the Minister of Health, the Minister of Agriculture, the Solicitor General, the Head of the Corruption Prevention and Combating Bureau, the Head of the State Labour Inspectorate, the Head of the State Revenue Service, the Head of the State Police

Department, and the Head of the State Health Inspectorate. It also includes social partners, namely, the President of the Employer's Federation of Latvia, the Chairman of the Municipality Association of Latvia, the Chairman of the Free Unions of Latvia, and the President of the Trade and Industry Chamber of Latvia. It has produced an Action Plan for 2016-2020, coordinating some 30 different institutions listed as being involved in tackling informality.

In both examples, however, there has been limited experimentation with cross-cutting, shared strategic objectives and key performance indicators (KPIs) across institutions so far, to establish and facilitate a more integrated strategic approach. Their usage could be experimented with in countries that in future establish such whole government coordinating bodies.

At the level of strategy, it would be necessary to join up the individual strategies of the various institutions involved in tackling informality. At present, in many countries, different government departments are responsible for different aspects of the transition to formality (e.g., tax authorities for tax compliance, labour inspectorates for labour law and social insurance bodies for social security compliance). A way forward could be to develop a single national body responsible for coordinating the overall strategy on informal economy, as outlined above. Once established, it might also be considered whether this body sets national targets for the transition to formality that are common across government, or develops shared targets for some government agencies, or whether all government departments are maintained along with their individual targets, but are joined-up and coordinated by this national body. Each institution, therefore, needs strategic objectives and targets that reflect the overall national strategy.

Different countries are at various stages of developing such a joined-up integrated strategy for facilitating the transition to formality. Countries are responding to this challenge in different ways depending on their national circumstances and institutions. As the result of adopting a new law on formalization or launching a large national action plan or a strategy on formalization, one can observe the emergence of new coordination bodies and mechanisms which can be associated to a specific Ministry (Labour, Economy and finance, Trade or Small enterprises) or to the Prime Minister or President Office. In some countries, a tripartite or bipartite body is established to coordinate the efforts towards formalization.

In some countries, government departments work largely in 'silos' and cooperation with social partners is limited. In others, there is more developed partnership working involving a national strategic coordinating body, joined-up cross-government operations, well-developed databases shared with all relevant stakeholders, and central units that provide data mining and analysis functions. All countries therefore need to identify the stage they have reached in developing an integrated strategic approach, as well as the barriers to a more joined-up approach and how these might be overcome. Similarly, labour, tax and social security institutions, as well as other stakeholders and social partners, in a country also need to identify the key actors in facilitating the transition to formality and the type of partnership required, and to develop coordination mechanisms at three levels: strategy; operations; and data mining, analysis and sharing.

Whereas there is a growing consensus worldwide about the need to facilitate transition from the informal to the formal economy, there are often diverging views between the government, workers and employers about the diagnostics of the situation (in particular the drivers of informalization and obstacles to formalization), priority policy areas and the sequencing of an integrated strategy to tackle the challenge of the informal economy. To design an effective integrated strategy, which will be owned by all the stakeholders, it is important that the concerns and priorities of each party be reflected in the strategy and that consensus on the objectives of such strategy be obtainned through social dialogue mechanisms (see Boxes 8 and 9). The ultimate objective of transition to formality should be inclusive development and decent work rather than formalization per se. Thus, it should be clear that cooperating for transition to formality is a win-win game for all at the end. Social dialogue plays a crucial role in incorporating the concerns and priorities of all the key stakeholders into the formulation process, which is essential for building confidence in the win-win nature of the transition to formality.

Box 8. The Roadmap for tackling undeclared work in Greece

In August 2015, the European Stability Mechanism support programme for Greece was approved by the Greek authorities and the European Commission. Its Memorandum of Understanding included a key deliverable which was that "the authorities will adopt an integrated action plan to fight undeclared and under-declared work in order to strengthen the competitiveness of legal companies and protect workers as well as raise tax and social security revenues".

In that context, the ILO, in close collaboration with the Government and the social partners in Greece, formulated an EU-funded project on “Supporting the transition from informal to formal economy and addressing undeclared work in Greece”. This project started in February 2016 and it aimed at assessing undeclared work (UDW) patterns in Greece, helping design policy measures to tackle UDW, and strengthening the labour inspection system through exchange of best practices, training and pilot activities.

One of the main outcomes of the 2016 project was the publication of a *Diagnostic report on undeclared work in Greece*, which was validated on 6th July 2016 at a high level tripartite meeting, bringing together the Minister of Labour, Social Insurance and Social Solidarity, the President of Greek General Confederation of Labour and Presidents of employers’ organizations. The validation was a very important stage of the ILO project, as it aimed at building consensus on both the nature and characteristics of undeclared work in Greece and the priority measures to implement in order to tackle that problem. The tripartite validation provided the needed trust and commitment to drafting a roadmap to tackle undeclared work in Greece, a second key deliverable of the ILO project, which was validated on 26th October 2016 at a high-level tripartite event. The validation of the roadmap aimed at building consensus on priority policy measures to tackle undeclared work in Greece and provided solid ground for political commitment and for the implementation of the integrated strategy proposed in the roadmap. The roadmap contained a sequence of interrelated actions, which would support the fight against undeclared work in Greece between 2017 and 2019.

The formulation of both the diagnostic report and the roadmap was based on tripartite mechanisms to ensure the ownership, relevance and implementation of their outputs by all parties; in other words, an integrated strategy based on a balanced approach combining deterrence, preventive and curative measures. Indeed, at all stages, the ILO provided the technical and dialogue space for the Government and workers' and employers' organizations to express their concerns, priorities and build a consensus about the appropriate pathway for Greece.

A prerequisite for both the implementation and the monitoring of the roadmap was the establishment of a national tripartite institutional body. This was set up under **Law 4468/2017** of 28.04.2017 and convened for the first time on 25 September 2017. The tripartite Committee on tackling undeclared work under the Supreme labour Council (ASE) was established, in consultation with the social partners, with equal representation of the Government and the national social partners (4 representatives from the Government, 4 from the employers and 4 from the workers). The tripartite Committee of ASE is responsible for steering and monitoring the implementation of the roadmap, involving social partners in the design and implementation of economic, employment and social policies. In its first two years of activity, ASE met 14 times and proved a very effective dialogue and consensus building space for the implementation of the Roadmap.

Box 9. The National Strategy for Transition to formality in Côte d'Ivoire

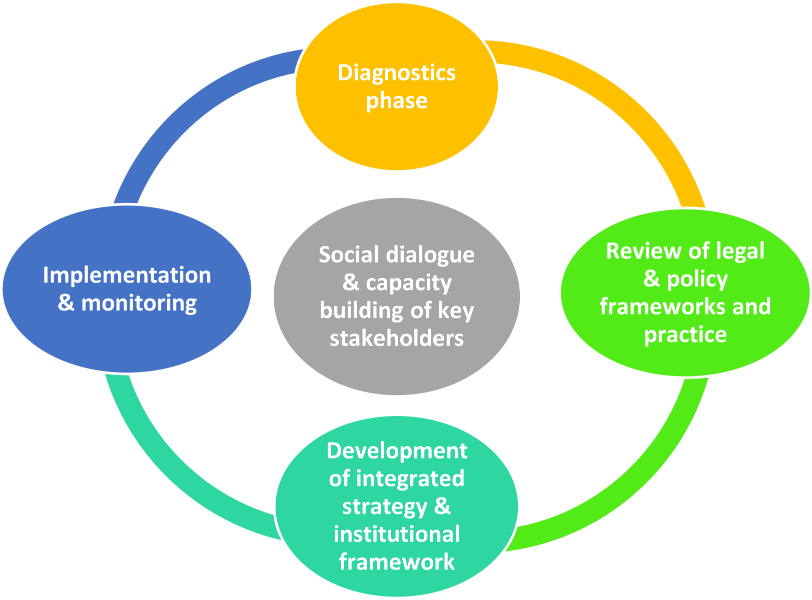
Despite the recent improvement of the business environment, the informal economy continues to spread and currently accounts for 93.6% of the jobs at national level (national estimates, 2016) and even higher in certain segments of the population (96.8 % of women are in informal employment, 95.2% of young people less than 25 years). For too long, the Government responses to this challenge were not coordinated and there was no integrated legal and policy framework for policy coherency in facilitating transition to formality. This lack of synergy seriously undermines the pooling of available resources, the effectiveness of the measures implemented and the visibility and readability of the Government actions. Therefore, in 2019, the Ivorian Government, through the Ministry of Labour and Social Protection, launched the formulation of an integrated national strategy on transition to formality based on a participatory diagnostic process which: i) provided key information about the characteristics and drivers of the informal economy in Côte d'Ivoire, and ii) identified 4 main components to be combined in an integrated strategy, namely the legal and regulatory component, the productive component, the working condition component and the representation and social dialogue component.

The formulation process of the Integrated National Strategy brought together 32 national structures (Ministries, public agencies, workers and employers' organizations, associations of those in the informal economy), which were directly involved in designing the 4 components of the national strategy to facilitate transition to formality. Those stakeholders worked in thematic groups to review the relevance and effectiveness of the existing legal and policy frameworks and to develop a set of policies and measures aiming at supporting the transition to formality. This participatory and multi-stakeholders process was based on strong social dialogue mechanisms and the creation of a consensus building space. It proved very effective in formulating an integrated strategy which took on board the priority and concerns of all sides and set a series of indicators and targets to be achieved.

A coordinating body at national level is not the only requisite for a joined-up integrated strategic approach. Each institution involved in facilitating the transition to formality (e.g., the labour, tax and social security institutions, as well as other stakeholders and social partners) also needs to consider its key stakeholders in facilitating the transition to formality.

In conclusion, effective policy making in the field of transition to formality requires a specific intervention model, which ensures smooth functioning and delivery of the integrated strategy. Figure 8 below illustrates such a model that places social dialogue mechanisms and capacity building of key stakeholders at the heart of the process, so as to ensure both the relevance of the priorities and the commitment of the stakeholders to implementing the strategy.

Figure 8: Intervention model for integrated strategies



1.7 Concluding remarks

It is widely acknowledged that there is a fragmented and uncoordinated approach across the multifarious government bodies responsible for facilitating the transition to formality, limited integration of social partners, and a narrow range of implemented policy measures. The result is the lack of a coordinated, joined-up whole government approach and failure to use the full range of policy measures available to governments all too often. Therefore, there is a need to elaborate a more coordinated, joined-up approach and to put in place the institutions required for managing an integrated strategy to facilitate the transition to formality.

Different countries are at various stages of establishing effective cooperation in the pursuit of a joined-up integrated strategy. In some countries, there is already a high-level national coordinating body and, perhaps, the major issue is to develop cross-cutting shared objectives and key performance indicators. Such countries, despite the joined-up strategy, might also need to shift the focus to joint operations and data mining, analysis and sharing by developing joined-up cross-government operations, well-developed data-bases shared among all relevant stakeholders, and central units that provide data mining and analysis functions.

In other countries, however, more developed partnership working is already in place at the level of operations and/or data sharing, but there might not be a national coordinating body at the level of strategy. In yet other countries, government departments work largely in 'silos' on either strategy, operations and/or data mining, analysis and sharing, and/or there will be low levels of cooperation with social partners. Perhaps the first step all countries should therefore take is to identify: the stage they have reached in developing a whole government approach towards the transition to formality; and the barriers that prevent a more joined-up approach in areas where they are under-developed, and how these might be overcome.

Even though structural transformation is a necessary condition for the employment formalisation process, experience shows that it is the interaction between that process and specific policies that ultimately determine policy effectiveness and the tangible results observed in terms of a transition to formality (Lapeyre and Barussaud, 2019). Policy work for structural transformation, as described above, needs to be mixed with specific policies fostering the transition from informality to formality (especially for some vulnerable groups including women, young people, migrants, older people, indigenous and tribal peoples, persons living with HIV or affected by HIV or AIDS, persons with disabilities, domestic workers and subsistence farmers).

Mainstreaming and strengthening the transition to formality in policy making is a key component of any strategy aiming at promoting formalization. It goes hand in hand with developing monitoring mechanisms, providing information on the impact of those policies and integrated policy framework on employment. Now that a growing number of governments and international organizations have set specific objectives regarding job creation, decent work and reduction in informal employment, it is crucial to develop employment impact assessment tools – both quantitative and qualitative – for the new employment policy frameworks. Indeed, once public resources are channelled through state budget and cooperation programmes to promote more and better jobs are developed, there is a crucial need to design and implement methodologies to measure the direct, indirect and induced effects on informal employment. It is especially important for assessing sectoral policies (public investment in infrastructure, skills development, macroeconomic and trade policies) aimed at facilitating structural transformation for the transition to formality.

Across all countries, when decisions are taken on policy initiatives, there is a need for evidence-based evaluation to assess their effectiveness at facilitating formality. To do this, enforcement authorities should conduct both ex-ante and ex-post evaluation, as applicable (see Box 10).

Box 10. Ex-ante and ex-post evaluation of policy initiatives

An enforcement authority can conduct a transparent and comprehensible ex-ante evaluation of specific initiatives undertaken. A standardised format (e.g. SWOT analysis, counterfactual analysis) can be used combining the results of high-quality ex-post evaluations (e.g. for comparable services) with rigorous theoretical reasoning on the likely effects of the specific service design. High-quality ex-post evaluations take account of the integration of service provision into the organisational practice (e.g. by defining responsibilities, communicating the goals of specific services, providing guidelines/handbooks, defining performance indicators etc.) and the practical provision of the services. Thus, high-quality ex-post evaluations comprise an appropriate combination of implementation and impact analyses. Usually, implementation and impact analyses are combined in a way that allows the identification of differences in causal impacts conditional on differences of specific implementation 'types'.

Furthermore, enforcement authorities can adopt the good practice of using pilot studies when introducing and evaluating the feasibility of new policy initiatives (see Box 11).

Box 11. Pilot studies

An enforcement authority can conduct pilot projects in cases where ex-ante evaluations do not provide evidence on positive results of a specific service/policy initiative. Pilot projects are used in a limited number of offices or with a limited number of customers (e.g., sectors) to gain experience/insights in the effects of such services/policy initiatives while minimising possible negative side effects. The effects of such pilot projects are evaluated rigorously using the above-mentioned combination of implementation and impact analyses. Furthermore, it should be considered that results of pilot projects can be subject to (positive as well as negative) biases and that the extrapolation of such results to the organisation as a whole has to be done very carefully.

Adopting pilot studies facilitates the use of a 'test, learn and adapt' evidence-based approach by enforcement authorities. Take, for example, a pilot project on the use of notification letters sent to businesses advising them to put their affairs in order. Following a first round of notification letters to test various formats (e.g. hard and soft letters, followed by inspections, emails and posted letters), the results can be analysed and lessons learned. The second round of such notification letters can then use what has been found to work in the previous round, and experiment with small variants to further improve their effectiveness. For example, if hard notification letters sent by email accompanied with the announcement of an inspection are found to be effective, then the second round can experiment for instance with comparing stating and not stating an inspection date. Using this 'test, learn and adapt' approach, a more effective use of notification letters can emerge.

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Part I: The role of inclusive structural transformation

Chapter 2

Inclusive structural transformation and transition to formality: issues, evidence and country-specific experiences

Iyanatul Islam

The notion of the informal economy has been associated with the ILO since the early 1970s[4], but it was only in the 2000s that specific instruments (notably Convention No. 189 and Recommendation No.204) were developed to support member states to facilitate the transition to formality.[5] On the other hand, a competing paradigm – known as the 'shadow economy' - has evolved over this period through the aegis of the international financial institutions. It is important to make a conceptual distinction between the shadow economy and the ILO-supported notion of the informal economy. The former regards informality as a voluntary act by individuals and enterprises (such as incentives for tax avoidance and evasion and the general urge to avoid and evade government regulations).[6] The latter considers informality as the product of compulsion rather than choice, since individuals and enterprises are trapped in low-productivity activities in informal work and business ventures, because they face formidable barriers to entry into the formal, more productive and better remunerated part of the economy.[7] Hence, it is important not to conflate alternative intellectual frameworks and the policy prescriptions that follow from them. In particular, the agenda of the transition to formality should not be reduced to a case of improving the business climate, including enhancing labour market flexibility, that will usher private sector-led structural transformation. This will be contrary to the spirit and substance of the ILO's notion of the transition to formality, which embraces a holistic policy agenda and tethers it to the goal of fostering 'inclusive' structural transformation (as envisaged in Recommendation 204).

2.1 Structure of the chapter

Given such a background, the proposed policy paper will seek to elaborate on the following issues in a concise manner.

[4] There is, of course, a large ILO-inspired literature on the informal economy. A good, empirically oriented example of this genre is Hillenkamp, I, Lapeyre, F and Lemaitre, A (2014) *Securing livelihoods: informal economy practices and institutions,* Oxford University Press.

[5] Convention no.189 (2011) pertain to protection of domestic workers, https://www.ilo.org/dyn/normlex/en/f?p=NORMLEXPUB:12100:0::NO::P12100_ILO_CODE:C189. Recommendation 204 (2015) pertains to the transition to formality, https://www.ilo.org/dyn/normlex/en/f?p=NORMLEXPUB:12100:0::NO::P12100_ILO_CODE:R204

[6] See, for example, Medina, L and Schneider, F (2018) 'Shadow Economies Around the World: What Did We Learn Over the Last 20 Years?' IMF WP No. 17, January 24. See also Wu, D.F. and Schneider, F (2019) 'Nonlinearity Between the Shadow Economy and Level of Development', IMF Staff WP No.19, March.

[7] For a detailed discussion of the ILO-supported notion of informality, see ILO, https://www.ilo.org/ilostat-files/Documents/description_IFL_EN.pdf

First, it will make a succinct distinction between the competing paradigms of the shadow economy and the ILO-supported notion of the informality. It will argue, both on conceptual and policy grounds, why this distinction is important. The author's experience from working on countries in the South Caucasus and Central Asia as well as in India suggests that the notion of the shadow economy has imparted a significant influence on policy-makers to the point where improving the business climate is seen as the primary driver of the structural transformation agenda. This will be contrasted against the notion of 'inclusive' structural transformation and the extant debate on 'premature de-industrialization'.[8]

Second, it will offer a global statistical glimpse of cross-country patterns in the incidence of the informal economy. It will note that what strikes one is the persistence of informality for low- and middle-income economies, even though there is a clear-cut link between rising per capita GDP and declining incidence of informality. This will enable the paper to suggest that the optimistic notion that the informal economy will wither away as a country gets wealthier is unlikely to hold at least over a realistic time-frame. This, in turn, means that facilitating the transition to formality through 'inclusive' structural transformation will have to entail deliberate policy actions by deploying an array of instruments.

Third, this chapter will review the agenda of improving the business climate as the primary way of fostering formal private sector-led structural transformation. It will note how undertaking *de jure* reforms to improve rankings in the World Bank's highly influential 'Doing Business' Indicators has, in some cases, become an important declared goal (e.g. India), or is seen as a major sign of accomplishment (e.g. Georgia). By drawing on both global evidence and country-specific experience, the paper will argue why improving the business climate, while important, represents a narrow view of what is required to facilitate a broad-based transition to formality. One runs the risk of impairing wages and working conditions in the quest to improve the business climate and reduce the size of the so-called shadow economy. This will lead to an outline of various actions that might be taken to broaden the policy agenda of moving from informality to formality. These actions fall broadly into two categories: (a) developing an enabling environment for in-situ formalization to take place; (b) developing specific sectors, which offer the promise of significant employment and decent work opportunities.

Fourth, the chapter will commence by extending the discussion noted above. This will entail reviewing firm-level evidence across different countries on the barriers to the expansion of the formal private sector. It will also note that lack of access to a) good quality infrastructure and b) finance are typically cited by the business community across both low- and middle-income economies as barriers to business expansion and productive job creation. This will segue into an expansive discussion of how enhanced financial inclusion, especially of small and medium enterprises (SMEs), as well as public investment in infrastructure, can facilitate productive structural transformation thus

[8] See, for example, the briefing note on 'premature de-industrialization', https://www.gpidnetwork.org/wp-content/uploads/2018/03/Brief_9.pdf

enabling low and middle economies to make the transition to broad-based formalization. The issue of investing in essential infrastructure is highlighted by drawing attention to the case of energy supply and how the dual goal of clean energy and new income -earning opportunities can be met by the off-grid solar energy sector.

Fifth, specific case studies will be utilized to highlight pertinent areas that hold promise in fostering transition to formality in specific activities and sectors, such as the development of floating farms in Bangladesh to mitigate the consequences of climate change and take measurable steps both towards the green economy and a more resilient rural economy. Other promising examples of supporting the productive sector for durable job creation include specific segments within the service sector (such as tourism in Morocco and the IT industry in India). The discussion will be placed within the broader context of the debate on 'premature de-industrialization'. Advocates of such a view envisage formalization primarily through the route of the manufacturing sector. This paper argues that this is too narrow a view.

The *concluding* section will summarize the key findings and highlight policy lessons. A key message is the need to forge a partnership between the government, the private sector and civil society as countries across the developing world seek ways to make the transition to formality.

Two caveats are necessary. First, while the paper covers a wide terrain, it still leaves out some important issues that should be the subject of another paper and further research. These pertain to (i) complementary labour market and social policies that can support the economy-wide and sectoral policies advocated here; (ii) the impact and implications of the future of work on the transition to formality. The available evidence suggests that extending social protection, well-designed and comprehensive minimum wage legislation and active labour market policies can facilitate the transition to formality.[9] The future of work, as shaped by digitalization and new technology, will have a significant impact on the agenda of fostering formality. According to available evidence, digitalization can facilitate formality, but it can also pull in the opposite direction (Islam, 2019).

Second, a critique of the notion of the shadow economy does not mean that there are no opportunistic actors working informally or running an unregistered business to avoid and evade government regulations and taxes. As chapter 1 has suggested, one use a combination of deterrence and incentives to encourage informal firms to become formal over time. The critique merely suggests that focusing on pro-business regulations alone will be overly simplistic in dealing with the complex phenomenon of informality.

[9] See Stuart, E et al (2018) 'Informal is the new normal', *ODI Working Paper* 530 for the evidence, culled from Latin America, on the impact of social protection and minimum wages on the incidence of formality. Evidence on the link between active labour market programmes and formality is discussed in Escudero, V et al (2017) 'Active labour market programmes in Latin America and the Caribbean: evidence from a meta-analysis', ILO Research Department, Working paper no 20

2.2 Clarifying competing paradigms - the shadow economy vs the informal economy

All low- and middle-income countries have a large informal economy consisting of those who work in informal enterprises plus those who are informally employed in the formal sector.[10] There is a tendency to use the notion of the informal economy as a synonym for the 'shadow economy'. This conflates two terms with distinct intellectual antecedents. From the perspective of the ILO, those who work in the informal economy do so largely because they are compelled. The focus is thus on the precarious nature of work undertaken by informal economy workers and the self-employed, as they lack access to social benefits and legal protection that govern industrial relations pertaining to wages, working conditions and labour rights. As the ILO (2015) puts it:

> *Work in the informal economy is often characterized by small or undefined workplaces, unsafe and unhealthy working conditions, low levels of skills and productivity, low or irregular incomes, long working hours and lack of access to information, markets, finance, training and technology. Workers in the informal economy are not recognized, registered, regulated or protected under labour and social security legislation. The root causes of informality include elements related to the economic context, the legal, regulatory and policy frameworks and to some micro level determinants, such as low level of education, discrimination, poverty and, as mentioned above, lack of access to economic resources, property, financial and other business services as well as to markets. The high incidence of the informal economy is a major challenge for the rights of workers and decent working conditions and has a negative impact on enterprises, public revenues, government's scope of action, soundness of institutions and fair competition.*[11]

Using this definition, the ILO concludes that 'two billion of the world's employed population work in the informal economy representing 61.2% of global employment' (ILO, 2018: 13).

The notion of the 'shadow economy', on the other hand, emphasises the largely voluntary nature of activities that are undertaken to avoid payment of taxes and onerous labour and business regulations.[12] Hence, the shadow economy represents the universe of workers and the self-employed who maintain their employment status by choice rather than by compulsion. Those who seek to reduce the incidence of informality thus focus on improving wages and working conditions, while the advocates of the shadow economy focus on tax reforms and the need to reduce the regulatory burden on the business community.[13] According to some evaluations, the size of the

[10] For a detailed definition and discussion, see ILO, https://www.ilo.org/ilostat-files/Documents/description_IFL_EN.pdf

[11] https://www.ilo.org/global/topics/dw4sd/themes/informal-economy/lang--en/index.htm

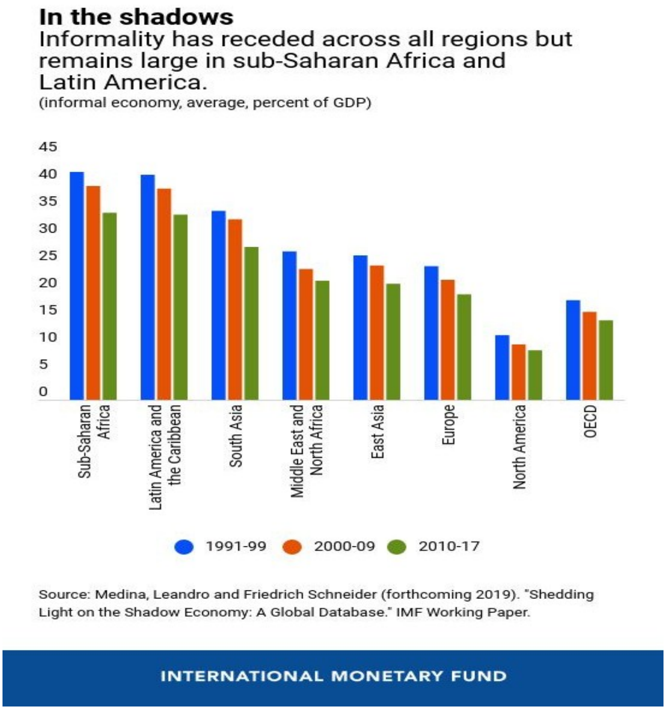
[12] ***M***edina, L and Schneider, F (2018) 'Shadow Economies Around the World: What Did We Learn Over the Last 20 Years?' IMF WP No. 17, January 24. It is also worth noting that the European Union uses the term 'shadow economy' to include illicit and criminal activities and prefers instead the term 'undeclared work'. See European Commission (2018) *European Platform Undeclared Work: Glossary of Terms*, October

[13] Wu, D.F. and Schneider, F (2019) 'Nonlinearity Between the Shadow Economy and Level of Development', IMF Staff WP No.19, March. They note (p.21): '…the authorities should put additional efforts to make working in the

shadow economy for the 2004-2015 period averaged over more than 150 countries was estimated at 31.8% of GDP (Medina and Schneider, 2018).

Figure 1 shows changes in the size of the economy that operates 'in the shadows' between 1990 to 2017. As the IMF concludes, the shadow economy has gradually receded over this period across all regions. The figure also shows that, at 34% of GDP, the size of the shadow economy is largest in Sub Saharan Africa and Latin America and smallest in North America (around 9%), with the OECD average standing at 15%.

Figure 1. Informal economy, average, percent of GDP.



Source: IMF, https://blogs.imf.org/2019/10/30/the-global-informal-economy-large-but-on-the-decline/

The current literature on the shadow economy – which confusingly uses it as a synonym of the informal economy – was preceded by contributions that portrayed informal enterprises as 'parasites' that competed unfairly with law-abiding formal business entities (Farrell, 2004). At best, informal enterprises should be regarded as opportunistic arrangements deliberately set up to avoid taxes and regulations. This signified the need to bring such enterprises into appropriate legal, regulatory and tax compliance (Levy, 2008). Others depicted a romantic view in which informal enterprises were run by potentially highly productive entrepreneurs whose creative energy needed

formal sector more beneficial, for example by reducing labour market rigidities to improve market efficiency and simplifying tax compliance procedures …' A rather similar position is adopted in Abdih, Y and medina, L (2013) 'Measuring the informal economy in Caucasus and Central Asia', *IMF Working Paper* No.137

to be unleashed by enhancing the ease of doing business, specifically by reducing entry barriers to the formal segment of the economy and improving property rights.[14]

The paper seeks inspiration from the fact that the above interpretations of the informal economy are not substantiated by robust evidence. Instead, one should accept that structural dualism -in which a low productivity informal economy co-exists with a more productive formal economy- is an endemic feature of development and does not easily wither away as nations become richer nor can it be easily tackled either by reducing the regulatory burden on formal enterprises or by enhancing regulatory and tax conformity of seemingly opportunistic actors in the informal economy. This notion of entrenched dualism is part of a venerable tradition in the scholarly literature on developing countries. This means that one would have to rely on well-designed policies and measures to deal with the pervasive challenge of informality.

One should concede that it is entirely possible for opportunistic actors to co-exist with firms that are hobbled by low productivity and meagre resources. Enterprise surveys – to be discussed at greater length at a subsequent juncture - do show that a sizeable proportion of formal firms regard competition from informal firms as a source of concern. Furthermore, as the ILO notes: '…not everyone in the informal economy is poor and there is also poverty in the formal economy…'. Nevertheless, the harsh reality is that '…workers in the informal economy face a higher risk of poverty than those in the formal economy, while informal units face lower productivity and income' (ILO, 2018: 1). Hence, the paper uses the ILO perspective on the informal economy, which is now part of the SDGs under 8.3.[15] It does not regard the term as a synonym of the shadow economy, which is based on a rather different intellectual premise.

2.3 Cross-country patterns in the incidence of the informal economy: brief overview and implications

One of the enduring features of cross-country statistics on informal employment is that, at a point in time, there is a strong negative relationship between per capita income and the incidence of informality, i.e. higher per capita GDP is associated with lower degrees of informality (as measured by sectoral employment share). For example, using pooled data for 16 Latin American countries in the 2005-2010 period, it is possible to show that 71% of the cross-country variations in the share of informal employment can be attributed to variations in per capita GDP (Stuart et al., 2018).

Figure 2 below illustrates this premise. It shows that, on average, richer countries have significantly lower levels of informality as measured in terms of employment

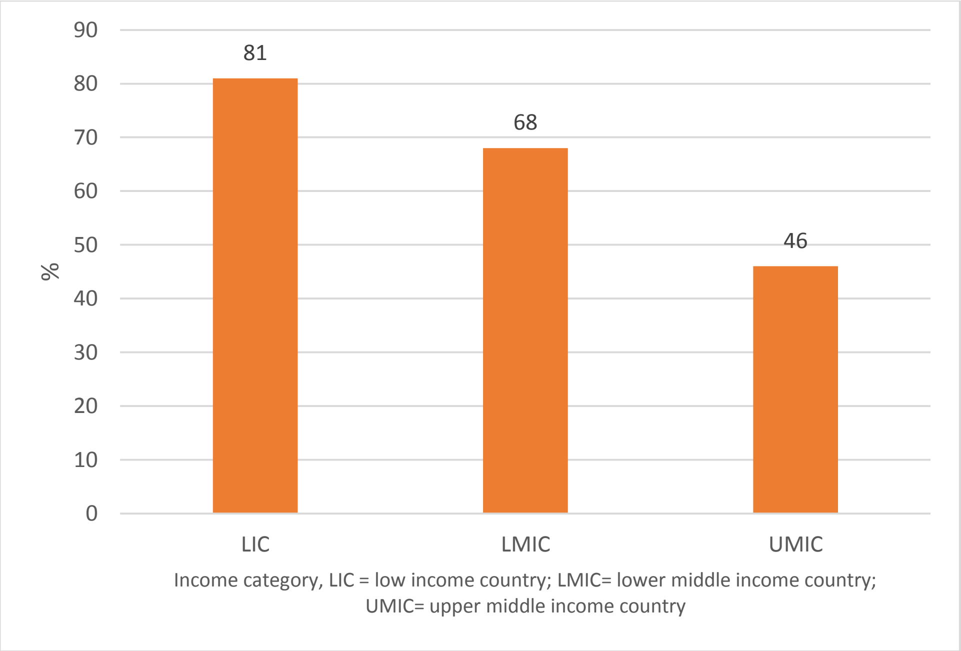
[14] De Soto, H (2003) *The mystery of capital: why capitalism triumphs in the west and fails everywhere else*, New York: Basic Books. A good critical account of Soto, Levy and Farrell can be found in La Porta, R.L and Shleifer, A (2014) 'Informality and development', *Journal of Economic Perspectives*, 28(3), pp.109-126

[15] SDG 8.3 under goal 8 highlights the need to 'Promote development-oriented policies that support productive activities, decent job creation, entrepreneurship, creativity and innovation, and encourage formalization and growth of micro-, small- and medium-sized enterprises including through access to financial services'. SDG10.3 is also relevant to the issue of informality because it pertains to the need to 'empower and promote the social, economic and political inclusion of all irrespective of age, sex, disability, race, ethnicity, origin, religion or economic or other status'.

shares. Thus, for instance, as an economy makes the transition from a low-income country (LIC) to an upper middle-income country (UMIC), the incidence of informality declines from 81% to 46%. Note that regional variations in the size of the informal economy depicted here are rather different from those in Figure 1, because the metric used is different (employment share in Figure 2 vs GDP share in Figure 1). This, in turn, has important ramifications for the implied productivity gap between the formal and informal segments of the economy. This point will be revisited at a later juncture.

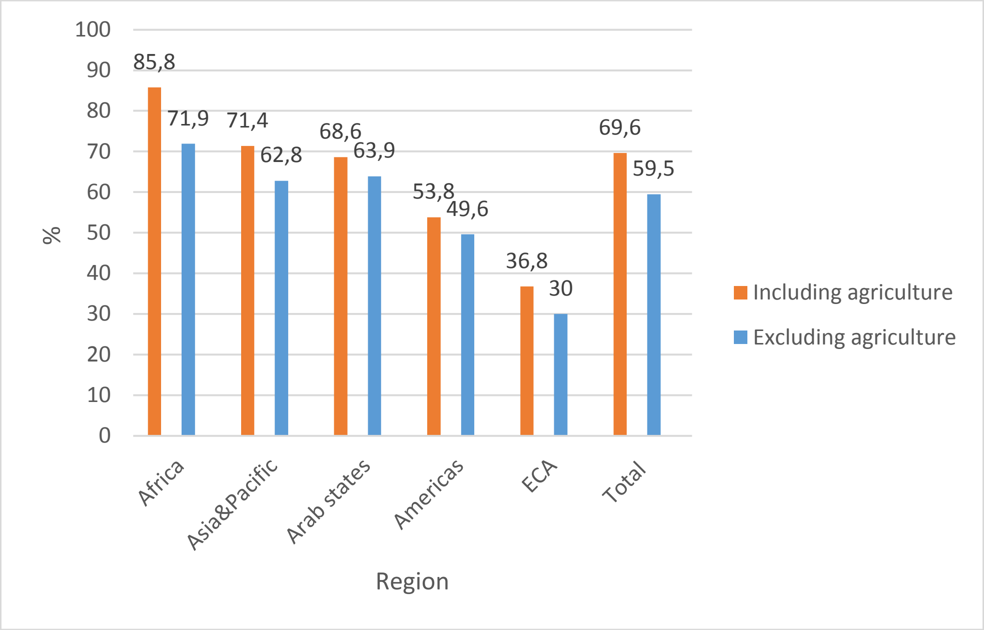
There are, for the same income category, significant variations across regions of the world in terms of the incidence of informality. As can be seen in Figure 3, within the cohort of low- and middle-income economies, Africa has the highest share of informal employment (76 to 82%), while Europe and Central Asia (ECA) has the lowest share (30 to 36%). ECA is, of course, a significantly richer region than Africa. The nexus between income levels and informality becomes even more pronounced when one examines variations in the degree of informality by income groups while holding regional groups constant. Thus, for example, as an economy within the ECA moves from a middle-income economy to a high-income economy, the incidence of informality is halved – declining from 30% to 14% (compare Figure 2 with Figure 3).

Figure 2. Percent of informal employment



Source: World Bank (2019) World Development Report, p.8. LIC = low income country; LMIC= lower middle-income country; UMIC = upper middle-income country

Figure 3. Percent of informal employment by region in low- and middle-income countries, 2016



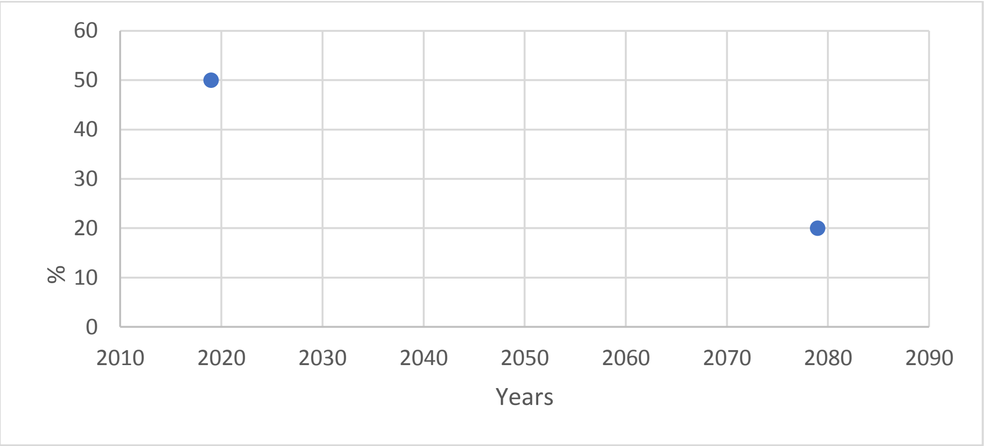
Source: ILO (2018:14) *Women and men in the informal economy: a statistical picture,* 3rd Edition, Geneva

Does that mean that sustained economic growth that propels a country to higher levels of prosperity is the primary mechanism via which informality will wither away?

Unfortunately, the answer to this seemingly straightforward question is not straightforward. To start with, relying solely on economic growth might eventually lead to a substantial reduction in the size of the informal economy, but only in the long run, which might be too long to benefit the current generation of the self-employed and workers stuck in low productivity activities. As Keynes reminded us in a famously pithy observation, 'in the long run we are all dead'.

An indication of the long run, in this case, is given by the following example of a hypothetical low-income country (LIC). Using the share of self-employment in overall employment as a proxy, and taking the statistical link between changes in the relative size of self-employment and changes in per capita GDP, one can show that it will take 60 years for informality to approach high income country levels (20%) provided the following heroic assumptions : (a) there is zero labour force growth and (b) GDP grows at an uninterrupted rate of 7% for sixty years. If one assumes a positive labour force growth of, say, 2%, then it will take more than 100 years for the size of informality to be more than halved. As some authors have correctly noted, '...the transition to formality is driven by economic growth, but it is very slow, and even slower when labour force growth is fast' (La Porta and Shleifer, 2014).

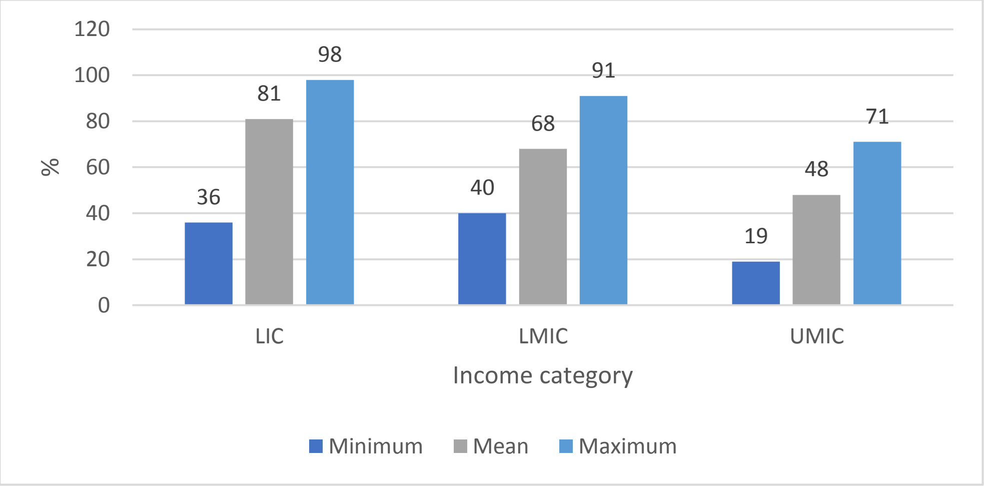
Figure 4. 2019 share of self-employment of hypothetical LIC vs precited share in 2079, given growth rate of 7% and zero labour force growth



Source: Derived from La Porta, R.L and Shleifer, A (2014:122-123) 'Informality and development', *Journal of Economic Perspectives*, 28(3), pp.109-126

Further evidence that one should not rely solely, or even largely, on economic growth to understand the evolution of informality, stems from the fact that there is substantial variation in the size of informality within income categories. As figure 5 shows, within LICs, the share of informality varies from a high of 98% to a low of 36%. Within LMICs, the range is 91% to 40%, while in UMICs, it is 71% to 19%. It is therefore deduced, that focusing on the 'average' relationship between per capita income and informality will hide a lot more than it will reveal.

Figure 5. Variations in estimates of informal employment by income level



Source: Derived from World Bank (2019:8) World Development Report

What about the trends in informality across countries? Not surprisingly, the ILO emphasizes that the stylized evidence yields a mixed picture, with informality declining in some regions, such as many countries in Latin America, but remaining stubbornly persistent in others and even rising in some cases, such as the Russian Federation and Serbia (ILO, 2018:15). The World Bank, too, emphasizes that the striking feature of informality is its sheer persistence, despite sustained economic growth in many parts of the world. As the 2019 World Development Report observes: 'informality has remained remarkably stable notwithstanding economic growth or the changing nature of work' (World Bank, 2019: 7). It then proceeds to highlight the cases of Peru, South Africa and South Asian countries, where the incidence of informality has either remained stubbornly persistent or has increased.

It is thus clear, that one cannot rely on economic growth alone to understand the evolution of informality. There are various structural features associated with the size and nature of the informal economy that need to be underlined. To start with, as a share of the global population, more men than women work in the informal economy, but the picture is reversed when country representation is considered. In more than 50% of countries for which data are available, more women than men participate in the informal economy (ILO, 2018: 67). Furthermore, both young and elderly people are overrepresented in the informal economy.

A key aspect of informality is that '…people with higher levels of education are less likely to be in informal employment', with only about 7% of informal workers having tertiary level education (ILO, 2018: 69). Some studies emphasize that most informal units are operated by poorly educated owners/managers and that this is the critical constraint affecting the transition to formality.

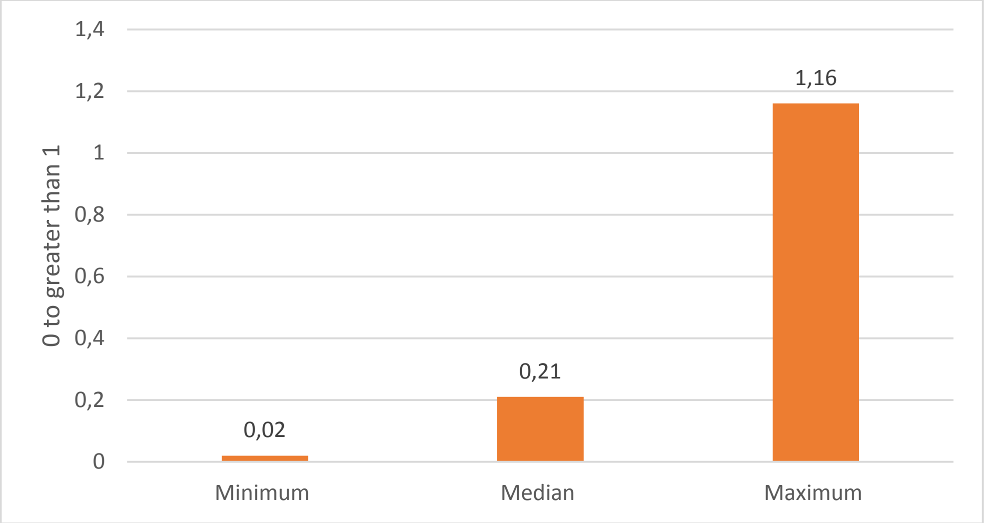
It is also the case that workers in the informal economy have a higher incidence of poverty than their formal counterparts. For example, in India, the poverty rate is 65.6% in the informal economy vis-à-vis a poverty rate of 33.4% in the formal economy.

What is perhaps among the most intriguing characteristics of informality is the sharp productivity gap between the formal and informal economy. Indeed, this can be readily inferred when comparing the size of the informal economy using alternative measures, that is, in terms of share of GDP vs share of employment. For example, the size of the informal (or 'shadow') economy is 34% in sub-Saharan Africa (Figure 1) but above 85% when measured in terms of employment share, suggesting the existence of a very low productivity sector.

Explicit estimates of the low productivity in the informal sector have been made by some studies. This is shown in Figure 6 for a sample of 23 countries. Measured in terms of the value added by informal firms relative to the value added by formal firms, the productivity gap is on average 21%, namely informal firms have productivity levels that are 21% of their formal counterparts. Other studies have come up with similar estimates suggesting that informal firms have productivity levels that rise to 25% of their formal counterparts.[16]

[16] See: https://blogs.worldbank.org/developmenttalk/challenges-informality

Figure 6. Value added by informal firms/value added by formal firms, 23 countries



Source: Derived from La Porta, R.L and Shleifer, A (2014:113) 'Informality and development', *Journal of Economic Perspectives*, 28(3), pp.109-126

In sum, there are important structural features of the informal economy that need to be considered. These features cut across gender, age, education, poverty and productivity. Closing the productivity gap in the informal economy is closely aligned with the agenda of fostering structural transformation.

2.4 Improving the business climate to foster inclusive structural transformation as a route to broad-based formalization: promises and pitfalls

Inclusive structural transformation takes place when resources move from the low productivity informal economy to the high productivity formal economy. It also takes place when there are intra-sectoral improvements in productivity. Through such a process poverty declines and workers gain access to more remunerative and productive employment opportunities both between and within sectors. Factors and forces that inhibit such desirable changes to take place are thus antithetical to the agenda of transition to formality.

One influential view maintains that onerous business regulations – such as cumbersome processes that make new business registration time-consuming and expensive – can impede the capacity of informal firms to become formal and support a process of inclusive structural transformation. Thus, if the business climate can be improved, for example, by making it easier to start a new business, then this will usher in a new era of formality. Indeed, this premise became an important part of the World bank's *Doing Business* (DB) reports. As a study claims: 'Making it easier to formally register a business…has seen the most attention from policymakers over the past decade' (Bruhn and McKenzie, 2014: 186).

In the case of the World Bank evaluations, countries were measured and ranked based on DB indicators. This motivated many countries across the world to undertake a series of procedural reforms to improve their ranking in the DB indicators. Some countries, such as India, declared reaching a certain threshold as a policy priority (the world's top 50 in terms of DB ranking).[17]

A critical discussion of this influential view is offered here using the case of Uzbekistan as an example. This Central Asian country has made a determined effort to improve its ranking in the World Bank's highly influential 'Ease of Doing Business' index by undertaking a variety of procedural reforms to improve the business environment. In one of the latest ranking exercises (2018), it was placed 76th in the overall Doing Business Index. Although this might seem modest, Uzbekistan has been hailed for the progress that it has made so far. Thus, the World Bank proclaims:

Having been named a top improver previously in 2015 and 2012, Uzbekistan has continued its strong reform agenda. With its five business reforms during the past year, the country carried out the most reforms in the Europe and Central Asia regions. [18] This assessment has also been highlighted by the Uzbekistan government (2017: 9).

What employment and social dividends can Uzbekistan expect from striving to improve its ranking in the Doing Business indicators? One way to answer this question is to compare Uzbekistan with Georgia, which is the only lower middle-income economy in the world with the distinction of being in the top ten of the Doing Business ranks. As Table 1 shows, there is clearly a yawning gap between the two countries in terms of Doing Business Indicators. Is that reflected in labour market and poverty indicators, with Georgia enjoying a substantial premium over Uzbekistan? Unfortunately, the reverse happens to be true, that is, in most cases, Georgia does not stand out as a standard which Uzbekistan might seek to emulate.

This comparison of Uzbekistan with such a star performer as Georgia (in terms of its very distinctive ranking in the Doing Business Indicators) is not meant to be a definitive refutation of the validity of Doing Business Indicators. It will always be possible to find a binary comparison that can put Georgia in a much better light than shown here. Nevertheless, they do serve an important purpose in highlighting the pitfalls of becoming too reliant on international rankings that focus exclusively on the business environment.

Another way to illustrate the likely impact of improvements in the Doing Business indicators on employment and poverty is to draw on global estimates as reported in the World Bank's global report for 2018. It argues that, if a country can close the gap between its current rank and the 'distance to frontier' (DTF, set to a maximum value of 100), then (1) poverty will fall by 2% and (2) the unemployment rate will drop by 0.2%. Suppose, as part of its 2030 vision of becoming an upper middle-income economy, Uzbekistan can increase its current Doing Business score from 67.40 to 77.40 over the next 10 years. This will improve its ranking from 76 to the vicinity of 31-32 (1 being the

[17] See: https://economictimes.indiatimes.com/news/economy/indicators/govt-to-implement-200-reforms-to-push-india-into-top-50-in-world-bank-ranking-dipp/articleshow/61405504.cms
[18] See: https://www.worldbank.org/en/news/press-release/2017/11/01/uzbekistan-is-a-global-top-improver-for-third-time-as-reform-agenda-continues-doing-business-report

best) and place it at par with Russia and above the European and Central Asian average (World Bank, 2019: 4). The expected impact is that extreme poverty will reduce to 10.3% (from 12.3% as recorded in 2016) by 2030 and the unemployment rate will decline to 5.6% (from 5.8% as recorded in 2017).[19] For a country that seeks to eliminate extreme poverty and achieve an unemployment rate below 5% by 2030, these effects – while being in the right direction – will not enable Uzbekistan to reach its goals.

Table 1. Doing business and labour market and social indicators in Uzbekistan and Georgia.

Georgia	Georgia	Uzbekistan
DB Rank (2018)	6	76
Income (US$ per capita)	3830	1520 (after devaluation in 2016/2017)
Employment rate (%)	56.7	61.0
Unemployment rate (%)	13.9	5.8
Youth unemployment rate (%)	28.9	14.0
NEET (%)	29.6	N/A
Share employed in agriculture (%)	43	28.3
Income poverty (NPL) (%)	21.3	12.3
Income poverty (IPL) (%)	4.6	N/A
HDI	0.78 (high HDI)	0.71 (high HDI)
Size of informal economy (% of total employment)	32	38.7

Source: World, ADB and UNDP; author's estimate. NPL = national poverty line; IPL = international poverty line (USD 1.90 a day)

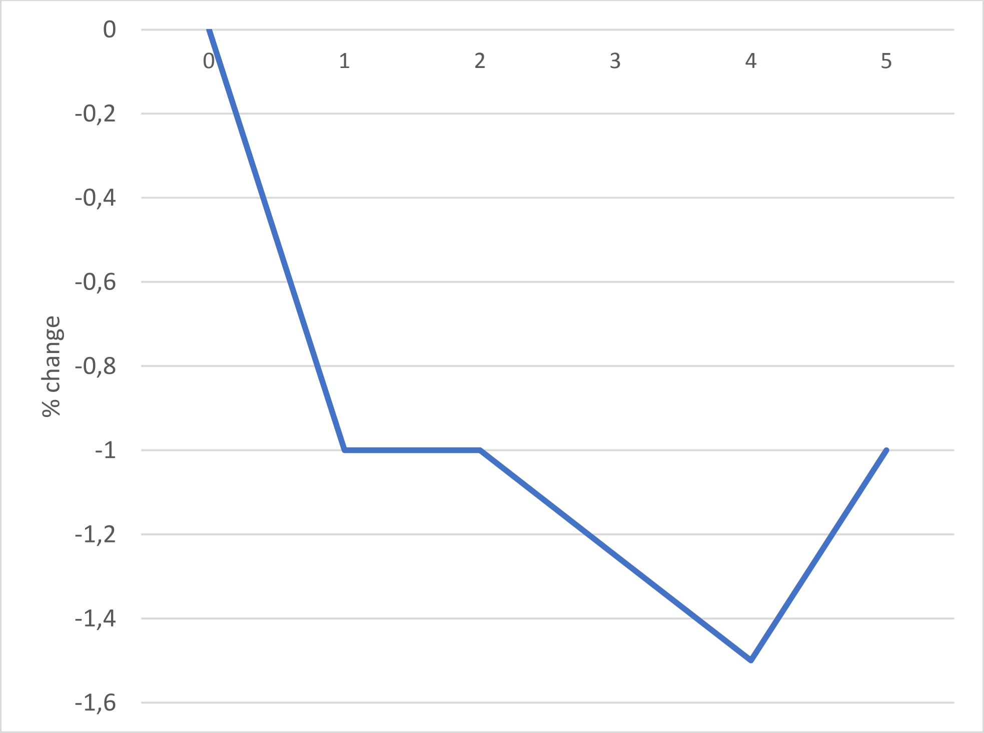
The 2019 World Development Report also acknowledges that the improvements in the business climate, based on DB indicators, have had a negligible impact on the evolution of informality. It notes that 'Informality has remained high over the last two decades despite improvements in the business regulatory environment' (World Bank, 2019: 7). Thus, the available evidence in 2017/2018 shows that: 'Around the world, registering a business now takes an average of 20 days and costs 23% of income per capita, compared to 47 days and 76% of income per capita in 2006' (World Bank, 2019: iv). Yet, this has taken place against a background of remarkable persistence of

[19] As noted, these estimates are based on global parameters as calculated by the World Bank (2018) Doing Business Report, Introduction

informality in low- and middle-income economies. A large-scale evaluation based on field experiments corroborates this conclusion (Bruhn and McKenzie, 2014).

Improving the business climate is a core element of a broader structural reform agenda. The IMF has restated its commitment to structural reforms entailing deregulation of financial, product and labour markets reinforced by trade liberalization and improved governance. It argues in a recent flagship publication that such a reform agenda can promote growth while reducing the incidence of informality. Yet, the impact is modest, because model-based estimates suggest that informality drops by 1 percentage point after a period of 5 years following de jure deregulation across both factor and product markets – see Figure 7.

Figure 7. Decline in informality after 5 years following *de jure* deregulation: model-based estimates



Source: Derived from IMF (2019: chapter3, p.109), World Economic Outlook, October

The above illustrations are not meant to refute the manifold benefits that flow from business-friendly regulations. It is important to acknowledge the positive influence of successive Doing Business reports in motivating governments across the world to undertake a variety of reforms, that have empowered the private sector to play its due role as a source of job and wealth creation. Furthermore, as the ILO notes, the promotion of a conducive business and investment environment can encourage informal firms to formalize.[20] It is indeed possible to devise multiple instruments that combine both deterrence and incentives – as articulated in considerable detail in chapter 1 – to facililate the transition to formality.

Yet, it is possible to place undue faith in the power of business-friendly regulation to carve a pathway to shared prosperity. Sustainable job creation and poverty reduction are the product of multiple and complex forces. Procedural reforms that improve the business climate create an enabling condition for the private sector to prosper but does not ensure that these enabling conditions are good enough to overcome deep-structural impediments that inhibit the attainment of job creation and poverty reduction targets. Hence, if business-friendly procedural reforms fail to generate wide-ranging employment and social dividends, they can lead to unfulfilled expectations.

Perhaps what is most problematic in interpreting the power of pro-business regulations to transform economies and societies is that there is an implicit – and at times explicit – association between such regulations and the need to have highly flexible labour markets. The emphasis on employment flexibility, while appearing to be a reasonable premise creates tension between the need to have a business-friendly climate and the need to foster strong labour market institutions. It adds succour to the view that pro-business regulations *seek* the emasculation of labour market institutions. It is necessary to strike the right balance between protecting the rights of workers and the interests of the business community.

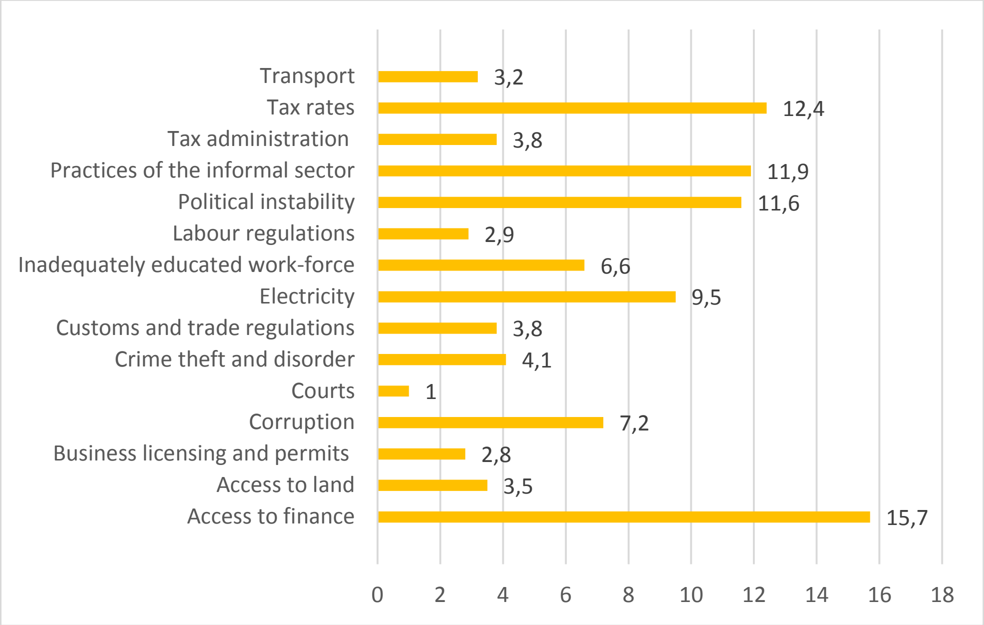
2.5 Enhancing financial inclusion for broad-based formalization: issues and evidence

The notion that improving the business climate will engender formalization is based on the premise that onerous business regulations are the primary impediment to formal sector firms. Yet, the available evidence does not seem to show that improving the business climate will necessarily unleash a major transition towards formality. This point is reinforced by enterprise-level surveys, which highlight multiple binding constraints on the formal private sector based on 140,000 firms in 141 countries.[21] As can be seen in Figure 8, the surveyed firms identify a range of factors that are perceived as the 'biggest obstacle' to business operations. By far, the biggest obstacle is lack of access to finance followed by onerous tax rates, competition stemming from the informal firms, political instability and unreliable supply of electricity. Factors pertaining to various regulatory issues, such as labour regulations, tax administration, business licensing and permits, hardly appear to be major concerns. It thus follows that enhancing access to finance should be a policy priority in promoting the agenda of expanding the formal private sector. This in turn entails a discussion of financial inclusion as a means of fostering formality.

[20] See: https://www.ilo.org/dyn/normlex/en/f?p=NORMLEXPUB:12100:0::NO::P12100_ILO_CODE:R204

[21] See: https://www.enterprisesurveys.org/en/data. These surveys are undertaken by the World bank. It notes: 'Formal (registered) companies with 5 or more employees are targeted for interview'. The respondents are typically 'business owners and top managers' in the manufacturing and service sectors.

Figure 8. Percentage of formal private sector firms identifying biggest obstacle



Source: Derived from https://www.enterprisesurveys.org/en/data.

Financial inclusion entails the access of the unbanked population to formal financial services through bank account ownership. Both theory and evidence suggest that financial inclusion can facilitate development.[22] Enhanced access of individuals, households and firms to the formal financial system contributes to poverty reduction by facilitating investments in health, education and businesses. It also fortify the capacity of individuals and households to cope with financial emergencies – such as job losses, crop failures and bankruptcies. Digitalization of payments has also been shown to reduce the incidence of fraudulent financial transactions.

One of the core indicators of financial inclusion is the ownership of bank accounts. This is the foundation on which other elements of formal financial services – such as digital payments, savings and credit instruments, mobile phone banking – can be built. Globally, 69% of adults worldwide now (as of 2017) have a bank account. Understandably, there is a big gap in account ownership rates between developed and developing countries – 94% vs 63%, respectively. There is also typically a significant gap within countries along income and gender dimensions.

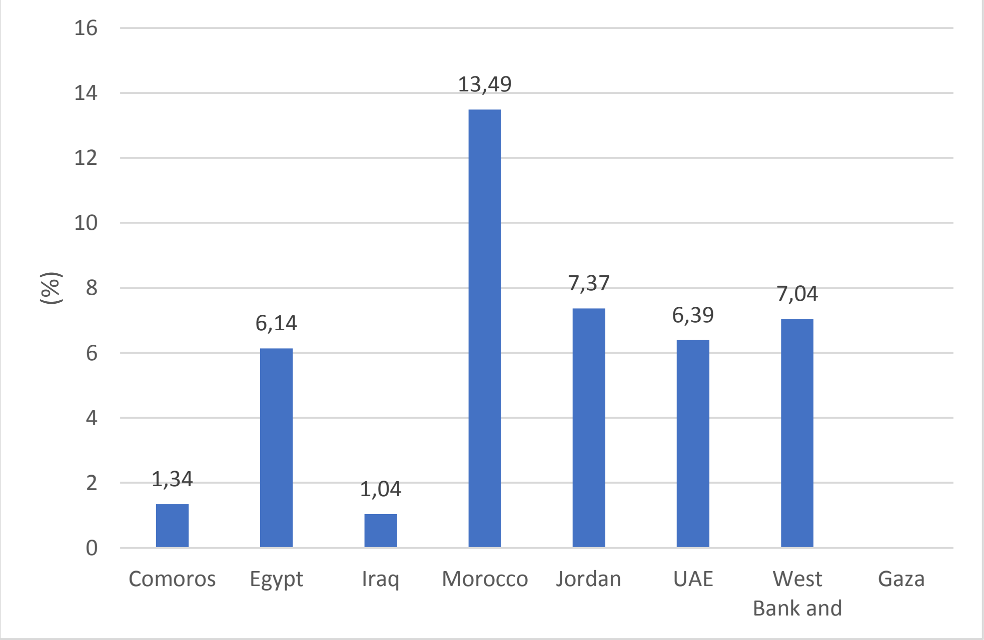
Financial inclusion can be studied from the perspective of individuals and households. It can also be studied from the perspective of firms. A firm-level analysis of financial inclusion is important given that the focus of this paper is on drivers of formal private sector development. As noted at a previous juncture, lack of access to finance is often

[22] See: https://www.worldbank.org/en/news/immersive-story/2018/05/18/gains-in-financial-inclusion-gains-for-a-sustainable-world?cid=ECR_TT_worldbank_EN_EXT

regarded as a major constraint on business, especially by SMEs.[23] Hence, if access to finance can be enhanced, it will boost the role of SMEs in creating jobs, diversifying economies and supporting growth. This issue is discussed by utilizing a case study from the Middle East and North African region. This is important because in the Middle East and North African region, SMEs account for 96% of all firms in the formal sector, which employ about 50% of the work-force. This is representative of evidence available from other low- and middle-income economies.

A recent evaluation has demonstrated that the Middle East and North African region, including Afghanistan and Pakistan, has the lowest degree of financial inclusion of SMEs as measured by a composite index.[24] As supplementary evidence, some country-specific data of loans from commercial banks to SMEs (as% of GDP) are shown in Figure 9 for 2017, and in some cases, for 2018. Except for Morocco, all the Arab countries identified in the Figure, have very limited financial access for SMEs in terms of this specific indicator, and lie well below the global benchmark of 12.3% (as measured in 2017).

Figure 9. Loans of SMEs from banks (% of GDP), 2017/2018, selected countries in the Arab region



Source: Extracted from IMF, Financial Access Survey (FAS), http://data.imf.org/?sk=E5DCAB7E-A5CA-4892-A6EA-598B5463A34C&sId=1460055200236

[23] SMEs are defined as those employing less than 100 workers. Small firms are defined as those employing less than 20 workers.

[24] The composite index, which utilizes financial access and utilization data, can be found in IMF (2019) 'Financial inclusion of small and medium-sized enterprises in the Middle East and Central Asia', Middle East and Central Asia Department, No.19/02

An econometric investigation using pooled data for the Middle East and North African region, including Afghanistan, Pakistan and the Central Asian region, suggests that the level of economic development (as proxied by per capita income), credit information availability for small firms (as measured by coverage of credit registries), the quality of governance (as indicated by control of corruption), the degree of economic competition (as proxied by the share of small firms in the private sector) and the quality of the business environment are key determinants of the financial inclusion of SMEs. The same investigation also shows that if the financial inclusion gap in the region (as measured by the distance of the region to best performing countries) were eliminated, growth could, in some cases, be boosted by up to 1% potentially leading to about 16 million new jobs by 2025 (IMF, 2019).

It is also worth noting that enhanced financial inclusion can increase the '…effectiveness of fiscal and monetary policies by improving domestic revenue mobilization and monetary transmission…mechanism' (Lagarde, 2019). Hence, a national financial inclusion strategy (NFIS) is one of the pertinent ways to support the development of SMEs, while strengthening the macroeconomic policy framework. One evaluation points out that:

As of mid-2018, more than 35 countries have launched an NFIS, and at least 25 countries are in the process of developing such an instrument. Several countries […] have updated their original NFIS or launched a second NFIS (World Bank, 2018: 4).

What would an appropriate financial inclusion strategy look like? The central bank, in consultation with all pertinent stakeholders across government ministries, the private sector and civil society associations, as well as international organizations, should lead an NFIS. A World Bank evaluation suggests that 'key success factors' for an NFIS include: (1) sustained engagement with all relevant stakeholders; (2) investment in data and diagnostics work; (3) identification of national champions; (4) clear articulation of objectives and targets; (5) prioritization of actions; (6) establishment of efficient and inclusive governance structures; (7) mobilization of resources to support launch of NFIS; (8) a clear communications strategy; (9) flexibility to adapt NFIS to changing economic circumstances; and, finally, (10) a well-resourced and robust M&E system to track implementation progress (World Bank, 2018: 2).

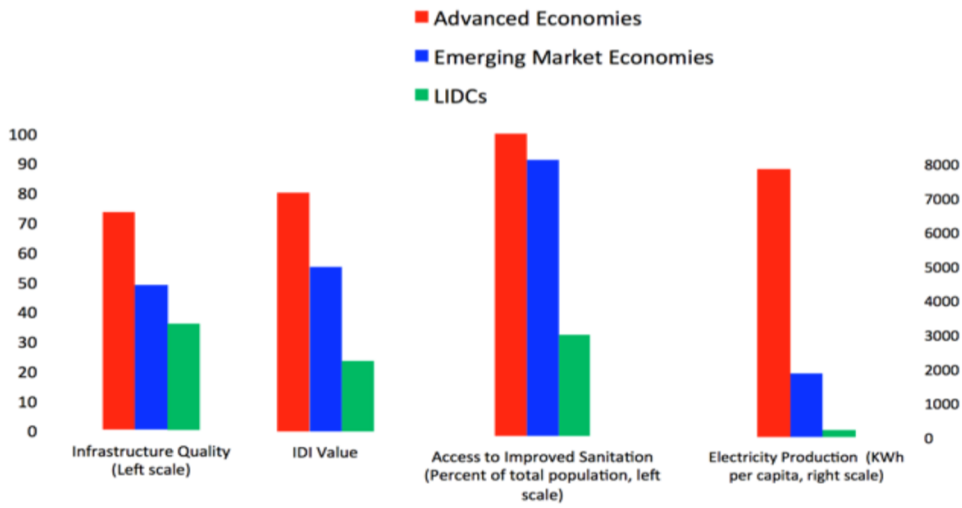
In the Arab region, Jordan is the first country to have developed an NFIS.[25] The Central Bank of Jordan (CBJ) developed the NFIS together with the government, the private sector, civil society and other key stakeholders in alignment with the SDGs. The aim to enhance financial inclusion in Jordan, which currently is a laggard based on international comparators, includes a focus on SMEs, women, other vulnerable groups (most notably refugees), microfinance, digital financial services, financial literacy, consumer protection, and consolidation of credit bureaus, which should be able to provide credit rating of SME borrowers. One hopes that other countries in the Arab region – and in other parts of the world – will learn from the experience of Jordan that financial inclusion must be a core part of the agenda of nurturing formal private sector growth .

[25]See: https://www.afi-global.org/news/2017/12/jordan-launches-nfis-first-arab-region

2.6 Investing in infrastructure for broad-based formalization: issues and evidence, with special reference to the energy sector

'Infrastructure investment', as one study notes, 'is widely recognized as a crucial driver of economic development' (Gurara et al, 2018: 1). There is now a well-established literature that demonstrates that infrastructure improvements enhance productivity, crowd in private investment and stimulate domestic and international trade. In addition, the pertinent literature shows that enhancing access to essential infrastructure services – road networks, access to reliable supply of energy, digital connectivity, water supply and sanitation, health and education facilities and so forth – can play an important role in reducing poverty and promoting inclusion. Of course, the benefits of infrastructure investment can be attenuated if investment efficiency is low due to imprudent project selection, poor management and outright corruption. Hence, these are risks that need to be considered when making the case for increased investment in infrastructure.

Figure 10. Indicators of variations in infrastructure deficits by levels of development

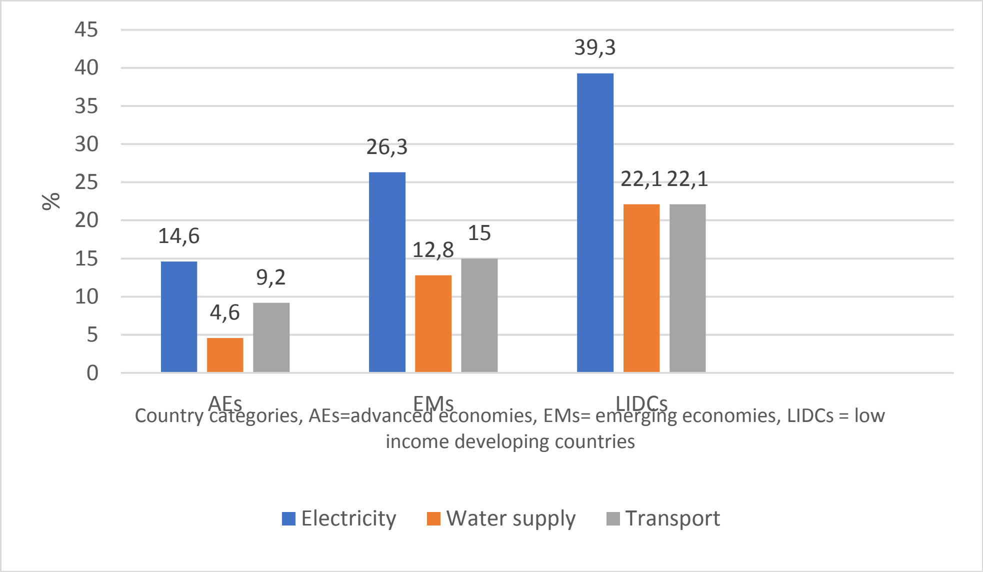


Source: Gurara, D et al (2018:4) 'Trends and challenges in infrastructure investment in developing countries', International Development Policy, The Graduate Institute, Geneva. 10, 10 January

Figure 10 shows the significant variations in the quantity, quality and accessibility of economic infrastructure across developed and developing countries. Even within the latter, the gap between low income developing countries (LIDC) and middle-income emerging economies is quite large, especially in the electricity sector.

The evidence presented in Figure 10 is supplemented by enterprise-level data in Figure 11. As can be seen, and as expected, the percentage of firms identifying access to key economic infrastructure (electricity, water, transport) as a major constraint rises sharply as one moves from advanced economies (AEs) to low income developing countries.

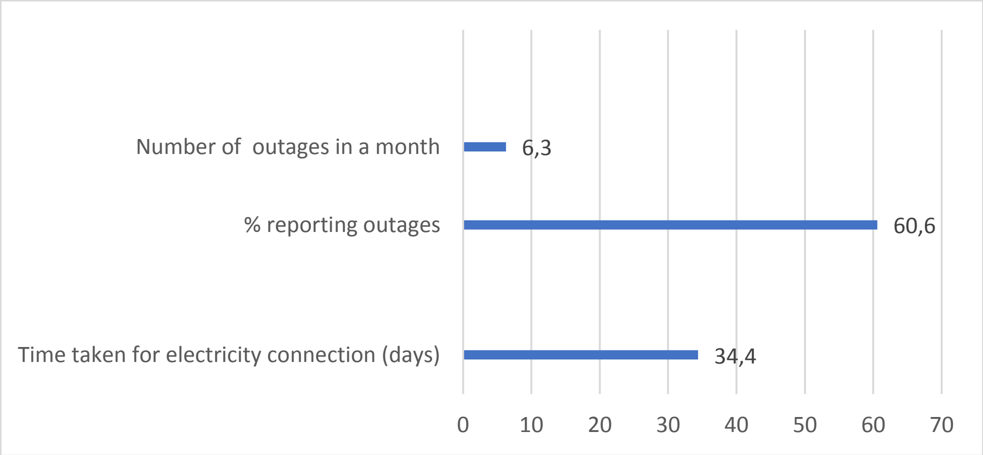
Figure 11. Percentage of firms identifying a major infrastructure constraint (electricity, water supply, transport)



Source: Derived from Gurara, D et al (2018:5) 'Trends and challenges in infrastructure investment in developing countries', International Development Policy, The Graduate Institute, Geneva. 10, 10 January. The original data source is the World Bank's World Enterprise surveys. Above figures depict simple averages for the 2002 to 2016 period.

In the case of electricity, firms across the world report major hindrances emanating from the electricity sector – in terms of long lead-time for connections and disruptions to electricity supply through outages. This can be seen in Figure 11.

Figure 12. Electricity connection time and disruptions to supply



Source: World Bank, World enterprise surveys, all firms, 141 countries

How can developing countries respond to the challenge of infrastructure deficits in such a way as to facilitate inclusive structural transformation through the expansion of the formal private sector? There is no single policy that will work. It will require a combination of sustainable domestic revenue mobilization, prudent borrowing, improved efficiency of investment projects and partnerships with the private sector as well as the donor community.

Most importantly, innovative approaches will be needed to resolve enduring challenges in the provision of adequate infrastructure by the government. For example, the time-honoured approach to electrification of households and firms is effected through connections to a national grid. But this traditional model, because of its expensive and technically rigid nature, has failed to provide access to more than 1 billion people across the world with reliable supply of electricity, despite impressive expansion in recent years, especially in South Asia. At the same time, national grids are often driven by fossil fuels making them unresponsive to concerns about climate change.

The problem is rather similar in the case of telecommunications infrastructure, where fixed landlines have simply failed to provide the necessary connectivity. Yet, a revolution in mobile telephony in the developing world, led by the private sector and supported by cooperative governments, has not only provided much needed connectivity to millions of firms but has also spawned new income earning opportunities. The ensuing discussion highlights global, regional and country-specific examples in the energy sector, which showcase an innovative approach that circumvents traditional models to unleash a new era of enhancing access to essential infrastructure services.

2.6.1 Investing in essential infrastructure: the case of the off-grid solar sector

Contemporary experience across the world has shown that the off-grid solar sector (OGS) can serve as a viable and ecologically friendly supplement to a national grid, responding to the needs of unserved and underserved households and firms, especially in low-income communities. The most recent global evaluation suggests positive and enduring benefits. These include the following:[26]

- in 2017, OGS provided improved electricity access to 360 million people and the expectation is that this will double over this decade. This means that the OGS can play an important role in supporting the attainment of SDG 7 (access to affordable, clean energy for all);
- by encouraging households to switch from kerosene and other conventional fuels, OGS devices have led to estimated savings of USD 5.2 billion while 28.6 million tons of greenhouse gas emissions have been avoided;
- providers of OGS devices have been a source of direct job creation in the formal economy. For example, in 2010, there were only 60 firms globally. By 2017, this has risen to 300;

[26] The rest of the discussion draws on the following sources. World Bank et al (2018) *Off-grid solar market Trends Report*, January; GOGLA (2019) *Powering opportunity in East Africa*; Graber, S et al (2018) 'Solar microgrids in rural India', *Energy for Sustainable Development*, 42, pp.32-43

- the OGS market is competitive, with its concentration ratio falling from 50% of annual sales to approximately 30% between 2011 and 2017;
- OGS devices have indirectly supported an estimated 1.9 million people through income generating activities, by spawning new business and expanding existing business, which demonstrates an important link between formalization and electricity provision;
- an estimated 45% of OGS users reported health benefits by reducing their reliance on kerosene;
- these global benefits have been supported by a regional evaluation of several East African countries;
- in terms of job creation, estimates based on the East African experience suggest 21 fulltime equivalent (FTE) jobs per 100 OGS devices sold, with 52% of these FTEs being undertaken by women and 50% in rural areas;
- given that, globally in 2017, it was estimated that 22.3 million devices were sold, the implied global job creation rate, that can be attributed to the OGS, is 4.68 million;
- an evaluation from India suggests a higher degree of consumer satisfaction with OGS devices than with the national grid.

There is, of course, the issue of the role of the private sector, the government and donors. Certainly, the private sector has been responsible for direct supply of OGS devices, but this requires the support of the government. Increasingly, governments are aware of the role that OGS can play in supporting unmet energy needs of households and firms. Hence, as in the case of Kenya, OGS has become a formal part of the national electrification strategy. The global industry association that represents firms in OGS has argued that perhaps one of the most effective ways in which governments can support the development of the off-grid solar energy is through the provision of fiscal incentives. If taxes and tariffs on all OGS devices are lifted, either temporarily or permanently, there will be a significant drop in prices stimulating the expansion of OGS. In Kenya, for example, a reduction in the price of a solar lamp due to fiscal incentives by 43% can increase household uptake of OGS devices by 22%.

Finally, donors can play, and have played, a supportive role, especially in low income countries that are significantly reliant on development assistance. The World Bank group has been quite active in supporting the development of the off-grid energy market in 25 countries, mostly in Sub-Saharan Africa.

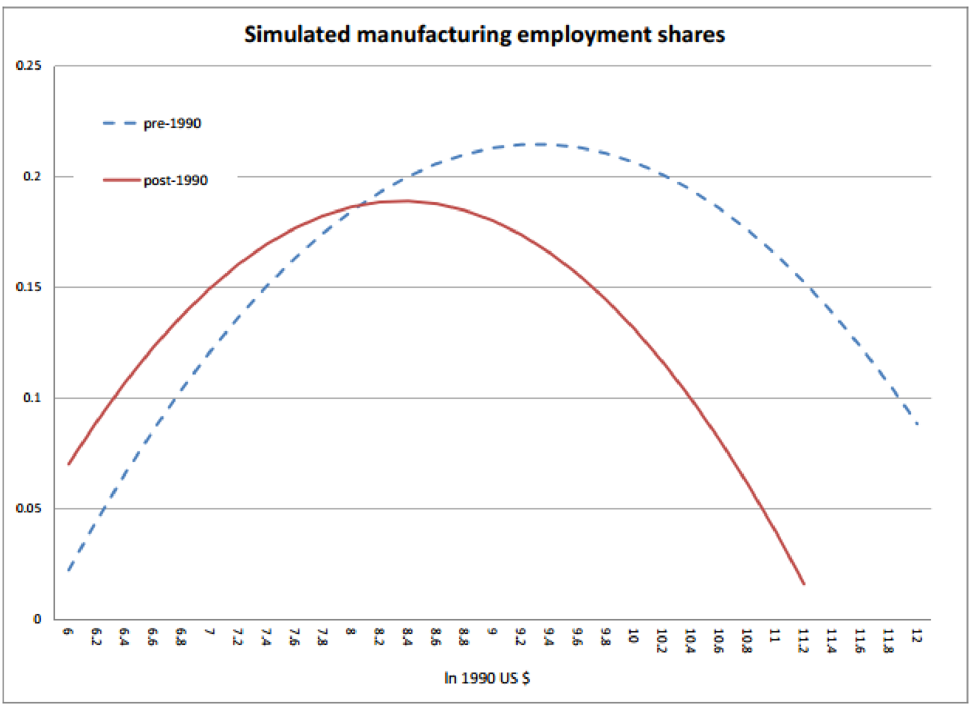
2.7 Supporting selected sectors for inclusive structural transformation: lessons of country experiences and the debate on ‘premature deindustrialization’

The current debate on the nature of structural transformation in low- and middle-income economies has been largely shaped by concerns about ‘premature deindustrialization’. What does the term mean and what are its implications?

The crux of this literature has been shaped by the work of Harvard economist Dani Rodrik.27 As is well known, the standard evolution of structural transformation is that labour and resources move out of low productivity agriculture to high productivity manufacturing. In such a process, the employment share of manufacturing exhibits an inverted U pattern, rising at first while the employment share of agriculture shrinks, reaching a plateau and then inexorably declining. At this stage, economies become post-industrial, service-sector societies with high living standards and good quality employment. In this normal process of historical evolution, which characterises all developed countries and some parts of Asia, structural transformation is inclusive and characterized by substantial and sustained reductions in informality. Economists, such as Rodrik, claim that many developing countries, especially in Latin America and Sub-Saharan Africa, are 'deindustrializing' at a faster pace and are doing so before completing the much-required phase of industrialization.

The premise of 'premature de-industrialization' as a stylized fact is captured in Figure 13. As can be seen, globally, before 1990 the predicted employment share of manufacturing peaked at much higher levels of per capita income than in the post-1990 period.

Figure 13. 'Premature de-industrialization' *à la* Rodrik'



Source: Rodrik, D (2016) 'Premature deindustrialization', *Journal of Economic Growth*, 21: pp.1-33.

[27] Rodrik, D (2016) 'Premature deindustrialization', *Journal of Economic Growth*, 21: pp.1-33. This article is a culmination of his work on this topic that he has undertaken since 2011.

Premature deindustrialization is, according to its advocates, a perverse form of structural transformation that is a drag on growth and is accompanied by persistent and rising informality. As Rodrik observes:

'In Latin America, as manufacturing has shrunk informality has grown and economy-wide productivity has suffered. In Africa, urban migrants are crowding into petty services instead of manufacturing'.

How valid is the thesis of 'premature deindustrialization'? As a stylized fact, it is based on solid evidence. On the other hand, its normative implications can be contested as can some of the sweeping generalizations that are made. For example, the notion that informality has grown in Latin America is inconsistent with the evidence that in many parts of Latin America informality has declined. Governments in the region are credited with several policy initiatives – such as expanding social security coverage and labour protection measures, enlarging the scope of minimum wages – that have facilitated transition to formality.

The advocates of premature deindustrialization are keen to highlight its perils but unable, or unwilling, to prescribe pragmatic policy proposals that can attenuate or reverse this adverse phenomenon. They are also too keen to downplay alternative pathways to inclusive structural transformation. Good examples of such pathways that are pertinent to low- and middle-income economies include agricultural diversification and service sector-led growth strategies. The ensuing discussion offers country-specific examples – Bangladesh (floating farms), India (service sector-led growth), selected Arab states (service-sector led growth).

A summary of a possible structural transformation typology in different countries is shown in Table 2 as a preamble to a more extensive discussion of the country-specific experiences. As can be seen, premature deindustrialization is indeed a retrograde form of structural change that sustains and increases informality but addressing this phenomenon can take multiple forms.

Table 2. Typology of structural transformation and country/regional examples

1. Nature of structural transformation	2. Implications for formality, growth and employment	3. Country/regional examples
4. Premature deindustrialization	5. Adverse / persistence of informality or increase in employment share, drag on growth	6. Latin America, Sub-Saharan Africa (*a la* Rodrik 2016)
7. Manufacturing sector led structural transformation	8. Positive/ decline in share of informal employment, good growth	9. East Asia, China (Rodrik 2016)
10. Agricultural diversification	11. Positive/ decline in share of informal employment, good growth	12. Bangladesh (this paper), Ethiopia, Rwanda, Peru, Vietnam, Chile (case studies available in Islam and Islam, 2015)
13. Service sector-led growth	14. Positive/ decline in share of informal employment, good growth	15. India, Arab states (this paper)

2.7.1 Floating farms of Bangladesh[28]

Bangladesh has attracted a good deal of global attention because it has emerged as the second largest exporter of readymade garments (Robinson, 2018). This export-oriented industry has offered employment to over 4 million, mostly female, workers. In this respect, Bangladesh fits the description of a country that has, to some extent at least, overcome the perils of premature de-industrialization. What is less well known is how Bangladesh has developed a home-grown strategy to combat climate change while furthering the cause of agricultural diversification.

Bangladesh is highly vulnerable to climate change. Flooding regularly affects about 1 million people. One prediction is that by 2050 about 20% of the available land will be permanently submerged under water.

More than 100,000 people are forced to move regularly, as villages and livelihoods succumb to rising water levels during the monsoon season. Such enforced migration in turn enlarges the urban informal economy.

During the monsoon season, much of the farmland in Southern Bangladesh is flooded and remains water-logged for about 9 months severely restricting the capacity of local farming communities to earn a living. Local resilience and an innovative proclivity to adapt to changing climatic condition led some farming communities to revive an age-old technique of building 'floating farms'.

Such farms, or gardens, -usually 8 to 10 metres long and a few metres wide- are constructed using water hyacinth. This is typically an abundantly available invasive species but can serve as a robust base for the floating gardens which are then covered with soil and cow dung. A variety of cash crops can be planted on them. They serve the needs of local communities, while the surplus generated become a new form of income generating activity. This farming technique is productive because the cropping and harvesting cycle is significantly shorter than crops grown on dryland. At the same time, it promotes agricultural diversification by encouraging cultivation of diverse crops throughout the year. Moreover, the products are organic, which in turn enhances their appeal to local traders because they can sell them at a premium price.

The floating farms must be built every year, but the debris left behind is used as fertilizer during the dry season. Today, about 50,000 farmers are involved in the floating farm sector.

What role have different actors played in the revival and expansion of floating farms which are now recognized as one of 21 examples of 'globally important heritage agriculture' (as designated by FAO)[29] across the world? Clearly, the innovative capacity of local farming communities was essential, but in the mid-2000s they benefited from the activism and support of local and international non-governmental organizations (NGOs).

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[28] This discussion draws on the following sources: *BBC*, 2 January 2019, https://www.youtube.com/watch?v=CONfhrASy44; *Aljazeera*, 11 August 2019, https://www.aljazeera.com/news/2019/08/floating-farms-bangladesh-farmers-survive-floods-190814081711860.html; Climate Action Network South Asia, https://www.cansouthasia.net/floating-gardens-of-bangladesh-a-community-based-adaptation-for-combating-climate-change/; Irfanullah, H et al(2011) 'Floating Gardening in Bangladesh: A means to rebuild lives after devastating flood', *Indian Journal of Traditional Knowledge,* 10(1), 31-38

[29] See: http://www.fao.org/giahs/giahsaroundtheworld/designated-sites/en/

In 2005, and again in 2009, the Bangladesh government recognized the importance of floating farms as part of its climate change adaptation strategy. In 2013, the government approved a USD 1.6 million project under the Bangladesh Government Climate Change Trust (BCCTF) to promote floating farms for climate change adaptation and has targeted close to 50 localities across the country. This suggests that the scaling up of the floating farm sector is contingent on appropriate support from the government.

2.7.2 Service sector led growth and employment in India, with special reference to the IT sector

'India', as one study notes, is distinctive for its fast-growing service sector' (Eichengreen and Gupta, 2011". The historical evolution of the service sector can be gauged from the fact that in the 1980s, the share of services in GDP was 20%, but grew to 50% by the early 2000s. On the other hand, the employment share of services has been relatively modest rising from 20% in 1983 to 28.5% by 2000. This suggests that productivity growth has been quite rapid in the service sector.[30] Some evaluations show that the service sector has high backward and forward linkages and has spurred productivity improvements in the manufacturing sector (Banga, 2005).

Within the service sector, the information technology (IT) and related activities (business processing management or BPM, digital communications services, etc.) take pride of place. In 2017-2018, they accounted for 7% of GDP and are expected to contribute 10% of GDP by 2025. They hold the lion's share of both inward and outward FDI and exports. The Indian IT sector is responsible for 55% of the global sourcing market.

The IT sector and allied activities are evolving against a rapidly digitalizing Indian economy. There are currently 560 million internet subscribers, 354 million smartphone devices, 294 million users engaged in social media and 1.17 billion mobile phone subscribers. In terms of sheer scale, India ranks second only to China. The government has provided a big boost to this digitalisation trend by launching the world's largest Digital ID programme (known as Aadhaar) in which more than 1.2 billion Indians are enrolled. It has been estimated that, after allowing for digital applications in other sectors, such as agriculture, health, logistics and retail, 60 to 65 million jobs could be created by 2025, but 40 to 45 million people would have to be retrained once displacement and dislocation are considered. Still, an ex-ante net job creation rate of 20 to 25 million over the next five years is quite impressive.[31]

What role has the government played in this process? A former World Bank Chief Economist (Justin Lin) highlights the combination of direct and indirect measures taken by the Indian government that provided a congenial environment in which the IT sector could prosper (Lin, 2012). To start with, it created a large pool of talented professionals through leading edge institutes in the higher education sector (five Institutes of Technology and two Indian Institutes of Management).

[30] The stylized historical trends are discussed in Banga, R (2005) 'Critical issues in India's service-led growth', October, Indian Council for Research on International Economic Relations (ICRIER)

[31] McKinsey Global Institute (2019) Digital India, https://www.mckinsey.com/business-functions/mckinsey-digital/our-insights/digital-india-technology-to-transform-a-connected-nation

As early as 1972, the government allowed duty-free imports of computer systems, which were contingent on time-bound export performance targets for software and services. This was followed up in the 1980s in which software was targeted for export promotion.

In 1990, software technology parks were established, while later in the decade, foreign companies were permitted to establish fully-owned subsidiaries in the electronics export processing zones. In addition, duties, tariffs and taxes were either reduced or rationalized.

The focus on the IT sector continues to sustain the development of India as a software nation to this day. This is part of a larger strategy in which IT is seen as one of the 12 'champion' service sectors. The government has set up a fund of USD 746 million (approximately) to support the sector. There are also time-bound tax exemptions for successful start-up companies.

The government has also benefited from the feedback and guidance received from influential business associations, most notably NASSCOM. Today, NASSCOM continues to play a pivotal role as the voice of the IT industry. It has launched an online platform aimed at upskilling over 2 million technology professionals and skilling another 2 million workers and students.

2.7.3 Service sector led growth and employment in the Arab states

Some of the Arab states have shown that it is possible to have a viable service sector-led growth and employment strategy. One can detect the emergence of several services sectors that, according to some analysts, are reaching 'world-leading' standards in the Gulf Cooperation Council countries (GCC) (Awad, 2018). These include the rise of the United Arab Emirates (UAE) as a transport and logistics hub cutting across ports, airports, airlines and roads. DP World – born in Dubai decades ago– has now become the world's fourth largest port operator. Kuwait's logistics company Agility ranks among the world's top ten. The world's major airlines companies – Emirates, Etihad and Qatar – are all headquartered in the GCC countries.

The GCC countries have also demonstrated a capacity to invest in world-class premium shopping facilities that have attracted shoppers across the world. Hence, the retail sector has become rather buoyant in the region. This has been complemented by the rise of e-commerce in the region, which is expected to double in size within five years.

Going beyond the GCC countries, one can invoke the case of Morocco which has built up an internationally renowned tourism industry. It is worth noting that tourism is included in SDG Goals 8, 12 and 14 on inclusive and sustainable economic growth, sustainable consumption and production (SCP) and the sustainable use of oceans and marine resources, respectively.[32]

Despite challenging external circumstances, Morocco has managed to attract more than 10 million tourists. The industry now accounts for 8.1% of GDP and 7.1% of employment. Tourism is expected to contribute nearly 9% of Moroccan GDP in the next

[32] http://tourism4sdgs.org/tourism-for-sdgs/tourism-and-sdgs/

10 years. This strategy of expansion is being driven by vision 2020, which seeks to attract 20 million tourists to Morocco over time Oxford Business Group, 2018).

In all the cases documented above – be it the emergence of a world-class logistics hub in the GCC country or the tourism industry in Morocco – the government has played an important part in their evolution through regulatory reform to enhance the quality of service provision, use of fiscal incentives to attract FDI and major investments in infrastructure. New industries are rarely the product of spontaneous market-driven and private sector-led activity. This is an enduring lesson that one can derive from a discussion of the agenda of structural transformation.

2.8 Summary of key findings and policy lessons

In any discussion of structural transformation and transition to formality, a distinction needs to be made between the notion of the 'shadow economy' and the 'informal economy'. The notion of the shadow economy maintains that individuals and households choose to work informally in order to avoid taxes and government regulations. The informal economy as interpreted by the ILO maintains that informality is largely driven by compulsion, with workers trapped in low productivity, low income activities. ILO Convention No. 189 (2011) and Recommendation No. 204 (2015) are based on this premise.

While there is a clear-cut link between per capita income and the incidence of informality, one should eschew the optimistic notion that sustained growth will, on its own, lead to the progressive enlargement of the formal economy. Numerical illustrations based on panel data suggest that even if a country grows at 7% for decades, it will still take between 60 and 105 years for the formal segment of low- and middle-income economies to reach developed country thresholds. This means that a strategy of relying on growth alone will fail to tackle the challenge of pervasive informality in the developing world within a realistic time-frame. Deliberate policy actions entailing a paraphernalia of instruments will be needed.

An influential view, inspired by the work of those who are wedded to the idea of the 'shadow economy', suggests that the best way to facilitate formality is to enhance the ease of doing business. Unfortunately, binary comparisons and large-scale evaluations show that *de jure* pro-business reforms seem to have limited impact on reducing informality and improving labour market and social indicators. Hence, it is a necessary to take a measured approach to improving the business climate to facilitate formal private sector-led structural transformation. One should take particular care not to fall into the trap of embracing *de jure* pro-business reforms that might paradoxically undercut wages and working conditions.

In pursuing the goal of inclusive structural transformation as a route to broad-based formalization, world-wide firm-level surveys that capture the perceptions of major obstacles to business operations, as expressed by formally registered firms, can act as a guide. These surveys show that lack of access to finance is the biggest obstacle to the expansion of formal private sector firms. Region-specific evaluations suggest that enhancing financial inclusion, especially for SMEs, delivers both direct and indirect job creation dividends while at the same time improving the efficacy of monetary policy.

Investment in infrastructure can alleviate an important constraint on the private sector. This can be illustrated by highlighting global, regional and country-specific experiences in the case of reliable supply of energy. Firm-level surveys show that disruptions to supply of electricity have an adverse impact on business operations. The emergence of the off-grid solar (OGS) energy sector in many parts of the developing world can respond to the dual goal of clean energy and new income generating opportunities. Global estimates suggest that well over 4 million full-time jobs have been created in this sector. This sectoral development is aligned with SDG 7.

Support to productive sectors that can facilitate broad-based structural transformation takes many forms. However, for many low- and middle-income economies, supporting the rural economy (such as floating farms in Bangladesh) and specific segments within the service sector (such as tourism in Morocco and the IT industry in India) holds promise for both ecological friendliness and productive job creation. These country-specific experiences also highlight alternative pathways to structural transformation. This means that there is no 'one-size-fits-all' approach in which the primary route to economic prosperity lies in directing all resources to nurture the manufacturing sector, as proponents of 'premature de-industrialization' suggest.

Inclusive structural transformation is often the product of a partnership –whether implicit or explicit– forged between the government, the private sector and non-governmental organizations (NGOs). Often, the successful emergence of a sector, such as the IT industry in India, is seeded by private sector initiative, but sustainable and successful outcomes are rather difficult without government support. After all, one cannot expect either the private sector or community-based organizations to compensate for the lack of access to finance, a poorly educated work-force, and low-quality infrastructure. These 'fundamentals' need the intervention of the government to resolve them.

Formal recognition by the government of the potential and promise held by a sector that can create formal jobs and/or respond to prevailing threats –such as climate change– is the first and most important step to inclusive structural transformation. Not surprisingly, governments across the world choose to formally incorporate specific sectors/activities that are deemed worthy of support in national strategies. Once particular sectors/activities form part of a national strategy, a wide range of measures are employed to support the expansion of these sectors. The region- and country-specific examples illustrated in this paper suggest several common elements that inform sectoral policies. These include: purpose-built funds, import and FDI liberalization tied to export performance, tax exemptions, technology parks, education and training and so forth. These government initiatives can in turn be supported by industry and business associations that engage in advocacy for the targeted sectors and implement training programmes to enhance employability.

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Chapter 3

The challenges and opportunities of transition to formality in Sub-Saharan Africa (SSA)

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The different structural features of developed and developing economies have been extensively studied. Three key features that distinguish developed and developing countries have been consistently highlighted (see Mhone, 2000; Ghose *et.al.,* 2008; Hilson (ed., 2010). The first is dualism, namely the existence of two radically distinct parts, a modern or formal segment employing a small proportion of the labour force, and a traditional or non-formal segment employing the bulk of the labour force.

This dualism is a result of the grafted type of capitalism that was carved out under colonialism. Thus, the low resource absorptive capacity and persistent under-utilization of resources that characterizes most African economies is related to the enclave growth emanating from the structural legacy of economic dualism. This explains to a large extent the vicious cycle of perpetual under-employment that afflicts most of the labour force, and especially women and youth. The evolving social formations suggest the co-existence of the dominant capitalist and pre-capitalist modes of production that have been fused together in a rather uneasy and tenuous co-existence – the so-called grafted capitalism (see Mhone, 2000).

The organization of production in the formal sector involves the use of reproducible capital (including advanced technology) and labour (skilled and unskilled). In the non-formal segment, production largely involves use of predominantly unskilled labour, with natural resources and simple tools and implements. In the formal segment, production is for profit, which is saved and used to reproduce capital (investment); while in the non-formal sector it is for subsistence, with little savings and investment.

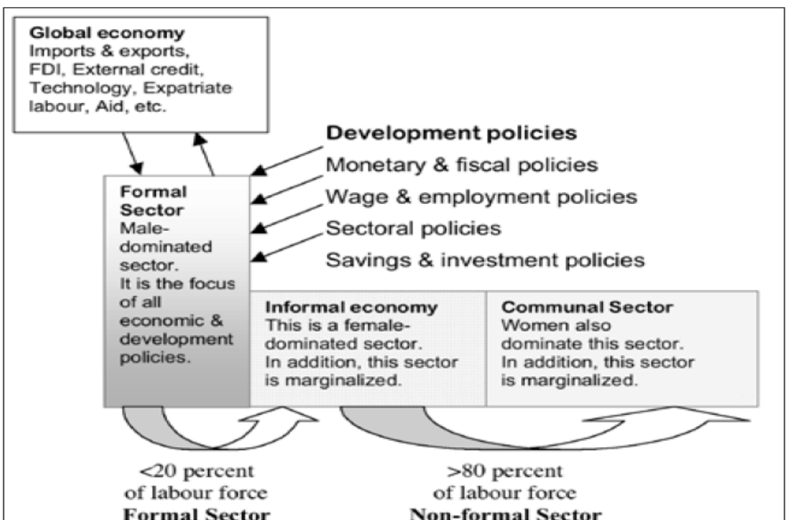
Based on the primary motive that drives production, Mhone (2000) argues that from the perspective of capitalism, pre-capitalist forms of work primarily constitute non-productive labour in the sense that it is not captured by capital for profit-making or the continuous expansion of capital. Such labour therefore does not continuously contribute to dynamic growth at the micro and macro-economic levels. Critically, grafted capitalism imparts a different growth and development path to a country compared to endogenously evolved capitalism that characterizes the first generation of developed countries of Europe. The simultaneous process of disruption and preservation of pre-capitalist relations in the developing world has resulted in a self-perpetuating low-income equilibrium trap. An important requirement for development under capitalism is, therefore, the need to capture non-productive labour into the productive sphere of capital. The major challenge for developing countries is the large size of the non-productive labour compared to developed countries, where it constitutes a small and often declining share of the labour force.

Furthermore, workers in the formal segment are engaged as regular, full-time wage employees, while in the non-formal segment they are either self-employed or engaged as casual, irregular wage workers. Huge gaps in labour incomes and productivity characterize the two segments, with poverty (and use of child labour) prevailing in the non-formal segment. Government regulations and collective bargaining institutions generally exist in the formal segment but are absent in the non-formal economy. Other sectoral policies, including financial intermediation and infrastructure are better developed in the formal than in the non-formal part of the economy.

The second distinguishing feature is the availability of surplus labour in the non-formal segment, implying that a substantial portion of workers in the non-formal economy are under-employed – they are engaged in work and income sharing. These forms of work and income sharing (casual work, self-employment) accommodate surplus labour by ensuring that no one is totally unemployed. As a result, a substantial proportion of workers in this segment can be withdrawn into the formal segment without affecting the labour input used in production. This is possible because of the prevalence of underemployment in the non-formal segment (see Lewis, 1954).

The third feature is the absence of institutionalized social security, with only a few people from well-off households being able survive without working –most people must work to survive. In such a situation, unemployment –conventionally measured as the population aged 15 years and above who, during the reference period, did not work and had no job or business to go back to, but who were available for work– is a poor indicator of the state of the labour market as most people cannot afford to sit-back and do nothing in the absence of social protection. Figure 1 shows the key aspects of the dual economy that typifies most African economies.

Figure 1. Illustration of the Dual-Enclave Structure of the African Economy



Source: ANSA (2006:31-32).

This structural feature of African economies is crucial for understanding the employment situation in these countries and significant for interpreting the labour market information system. This is particularly important given that labour market data collection systems in such countries are modelled along those created for the developed countries. Thus, for instance, the unemployment rate is not a good indicator of the labour market situation in a developing country context given that people cannot afford to be unemployed in the absence of institutionalized social security.

Within the structures of economic dualism, the ‘trickle-down’ effects from the formal sector are too weak to transform and absorb the non-formal sectors into formal activities. In addition, market forces on their own would simply perpetuate this dualism, even in the presence of some growth. Thus, assessing the employment situation in developing countries is not a straightforward task. This is compounded by the paucity of data. In this case, the growth of ‘employment’ in developing countries does not reflect the growth of productive jobs in the economy, as employment growth in the non-formal segment may imply increased underemployment. In this case, the unemployment rate cannot be taken as a measure of surplus labour in the economy. It is only in the formal segment that employment growth may be interpreted as increase in productive jobs.

Thus, it is only the movement of workers from the non-formal into the formal segment or from casual to regular full-time wage employment, or from low-productivity employment to high-productivity employment, from unregulated into regulated employment that can suggest improving employment situation. More generally, a move of workers from the non-formal to the formal segment is considered positive; hence, a rising share of the formal sector in total employment indicates an improvement in the overall employment situation. And a decline in underemployment or low-productivity survival activities results in increased labour productivity.

3.1 The Demographic Challenge

Africa had a population of close to 1.3 billion people in 2018 accounting for 17 per cent of the world’s population. It is the youngest continent, with children and youth aged below 30 years constituting 70 per cent of the continent’s entire population, as opposed to other regions of the world where the populations are aging. Half of the population is under the age of 18, and those in the age group 15-25 make up almost 30 per cent of the population. This youth bulge in the population is expected to continue for several generations to come. In fact, SSA is about 7 years younger than the next youngest region, South Asia, and this gap is likely to widen (see Fox, 2014; Filmer and Fox, 2014).

The working-age population aged 15 years or older account for fifty-nine percent of the total population (764 million people). Of the working-age population, over 63 per cent is in the labour market, with labour market participation rates averaging 46 per cent in North Africa and 68 per cent in sub-Saharan Africa (SSA). A very small proportion of the continent’s working age population (4.3 per cent) is unemployed (4 per cent in SSA and 5.5 per cent in North Africa), reflecting that in the absence of some form of social protection, the majority of its people have no choice but to take up the poor quality, often informal and insecure, jobs available in order to escape poverty. Overall, the number of the unemployed is expected to increase from 23.6 million in 2017 to 25.9 million in 2020 due to the region's strong labour force growth (see ILO, 2019).

The country-level experiences are highly divergent, with unemployment projected to range between 1.8 per cent in Ethiopia, 6.0 per cent in Nigeria, 18.2 per cent in Botswana and 27.3 per cent in South Africa in 2019. In the extreme case of South Africa, unemployment has been persistently high, having stood at 25.9 per cent in 2016 and projected at 27.6 per cent by 2020. Moreover, 72.2 per cent of total employment in SSA consists of own-account and contributing family workers - vulnerable employment (30.3 per cent in North Africa) in 2019, which declined from 83 per cent in 1991 to 82 per cent in 2000 and 77 per cent in 2012.33 More secure forms of employment in the form of wage and salaried workers are hard to come by at less than one in three jobs (28 per cent of total employment).

Again, the experiences are so diverse with wage and salaried employment higher in North Africa at 68.6 per cent compared to 22.4 per cent in SSA. On average, around 86 per cent of those employed in Africa are in informal employment, with the share of women higher than men (see ILO, 2019). The informality rate exceeds 90 per cent in more than half of the countries in SSA. According to the IMF (2018:58), SSA has the largest 'shadow economy' in the world accounting for 42.4 per cent of GDP during 1991-99, 40 per cent during 2000-09 and 36.2 per cent during 2010-15, followed closely by Latin America at 41.1 per cent of GDP (1991-99), 38.1 per cent (2000-09) and 33.4 per cent (2010-15)[34].

While the youth bulge in the population prompted talk of a demographic dividend in SSA, projections suggest that this may not happen soon. The 'demographic dividend' is associated with falling fertility rates, increased employment opportunities and declining dependency ratios and is expected to last at least five decades. In SSA, the growing population is associated with higher dependency ratios, low savings rate, low producti-vity and therefore a limited 'demographic dividend.' Youth in SSA are twice as likely to be unemployed as adults. Thus, the youth in Africa lack pathways into productive employment, which is the missing link for reaping the 'demographic dividend' (see Filmer and Fox, 2014; Fox, 2014; ILO, 2015).

3.2 Robust Growth Amidst Rising Poverty

Following the 'lost' decade of the 1980s and early 1990s, SSA experienced economic resurgence, with GDP growth accelerating from an average of 2.1 per cent during 1991-2000 to 4.6 per cent per annum during 2001-18. This recovery amongst African economies is widespread, with the exception of a few countries.[35] The stellar economic

[33] In 2017, vulnerable employment accounted for 72.1 per cent of total employment in SSA (30.4 per cent in North Africa), and in 2018 for 72.1 per cent (30.4 per cent in North Africa) (see ILO, 2019).

[34] See Chapter 2 of this volume for a critical discussion of the notion of the 'shadow economy'

[35] This remarkable turnaround is attributable to a sharp decline in large-scale conflicts in the 1990s, better macroeconomic management, a commodity super-cycle, and discoveries of new natural resources, as well as catch-up effects following 20 years of stagnation during the 1980s and 1990s (see World Bank, 2016; ILO, 2013; AfDB *et.al.,* 2015; UNECA, 2015).

performance prompted the influential magazine, The Economist, in its December 2011 edition to refer to the continent as 'the hopeful continent: Africa rising,' a narrative that captured the global imagination, yet only three years earlier, it had characterized the continent as a hopeless case.[36] Thus, since the mid-1990s, SSA had the longest continuous expansion in over 50 years (see Fox et.al., 2015). Annual economic growth in the continent is projected to accelerate from 3.4 per cent in 2018 to 3.9 per cent in both 2019 and 2020 (ILO, 2019).

While the share of the African population living below the international poverty line of $1.90 a day declined from 59.7 per cent in 1993 to 41.4 per cent by 2015, economic growth in SSA has not been as pro-poor as in other parts of the world, especially in East Asia and the Pacific, and South Asia, which had poverty rates as high as Africa's in the 1980s (see Table 1).

Table 1. Percentage of Population Living in Households with Consumption or Income per Person below the Poverty Line (2011 PPP and US$1.90 per day poverty line)

Year	Region 1	Region 2	Region 3	Region 4	Region 5	Region 6	World
1990	61.32	*	14.85	6.19	47.30	54.69	35.88
1993	53.72	5.23	13.97	6.96	44.86	59.65	33.99
1996	40.88	7.27	13.71	6.17	40.31	58.91	29.44
1999	38.50	7.86	13.54	3.79	*	58.32	28.62
2002	29.69	5.97	11.80	3.36	38.60	55.27	25.49
2005	18.92	4.86	9.88	3.05	33.74	50.78	20.71
2008	15.30	2.79	6.90	2.70	29.48	47.95	18.16
2010	11.21	2.39	6.20	2.05	24.58	46.54	15.73
2011	8.57	2.05	5.69	2.36	19.83	45.05	13.72
2012	7.24	1.85	4.73	2.39	18.17	43.90	12.79
2013	3.64	1.58	4.56	2.42	16.15	42.65	11.20
2015	2.31	1.46	3.88	4.21	*	41.39	9.98

Notes: Region 1 is East Asia and Pacific; Region 2 is Europe and Central Asia; Region 3 is Latin America and the Caribbean; Region 4 is Middle East and North Africa; Region 5 is South Asia; and Region 6 is Sub-Saharan Africa. [Downloaded on 19 November 2019].
Asterisk * denotes survey data coverage is too low, the result is suppressed.
Source: World Bank, http://iresearch.worldbank.org/PovcalNet/povDuplicateWB.aspx

[36] During this period, perceptions of Africa changed dramatically from viewing it "…as a continent of wars, famines, and entrenched poverty in the late 1990s, there is now a focus on "Africa rising" and an "African 21st century," (World Bank, 2016: 3).

As the incidence of poverty declined, however, Africa's population continued to increase rapidly such that the number of people living in extreme poverty increased by an estimated 136 million, from 280 million in 1990 to 416 million by 2015 (see World Bank PovcalNet database.[37] Regrettably, all developing regions reached the Millennium Development Goal (MDG) of halving poverty between 1990 and 2015, except Africa (UN, 2015). Now that the UN has adopted a new set of global development goals, the Sustainable Development Goals (SDGs), it is difficult to see how Africa will achieve the ambitious target of eradicating poverty by 2030, unless something drastic happens, with 10 years remaining to that target.

The low growth elasticity of poverty reflects the high levels of inequality that characterize the continent. Seven of the world's 10 most unequal societies are African (UNECA, 2015:56) and the continent is the second most unequal region of the world after Latin America, with high inequality persisting for over 60 years (AfDB *et.al,* 2015). High levels of inequality have undermined the potential positive impact of SSA's economic growth on poverty. This is the case even in countries such as Botswana, which has been touted as "…one of Africa's great development success stories" by the World Bank, where sustained high growth against a context of inequality has resulted in unacceptably high levels of poverty for an upper middle-income country. Thus, despite recording steady growth, the ability of Africa to offer economic and social opportunities to its growing labour force lags behind its demographic dynamism. Hence the continent is faced with a formidable challenge of not only sustaining growth, but also making it more inclusive and decent-work rich.

3.3 Structural Change, Productivity and Employment

Since the seminal work of Arthur Lewis, it is now widely accepted that the transformation of the economy from an agrarian, and fundamentally subsistence to an urban-based, integrated, enterprise-driven one is the essence of economic development that will sustain improvements in economic welfare (see Lewis, 1954, Chenery and Syrquin, 1975; Chenery, 1979; ILO, 2013; 2014; 2015). Hence, structural transformation is widely used as a macroeconomic measure of the quality of the economic development process. As such, the reallocation of jobs across sectors is central to the process of structural change and productivity upgrading.[38] Structural change is seen as the most effective driver of growth that helps bring down rates of vulnerable employment in developing economies, both in the short and in the long run.

Structural change has potential to produce a faster decline in vulnerable employment. A growth model that is based on structural change lowers the share of workers in vulnerable employment faster than other growth models, if structural change is associated with a reallocation of labour away from agriculture into industry and service sectors. It is the across-sector labour productivity component of growth that is associa-

[37] The World Bank's Africa Poverty Report (2016) is appropriately titled "Poverty in a Rising Africa."

[38] Baumol *et.al.,* (1985) referred to the effect of the transfer of labour on productivity the 'structural bonus' of economies that have a large share of employment in low-productivity activities, mainly agriculture (see ILO, 2013).

ted strongest with the speed at which vulnerable employment decreases, compared with other growth components. Vulnerable employment is often particularly present in the agricultural sector. Therefore, productive structural change is effective in lowering the prevalence of vulnerable employment on average. Hence, structural change is important in order to promote decent work (see ILO, 2013).

The low growth elasticity of poverty in SSA partly reflects the region's growth model that continues to rely on traditional low-productivity sectors, export of primary commodities, and public expenditure. Private investment remains at low levels relative to other regions of the world at a similar level of development (see ILO, 2019). SSA's over-reliance on primary commodity exports is such that agriculture, and in resource-rich countries, oil and mining drive the growth. Manufacturing typically plays a limited role, being relatively small with an average contribution of only 10 per cent of GDP. In fact, the share of manufacturing in GDP decreased significantly from 16.7 in 1991 to current levels below 10 per cent, lower than it was in 1980, whereas it improved in Asia over the same period. Only 6 per cent of all jobs that were created between 2000 and 2018 were in manufacturing, which accounts for just 6.2 per cent of total employment (ILO, 2019).

Moreover, countries with low per capita income levels, and those with high resource wealth tend to have very small manufacturing sectors, often around 5 per cent of GDP or less. Agriculture remains the leading sector in employing workers in SSA, contributing 63 per cent of the total in 2018, down from 65.5% in 2000 and 67.5 per cent in 1991 (see ILO, 2014, 2015; 2019; AfDB *et.al.,* 2013).[39] However, it contributes much less to GDP, averaging 25 per cent due to relatively low levels of productivity and earnings. The decline in the share of agricultural employment almost exclusively benefitted services sectors, with employment in industry remaining stagnant at below 10 per cent. Studies have observed the phenomenon of 'premature deindustrialisation' wherein "…countries are running out of industrialization opportunities sooner and at much lower levels of income compared to the experience of early industrializers," (Rodrik, 2015).

The challenge is that most economic activities in the services sector in SSA are associated with low productivity informal enterprises, even though their productivity is higher than in subsistence agriculture (see ILO, 2013; 2018; 2019). Structural transformation in Africa is therefore in its formative stage in most countries, hence the slow pace of poverty reduction. In sharp contrast to the African experience, emerging economies (e.g. Brazil, China and India) were more successful, witnessing impressive reductions in poverty for more than two decades on the back of more rapid *structural transformation* - a higher proportion of labour moved from low-productivity to high-productivity sectors (see AfDB *et.al.,* 2013).

Thus, despite strong economic growth, the employment situation has failed to improve significantly in SSA such that underemployment and informal employment remain unacceptably high. The share of workers employed in the sector with high levels

[39] Around 65–70 percent of the population in Africa resides in rural areas and hence directly derive their livelihoods from agriculture (World Bank, 2016). The share of agriculture in total employment has declined from 44 per cent in 1991 to 28 per cent by 2018, with much of this reduction attributable to middle-income countries (see ILO, 2019).

of productivity and income, i.e. industry, is estimated at less than 10 per cent in SSA, compared to other regions where its share is at least 20 per cent, and to East Asia where it exceeds 30 per cent. The proportion of the working-age population in paid employment in SSA is also low at 13.7 percent. While many African countries have taken measures to diversify their economies, progress has been slow. Yet the potential for labour-intensive manufacturing, particularly in sub-sectors that have linkages to agriculture and extractive industries, remains largely underutilized.

These developments undermine labour productivity growth which, at less than 1 per cent in 2018, is at par with the average annual rate of growth over the past decade. Labour productivity in SSA is still very low, even more so in the informal economy where many eke out a living, and the region has the lowest levels of labour productivity in the world. In fact, between 1992 and 2003, labour productivity in SSA was below its 1991 level and only exceeded that level from 2004 onwards when a clear upward trend emerged. Part of this labour productivity growth is associated with the shift in labour from agriculture to more productive sectors, especially services, but was quite limited towards industry (see ILO, 2013). The growth in labour productivity varies from 0.6 per cent in SSA to 2.5 per cent in North Africa, but both are below the average rate of 3.1 per cent experienced elsewhere in the world in 2018. With high fertility rates in Africa, in spite of the growing proportion of the working-age population relative to the total population, this results in relatively modest potential for greater economic progress (see ILO, 2019).

As a result, labour productivity growth is projected to remain too slow as the population grows too fast to facilitate a rise in average incomes and rapid reduction of poverty. Not surprisingly, therefore, working poverty remains widespread, afflicting one third of workers (32 per cent), who were in extreme poverty in 2018, and 22 per cent who experienced moderate poverty. Available data suggest that around 250 million workers in Africa were in extreme or moderate poverty in 2018. In the absence of inclusive growth, the number is expected to grow by nearly 5 million by 2020 due to the rapid growth of the population. Moreover, the projected acceleration of economic growth at least up to 2020 is considered too small to create enough jobs required to absorb the new entrants into the labour market. Employment is expected to grow by 2.9 per cent per year during the period 2018-20, just below the anticipated annual labour force expansion of 3 per cent over the same period. Consequently, the number of those unemployed is expected to increase by almost 2 million people by 2020. At the same time, the unemployment rate is expected to remain unchanged at 6.8 per cent.

Clearly, therefore, the sustained growth in Africa has not signified the beginning of a process of sustained structural transformation as the continent has continued to suffer from huge decent work deficits and uneven distribution of the benefits of growth. The growth story of SSA is one of low but rising labour productivity, and slow but steady structural shift of labour from agriculture into services, but no expansion of the industrial sector. The job story is also about persistently high levels of vulnerable employment that only declined at a modest pace in the last two decades, even in the presence of high economic growth. Thus, the quality of jobs in SSA is of concern with the working poor and vulnerable employment being the highest across all regions (see ILO, 2013; 2014; 2015;

2018; 2019). A huge gender gap in vulnerable employment persists and has widened as women are more likely to be in such employment than men. Even though the working poverty rate in SSA is declining, however, the absolute number of working poor is rising. In this case, structural transformation alone is not enough to result in widespread improvements in working conditions. This can only happen when there is a shift in employment out of subsistence agriculture towards sectors that offer high quality jobs.

The growth has not resulted in a significant improvement in labour market outcomes and poverty reduction. Not surprisingly, therefore, the ILO's social unrest index, which measures the discontent openly expressed by citizens at the labour market, economic and political situation in their country, shows an increase in SSA in 2018 over 2017, even though it is below the difference from the ten-year average (2008-17) (see ILO, 2019). The real challenge in SSA is, therefore, not getting people into the labour market, but rather improving labour productivity and conditions of work, as well as the returns and benefits associated with work. For employment to play its part as the intermediary or nexus between growth and poverty reduction, it must be productive and remunerative (see Osmani, 2004).

While industry is readily the vibrant source of wage employment in other regions, and particularly in East Asia, the process of structural transformation is in its early stages of development in SSA, and obviously requires time to take root. Meanwhile, it makes sense to leverage the more immediate potential for productive employment in agriculture and household enterprises (informal economy) (see ILO, 2013-19; Filmer and Fox, 2014). Accordingly, priority should be given to raising their productivity by targeting interventions that deal with the most binding constraints to higher productivity for people employed in these sectors, namely constraints related to human capital (labour supply – employability) and those related to the business environment (enhancing labour demand). This also entails enhancing productivity growth within individual sectors through for instance the reorganization of work, technological change and promoting higher skill levels. Given the slow pace of structural change, the challenge of creating sufficient productive jobs is therefore huge, requiring immediate action. In this regard, the ILO and FAO are promoting decent rural employment by supporting the promotion of decent work within the agriculture sector through the upskilling of rural households and the development of agricultural value chains.

3.4 The Way Forward - Opportunities for Transition to Formality in Sub-Saharan Africa

3.4.1 The Long-Term Vision: Promoting Structural Transformation

The slow pace of poverty reduction in SSA reflects the continued dependence on the primary sector, hence lack of structural change and productive jobs. However, Africa's natural resources are its comparative advantage, and therefore the basis for structural transformation (see AfDB *et.al.,* 2013; UNECA, 2015). Potential exists for labour-intensive manufacturing, particularly in sub-sectors with linkages to agriculture and extractive industries. As highlighted above, while many countries in SSA have adopted measures to diversify their economies, progress remains slow (see ILO, 2014; 2015; and AfDB, *et.al.,* 2013). Yet, structural change is central to raising living standards in a durable and equitable manner, enabling more people to enjoy higher productivity levels in the more advanced parts of the economy.

Given the abundance and diversity of agricultural, mineral and other resources, the process of industrialization in Africa should take advantage of this natural endowment. As argued in AfDB *et.al,* (2013), structural transformation towards more productive activities and better jobs is closely linked with a strong natural resource sector. Those countries with comparative advantages in a large range of raw commodities also tend to have comparative advantages in a wide range of higher value-added products. Thus, instead of holding a country back, a strong and diversified primary sector is an important step towards a diversified economy that creates productive jobs.

There is emerging consensus that the continent should simply exploit its comparative advantage in commodity-based industrialization, starting with labour-intensive sectors and upgrading to medium- and high-technology sectors as productive capacities are built. Borrowing from the East Asian and, indeed, developed world experiences, Africa's trade policies should seek to promote dynamic efficiency of mature firms and efficiency of 'infant industries' through temporary protection from international competition. Extra care must be taken in negotiating trade and investment agreements in a manner that safeguards domestic and regional industrialization objectives (AfDB, 2013; AfDB *et.al,* 2013 & 2015; ECA & AUC, 2013; UNECA, 2014 & 2015).

In recent years, structural transformation is assuming pride of place in Africa's economic agenda, being at the centre of the African Development Bank's ten-year strategy (AfDB, 2013) and a priority for the Economic Commission for Africa (UNECA, 2014; 2015; ECA & AUC, 2013). The theme of the 2013 Africa Economic Outlook of the AfDB was on Structural Transformation and Natural Resources, while UNECA's 2015 Economic Report on Africa focused on Industrializing through trade. This strategic shift culminated in the identification of structural transformation as Africa's overarching objective in the African Union's Agenda 2063 adopted in January 2015. The departure point lies in the recognition that growth alone is inadequate for Africa to fulfil its social goals, especially employment creation and poverty eradication. In the same vein, the Southern African Development Community (SADC) adopted its 'Industrialization Strategy and Roadmap 2015-2063,' at its Extra-Ordinary Summit in Harare, Zimbabwe, in April 2015.

The African Economic Outlook (AEO) 2013 proposed a four-layer policy approach to promote natural-resource based structural transformation through better utilization of their natural resources combining investment in fundamentals with a push for transformation. The first layer involves putting in place the right conditions for structural transformation, which includes basic requirements such as infrastructure and education to strengthen skills, as well as sufficiently large and competitive markets. The second layer revolves around meeting the specific requirements of the primary sectors to fuel transformation, through good land management and resource-specific skills and research. The third layer focuses on optimizing the revenues from natural resources and their prudent investment, while layer four involves promoting structural transformation through active policies, especially those that increase agricultural productivity, and building linkages to and from the extractive industries (AfDB, 2013; AfDB *et.al,* 2013).

As part of this drive towards industrialization, the AU adopted the Africa Mining Vision (AMV) in 2008, which proposed to harness the potential of the capital-intensive sector through building resource linkages with the rest of the economy, involving: (i) revenue linkages; (ii) backward linkages (supply chains); (iii) forward linkages (value addition/beneficiation); (iii) knowledge (side-stream- mineral technical HRD and R&D); and (v) spatial linkages [side-stream- collateral use of mineral infrastructure (road, ports, rail, power and water)]. Thus, the Africa Mining Vision (AMV) of 2008 and the International Study Group (ISG) report of 2009[40] demonstrated how to maximize the growth, development and employment potential embedded in mineral resources through the creation of strong and diverse linkages between mines and the immediate economy. The AMV and ISG Report went beyond the mining sector by encouraging planning for and investment in development corridors to enable non-mining businesses and enterprises to take advantage of such arteries, i.e. the roads and railways transporting minerals to markets. The AMV therefore envisages an African "mining sector that catalyses & contributes to the broad-based growth and development" and this represents a paradigm shift from the liberal FDI-dependent and resource rent centred strategy which governed African mining hitherto.

Some African countries have been targeting some of the estimated 85 million jobs at the lower end of global manufacturing that are expected to be transferred from China, where rising wages for unskilled workers and technological upgrading creates opportunities for such jobs to be off-loaded to low income countries of Asia and Africa (jobs bonanza) in areas such as assembling consumer electronics, motorcycles, garments, footwear based on special economic zones. It is reported that Ghana and Ethiopia are already benefitting from this development (UNECA, 2015).

3.4.2 Enhancing Within-Sector Productivity Growth

Given that structural transformation is still in its nascence in SSA, and recognizing that developing the necessary technological and other capabilities will take time, in view of the urgency to generate productive employment in SSA in the context of population dynamics, it is necessary to look to enhancing within-sector productivity growth, especially in agriculture. The strategy should entail focusing on the most binding constraints to higher productivity. Reorganization of work, technological change and promoting higher skill levels amongst the poor are key to raising their productivity. Examples abound on measures being implemented to promote labour productivity in low income sectors, such as subsistence agriculture and the informal economy.

For instance, the ILO and FAO are promoting decent rural employment (DRE) by upgrading the skills of rural households and promoting the agricultural value chains. Decent rural employment refers to any activity, occupation, work, business or service performed by women and men (adults and youth) in rural areas that:

[40] The International Study Group (ISG) to Review Africa's Mineral Regimes was established by the UN Economic Commission for Africa (UNECA) in September 2007 following the recommendations of a meeting (the 'Big Table') organized by UNECA and the African Development Bank (AfDB) in February 2007 attended by Ministers and senior officials from eleven mineral-rich African countries and representatives of the African Union Commission.

a. respects the core labour standards as defined in ILO Conventions;
b. provides an adequate living income;
c. entails an adequate degree of employment security and stability;
d. adopts minimum OSH measures adapted to address sector-specific risks and hazards;
e. avoids excessive working hours and allows sufficient time for rest; and
f. promotes access to adapted technical and vocational training.

In many SSA countries, multilateral, bilateral and local partners, including governments, are spearheading the enhancement of agricultural value chains in the industrial cluster groups that include (i) horticulture; (ii) livestock and meat; (iii) legumes and oilseeds; (iv) tree crops; (v) grains; (vi) cotton; (vii) tobacco; and (ix) forestry and timber. These initiatives are aimed at the explicit objective of transitioning from subsistence to commercial agriculture, and informality to formality by strengthening every node or level of the value chains. One example in Zimbabwe is a three-year EU project promoting inclusive poultry value chains at three levels, namely, economic, social and environmental, to achieve their inclusive green growth. The project is being implemented within a radius of 100 kilometres in five major cities (Harare, Bulawayo, Gweru, Mutare and Masvingo). It is based on three pillars, namely organize, capacitate and integrate. At the core of the intervention lies the promotion and support of the organizational development of small to medium farmer groups into business associations, co-operatives, out-grower schemes and/or similar formal business structures with a view to improving:

- market and service linkages providing a platform for growth in production and sales;
- economies of scale to achieve greater production efficiency and profitability;
- bargaining power to improve terms of trade for fair value realization along the value chain;
- policy advocacy and strengthening farmers’ voices to reduce the cost of compliance and improving the business environment;
- appropriately structured financial products by collectively managing credit risk.

In terms of capacitation, service providers in the poultry value chain are being assisted to enhance and develop comprehensive models and services designed to improve production and reduce costs for Small and Medium Producers (SMPs). Lastly, as a basis for their integration into the poultry value chains, the project seeks to develop, document and promote innovative business systems in support of the economic, social and environmental aspects through:

- Quality Management Systems, to improve the consistency of quality products produced and consumed in the value chain;

- Decent Rural Employment (DRE), to improve employee welfare and corporate social responsibility among value chain actors; and
- Natural Resource Management, to improve sustainability of natural resources used in the value chain.

This is supported by a theory of change around DRE for poverty reduction, which entails investing in agricultural and rural development at the input level, leading to increased agricultural productivity, output and income, as well as growth of the rural non-farm economy at the output level, cascading to more productive and decent rural employment as an outcome, and dynamic rural economies and reduced rural poverty as impacts. Other successful interventions by, for instance, USAID in Zimbabwe involved transitioning subsistence female banana growers to commercial agriculture with the use of similar approaches of targeting value chain development from producers, input providers, and at retail level.

Promoting within-sector productivity growth is not exclusive to agriculture as it pertains to all sectors of the economy. In the manufacturing sector, for instance, this would involve adopting and adapting new technologies to enhance competitiveness, as well as building the requisite technological capabilities.[41]

3.4.3 Facilitating Transition to Formality

Given the pre-dominance of informal employment in SSA, countries are increasingly seeking to transition informality to formality, but most of the efforts are still fragmented. For instance, Ghana and Zimbabwe have led the way in organizing the Informal Economy through their trade unions and own initiatives from within the 'sector' itself. In Tanzania, social protection has been extended to cover the informal economy. As discussed above, some initiatives promoting value chains have sought to foster inclusion of informal economy actors along the value chains by promoting organization, capacitation and integration on the basis of fairness, equity, economic viability and competitiveness, social standards and environmental sustainability. Most of these interventions are still in too early stages to assess outcomes and impact.

Priority Area 3 on Social Security and Protection of the AU Agenda 2016 seeks to ensure that: (i) all citizens have access to Social protection by 2063; and (ii) all in formal sector and 20% in Informal Economy by 2023. Innovative social security schemes have been designed to extend social security to the informal sector, most of which are group- and community-based or micro-insurance schemes aimed at providing or securing the basic needs of their members, including childcare, mutual health funds, death benefit funds, and thrift savings schemes for emergencies. In some cases, groups or communities conclude a social contract with the public service: if the groups deliver improvements to local infrastructure, the public services provide social security to the group in question. In most cases, however, the groups seek the services of a local service provider for which they pay the costs out of the mutual contributions. The

[41] Technological capabilities include physical investment, human capital and technological efforts.

concept of micro-insurance is now being promoted and its potential is being demonstrated, mostly in Central and West Africa. The creation of group-based schemes has proven successful. However, the schemes vary in the scope and magnitude of benefits as well as in the level of organization and management.

As highlighted in Nhongo (2013), there are not many examples of national social protection programmes targeting informal workers in Africa. High population coverage levels in countries such as Ghana and Rwanda in health insurance care have been achieved through making insurance scheme membership mandatory for the entire population. National coverage in universal health care (UHC) in Rwanda has reached 75 per cent, in Ghana 66 per cent and Gabon, 45 per cent. In the case of Rwanda, funding is through VAT, donors in Rwanda, and Government matching members' contributions by 100% in Tanzania (see Frota, 2019).

An example of extending social protection to the informal economy comes from the Maternity Leave, Sick Leave and Death Benefits (MSD) Fund in Namibia. The MSD Fund is a short-term social insurance scheme administered by the Social Security Commission of Namibia. It covers all persons who work and receive a basic wage for their services, even if it is for only one day per week on a regular and continuous basis. This includes domestic workers, as well as employees of Small and Medium Enterprises (SMEs), including shebeens, hair salons, panel beaters, construction workers etc. Self-employed persons may choose to register themselves with the MSD Fund voluntarily. In such cases, the employers are expected to register all such employees.

The contribution rate of 1.8 per cent of the employee's basic wage paid to the MSD Fund is shared equally (50/50 basis) between the employer (0.9 per cent) and the employee (0.9 per cent) from N$300 per month to the ceiling of N$9,000. The minimum monthly contribution by members is N$2.70 and the maximum is N$81. Employees earning less than N$300 per month are also required to contribute the minimum of N$2.70. For a self-employed person, their contribution includes both an employer's and an employee's contribution (i.e. 1.8 per cent of their basic wage/income) (see www.usnamibia.com.na).

In both Anglophone and Francophone countries, attempts have been made to establish inclusive health insurance schemes around the concept of community health programmes (mutuelles de sante) (see Nhongo, 2013). For instance, Community Health Funds (CHFs) were introduced by the Ministry of Health in Tanzania, in 1996, as an alternative insurance scheme to the National Health Insurance Fund (NHIF) which only covers the formal sector. CHFs were created to make health care affordable and available to the rural population and workers in the informal sector. Pursuant to this objective, government passed the Community Health Fund Act of 2001, which formally institutionalized the CHFs.

CHFs are insurance-based hybrid schemes at district level, which are co-financed by the community (household) and the government. These schemes cover all households in the area where a community health fund is established by the respective local authority. Both the informal and formal sector workers can become members of the CHFs. The scheme is voluntary and members (households) pay a small uniform contribution on a regular basis to offset the risk of having to pay much larger amounts in health care user fees when they fall sick (see Ackson and Masabo, 2013).

As such, several CHFs have been established including the Igunga Community Health Fund, Mkuranga Community Health Fund, Bukombe Community Health Fund, Misungwi Community Health Fund, Maswa Community Health Fund and Rungwe Community Health Fund, among others. Informal economy workers in these districts joined the schemes for three main reasons. First, they only have to contribute amounts ranging between TZS 5,000 and 15,000 per annum (about USD 4 and USD 11) once a year to be entitled to medical care throughout the year. Second, members of the community health funds do not have to contribute on behalf of the 'non-existent employer' as happens with the existing schemes. The Government of Tanzania matches the contributions made by the members to CHFs. Third, medical care is considered one of the highest priorities in the informal economy.

Workers in the informal economy responded positively to the CHFs, including those in the formal sector who are inadequately protected against health-related risks. As a result, both the National Health Insurance Fund (NHIF) and CHFs registered increased membership. NHIF membership base increased from 164,708 in 2001/02 to 468,611 in 2010/2011. The beneficiaries increased from about 2.5 million in 2010/11 to about 3.4 million by 2016/17 (7.3% of the total population). CHF enrolment reached over 2.1 million households covering roughly 12.6 million beneficiaries in 2016/17 (up from about 7 million in 2014/15), pooled at district level. Indeed, the coverage of both funds remains low. In March 2018, the improved Community Health Fund (iCHF) was launched as an alternative insurance scheme to NHIF intended to cover the informal sector and rural households. The iCHF pools funds at a regional level and all beneficiaries covered by the scheme are entitled to services available up to the regional hospital level, subject to an exclusion list comprised predominately of specialized procedures and drugs

iCHF Premiums and Contributions per year are set at TZS 45,000 (US$20) per beneficiary or TZS 150,000 (US$65) per household of six in Dar es Salaam. In all other urban areas in the country, premiums are set at TZS 30,000 (US$13) per beneficiary. In rural areas, premiums are set at TZS 30,000 per household of six. Each additional adult is set at TZS 30,000 and each additional child is set at TZS 10,000 (US$4). Households larger than six may choose to form a separate family group. The Government of Tanzania's matching contribution is TZS 30,000 (US$13) per household of six. The matching contribution combined with the beneficiary contribution equals a total of TZS 60,000 collected per household (see Lee et.al., 2018).

Another relevant experience is the UMASIDA health care programme in Dar es Salaam, which covers the informal sector. While this health insurance scheme requires monthly contributions, however, members need not make 'double contributions' as required by the existing social security schemes. In which case, members can insure themselves and their families against social risks related to health. As with CHFs, the positive response is associated with the fact that health care is a priority in the informal sector. However, Government does not match contributions made by members of UMASIDA.

However, as pointed out by Ackson and Mabaso (2013), “Social protection in Tanzania is availed to the informal sector in an uncoordinated manner to the extent that the informal sector workers find it difficult to access the available protection. The demands for security, forming groups, and other hurdles also complicate access to social protection which would otherwise be available to the informal sector.” To end fragmentation of health insurance coverage, increase resources for health, provide a minimum benefits package for all, and increase the efficiency of health spending, the goal of the health insurance reform agenda is the establishment of a single national health insurer, (SNHI).[42]

Key lessons emerging from the various country-level interventions designed to transition informality to formality include the following:

- Absence of a focal coordinating point or authority with overlapping mandates (Ministries responsible for Small & Medium Enterprises, Youth, Labour, Local Authorities, etc.);
- Fragmented interventions often supported by development partners raising questions regarding their sustainability;
- Lack of an integrated package of interventions;
- One-size-fits all interventions;
- Lack of detailed information and analysis on informality – often based on partial analyses. Interventions are often reduced to groping in the dark;
- Lack of voice and representation; and
- Policy ambivalence with respect to targeted sectors.

3.4.4 Towards Pro-employment Macroeconomic Policy for SSA

In January 2015, the AU Assembly of Heads of States and Governments adopted the Declaration and Plan of Action on Employment, Poverty Eradication and Inclusive Development, with its Follow-Up Mechanism (Ouagadougou +10) and noted the progress achieved in terms of the development of policy, with several countries adopting National Employment Policy Frameworks as directed. However, concern was raised that despite the significant efforts, unemployment, underemployment and poverty rates, in particular among the youth and women, remain unacceptably high, threatening political stability.

Part of the challenge lay with the SSA’s continued reliance on the traditional macroeconomic framework that is largely pro-cyclical and based on targeting macroeconomic stability. Regional integration has been based on macroeconomic convergence criteria that include: (i) inflation target of below 5 per cent; (ii) budget deficit of below 5 per cent of GDP; (iii) public debt of below 60 per cent of GDP; and (iv) current account deficit of below 9 per cent of GDP. This convergence framework based on fiduciary and solvency criteria has often been associated with modest employment outcomes; persisting poverty; high inequality; insufficient economic diversification; and constrained ability to engage in counter-cyclical policies (see Muqtada, 2010).

[42] Health Sector Strategic Plan July 2015 – June 2020 seeks to reach all households with Quality Health Care.

The financial and economic crisis of 2008/09 resulted in a major rethinking of the conventional approach and its efficacy in achieving social goals. An IMF paper appropriately titled, "Rethinking Macroeconomic Policy," argued that "…we thought of monetary policy as having one target, inflation, and one instrument, the policy rate. So long as inflation was stable, the output gap was likely to be small and stable and monetary policy did its job. We thought of fiscal policy as playing a secondary role, with political constraints sharply limiting its de facto usefulness. And we thought of financial regulation as mostly outside the macroeconomic framework," (see Blanchard *et.al,* 2010: 3).[43]

This rethink suggests that there can be multiple targets in a macroeconomic strategy, and that these can be achieved through multiple instruments, a development that is critical to the design of employment-friendly macroeconomic frameworks.[44] The recognition of fiscal policy as a significant policy tool[45], particularly in times of crisis when counter-cyclical measures are warranted, and when monetary policy often reaches its limits, is a worthwhile development.[46] The IMF paper calls for a review of the inflation target from 2 per cent to 4 per cent, an adjustment which may be sensitive to the developed countries, while remaining insensitive to the conditions prevailing in developing countries where an inflation threshold of 11-12 per cent beyond which growth will be hampered has been suggested (see Muqtada, 2010).

Box 1. New Zealand Adopts a Dual Mandate

New Zealand was the first country to officially adopt inflation targeting in February 1990, with most developed countries following its example. Under the inflation-targeting era, New Zealand brought inflation down from around 20 per cent to two per cent in five

[43] This shift has also been highlighted at an IMF conference in March 2011. See Macroeconomic Policy in the wake of the crisis. http://www.imf.org/external/pubs/ft/survey/so/2012/BOK033012A.htm.

[44] The USA legislated the dual mandate of maintaining price stability and full employment for their monetary policy (see Islam, 2018). In the United States, the dual mandate of the Federal Reserve System was formally instituted in 1977. The Federal Reserve Reform Act of 1977, states the following: "The Board of Governors of the Federal Reserve System and the Federal Open Market Committee shall maintain long run growth of the monetary and credit aggregates commensurate with the economy's long run potential to increase production to promote effectively the goals of maximum employment, stable prices, and moderate long term interest rates" (see Smith and Aziz, 2019). The Full Employment and Balanced Growth Act of 1978 required the federal government to "promote full employment … and reasonable price stability" (see Thorbecke and Levy, 2002). A dual mandate of price stability and low unemployment is evident in the objectives assigned to the Reserve Bank of Australia (RBA) by the Reserve Bank Act 1959 (see Smith and Aziz, 2019). The RBA was to direct monetary and banking policy "to the greatest advantage of the people of Australia", and the board of the Bank was to exercise the Bank's powers to "best contribute to: (a) the stability of the currency of Australia; (b) the maintenance of full employment in Australia; and (c) the economic prosperity and welfare of the people of Australia." A dual mandate serves as an approximation for a social welfare function (Debortoli *et.al.,* 2017).

[45] Rogoff (1985) and Walsh (1995) both show that skewing the incentives or objectives of the central bank relative to the general populace's preferences may enhance welfare.

[46] In the aftermath of the Great Depression, following Keynes, fiscal policy was a central tool of macroeconomic policy. In fact, during the 1960s and 1970s, fiscal and monetary policy roughly had the same weight; instruments designed to achieve two targets, namely, internal and external imbalance. In the past two decades, however, fiscal policy took a backseat to monetary policy as a result of scepticism about the effects of fiscal policy and the argument that if monetary policy could maintain a stable output gap, there was no reason to use another instrument. It was also argued that lags in the design and implementation of fiscal policy, and the short length of recessions meant that fiscal policy will come too late (see Blanchard ***et.al,*** 2010).

years. For nearly 30 years, inflation has been low and stable in New Zealand. Once inflation stability was broadly achieved, the emphasis gradually shifted towards 'flexible inflation targeting', with greater emphasis on secondary objectives, such as stabilisation of the real economy as well as exchange rate, interest rate and financial stability.

In the case of New Zealand, the shift towards flexible inflation targeting started in the mid-1990s when the band for the inflation target was relaxed from 0-2 per cent to 0-3 per cent in 1996, and to 1-3 per cent in 2002. In 2012, the inflation target remained at 1-3 per cent, but with a focus on a 2 per cent target midpoint. The Policy Target Agreements of the late 1990s and early 2000s also placed greater emphasis on secondary considerations. In the Policy Targets Agreement of 2017, the Minister of Finance introduced maximum sustainable employment as a higher-order objective. An amendment to the Reserve Bank Act in 2018 gave maximum sustainable employment equal status to price stability as a primary objective, formally giving monetary policy in New Zealand a dual mandate (see Smith and Aziz, 2019). Thus, the country adopted a dual mandate, focused on achieving price stability and supporting maximum sustainable employment beginning 1 April 2019.

The change came about following the realization that over the past 30 years, the inflation and growth trajectories for inflation-targeting central banks (e.g. New Zealand and the United Kingdom) and central banks with a dual mandate (e.g. Australia and the United States) have been pretty similar. The change also came about following greater appreciation that low inflation is a means to an end, and not the end itself, an understanding that is easily lost in the fight to lower inflation. The ultimate goal is to improve the wellbeing of the people and, for many, *employment* is one tangible measure. *Employment* provides everyone with an opportunity to earn a wage and contribute to society, as well as living a fulfilling life. It is in this light that the Reserve Bank Act (1989) was amended to embrace a dual mandate with an *employment* objective sitting alongside the price stability goal. Including the objective of supporting maximum sustainable employment along with inflation helps underlines the long-term goal of improving the wellbeing of the people (see Hawkesby, 2019; Smith and Aziz, 2019).

The recent experiences of austerity in Greece also raised concerns about the efficacy of such interventions. IMF forecasts as part of Greece's first bailout programme in 2010, predicted that the nation could cut deeply into government spending and quickly bounce back to economic growth and rising employment. An IMF Working Paper published on 3 January 2013 titled "Growth Forecast Errors and Fiscal Multipliers," co-authored by its chief economist Olivier Blanchard and Daniel Leigh, a research-department economist, argues that the IMF recommended slashing budgets too early in the euro crisis, starving many economies of much-needed growth. It observes that: "Forecasters significantly underestimated the increase in unemployment and the decline in domestic demand associated with fiscal consolidation." The Report indicates that IMF and European economists underestimated the effect of cutting government budgets.

Even though this emerging consensus has not translated into a change in practice in much of Africa, it offers hope for the implementation of pro-employment policies, and in particular the adoption of dual targeting (mandate), whereby the conventional stability (inflation) target is associated with the social goal of full employment. Experience with National Employment Policies (NEPs) so far also suggests that having good policies alone is not enough. It is important to ensure that this is complemented by a pro-employment budgeting (PEB) - i.e. fiscal space for employment. The key principle behind PEB is that resources should not just be allocated based on 'return on investment', but also based on the employment impact. As highlighted at the conference of African ministers of economy and finance held in Lilongwe, Malawi, in March 2010, including employment in national budgets is the weak link: "National policy declarations on job creation are seldom based on quantifiable budgetary objectives and are forgotten, once the budget is drawn up. In other words, employment is not taken into consideration in the end of budget cycle assessment. Concerning employment policies, interministerial coordination, particularly between the ministries of finance and labour, are lacking and must be reinforced."

In this regard, all the policies and budgets of all state-run structures should include an employment aspect throughout the budgetary cycle (design, performance, follow up). Furthermore, ensuring employment is a cross-cutting issue in all policy frameworks and sectors, involving multiple stakeholders, requires leadership and effective coordination. Most countries lack effective coordination frameworks. Phororo (2013) observes that these interventions have not been well coordinated, resulting "…in the inefficient use of limited resources; overlaps and duplication; and a failure to exploit untapped potential for synergies and cooperation." She makes a strong case for better coordination of (youth) employment interventions given its cross-cutting nature that requires a multi-stakeholder approach. She proposes an integrated model based on the collective impact approach, where a group of actors commit themselves to a common agenda for solving youth employment challenge by better aligning and synchronizing the various coordination elements. Hence the importance of the five components involving a common agenda, shared measurement, mutually reinforcing activities, continuous communication and backbone support.

The Government of Rwanda has established a new agency for co-ordinating their NEP, the Capacity Development and Employment Services Board (CESB), which brings together institutions responsible for capacity building (the National Capacity Building Secretariat), labour market interventions and employment. CESB also provides policy advice and coordinates the implementation of the national capacity development strategy, the national human resource development strategy, as well as the national employment programme and interventions across sectors. While CESB is at the operational level, the Ministry of Labour provides policy oversight.

An interesting development is the growing interest in and renewed commitment to employment, and in particular youth employment as an urgent policy issue amongst governments and development agencies. Since 2011, reports on the issue have been published by the African Development Bank (in conjunction with the OECD, UNDP, and the AU), the Mo Ibrahim Foundation, the World Bank, the ILO and several think tanks. Governments have issued strategy papers and devoted increasing budgetary resources to youth employment programmes, often complemented by bilateral and NGO donor funds. The AU's Africa Agenda 2063 has a central aspiration of achieving a prosperous Africa based on inclusive growth and sustainable development. Furthermore, with the coming to an end of the MDGs in December 2015, the international development agenda is guided by 17 Sustainable Development Goals (SDGs). Goal no. 8 seeks to "promote sustained, inclusive and sustainable economic growth, full and productive employment and decent work for all".

3.5 Concluding Remarks

While Africa has a young population, its capacity to create productive employment opportunities has lagged population growth. However, while the challenge of employment on the continent may appear daunting, Africa's vibrant youth represents an opportunity in a context where populations elsewhere in the world are aging fast. The youth may not only need jobs, but also create jobs themselves, such that ultimately the growing labour force can easily be an asset in the global marketplace. Youth are energetic, have great potential and creativity to drive Africa's flagship Agenda 2063. In this case, the potential to leverage the demographic dividend is immense if fertility rates are significantly reduced and productive opportunities generated quickly enough.

As the labour force grows more rapidly than the population dependent on it, resources are released for investment in economic development and family welfare, resulting in faster per capita income growth, with the dividend period estimated to last for five decades or more (see Bloom et.al, 2003). Africa is not on its own in this, as the East Asia and the Pacific region's experience points to the potential growth-enhancing effect of this 'youth bulge' in the population. Estimates suggest that a third to half of the economic growth that East Asia and the Pacific enjoyed was a 'demographic dividend' associated with the changing population structure.

Since the mid-1990s, Africa has experienced sustained economic growth. However, that growth has not reduced poverty as quickly as in other regions of the world and it has not been associated with productive employment. Four out of every five new jobs in the continent are informal. Furthermore, while many African countries have taken measures to diversify their economies, progress has been slow, with structural transformation still in its formative stages. In fact, the shift in output and employment has been from agriculture to informal services, which though better than agriculture, have not reduced poverty substantially. Hence, SSA faces a formidable challenge of creating more and better jobs, by sustaining high economic growth and making it more inclusive through enhancing within-sector productivity growth as well as a more rapid structural transformation through which employment shifts from low-productivity to high-productivity sectors.

The lack of a more rapid process of poverty reduction, implying a low growth elasticity of poverty prompted African Heads of State and Government to adopt the Ouagadougou Declaration on employment and poverty in September 2004 where they agreed to treat employment as a cross-cutting issue and to design National Employment Policies (NEPs) to implement pro-employment strategies across all policy domains, macro, micro, sectoral, infrastructure and in new areas around green economies and jobs. While most governments have adopted NEPs, this has not been accompanied by implementing pro-employment budgets and effective monitoring and evaluation frameworks as well as a coordinated approach. The continued reliance on the traditional macroeconomic framework, with a singular focus on macroeconomic stability has been at odds with the explicit objective of leveraging pro-employment and inclusive growth and development. An explicit approach towards adopting a dual mandate, which includes both price stability and promoting full employment, is necessary.

Efforts at transitioning to formality have been made, but these tend to be fragmented, duplicative, donor-driven and have not been scaled up for impact. Moreover, in many countries, governments remain at best ambivalent, supporting it at times and at others attacking it. Even within the same government, some agents seek to support the informal economy, while others, such as local authorities and security bodies seek to undermine it, as is the case in Zimbabwe. Lastly, an explicit focus on employment and the labour market would require more robust Labour Market Information Systems (LMIS). Sadly, in SSA, only Mauritius and South Africa undertake regular quarterly employment surveys.

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Chapter 4

Informal Employment in Urban China: Measurement and Implications.

Yang Du and Albert Park

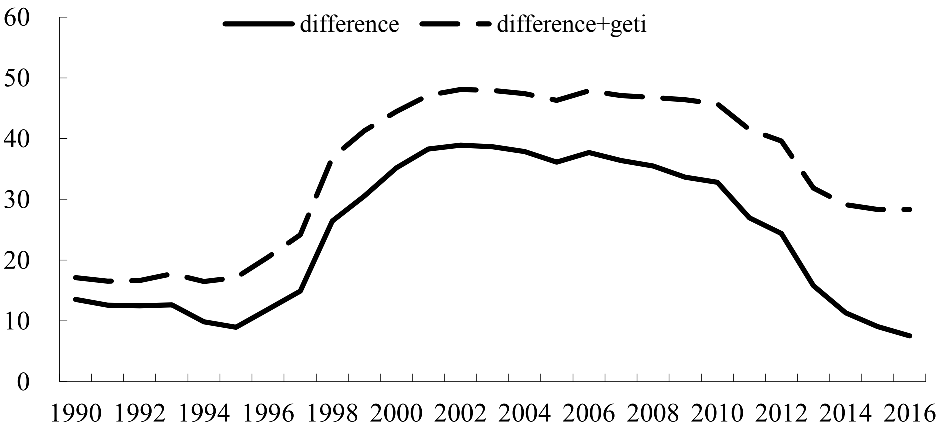
Because of China's socialist legacy, little attention had been paid to the rise of informal employment until recently. Under planning, urban workers enjoyed guaranteed employment, housing, pensions, and health care. However, during the reform period, the rise of a dynamic but relatively unregulated private sector, the aggressive restructuring of state-owned enterprises which led to layoffs of millions of state-sector workers, and a surge in rural-to-urban migration have all led to an increasingly large number of workers in urban areas, who are self-employed or lack formal labour contracts or coverage by social insurance programs (Park and Cai, 2010). The prevalence of informal employment has important implications for public policies, because informality is often associated with poverty and social vulnerability, and affects tax collection, the enforcement of labour regulations and the provision of adequate social protection to workers and their families.

Many view informal jobs as undesirable, because they lack stability and put workers in a vulnerable position. Adherents of this view believe that priority should be placed on reducing informal work as much as possible. There is a positive correlation between poverty and informality across countries, and developed countries tend to have smaller informal sectors than developing countries (Charmes, 2009; Schneider, 2002; Schneider and Enste, 2000). However, others recognize that informal employment can also be voluntary, for example when there are high economic returns on self-employment, or when the perceived costs of participating in public social insurance programs are greater than the perceived benefits (Friedman et al., 2000; Maloney, 2004). Informality can thus be characterized by dualism, including both those who engage in informal work of their own volition and those who do so involuntarily, because they are systematically excluded from formal employment opportunities (World Bank, 2007; Fields, 1990). Despite the positive cross-country association between GDP per capita and formal employment shares, it remains the case that most workers in the developing world remain informally employed. In many parts of the developing world informal employment has even increased in prevalence despite economic growth (Charmes, 2009), and panel studies find that there is no systematic relationship between changes in the strictness of labour regulations and variation in the prevalence of informal jobs (Heckman and Page, 2004; Heckman and Pages-Serra, 2000). These different findings suggest that the nature of informal employment and its relationship to labour regulations and policies is complex and depends on the specific historical and institutional context of individual countries.

As noted earlier, the trend of informality in the PRC has been changing since market-oriented reform began in urban areas in the 1980s. As noted earlier, both the urban economic restructuring and the rural-to-urban migration have contributed to urban informality in China. However, due to data limitations, it is difficult to explicitly measure informality nationwide. A sensible and simple approach, as suggested by Cai and Wang (2004), is to take the difference between total urban employment and the sum of employment by ownership published by National Bureau of Statistics (NBS) as a proxy for informal employment. Total urban employment can be obtained from a labour market survey conducted by the NBS, which is accepted as a reliable source to measure the total size of urban market. Conversely, urban employment by ownership is based on reporting system[47], which only covers formal sectors and neglects informal employment.

The suggested approach provides a narrowly defined measure of informality. In a broader sense, the self-employed (geti jingying) can also be counted as informal employment. Figure 1 plots the two series of informality in urban China both of which share similar trends. The Figure shows that informal employment was quite small in most years of 1990s. Since then, driven by urban economic restructuring and the large scale rural-to-urban migration, the share of informal employment -in the broader definition- in total employment peaked at 48% in 2002 when the urban labour experienced serious dislocations. It has also shown a decreasing trend since the early 2000s. In 2016, total informal employment including self-employment accounted for 28.4% of total urban employment.

Figure 1. The trend of informality in urban China



Source: National Bureau of Statistics, *The PRC Statistics Yearbook 2017*, The PRC Statistical Press, 2017.

[47] The statistical system of the PRC was established to collect information of how the plans were implemented during the period of planning economy. Therefore, the major means of data collection in the system is to aggregate the reported information from bottom to top. This system is subject to shortcomings of inadequate data collection monitoring and incapability to reflect the informal sectors. See Cai, Du, and Wang (2013) for more details.

Despite these varying perspectives on the causes and consequences of informal employment, all sides probably can agree that it is important to accurately measure the size of the informal work force, in order to better understand the extent and nature of informal employment and to assess how it will impact different public policy goals. Unfortunately, unlike India where most of urban workers are informal and the Government has set up a Commission to study the problem of informality, and even directed the State Statistical Office to measure the extent of informality, China has no history or tradition of discussing or measuring labour market informality.

The goal of this paper is to provide, for the first time, an accurate measurement of informal employment in China by analysing data from recent household surveys collected in six large Chinese cities in 2010 and 2016. The surveys were designed by the authors and include questions that enable the measurement of informality using accepted international standards set by the ILO and considering factors relevant in the Chinese context. In doing so, we provide several insights into the extent and nature of informal employment and labour market development in China.

In considering the institutional context in urban China, it is important to start with China's legacy as a former socialist system under which all urban workers had lifetime job security and government-provided pensions, health insurance and housing. This system established formal employment relationships for nearly all workers at the outset of market reforms, as well as for most new workers employed by government units or state and collective enterprises well into the reform period. Other transition economies, such as Russia, Romania, and Moldova, also have experienced relatively low rates of informal employment (Charmes, 2009).

At the 17th International Conference of Labour Statisticians (ICLS), informal wage jobs were described as those in which the employment relationship "is not subject to national labour legislation, income taxation, social protection or entitlement to certain employment benefits (advance notice of dismissal, severance pay, paid annual or sick leave, etc.)." As noted earlier, multiple forces led to a rapid rise in informal employment in the late 1990s and early 2000s. In 2002 and 2003, 39 percent of urban workers were "missing", meaning that they were not reported by their employers (Park and Cai, 2010). Cai and Wu (2006) analysed survey data collected by the Ministry of Labour in 66 cities nationwide at the end of 2002 and estimated that 45 percent of urban employment was informal.[48] It has been argued that flexibility in employing migrant workers with little regulation helped fuel China's rapid export-led, labour-intensive industrialization (Hu, 2004).

China implemented a Labour Law in 1993 and a Labour Contract Law in 2008 to provide more stable, secure employment relationships to workers nationwide. The 2008 Law is highly protective of workers when viewed in international comparative perspective. It tightens penalties for not signing labour contracts, increasing severance pay and making open-ended contracts mandatory after two fixed-term contracts. Significant effort was made to enforce the 2008 Law, which led to a sharp rise in the

[48] Informality was defined mainly based on the absence of a labour contract. The sample included mostly local urban residents.

percentage of urban workers with labour contracts, especially for migrant workers (Li, 2011; Gallagher et al., 2012).

China has strived to build a more complete social insurance system by undertaking a variety of reforms to establish modern pension, unemployment and health insurance systems, and to expand coverage for both workers and dependents. However, it has enacted no law governing social insurance programs. According to the 2008 Labour Contract Law, employees have the right to end the labour relationship if their employers fail to provide them with social insurance benefits, however the regulation is not mandatory and in practice workers often choose to forgo benefits in favour of higher wage compensation. The lack of a social insurance law means that many regulations governing social insurance programs lack enforcement mechanisms and are perceived as flexible regarding their implementation.

Lack of participation in social insurance programs may reflect unattractive features in the design and implementation of such programs, especially from the perspective of rural migrant workers. At the launch of reforms, migrant workers were not even included in urban social insurance programs. Later, reforms expanded eligibility for social insurance programs to all enterprise employees. However, the programs are usually run by city governments and, until recently, the benefits were not portable so that contributions (and claims to future benefits) to a scheme in one city could not be transferred to other cities or regions. This was a fatal flaw making the programs unattractive to highly mobile rural migrant workers who often do not expect to settle permanently in the cities in which they are working. China's residential permit (or *hukou*) system creates barriers to permanent migration, for instance by not providing equal access to children of migrants to urban schools.

The large payroll charges for social insurance programs create a disincentive for both employers and employees to participate. Employers must pay contributions for pensions, medical insurance, and unemployment insurance of 20%, 6%, and 2% of wages, while workers must contribute 8%, 2%, and 1% respectively. A worker who withdraws from the pension system only receives back his own contributions (8%) (Giles et al., 2012).

4.1 Defining Informal Employment

Informal employment is very heterogeneous, including different groups of workers with distinct characteristics. To make our measurements as internationally comparable as possible, we apply the criteria endorsed at the Seventeenth International Conference of Labour Statisticians (ICLS) in 2003 and supported by the ILO. These criteria build upon those approved at earlier ICLS meetings, but still require that specific choices be made to adapt the ICLS definitions to China's unique institutional environment.

In this paper, we define both informal versus formal sectors, and informal versus formal employment (or jobs), and focus on the prevalence of informal employment. We define formal versus informal sector based on the employer type and employer size. The formal sector includes all government or public administrative agencies, as well as businesses with more than seven employees. In China, businesses with more than seven employees are required to register with the government as enterprises. Businesses with fewer than seven employees are defined as being part of the informal sector. In China, such businesses are viewed as petty entrepreneurs (*getihu*) subject to much less regulation than registered enterprises although, in principle, they are expected to register with local industrial and commercial bureaus (*gongshangju*).

Which types of jobs are considered to be informal? Figure 2 provides a breakdown of categories of informal work, distinguishing between jobs in the formal and informal sectors. Following the ICLS guidelines, family workers, the self-employed and casual workers are categorized as informal workers. Employers with seven or fewer workers are also considered to be informal, while employers of larger enterprises (eight or more workers) are categorized as formal in recognition of the fact that they run large, officially registered organizations.

Figure 2. Categories of Informal Employment

Production units by type	Jobs by status in employment								
	Own-account workers		Employers		Contributing family workers	Employees		Members of producers' cooperatives	
	Informal	Formal	Informal	Formal	Informal	Informal	Formal	Informal	Formal
Formal sector enterprises					1	2			
Informal sector enterprises[(a)]	3		4		5	6	7	8	
Households[(b)]	9					10			

(a) As defined by the Fifteenth International Conference of Labour Statisticians (excluding households employing paid domestic workers).

(b) Households producing goods exclusively for their own final use and households employing paid domestic workers.

Note: Cells shaded in dark grey refer to jobs, which, by definition, do not exist in the type of production unit in question. Cells shaded in light grey refer to formal jobs. Un-shaded cells represent the various types of informal jobs.

Source: International Conference of Labour Statisticians (2003)

To determine whether wage employees have informal jobs, we define two alternative criteria. These criteria apply equally to those working in formal or informal sectors. The first definition is based on whether the employer fails to provide all of the three most important types of social insurance that they are expected to provide in China: pensions, health insurance, and unemployment insurance. If any of these benefits are provided to the worker, then they are categorized as a formal worker. By focusing on social insurance coverage, this definition emphasizes the vulnerability of informal workers, and is consistent with definitions of informality frequently used in other countries.[49]

[49] If the respondent is re-employed laid-off worker, social insurance contributions for employment-based programs could be provided by local governments based on past employment in government or state-owned units instead of by current employers. In such cases, we cannot distinguish who is making the payment and

The second definition of informal wage employment is based on whether workers have a labour contract.[50] Those without a labour contract are considered to have informal jobs. In China, all workers have the right to sign a labour contract with their employer. Having a contract entitles workers to several important protections, which were reinforced by the 2008 Labour Contract Law, and enhances their claims if they wish to pursue dispute resolution mechanisms, such as arbitration or lawsuits. Thus, in the Chinese context, labour contracts play an important role in reducing the vulnerability of workers.

Workers in government or public administration agencies that hold government-approved positions (or *bianzhi*) are formal workers using either the definition of informal wage employment, regardless of how they answer questions about social insurance status, or labour contracts. Such workers are generally permanent employees, who normally do not sign written labour contracts, and often automatically qualify for free or subsidized health services or pension payments that are not always part of city-run social insurance programs.[51] The informal or formal status of workers hired in government or public administrative agencies who do not hold government-approved positions is determined by the questions about social insurance and labour contracts described above.

In addition to the two definitions for informal employment described above, we also define informality based on the union and intersection of informal workers in line with the first and second definitions. Thus, the third definition of informality encompasses those workers who are informal based on either definition 1 or definition 2 (union), and the fourth definition of informality includes those workers who are informal based on both definition 1 and definition 2 (intersection).

4.2 Data

The third and the fourth wave of the China Urban Labour Survey (CULS3 and CULS4), was conducted by the Institute of Population and Labour Economics (IPLE) of the Chinese Academy of Social Sciences (CASS) in six large Chinese cities in different parts of the country in 2010 and 2016, respectively. It included questions for both local resident and migrant households specifically designed to measure informal employment based on the ICLS categories. The survey questionnaire contains detailed information on work status, employer type (government, administrative units, state-owned enterprises, private or foreign enterprises), employer size measured by the number of workers, industry, occupation, work location, work status, labour contract type, social insurance coverage, earnings, and hours worked. The six surveyed cities are in different regions of the country. Three are in coastal China: Guangzhou in the Pearl River Delta, Shanghai in the Yangtze River Delta, and Fuzhou in the coastal area nearest to Taiwan. The other

assume that employers are providing the benefit. This will lead us to underestimate informality defined on the basis of employer-provided benefits, but it may not be the most meaningful definition of informality for such cases since the workers do enjoy social insurance coverage due to previous employment relationships and are, therefore, not as vulnerable as those with no such benefits.

[50] Labour contracts can be for a fixed period, open-ended, based on completed work, or with a labour service company that contracts workers to other employers.

[51] These employees normally have their personnel files (*dangan*) kept with their work unit. When asked if they have a labour contract or participate in social insurance programs, such individuals may respond negatively even though they actually enjoy permanent employment and receive benefits.

three cities are in the mainland: Wuhan in Hubei Province in central China, Shenyang in Liaoning Province in the northeast; and Xian in Shaanxi Province in the northwest.

In each city, representative samples of residents and migrants were independently selected in a two-stage procedure. Using past year data on the local resident population of each neighbourhood, a fixed number of neighbourhoods was selected in each city using probability proportionate to size (PPS) sampling. As the cities had limited information on the number of migrants living in each neighbourhood, neighbourhoods were first selected based on local resident populations, and weights are used to correct for differences in the relative sizes of migrant and local resident populations based on population estimates by neighbourhood office staff. These staff helped to construct an updated list of households to serve as a sampling frame. Neighbourhood office staff assisted with documenting unregistered migrants living in the neighbourhood, especially those operating small businesses, and including them in the sampling frame. Then a fixed number of households were randomly sampled in each neighbourhood, with 500 local resident and 500 migrant households sampled in each city in 2010. One disadvantage is that migrants were sampled through neighbourhood committees, so that unregistered migrants and those living in collective forms of housing may be underrepresented. These include workers living on construction sites or in dormitories of factories or in other large work units that do not belong to an urban community. Thus, those working in the construction and manufacturing sectors are likely to be under-sampled. To make up this shortcoming, the sampling plan in 2016 specifies every area in the sampled communities and additional information are collected, such as the size of the large work units.

4.3 Informal Employment in Urban China

In this section, we present our empirical estimates of the prevalence of informal employment in China by taking advantage of the two rounds of urban household survey data. Given the striking differences between urban local workers and migrant workers in informal employment, most analysis here is broken down by hukou locality, in order to reflect one of key contributing factors to informality in urban China. We also look at some other key indicators reflecting the quality of informal employment, including compensations, social insurance.

4.3.1 The Size and Composition of Informal Employment

Table 1 illustrates the share of urban jobs that are informal in different cities based on the four definitions described earlier. Migrants are defined as those whose official residence permit (hukou) has not been issued in the city in which they reside. Using the first definition based on social insurance access, the informal employment share was 16.2% for local residents, 60.6% for migrants, and 25.5% overall in 2010. In 2016 the informality rates for the whole sample increased slightly to 27.9%. When looking at the informality rates by hukou locality, the informality rates for local workers were almost at the same level, 16.4% in 2016. The informality for migrant workers declined considerably over the 6 years, down to 46.6%. The overall increased informality rates in urban areas were mainly due to the increasing share of migrants in total urban population.

Table 1. Informality Rates by City

City	2010 Full sample	2010 Local workers	2010 Migrant workers	2016 Full sample	2016 Local workers	2016 Migrant workers
Definition 1						
Shanghai	16.6	4.0	69.9	18.0	3.8	36.5
Wuhan	25.8	19.1	86.8	32.7	23.5	54.1
Shenyang	29.4	24.6	72.9	31.0	26.4	51.7
Fuzhou	32.7	24.0	64.5	26.7	21.5	49.5
Xi-an	30.0	26.2	76.3	31.0	23.1	50.9
Guangzhou	31.0	18.2	46.3	35.8	16.1	53.1
Total	25.5	16.2	60.6	27.9	16.4	46.6
Definition 2						
Shanghai	14.7	8.9	39.3	19.5	7.3	35.5
Wuhan	37.0	31.5	87.3	38.6	32.9	52.0
Shenyang	53.9	51.9	71.4	39.8	36.7	53.4
Fuzhou	35.2	29.0	57.9	33.4	31.1	43.6
Xi-an	35.8	33.2	66.2	37.3	20.2	48.6
Guangzhou	34.6	27.7	42.9	36.0	32.8	49.8
Total	31.0	26.3	49.0	31.3	23.2	44.6
Definition 3						
Shanghai	22.7	10.7	73.2	22.8	8.4	41.5
Wuhan	39.1	33.3	91.4	43.7	36.9	59.8
Shenyang	58.3	56.1	78.9	42.8	39.8	56.4
Fuzhou	44.6	37.2	71.4	38.2	34.3	55.3
Xi-an	41.0	37.7	80.0	43.3	38.3	55.8
Guangzhou	41.2	31.5	52.8	40.7	21.8	57.3
Total	37.2	29.6	65.9	35.5	25.8	51.4
Definition 4						
Shanghai	9.3	2.5	38.0	14.8	2.7	30.5
Wuhan	23.2	16.7	82.2	27.6	19.6	46.3
Shenyang	26.0	21.4	66.9	28.0	23.4	48.7
Fuzhou	24.3	16.8	51.6	21.9	18.3	37.7
Xi-an	25.3	22.1	63.3	25.0	17.7	43.7
Guangzhou	25.7	15.0	38.6	31.1	14.6	45.6
Total	19.9	13.2	45.4	23.7	13.8	39.8

Source: Authors based on the third and the fourth wave of the China Urban Labour Survey (CULS3 and CULS4)

Although the informality rates for migrant workers declined, the large gap in informality between residents and migrants is striking. In 2010 in none of the six cities did the share of formal jobs reach 27%, while in four of the cities the share of migrants who were employed informally approached or exceeded 70% in 2010. However, the formality increased over time. In 2016, five cities reported about half of migrant workers working informally, and the informality rate of migrant workers in Shanghai was even as low as 36.5%. There were also substantial differences across cities: in 2010, informality for residents ranged from 4.0% in Shanghai to 26.2% in Xian, while for migrants from 46.3% in Guangzhou to 86.8% in Wuhan; in 2016 for local residents it ranged from 3.8% in Shanghai to 26.4% in Shenyang, and for migrants from 36.5% in Shanghai to 54.1% in Wuhan.

Using the second definition, based mainly on labour contract status, the share of informal employment was 26.3% in 2010 and 23.2% in 2016 for local resident workers; 49.0% in 2010 and 44.6% in 2016 for migrant workers; and 31.0% in 2010 and 31.3% in 2016 overall. There is still an obvious discrepancy between the two groups, but the difference is smaller than under the first definition. However, the total informality rate is higher using the second definition, mainly due to the higher informality share of residents under the second definition. An interesting contrast arises in informality rates of migrants versus residents when using the two definitions. For residents, informality is higher under the second definition, but for migrants it is the other way around. This probably reflects the fact that migrants are much less likely to join social insurance programs compared to urban residents. Migrants question the benefits of such coverage, while urban residents expect to reside locally indefinitely and have grown up expecting such benefits.

The third definition provides the strictest criteria for formal employment. Using this definition, the informal employment share reached 37.2% in 2010 and 35.5% in 2016 overall, including 29.6% in 2010 and 25.8% in 2016 for local resident workers and 65.7% in 2010 and 51.4% in 2016 for migrant workers. Finally, using the fourth definition (informality using both definitions 1 and 2), the share of informal jobs fell to just 19.9% in 2010 and 23.7% in 2016 overall; 13.2% in 2010 and 13.8% in 2016 for residents and 45.4% in 2010 and 39.8 in 2016 for migrants. Thus, informality estimates using the strictest and loosest definitions range from 19.9% to 37.2% in 2010 and from 23.7% to 35.2% in 2016 for all workers; 13.2% to 29.5% in 2010 and 13.8% to 25.8% in 2016 for local residents and 45.4% to 65.7% in 2010 and 39.8% to 51.4% in 2016 for migrants. Although most residents have formal jobs, most migrants are employed informally. These rates of informal employment are lower than estimated in the early 2000s (Park and Cai, 2010; Wu and Cai, 2006).

Although the differences across cities can vary using different measures, informality prevalence for migrants and residents, in general, appears to be lower in more developed, coastal cities (Guangzhou, Shanghai, and Fuzhou) than in mainland cities. There are multiple possible explanations for this difference. In coastal cities, labour demand is very robust and competition to hire the best workers is intense, potentially leading to better treatment of workers. Richer cities also have more resources to spend on enforcement and greater capacity to implement new laws, such as the 2008 Labour Contract Law. Moreover, coastal cities have booming manufacturing sectors where labour regulations are more easily enforced than in the service sector, where self-employment and small enterprises are more common. On the other hand, coastal cities have a very high percentage of migrants and vibrant, relatively unregulated private sectors, which could make it harder to maintain high levels of formal employment.

Table 2 examines the correlation in informal job status using the first two definitions. In 2010, for local workers, 84.0% of formal employment based on the first definition is also formal using the second definition, and 80.7% of those employed informally using the first definition are also employed informally using the second definition. For migrants, the respective percentages are 88.1% and 74.4%. The correlation seems to go up over time. In 2016, for local workers, 88.8% of formal employment based on the first definition is also formal using the second definition, and 84.2% of those employed informally using the first definition are also employed informally using the second definition. The respective percentages for migrant workers are 91.0% and 85.4%, respectively.

Table 2. Distribution of different Definitions on Informal Employment (%)

	Local resident			Migrant		
	formal 2	informal 2	total	formal 2	informal 2	total
2010						
formal 1	84.0	16.0	100	88.1	11.9	100
informal 1	19.3	80.7	100	25.6	74.4	100
total	73.6	26.4	100	50.9	49.1	100
2016						
formal 1	88.8	11.2	100	91.0	9.0	100
informal 1	15.8	84.2	100	14.6	85.4	100
total	76.8	23.2	100	55.4	44.6	100

Note: informal 1 refers to the informal employment defined as the first definition, and the others are analogous.

Source: Authors based on the third and the fourth wave of the China Urban Labour Survey (CULS3 and CULS4)

Thus, in the case of migrants, a large share of workers who are informally employed based on social insurance coverage are not informally employed under the second definition, i.e. based on labour contracts. This likely reflects the significant share of migrant workers with labour contracts, who do not desire to participate in social insurance schemes or who are excluded from such schemes by their employers. Nonetheless, there is considerable overlap overall in people working informally under both definitions, which has been increasing over time.

We can further break down the different types of informal employment based on the categories described in Figure 2. As shown by Table 3, using the first definition of informality the share of workers in different types of informal jobs include the following: 9.3% in 2010 and 2.2% in 2016 were informal employees in the informal sector (24.1% in

2010 and 3.1% in 2016 for migrants; and 5.4% in 2010 and 1.4% in 2016 for local residents), 6.6% in 2010 and 9.0% in 2016 were informal employees in the formal sector (12.1% in 2010 and 13.4% in 2016 for migrants; and 5.2% in 2010 and 6.2% in 2016 for local residents), 7.9% in 2010 and 15.9% in 2016 were self-employed (20.3% in 2010 and 28.5% in 2016 for migrants; and 4.6% in 2010 and 8.1% in 2016 for local residents), and less than 1.4% in 2010 and 0.4% in 2016 were unpaid family workers or employers in the informal sector.

Table 3. Composition of Informality

	Local Workers	Migrant Workers	Total
2010			
Formal Employment	**83.9**	**39.5**	**74.6**
Informal Employment	**16.1**	**60.5**	**25.4**
Informal employee in informal sector	5.4	24.1	9.3
Informal employee in formal sector	5.2	12.1	6.6
Employer in informal sector	0.2	1.0	0.4
Self-employed	4.6	20.3	7.9
Unpaid family worker	0.8	3.0	1.3
Total	**100**	**100**	**100**
2016			
Formal Employment	**72.1**	**53.4**	**83.6**
Informal Employment	**27.9**	**46.6**	**16.4**
Informal employee in informal sector	2.02	3.07	1.37
Informal employee in formal sector	8.96	13.44	6.20
Employer in informal sector	0.66	0.88	0.52
Self-employed*	15.88	28.48	8.10
Unpaid family worker	0.39	0.71	0.20
Total	**100**	**100**	**100**

Note: based on first definition of informality; in CULS4 one more choice of employment type, freelance, is added. self-employment here includes this choice.

Source: Authors based on the third and the fourth wave of the China Urban Labour Survey (CULS3 and CULS4)

Although the overall informality rate only varied slightly between 2010 and 2016, its composition was quite different between the two years. One of the significant changes is the shrinking informal sectors, as evidenced by the decreasing share of informal employee in informal sector. The increase in self-employment is partly due to categorical changes in the questionnaire between the two rounds of survey. In CULS4 there is an added choice of employment type, i.e. freelance, which is included in self-employment here.

Next, we examine how the prevalence of informal jobs varies across economic sectors in Table 4. We report informal job shares for five broad economic sectors: manufacturing, other industry (including mining, construction, and electricity, gas and water supply), public services (including government agencies, healthcare, education, finance and insurance, etc), and services (including communications and transportation, information transfer and computer software, wholesale and retail, lodging and catering). There is a consistent ranking of the share of informal jobs across sectors. Using the first definition of informality, the share of informal employment by sector is as follows (in rising order): public services 8.6% in 2010 and 10.2% in 2016, manufacturing 14.3% in 2010 and 18.2% in 2016, other secondary sectors 17.9%, other sectors 28.3% in 2010 and 49.5% in 2016, and services 33.6% in 2010 and 36.5% in 2016.

Table 4. Informality by Sectors (%)

	2010			2016		
	Full sample	Local Workers	Migrant Workers	Full sample	Local Workers	Migrant Workers
Definition 1						
Manufacturing	14.3	6.8	52.8	18.2	6.6	38.5
Other Secondary	17.9	9.3	57.5	25.4	13.9	41.4
Public services	8.6	5.9	37.8	10.2	7.4	22.2
Personal services	33.6	22.9	64.3	36.5	23.9	52.3
Others	28.3	24.7	57.6	49.5	31.8	72.2
Total	25.4	16.0	60.6	27.9		
Definition 2						
Manufacturing	18.8	17.9	23.5	20.4	13.5	32.4
Other Secondary	24.3	19.3	46.8	25.6	17.1	37.3
Public services	9.6	8.4	22.2	19.8	19.0	23.3
Personal services	40.6	35.3	55.8	38.6	28.7	50.9
Others	35.3	33.1	53.4	54.6	39.5	74.0
Total	30.9	26.1	49.1			
Definition 3						
Manufacturing	26.6	21.0	55.4	24.5	15.2	40.5
Other Secondary	31.1	23.8	64.9	30.4	19.5	45.6
Public services	13.0	10.2	41.6	22.6	21.1	29.3
Personal services	46.9	38.9	69.9	43.2	31.8	57.4
Others	41.5	37.6	73.6	54.9	39.5	74.7
Total	37.0	29.4	66.0			
Definition 4						
Manufacturing	6.8	3.9	22.1	14.2	4.9	30.3
Other Secondary	12.4	5.6	43.7	20.6	11.5	33.2
Public services	5.1	3.9	17.9	7.4	5.3	16.2
Personal services	28.0	19.7	51.8	31.9	20.7	45.8
Others	27.3	24.7	48.2	49.2	31.8	71.5
Total	19.9	13.1	45.4			

Source: Authors based on the third and the fourth wave of the China Urban Labour Survey (CULS3 and CULS4)

Except for public services, the differences across sectors were more attenuated for migrants in the earlier round survey. Although there is a sharp discrepancy in the share of migrants who were informally employed in manufacturing using definitions 1 and 2 in 2010, 52.8% under definition 1 and 23.5% under definition 2 in 2010, the gap had significantly narrowed down by 2016 between 38.5% and 32.4%. This suggests that, in manufacturing, there were a lot of migrant workers who had labour contracts but did not participate in social insurance programs after the Labour Contract Law in 2008. The situation has improved, because the working conditions of migrants have improved due to growing labour scarcity.

We next break down informal employment rates by demographic groups split by gender and age (Table 5). Using the first definition of informality, we find evidence that the pattern of informal employment by demographic groups changed substantially over time. In 2010, women in both local resident and migrant groups were more likely to be informally employed than men, and younger workers were more likely to hold informal jobs compared to older workers. In 2010, 19.7% of female residents were employed informally compared to 13.5% for men; for migrants the difference was 64.0% compared to 57.7%. The greater propensity of younger workers to be employed informally was much more pronounced for local resident workers (31.6% in the age group 16-24 versus 11.5% in the age group 55-64; the respective figures for migrants were 72.9% and 65.8% for the same age groups). For both residents and migrants, gender differences are more pronounced among older workers.

Table 5. Informality by Age Group and Gender: Definition 1 (%)

Age group	Full sample	Local Workers			Migrant Workers		
		Female	Male	Total	Female	Male	Total
2010							
All	25.5	19.7	13.5	16.2	64	57.7	60.6
16-24	47.4	30.5	32.8	31.6	73.5	72.2	72.9
25-34	26.4	19.7	13.7	16.8	55.4	53.2	54.3
35-44	25.6	17.5	14.7	16	65.9	53.2	58.7
45-54	18.5	16.9	11	13.1	72.4	63.4	67.1
55-64	15.9	42.5	7.6	11.4	75.5	62.9	65.8
2016							
All	27.9	16.1	16.7	16.4	46.5	46.6	46.6
16-24	35.0	29.4	16.2	21.9	39.4	48.4	43.9
25-34	26.3	14.9	17.4	16.2	39.1	48.0	38.0
35-44	29.2	16.2	17.7	17.0	51.2	37.2	49.5
45-54	28.9	14.2	17.5	16.3	59.4	48.4	58.2
55-64	20.1	23.8	10.7	11.9	55.0	57.4	60.7

Note: the informality is based on the first definition.
Source: Authors based on the third and the fourth wave of the China Urban Labour Survey (CULS3 and CULS4)

However, the difference between male and female disappeared as shown in the second round of survey data. In 2016, the informality rates of female were slightly less than those of their male counterparts in both migrant and local workers groups. The pattern of younger workers with greater propensity to be employed informally has been maintained over time, but the difference is not as pronounced as the demonstrated by the results in CULS3.

4.3.2 Compensation of Formal versus Informal Workers

Next, we compare monthly wages and hours worked per week for formal and informal jobs held by residents and migrants. Mean wages for the different groups are reported in Table 6 and mean work hours in Table 7. In general, we find that the compensation of formal versus informal workers show string changes between the two rounds of survey.

Table 6. Monthly Wages by Formal and Informal Employment (RMB)

	All	Local Workers			Migrant Workers		
		Formal	Informal	I/F	Formal	Informal	I/F
2010							
Shanghai	2937	2965	1979	0.67	4475	2332	0.52
Wuhan	2117	2353	1274	0.54	2303	1779	0.77
Shenyang	1730	1836	1339	0.73	2385	1706	0.72
Fuzhou	2440	2602	2046	0.79	2767	2089	0.76
Xi-an	1731	1788	1517	0.85	2762	1636	0.59
Guangzhou	3615	3416	2705	0.79	5022	2819	0.56
Total	2625	2621	1725	0.66	4495	2336	0.52
2016							
Shanghai	8193	7565	8090	1.07	8264	10237	1.24
Wuhan	4042	4107	3768	0.92	4491	3702	0.82
Shenyang	3719	3663	3761	1.03	3980	3739	0.94
Fuzhou	5470	5289	6140	1.16	5740	5181	0.90
Xi-an	4269	4177	3530	0.85	4938	4802	0.97
Guangzhou	5952	6409	6301	0.98	5996	5176	0.86
Total	5965	5777	4728	0.82	6691	6381	0.95

Note: the informality is based on the first definition.

Source: Authors based on the third and the fourth wave of the China Urban Labour Survey (CULS3 and CULS4)

Table 7. Weekly Working Hours by Formal and Informal Employment

	All	Local Workers			Migrant Workers		
		Formal	Informal	Total	Formal	Informal	Total
2010							
Shanghai	44.2	41.7	46.3	41.9	53.8	53.7	53.7
Wuhan	47.3	43.1	53.9	45.2	62.6	66.8	66.2
Shenyang	49.7	47.0	53.4	48.6	56.3	61.1	59.8
Fuzhou	47.5	43.5	51.3	45.4	49.7	58.4	55.3
Xi-an	48.8	45.0	54.7	47.5	61.2	63.9	63.3
Guangzhou	49.8	45.3	50.0	46.1	52.0	56.9	54.3
Total	47.3	43.6	52.4	45.0	52.9	57.7	55.8
2016							
Shanghai	45.6	41.8	43.3	41.8	44.9	57.8	50.5
Wuhan	49.2	44.7	55.8	47.3	47.7	58.8	53.7
Shenyang	48.5	44.6	54.8	47.3	50.6	60.3	54.3
Fuzhou	46.3	42.7	53.6	45.0	45.5	58.1	51.7
Xi-an	48.0	43.3	49.2	44.6	48.0	65.0	56.7
Guangzhou	48.9	42.6	53.2	44.3	46.8	58.4	52.9
Total	47.6	43.0	53.0	44.6	46.3	59.5	52.4

Note: the informality is based on the first definition.

Source: Authors based on the third and the fourth wave of the China Urban Labour Survey (CULS3 and CULS4)

In 2010 those working in the informal sector were worse off. They earned lower wages but worked longer hours, and this was true in nearly every city and for both local residents and migrants. Using the first definition of informality, the wages of informal workers were about 66% of that of formal workers for local residents and 52% for migrants. Local residents employed informally worked nearly 9 hours longer than those who worked formally; migrants who were informally employed worked nearly 5 hours longer than those who were formally employed. Migrants worked longer hours than local residents on average, regardless of whether they were formally or informally employed.

In 2016, the wages difference between formal workers and informal workers was much smaller. The wages of informal workers were about 82% of that of formal workers for residents and 95% for migrants. In some cities, the local workers who worked informally earned even more than those worked formally. For migrant workers in most cities, informal workers still earned less than formal workers, but the difference was much smaller than in 2010. This new pattern implies that with growing labour scarcity the quality of informal jobs improved.

However, these clear differences in the wages and working hours of formal and informal workers do not necessarily translate into higher poverty rates for the families of informal workers. Other research has found that the poverty rate of migrant workers in China is not much higher than that of local resident families, because migrant workers work longer hours, support fewer dependents, and can leave urban areas and return home if they cannot find a job in the cities (Park and Wang, 2010).

In Table 8, we describe the working hours and years of schooling for formal workers and different types of informal workers. Whether local residents or migrants, those with formal employment had more years of schooling on average. Formal workers also worked the fewest hours on average, although this was not true for migrants. Informal wage employees work similar hours and have similar levels of education whether they work in the formal or informal sectors; if anything, working hours are slightly less and mean education years slightly higher when working in the informal sector compared to the formal sector. This suggests that many formal work units in China (e.g., government, enterprises) treat informal employees worse than small scale enterprises in the informal sector. Finally, those who are self-employed, employers of seven or fewer workers, or unpaid family workers have the longest working hours and the lowest levels of educational attainment.

Table 8. Working Hours and Years of Schooling in different Employment Groups (hours, years)

	Working hours			Years of schooling		
	local	migrant	total	local	migrant	total
2010						
Formal employment	43.6	52.9	44.6	12.8	12.1	12.8
Informal employee in informal sector	48.5	51.1	49.9	11.8	10.5	11.1
Informal employee in formal sector	49.0	53.3	50.7	11.6	10.0	11.0
Employer in informal sector	60.2	67.5	64.5	11.6	9.6	10.4
Self-employed	59.9	66.5	63.4	10.5	9.0	9.7
Unpaid family worker	55.4	64.3	59.8	9.5	8.1	8.8
Total	45.0	55.8	47.3	12.6	10.7	12.2
2016						
Formal employment	43.0	46.3	43.8	13.9	13.1	13.7
Informal employee in informal sector	52.0	53.4	52.8	11.7	9.2	10.3
Informal employee in formal sector	47.5	50.4	49.2	12.1	10.1	10.9
Employer in informal sector	49.1	53.5	51.4	12.8	12.5	12.7
Self-employed	57.2	64.0	61.8	11.7	9.8	10.4
Unpaid family worker	49.3	64.8	60.0	13.5	8.2	9.8
Total						

Note: the informality is based on the first definition.

Source: Authors based on the third and the fourth wave of the China Urban Labour Survey (CULS3 and CULS4)

To get a better sense of working conditions for informal employees, we asked questions about the place of work, with results presented in Table 9. For those informally employed, the distribution of informal working places was very similar for residents and migrants. Most workers (70.3% in 2010 and 67.4% in 2016) worked in conventional work environments (*workshop, office, shop, etc.*), and the percentages were almost identical for local residents and migrants. About 14% in 2010 and 12% in 2016 of employees worked in an outdoor place or street. Although our survey is likely to under-sample those working in construction sites or factory dorms, based on these results, there does not appear to exist strong evidence of systematic poor working conditions for informal workers.

Table 9. Work Location for Informal Jobs (%)

	2010			2016		
	Local workers	Migrant workers	Full sample	Local workers	Migrant workers	Full sample
workshop, office, shop etc.	70.4	70.2	70.3	71.4	65.1	67.4
own home	7.2	5.0	6.1	3.6	11.3	8.5
Employer's or customer's home	4.5	7.2	5.8	4.9	5.9	5.5
farm or farmland	1.4	0.0	0.7	0.2	0.1	0.1
building site	1.3	2.8	2.0	3.2	3.7	3.5
outdoor place or street	14.2	13.5	13.9	13.0	11.3	11.9
Other	1.0	1.3	1.2	3.9	2.7	3.1

Note: the informality is based on the first definition.

Source: Authors based on the third and the fourth wave of the China Urban Labour Survey (CULS3 and CULS4)

4.3.3 Social Insurance Coverage

Being provided access to social insurance programs by one's employer is the main criterion used in the first definition of informal employment. However, workers can also obtain pension, health insurance, or unemployment insurance coverage from sources other than their current employer. This can include coverage from public schemes that do not require employment for eligibility, or from voluntary purchases of commercial insurance products. The availability of alternative sources of social insurance, especially from other public schemes, may reduce the perceived benefits of formal versus informal employment and increase the likelihood that workers voluntarily work in informal jobs. But such alternative coverage can play an important role in expanding coverage rates to achieve higher rates of total social insurance coverage.

Table 10 summarizes coverage rates for pensions and health insurance, reporting for each type of social insurance the total coverage rate for workers, the share covered by employers, and the share covered from other sources (commercial, other public schemes). These estimates do not include dependents who do not work. We can see that 10.4% of employees obtained pension coverage and 21.6% obtained health insurance from sources other than their employer in 2010. These two shares slightly increased to 10.9% and 22.3%, respectively, in 2016. Some of these persons also received benefits from employers, but the difference between total coverage rates and those covered by employers was 5.8% for pensions and 16.1% for health insurance in 2010. These compare to 64.1% and 60.6% of workers who received pension and health insurance benefits directly from their employers in 2010. By 2016, the overlap of various social insurance provisions had decreased.

Table 10. Social Insurance Coverage by Groups (%)

	Full sample	Local workers	Rural migrant workers	Urban migrant workers
2010				
Pension coverage	69.9	76.1	29.1	56.3
By employer	64.1	71.8	14.8	45.3
From other sources	10.4	9.5	15.5	14.8
Health insurance coverage	76.7	79.2	63.9	62.1
By employer	60.6	68.0	13.3	41.7
From other sources	21.6	16.9	53.9	25.8
2016				
Pension coverage	81.5	88.8	62.3	81.6
By employer	70.9	83.2	38.9	70.4
From other sources	10.9	5.8	23.9	11.5
Health insurance coverage	90.2	93.2	85.2	85.7
By employer	68.8	80.4	37.4	70.1
From other sources	22.3	13.6	49.4	16.2

Source: Authors based on the third and the fourth wave of the China Urban Labour Survey (CULS3 and CULS4)

Migrant workers are as likely to obtain pension benefits from other sources as they are to obtain them from their employer, and more likely to receive health insurance benefits from other sources. In 2010, most strikingly, 53.9% of rural migrants obtained health insurance from other sources, presumably mainly from the New Cooperative Medical Scheme (NCMS) that has been scaled up to reach nearly all rural China, while only 13.3% obtained health insurance coverage from their employers. Although the share slightly decreased in 2016, it still seemed that most migrant workers did not get social insurance from their employers. Overall, depending on the quality of alternative programs, especially NCMS, China's efforts to expand social insurance coverage more broadly, to dependents and the self-employed, may be undermining incentives for workers, especially rural migrants, to take formal versus informal jobs. There remain large gaps in social insurance coverage between residents and migrants, and between formal and informal employment.

One might expect that migrants who have lived long in cities would be more integrated into the local economy and more likely to plan to stay in the city permanently. If this is the case, they should enjoy better social insurance coverage rates than more recent migrants. We test this proposition in Table 11 by comparing coverage rates of migrants who had lived in the local city for more than 10 years to those who had lived there for less than 10 years. We can also compare both sets of coverage rates with that of local urban residents (Table 10). Given that this information was no longer collected in 2016, we only present the results using 2010 data. We find that informal employment rates and social insurance coverage rates for long-term migrants look much more like short-term migrant than residents, suggesting that migrants' integration into the local economy had been slow even after longer periods.

Table 11. Migrants Integration into Cities in 2010 (%)

	Migrated 10 years or more	Migrated less than 10 years	Local resident
informal employment, definition 1	53.1	64.0	16.2
informal employment, definition 2	45.6	50.6	26.3
Pension coverage	25.5	20.7	74.6
Health insurance coverage	22.5	19.3	71.4
Unemployment insurance coverage	19.3	14.2	36.6
local resident pension	3.6	2.4	5.5
commercial pension	8.4	4.8	4.4
local resident health insurance	5.9	3.6	10.5
commercial health insurance	13.7	8.0	7.4
rural pension	5.7	5.2	-
rural migrant pension	2.2	2.7	-
rural cooperation health insurance	34.3	34.7	-
rural migrant health insurance	4.8	4.2	-

Source: Authors based on the third and the fourth wave of the China Urban Labour Survey (CULS3 and CULS4)

4.4 Drivers of Changing Informality in China

As discussed earlier in this paper, the trend of informal employment has been changing in the past decades in China. Some of the drivers are quite unique and distinguish the trend and pattern of informality in China from many other developing countries.

4.4.1 The Structural Transformation

The Chinese economy has witnessed great structural transformation in the past three decades, which has impacts on informality in China.

During this period of structural transformation, two of the biggest changes in the past three decades include the decline in farming jobs following the rise of industrialized urbanization, and the emergence of the private sector as the main creator of urban jobs. In 1978, the year when China kicked off the reform and opening-up policies, the value added of primary sector accounted for 27.7% of GDP and the shares of the secondary and tertiary sector were 47.7% and 24.6%, respectively. In 2016, the share of primary sector was only 8.6%. Service sectors have grown to become the largest sector in the economy, accounting for 51.6% of GDP.

The economic transformation has led to the employment restructuring, as evidenced by massive rural-to-urban migration. According to the data collected by the NBS, the rural migrant workers totalled 169 million in 2016, accounting for 40.8% of urban employment. In recent years, with growing labour scarcity, migrant workers have been gaining bargaining power in the labour market, which facilitates formalisation of their employment. As a result, the wages of migrant workers grew quickly in the past decade, 9.9% per annum between 2006 and 2016.

4.4.2 Demographic Transition

Both the strict population control policy and socioeconomic development have played active role in fertility decline, which made it possible for China to spend less time to complete the demographic transition process than many other countries. It took China about 30 years to complete the whole demographic transition process that had lasted for more than a hundred years in most industrialized countries.

The impact of quick demographic transition on labour market has already been observed in the past decade. Low fertility over a long period produced an ageing society. In the meantime, the size of working age population has been shrinking. The total number of people aged between 16 and 59 started shrinking in 2012 for the first time. In 2016, the number of working age population was 3.49 million less than in the previous year. This demographic change accelerates labour shortage, which tightens the labour market and increases workers' bargaining power. When employers compete with each other for workers, the supply of formal jobs should increase.

4.4.3 Labour Regulation

In the past decade, China has taken great effort to construct the legal framework of the labour market, including the *Labour Contract Law, Labour Disputes Mediation and Arbitration Law,* and improvement of social protection system.

As noted earlier in this paper, on January 1, 2008, China implemented a new Labour Contract Law with provisions considered to be highly protective of workers when viewed in international comparative perspective. This law significantly improved employment protection, facilitating formalization of employment for workers.

The other influential law was implemented in the same year. In order to improve the labour disputes settlement system, *Labour Disputes Mediation and Arbitration Law* was adopted by the Standing Committee of 10th National People's Congress on December 29, 2007 and took into effect on May 1, 2008.

This law is intended to resolve labour disputes fairly, protect legal rights and interests of parties and promote harmonious and stable employment relationships. It stipulates labour disputes mediation, arbitration, application and acceptance, hearing and award, etc. The law enhances the protection of the rights of both parties within employment relationship and guarantees the effective implementation of *Employment Contract Law*.

In addition to the labour-related laws, the social protection system, as one of the essential components of formal employment, has been improved significantly in the past decade. With the efforts made in the past two decades, China has successfully established a social protection system that is compatible with the market economy although the previous social protection was associated with the planned economy. In addition to some social programs, the social protection system consists of social insurance system including social pension, health care, unemployment insurance, and social assistance system cored at the minimum living standard guarantee system (*dibao*). For the first in the history of China, the social programs started covering the rural residents.

With increasing public spending on social protection system, the quality of jobs has been improved, which serves as an important driver of informality changes.

4.5 Conclusions

In this paper, we have estimated the extent of informal employment in China's urban labour markets using recent household survey data (in 2010) that enables application of definitions of informality consistent with international standards set by the ILO. Estimates of the share of urban workers employed informally ranged from 19.9% to 37.2% in 2010 and from 23.7% to 35.5% in 2016 depending on the definition used. Despite these relatively low rates of informal employment, there remains a striking difference in the propensity for residents and migrants to be employed informally, reflecting historically unequal treatment of the two groups and design features of current social insurance programs that make them unattractive to mobile, migrant workers. This suggests that policies should focus on incentives to increases the formal employment of migrants. Higher informality rates in the rapidly growing service and private sectors are also worthy of policy attention.

China has been more successful in mandating that employers sign formal labour contracts with migrant employees than it has been in getting migrants to participate in social insurance programs. Some of the reasons for this include scepticism over perceived benefits of the programs; lack of portability of benefits; high payroll contribution rates; lack of a legal mandate for participation; and availability of social insurance coverage from sources other than the employer. These patterns suggest that lack of social insurance coverage is likely to reflect voluntary rather than involuntary informal employment.

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Chapter 5

Informal Employment Trends in the Indian Economy: Persistent informality, but positive development

Santosh Mehrotra

Inclusive growth, a goal of the 11th and the 12th Five Year Plans (2007-17) of India, will not be achieved unless the share of informal employment in total employment falls. However, with 93 percent of the entire workforce (defined as those without any social insurance) and 85 percent of the non-agricultural workforce being informal, India is an outlier among low-middle income countries in this regard. Although India is the fastest growing large economy of the world, this number has remained stuck at this level for decades. The persistence of this statistic remains a serious area of concern, given that the numbers joining the labour force will only go on increasing over the next decade until 2030. India has experienced a demographic dividend since the early 1980s, which will end by 2040. Clearly a policy imperative is that not only the number of non-agricultural jobs grows at least at the same rate as the labour force growth, but also the quality of jobs improves.

This paper argues that even though informality in work has not declined in the last two decades since India's GDP growth rate has sharply increased, other favourable labour market developments have been afoot boding well. Since 2004-05 the structural shifts in employment, significant increase in rural wages, increase in per capita consumption expenditure and, therefore, a sharp decline in absolute numbers of the poor, as demonstrated by the National Sample Surveys of 2009-10 and 2011-12, have initiated an underlying process that has promoted inclusive growth. Post 2004-05, when a revised (Tendulkar) poverty line raised the absolute and relative poverty estimates, the absolute number of poor fell from 407 million in 2004-05 to 356 million in 2009-10[52] and further to 269 million in 2011 (a total decline of 138 million)[53]. What is of concern is that there has been a diverging trend between the structure of output and the structure of employment in the last decade, particularly when GDP growth rate has increased significantly.

This paper is organized as follows. Section 1 explains the very high share of informal workers in India's workforce. Section 2 attempts to explain the employment trends in the labour market: men or women; the self-employed, casual or regular workers; and the organized or the unorganized segment workers, especially in the non-agricultural sectors. More importantly, it notes that several positive developments have occurred in India's labour market, which have tended to mitigate the widespread and chronic effects of informality. Section 3 lists the conclusions.

[52] The fall between 2004-5 and 2009-10 seems misleadingly low because 2009-10 was a drought year; hence, despite rapid agricultural and overall GDP growth, incomes/consumption expenditure could not have increased much. Meanwhile, by 2011-12 agricultural and GDP growth had bounced back up.

[53] The incidence of poverty in this period declined from 37.2 percent in 2004-05 to 21.9 percent in 2011-12.

5.1 Explaining the rise and persistence of informality in India's workforce

There were many reasons for the growth and persistence of informality in India's labour force, which were the result of factors affecting both the demand and the supply of labour.

Demand for labour as a factor explaining the rise in informality

There are three prominent factors, which have impacted the demand for labour. The first was the pattern of India's growth. In the Second Five Year Plan (1955-6 to 1959-60), the government of India and its Planning Commission decided to adopt an import-substituting industrialization strategy, with a primary focus on heavy-industry. In other words, the limited domestic savings available in a country at a low-level of development were to be utilized only for investing in public-sector heavy industry. This could not be, by definition, a strategy for rapid absorption of surplus labour in agriculture. Consequently, as surplus workers migrated away from agriculture in search of non-agricultural work, they were inevitably absorbed by traditional service sector in both rural and urban areas. Alternatively, they were absorbed in unorganized manufacturing in micro-enterprises employing less than 10 workers, where no social insurance was available.

A second factor that impacted the demand for labour, also related to the policy-induced pattern of growth, was that the Industrial Policy resolutions of the Indian government launched a process of reserving consumer product production for the small scale sector. It began with a few products, but the number of products reserved exclusively for production in the small-scale sector kept growing until 1990 when it reached 836 products. Medium-sized firms or large corporates were disallowed from this sector. This resulted in perverse incentives for firms to remain small, with inevitable loss in terms of economies of scale. Another perverse incentive was that large corporates could set up small enterprises, to take advantage of the protection the small-scale industries benefitting from reservation of products for the small firms. Small enterprises had no incentive to grow and absorb more workers in their manufacturing units, thus exacerbating a problem caused by the heavy-industry first strategy of import-substituting industrialization (discussed above).

A third factor impacting absorption of labour in organized manufacturing or services were the plethora of central and state government labour laws. On the one hand, hardly any labour laws were applicable to the small enterprises. On the other hand, larger enterprises, whether medium or large, became gradually subject to several laws passed by state or central governments, which protected the workers in the organized sector. While social insurance (in the form of employee provident fund and state insurance) was mandatory, the growing number of laws covering organized workers drove employers to adopt technologies that often limited the number of workers. The number of central government laws related to labour alone amount to 45 (recently after the repeal of many laws the number is down to 35), which are often inconsistent with each other, and tend to grow in their coverage as the size of enterprises increases. On top of these 35, there are state-specific labour laws that organized segment firms in industry or services have to comply with. With barely 6000 labour inspectors available to enforce this multitude of laws, this became a breeding ground for corrupt inspectors engaging in rent-seeking. The reaction of employers was inevitable: the fewer the workers, the better from their perspective.

The final factor that resulted in the growth and persistence of informality in India was the education and skill levels of the workforce. Let us begin by noting that 146 million (or 30%) of the 485 million workers were illiterate in 2012; 52% (or 253 million) of the labour force had up to secondary level education (with 40% of this 52% having lower than middle-level education[54]); and 15 million had tertiary education, of whom half had a diploma or certificate and the other half were graduates of tertiary technical education. In other words, barely 3% of the workforce had technical education at tertiary level, and another 7.2% had general academic education at tertiary level.

NSS data allows a breakdown of the workforce into three types of employment: self-employed, casual labour, or regular salaried work. It is not surprising that hardly any illiterate workers have regular salaried jobs. Most illiterate are either casual workers or self-employed usually engaged in low productivity work. Over half of the self-employed are own-account workers, as opposed to being employed in micro-enterprises with 2-9 workers. Firms that employ less than 10 workers are defined in Indian official parlance as operating in the unorganized sector.

Just over half the workforce has education up to secondary level and half of them are self-employed. However, what is more worrying is that as many as 75 million of those with secondary education are in casual work. Given that nearly half of the entire work force has secondary education, it should be worrying for policy makers that a third of them are casually employed (without any social insurance).

The total number of those with higher secondary education (34.4 million) and those who have graduate level education and above (35.6 million) is roughly equal in the work force. Remarkably, however, half of those with higher secondary education are self-employed, while under a third of them are in regular salaried employment (but only 15% of those with secondary education have regular salaried jobs). However, half of those with graduate level education or above are in regular salaried employment. What is worrying is that nearly four million of those with higher secondary level of education are engaged in casual work.

Notably, technical education below graduate level as well as at graduate level and above significantly raises the probability of finding a regular salaried job compared to graduates with only general academic education (Mehrotra, 2015).[55] The good news is that the share of those with any tertiary level education in the workforce has risen from 7.3 percent in 2004-5 to 10.3% in 2011-12.

Both the labour market as well as tertiary education outcomes for men and women are rather different. It is well known that the labour force participation rate of women in India is well below that for men. In fact, it is one of the lowest in the world (at 23% in 2011-12) and worryingly enough it has even been declining. While there were 351

[54] See chapter 2 in Mehrotra (2014) for a more detailed analysis.

[55] The rate of unemployment of those with graduate general academic education is only slightly lower at 7.3 percent than for those with technical education below or at graduate level (8.8%).

million males in the total workforce of 485 million in 2012, there were only 134 million women. Nearly half of the women in the workforce are illiterate as opposed to less than one-third of men in the workforce.

If women acquire education up to graduate level, whether it is general or academic or technical education, there is a high likelihood they will get regular employment. In fact, the probability of women getting regular employment with graduate education is slightly greater than for men.

Clearly, with a labour force that has relatively poor levels of education, it is not surprising that most of them have been absorbed in traditional services, or construction, or unorganized manufacturing - if they are not in agriculture. In none of these areas does employment come with social insurance.

Finally, educational enrolments have risen sharply within the last decade at every level of education: elementary (near universal), secondary (from 58 in 2010 to over 80 percent by 2015) and tertiary (from 11 to 26 percent between 2006 and 2016). That means most youth are requiring higher and higher levels of education; this will create a challenge as they enter the labour force (as we discuss towards the end of the next section).

5.2 Positive developments in the character of employment – despite persistent informality

Total employment increased by 25.5 million between 1993-4 and 1999-2000, of which 5.1 million in agriculture. Over the five-year period 2000 to 2005, there was an additional 22 million increase in employment in agriculture – clearly a retrograde development, especially at a time when agricultural output was growing slowly. In other words, there was no structural shift taking place with workers moving out of agriculture until 2004-5, which indicated low productivity in agriculture and in the economy.

After 2005, for the first time in India's post-independence economic history, in the five-year period 2005-2010, as many as 23.7 million of India's agricultural workforce abandoned agriculture, or nearly 10 percent of the total workforce in agriculture. In fact, non-agricultural employment grew by 25 million, which is how total employment grew by only 1.1 million. Since 2010, non-agricultural employment increased sharply by 27 million in absolute terms, while at the same time the numbers in agriculture fell by 13 million within two years. This is an unprecedented development in India's economic history.

This structural shift, well evident from the employment elasticity of output by major economic sectors, is precisely the kind of progressive structural change in employment that should accompany a structural change in output between the primary, secondary and tertiary sectors in any developing economy. The opposite had been occurring between 1993-4 and 2004-5.

Non-agricultural jobs grew by 7.5 million per annum on average both during 1999-2000 and 2004-05, but this growth in employment was not rapid enough to absorb the 12 million that were joining the labour force annually over that period. Between 2004-05 and 2011-12, the number of non-agricultural jobs grew by 7.5 million per annum. In the two-year period (2009-10 to 2011-12), employment in manufacturing and non-manufacturing taken together grew by 16.1 million in a matter of two years vis-a-vis an increase of 15.7 million over a five-year period (2004-05 to 2009-10). The employment growth rate of 8.6 percent in the manufacturing sector during 2010 to 2012 surpasses the employment growth rate in all other sectors. Employment in the service sector has also witnessed a sharp increase with 11 million more jobs created after 2009-10, much higher than the 9 million increase during the five years to 2009-10. The real question for the future is whether the expected growth of the Indian economy can be employment-intensive enough to generate non-agriculture jobs and absorb both those entering the labour force, as well as those leaving agriculture for non-agricultural jobs.

The quality of employment: the self-employed, casual and regular workers

Of the 60 million increase in jobs during 2000-2005, about 30 million rural workers (women accounting for 60 percent of that number) joined the workforce as self-employed in agriculture, owing primarily to declining earnings capacity of the usual income earners, and productivity stagnation in the agriculture sector.

The decline in agricultural employment in the latter half of the decade might have been partly due to the nation-wide drought in 2009, that could have forced the self-employed, smallest and marginal farmers to migrate for sustenance. Moreover, the presence of alternative employment opportunities in construction at relatively higher wages also induced a move out of agriculture, which was evidenced by an increase in casual labour in non-manufacturing. The rise in construction employment is reflected, partly, in the boom of male rural casual workers - 16 million new jobs for them.

Most importantly, however, around 10 million new workers found regular salaried employment in non-agricultural sectors during 2000 and 2005, or about 2 million per annum. Another 7 million obtained regular jobs during 2005-10 and then another 12.8 million regular salaried jobs were created during 2010 and 2012; or nearly 3 million per annum. This rise in regular work reflects the very rapid GDP growth of 8.4 percent annually that occurred between 2003-4 and 2011-12 . The fact that organized sector work has been rising throughout the period of rapid economic growth is similarly reflected in the continuous increase in regular work.

Table 1. Employment and Change in Employment during the Decade, by Sector and Type of Employment (PS+SS)

Sectors	Absolute volume of employment (million)											
	1999-2000			2004-05			2009-10			2011-12		
	SE	RE	CL	SE	RE	CL	SE	RE	CL	SE	RE	CL
Agri	142.4	3.5	100.6	172.3	2.9	93.3	147.1	2.1	95.6	151	1.9	78.9
Mfg	22.2	13.0	7.6	28.6	15.9	9.3	24.6	16.4	9.8	29.3	20.5	9.9
Non-Mfg	3.2	2.6	14.5	4.8	3.0	21.6	5.3	4.1	38.9	5.7	5.3	44.3
Services	43.2	36.8	9.8	55.4	43.6	8.2	57.5	49.1	9.7	61.6	56.9	8.8
Total	211.1	55.9	132.5	261.2	65.4	132.5	234.6	71.7	153.9	247.7	84.7	141.9

Source: Authors' estimates based on NSS various Rounds

Employment trends in manufacturing were cyclical in nature – a rise in the first half of the decade, then a fall by 3 million with employment dropping as the global economic crisis began to take effect during 2005 to 2010, followed by a 9 million increase to reach 59.8 million over the next two years 2011-12, which was largely driven by the self-employed and regular work in manufacturing. After 2005 employment declined mainly among self-employed women in manufacturing activities. They are at the bottom of the production chain, typically in low productivity and low paid jobs, which usually echoes the absence of other viable income earning opportunities. It is also a reflection of the fact that unorganized segment employment fell during 2005-2012 in manufacturing.

Jobs in organized or unorganized segment enterprises?

Organized segment enterprises are officially defined as non-agricultural units that employ more than 10 workers. The key driver of the increase in employment in the period 2000 to 2005 had been the unorganized sector enterprises (as per NCEUS definition[56]). Of the 60 million new jobs generated during that period, 52 million were created in the unorganized segment enterprises (Mehrotra et al 2013). Agriculture (in which employment grew by 20 million) accounted for nearly 40 percent of this increase.

Table 2. Distribution of workers by organised-unorganised enterprises and formal-informal employment across sectors, 2004-2012 (million)

Sectors	Organized		Unorganized		Total	
	Formal	Informal	Formal	Informal	Formal	Informal
2004-05						
Agriculture	0.2	4.1	0.1	264.2	0.3	268.2
Manufacturing	5.0	10.3	0.6	38.0	5.6	48.3
Non-manufacturing	2.0	7.2	0.1	20.1	2.1	27.3
Services	19.5	10.0	1.1	76.8	20.6	86.7
Total	26.7	31.5	1.9	399.0	28.6	430.5
2009-10						
Agriculture	0.3	13.0	0.1	231.5	0.4	244.5
Manufacturing	5.3	11.1	0.4	33.9	5.7	45.0
Non-manufacturing	2.5	15.8	0.4	29.6	2.9	45.4
Services	22.7	13.5	1.4	78.7	24.1	92.2
Total	30.9	53.5	2.3	373.7	33.1	427.1
2011-12						
Agriculture	0.5	17.7	0.1	213.6	0.6	231.3
Manufacturing	6.1	14.6	0.4	38.7	6.5	53.3
Non-manufacturing	2.7	19.7	0.3	32.7	2.9	52.3
Services	24.2	16.1	1.2	85.8	25.4	101.9
Total	33.5	68.1	1.9	370.8	35.4	438.9

Source: Authors' estimates based on NSS various Rounds

[56] "The informal sector consists of all unincorporated private enterprises owned by individuals or households engaged in the sale and production of goods and services operated on a proprietary or partnership basis and with less than ten total workers"

Since 2000, organized manufacturing employment consistently increased, albeit slowly, all the way up to 2011-12. Similarly, employment in unorganized services and non-manufacturing industry (most of which is in construction) consistently rose after 2000. It was only employment in manufacturing that fluctuated after 2000, and any increase or decrease in manufacturing employment took place in the unorganized segment.

Significant improvement occurred in the construction sector, too. Given the increase in infrastructure (airports, national highways) investment by both the public and private sectors, there was a sharp rise in organized segment employment in the construction sector of non-manufacturing industry. In fact, in 2011-12, nearly 40 percent of total construction employment was in the organized segment.

Formal and informal employment

Though employment opportunities increased in the organized sector, it was mainly for informal[57] workers leading to an increase of informal employment in the organised sector or, in other words, a shift in the structure of informal employment from informal employment in the unorganised sector towards informal employment in the organised sector.

Their share rose from 32 percent in 1999-2000 to 54 percent in 2004-05 to 67 percent in 2011-12. This is worrying as workers in the unorganized sector and informal workers in the organized sector are more vulnerable and at higher risk of retrenchment in case of even the slightest economic shock. At the same time, labour laws will need to be re-examined by state governments if this trend towards informal employment is to be halted.

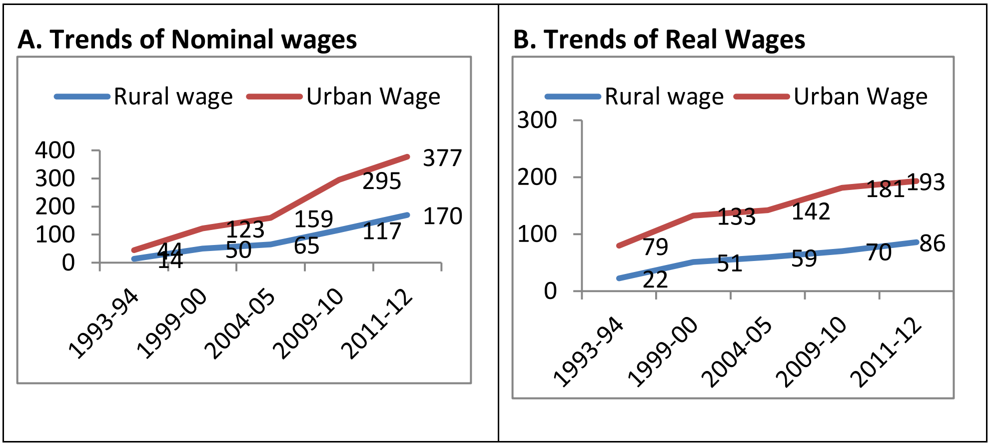
We noted earlier that 36 million fewer persons were engaged in agriculture in 2011-12 compared to 2004-5, which was a first in the economic history of India. A Lewisian structural change was under way.

A set of push and pull factors caused this Lewisian (Lewis, 1954) turning point. During the second half of the decade there was a remarkable and historic shift in rural wages, partly due to the spill-over effect of MGNREGA, on the one hand, and shortage of labour partly due to higher participation in education (Thomas, 2012), that forced the farmers to start using machines[58], on the other. In addition, rising demand for labour in the construction sector, both in rural and urban areas, with relatively higher wages also partly explains the absolute fall in agricultural employment post-2005.

[57]As per NCEUS Definition, “Informal workers consist of those working in the informal sector or households, excluding regular workers with social security benefits provided by the employers and the workers in the formal sector without any employment and social security benefits provided by the employers”.

[58]Wages also rose because the Government of India raised the minimum support prices of cereals (rice and wheat) purchased by the Food Corporation of India from farmers.

Figure 1. Trends of Nominal and Real wage rates (at 2001-02 prices) in Rural and Urban India, 1994-2012



Source: Authors' estimates based on NSS unit level data, various rounds

MGNREGA (2005) not only raised wages in public works, but also offered an alternative to working on the landlord's farm for landless labourers on a massive scale for the first time in India's history. Person-days of work generated under MGNREGA were many more than ever before (Mehrotra, 2008). The additional work available within the village caused a shift of the labour supply curve to the left locally as well as in areas where surplus labour would hitherto migrate in search of work. Labour contractors highlight that a combination of improved governance and a sharp pick-up in GDP growth in traditional labour supplying states, such as Bihar and Chhattisgarh, resulted in increased demand for labour in these states, leading to a decline in labour availability in states such as Maharashtra, Karnataka and Punjab, which have historically relied on labour supplying states for their requirements (Mukherjee, 2013).

Poverty declined in absolute terms – a new stage in India's development

As wages rose, there was a steep reduction in poverty rate in India, more remarkable in rural areas, and a new surge in consumption. The incidence of poverty had been declining consistently since 1973-4 in India. However, it was for the first time in India's post-independence history that the absolute number of the poor in India began to fall. The percentage of rural persons below the (Tendulkar) poverty line as estimated by the Planning Commission had fallen to 25.7% in 2011-12 compared to 41.8% in 2004-05. But as we noted earlier, the absolute number of poor had remained constant until 2004-5.

As per NSS[59] the share of food expenditure (in both rural and urban areas) was declining, whereas the share of non-food expenditure was increasing at a much faster rate recently. In rural areas, as total consumption expenditure was growing in real terms, the share of expenditure on processed foods and beverages increased from 4.5%

[59] See NSS KI(68/1.0): Key Indicators of Household Consumer Expenditure in India (Page no. 20)

to 5.8%, on clothing and bedding increased from 4.5% to 6.3%, on durable goods increased from 3.4% to 6.1% and on footwear also increased from 0.8% to 1.3% during 2005-2012.

In the period of high economic growth, salaries in urban India increased steadily, because of the sixth Pay Commission, which had a knock-on effect on private sector wages, particularly in the upper quintile of the wage distribution. This is reflected in the high rise in wages among professionals, personnel in administration as well as among plant and machine operators. In urban areas, as total consumption expenditure increased, the share of expenditure on processed foods and beverages increased from 6.2% to 7.1%, on clothing and bedding increased from 4% to 5.3%, on durable goods increased from 4.1% to 6.3% and on footwear also increased from 0.7% to 1.2% during 2005-2012.

The rise of employment in construction

Yet another factor was the growing demand for labour in construction activity driven by real estate investments, as well as by the \$ 500 billion of investment in infrastructure during the 11th Plan period 2007-12, which raised this investment's share in GDP from 4 percent to 7 percent. What is equally heartening is that infrastructure investment is scheduled to rise to \$ 600-700 billion during the 12th Five Year Plan period (2012-17). In other words, employment in construction, which had doubled from its 2004-5 level of 25 million to 50 million in 2011-12, is likely to go on increasing over the years as well.

The increase in construction jobs resulted from large private and public investments in infrastructure, as well as in real estate/housing and development projects like Indira Awaas Yojana, Pradhan Mantri Gram Sadak Yojana and Mahatma Gandhi National Rural Employment Guarantee Act (MGNREGA).

Slow increase in manufacturing employment: an outcome of falling exports, rising import-intensity and wages

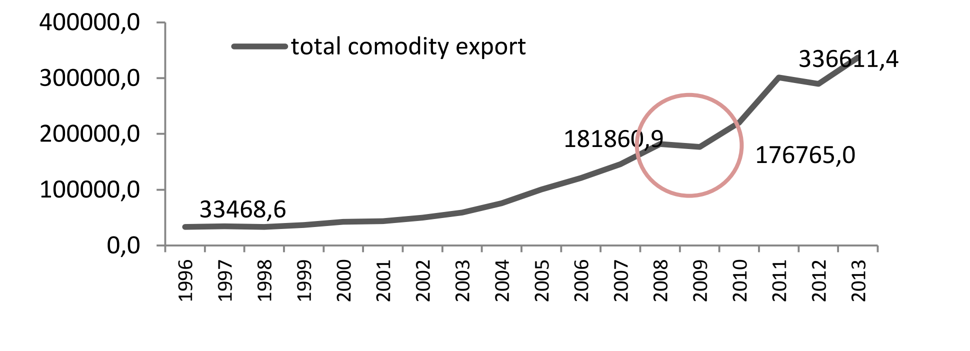
Employment in manufacturing made a significant recovery between 2010 and 2012 to reach 59.8 million with an increase of 9 million in two years. However, the point remains that manufacturing employment is still an issue. Manufacturing employment had increased by 11 million or 25 percent between 1999-2000 and 2004-5 (from 44 to 55 million) but fell by 3 million to 52 million in the latter half of the decade.

The decline in manufacturing employment during 2005-2010 (by 3 million) was a result of three sets of factors: falling demand for manufacturing exports (Ministry of Finance, 2013), rising import-intensity of manufacturing output, and rising wages, with the latter two raising capital intensity.

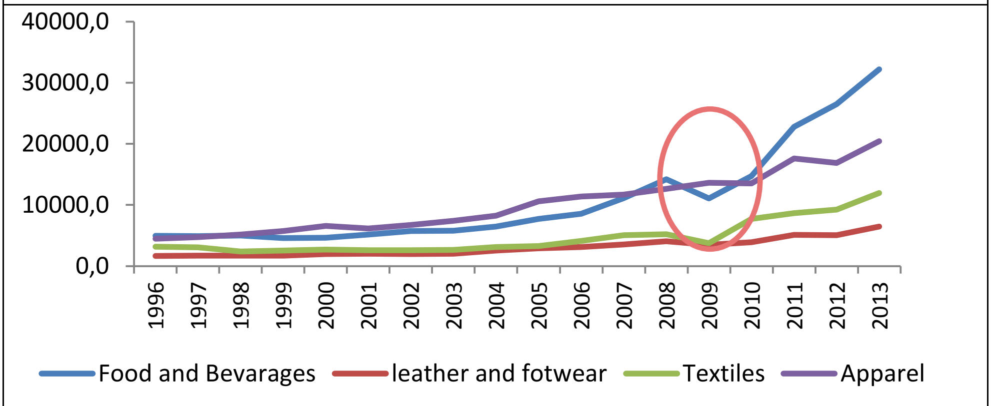
There was a sharp decline in merchandise exports, particularly labour-intensive manufacturing exports of India, during 2007 to 2009, on account of the global economic crisis that reduced demand. The Economic Survey 2012-13 also points out that the drastic fall in the share of manufacturing exports was mainly due to the falling shares of traditional items like textiles, leather and gems and jewellery, which are labour-intensive activities. The RBI's Annual Report (2011-12) mentions that capital goods production also contracted sharply mainly due to substitution by imported capital goods (especially from China). Hence, investment decelerated faster than other components of domestic demand.

Figure 2. Trends of Merchandise Exports of India, 1990-2013

Part A: Total Commodity Exports from India, 1996-2013 ($ million)



Part B: Exports of selected labour-intensive manufacturing goods from India, 1996-2013 ($ million)



Source: Compiled from UN-Comrade database

Post-crisis, a recovery in manufacturing employment was experienced with 9.1 million increase in absolute terms. This is partly explained by the rise in exports of commodities, particularly labour-intensive manufacturing goods, food and beverages, wearing apparel and textiles increased significantly.

However, there were two other structural trends in place that explain falling employment in manufacturing in the second half of the 2005.

Rising wages and other costs (hiking real estate prices, taxes and tariffs, electricity) inflated the cost of domestic manufacturers. This often encourages manufacturers to import final goods from China and other neighbouring countries as costs of production at home turn higher than prices of imported final goods. Many countries in the world have witnessed a rising share of China in their import basket[60].

Table 3. Trends of Rural and Urban Real Wages by Occupation in India, 1994-2012

Occupations	Real Daily wage rates (in 2001-02 prices)					
	1993-94	1999-00	2004-05	2007-08	2009-10	2011-12
Rural Areas						
Professional and admin	91.62	167.81	193.95	182.63	211.42	227.34
Clerical jobs	99.73	142.11	158.10	173.29	198.36	191.36
Sales and services	16.91	70.32	69.25	87.93	102.51	107.18
Agriculture and Allied	15.08	34.14	39.79	51.10	56.44	73.11
Crafts and trade workers	24.26	54.47	56.69	79.84	79.51	92.31
Plant and machine operators	43.26	85.06	92.25	97.99	96.78	107.39
Total	22.45	50.83	59.38	64.62	70.24	86.07
Urban Areas						
Professional and admin	154.90	277.17	317.26	365.04	377.14	390.57
Clerical jobs	148.53	186.93	210.34	217.96	245.71	240.08
Sales and services	42.22	90.96	88.58	115.42	129.26	135.94
Agriculture and Allied	24.07	55.91	50.24	92.57	126.39	110.30
Crafts and trade workers	54.13	89.09	85.42	107.19	111.35	121.72
Plant and machine operators	81.59	112.21	115.58	133.07	148.54	149.23
Total	79.45	132.74	141.90	164.10	181.19	193.35

Source: Authors' estimate based on National Sample Surveys, various rounds.

While this was the situation for workers at the lower end of the wage and skill distribution, a similar development was occurring at the higher end of the salary/skill distribution. Between 2003-4 and 2010-11, GDP grew by 8.4 percent per annum. Since it was both industrial (manufacturing and non-manufacturing) and services growth that was driving the GDP, skill shortages emerged at the higher end of the salary/skill distribution increasing salaries of the skilled and highly skilled workers.

These two sets of forces that were driving wages for the unskilled, and salaries for the skilled/highly skilled were also driving greater capital-intensity in goods and services production.

[60]China ranked first in merchandize exports to the world with a market share of over 10 per cent in 2010 compared to a share of less than 2 per cent in 1998 (Husted and Nishioka 2012).

Finally, we should note that developments in the labour market between 2012 and 2018 have not augured well for the Indian economy. We noted above that education levels rose sharply after 2012. These educated youth began entering the labour force in large numbers after 2012, reaching approximately 5 million per annum between 2011-12 and 2017-18 compared to just over 2 million per annum between 2004-5 and 2011-12. They were certainly not interested in working in agriculture, given that their parents had been leaving agriculture in growing numbers since 2004-5. But the number of non-agricultural jobs that created between 2012 and 2018 fell from 7.5 million per annum (2000-2012) to 2.9 million, causing massive and growing unemployment. The open unemployment rate– in an already highly informalized economy – rose to 6.1 percent in 2018 from 2.1 percent in 2012. Youth unemployment (15-29 year-olds) surged from 6.1 to 17.8 percent over the same period. Real wages stagnated, both in rural and urban areas, in striking contrast to the period 2004-5 to 2011-12.

It is true that the introduction of a nationwide new uniform Goods and Services Tax (GST) in mid-2017 resulted in many of the larger informal firms registering for the GST, which has caused some of them becoming formal. However, the National Sample Survey of employment (2017-18) has shown that the share of informal workers (by the 17TH ICLS 2003 definition) as a result has barely declined in the country.

5.3 Concluding remarks

This short paper has made two arguments. First, despite being the fastest growing large economy in the world currently, India is still suffering from the damaging effects of policy-induced informality in the workforce from the first four decades after independence. The slow pace of growth in the years 1950 to 1980, combined with a pattern of growth that was heavily dependent upon a heavy-industry first strategy plus reservation of products for small firms, led to massive growth of millions of unregistered firms, employing workers in work and wages conditions typical of informal firms. Labour laws – too many of them only applicable to the organized, registered firms – did not help. These factors undercut the demand for workers in the formal or organized sector. The supply-side factor that mostly reinforced these conditions was the low investment in schooling by the state, resulting in the poor educational level of the workforce, who were only employable in the informal economy.

However, several positive developments have taken place since 1991 when the pace of GDP growth picked up in the Indian economy. First, after a lag (from 2004 onwards), the absolute numbers in agriculture began to fall as non-agricultural growth picked up. Second, there has been a rising share of industrial employment in construction; in fact, the share of organized employment in construction has shot up. Third, the absolute numbers of workers in manufacturing have increased, and although the share of manufacturing in total employment remains small relative to that in Southeast Asian countries, the rising share offers a source of hope. The domestic market for manufacturers is growing rapidly, as shown earlier. Fourth, there is evidence of a rising share of organized segment (employing more than 10 workers) workers in non-agricultural employment, from 12% in 1999-2000 to 22% in 2011-12. Fifth, there is a rising share of regular wage employment, as opposed to merely casual wage employment. Sixth, all this has been reflected in rising real wages in both rural and urban areas. Finally, although the education level of the workforce is still a source of worry, the general academic level of the youthful part of the workforce has improved sharply in the last decade.

All these positive factors do tend to temper or mitigate the disadvantages of informality in India's growing workforce. If the state initiates efforts to provide coverage to the poor among the unorganized segment, informal workers, as soon as possible, it will signify a huge gain for the realization of the workers' rights. However, it is regrettable that the labour market took a turn for the worse after 2012 on many counts – a drop in overall job growth in the non-agricultural sector, rising open unemployment and stagnant real wages, primarily due to the sharp increase in the number of young entrants in the labour force post-2012. Even though these entrants are better educated, in the absence of a sustained annual GDP growth rate of at least 8 percent, they will not find the non-agricultural employment to which they aspire.

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Chapter 6

Organizing [in] the informal economy
Trade union action in sub-Saharan Africa[61]

Jürgen Schwettmann

Workers in the informal economy[62] are generally excluded from or under-represented in social dialogue institutions and collective bargaining processes. In order to secure and exercise an independent voice at work, workers and employers need representational security. Representational security at work is based on the freedom of workers, employers and the self-employed to form and join organizations of their own choosing without fear of reprisal or intimidation. […] Freedom of association and the right to organize constitute fundamental human rights, as well as key enabling rights. If workers or employers are denied the possibility of organizing, they will not have access to a range of other rights at work (ILO, 2002).

The very fact that in many sub-Saharan African countries the informal economy employs 90% or more of the national labour force provides a compelling incentive for trade unions to reach out to the informal economy. Organizing workers in the informal economy also allows workers' organizations to expand their membership, to "capture lost members", and reinforce their numerical strength. Ultimately, increasing union density by tapping into the vast pool of informal economy workers contributes to the collective voice of the workers' movement both nationally and globally (ILO, 2016). However, the diversity of informal employment situations requires appropriate organizing strategies (ILO ACTRAV, 2019).

The chapter describes the benefits as well as modalities and options of organizing in the informal economy; introduces the types of organizations that informal economy workers may form; provides a series of recent case studies on the way trade unions have reached out to the informal economy; and offers guidance on the way forward.

The title of this paper, with the word "in" placed between square brackets, refers to the dual aspect of the subject under discussion: "organizing the informal economy" means the building of organizations in the informal economy through external support from governments, trade unions, civil society organizations, etc., whereas "organizing in the informal economy" means the self-organization of the informal economy without, or with very limited, external support. Both options have their merits and challenges, and both are widespread in Africa's informal economy.

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[61] The present paper was originally prepared for the Friedrich-Ebert-Foundation (Berlin) in 2017; it has been expanded and updated by the author to reflect the latest developments.

[62] The recent ILO publication "Women and men in the informal economy: A statistical picture. Third edition" provides a comprehensive data and information on the informal economy worldwide, including sub-Saharan Africa (ILO, 2018).

6.1 The Informal Economy

Sierra Leone's official unemployment rate is just 3.4 per cent (Danish Trade Union Council for International Development, 2017) – does this mean that 96.6 per cent of Sierra Leone's labour force is employed in the private or public sector? Certainly not. Less than 11 per cent of Sierra Leoneans have a formal job – mostly in government. The overwhelming majority is self-employed in subsistence agriculture or in urban micro-enterprises. They belong to the informal economy. The lack of a social protection for the unemployed leaves them with few options but to find any kind of income-generating work.

Most African countries have experienced a prolonged period of "jobless growth", meaning that the national economies have grown by 4 to 6 per cent per year, however, such growth has not entailed a commensurate growth in formal employment. This phenomenon, known as "jobless growth", is the result of a low employment-elasticity of the Africa's economic growth. According to the African Development Bank (African Development Bank, 2019), a one-percent increase in GDP over the period 2000–14 was associated with only 0.41 percent growth in employment, meaning that employment was expanding at a rate of less than 1.8 percent a year, or far below the nearly 3 percent annual growth in the labour force. If this trend continues, 100 million people will join the ranks of the unemployed in Africa by 2030. Without meaningful structural change, most of the jobs generated are likely to be in the informal sector.

Clarification of Terms

The **informal sector** consists of informal enterprises and own-account workers that produce a marketable surplus; **informal employment** encompasses the informal sector plus informal workers in formal enterprises; **informal economy** includes informal employment plus households which produce exclusively for household consumption (mainly subsistence agriculture).

6.1.1 Global overview

The informal economy comprises more than half of the global labour force and more than 90% of micro and small enterprises (MSEs) worldwide. Two billion workers — representing 61.2 per cent of the world's employed population — are in informal employment (ILO, 2018). Informality is an important feature of labour markets in the world with millions of economic units operating and hundreds of millions of workers pursuing their livelihoods in conditions of informality (ILO, 2017). Most workers and operators in the informal economy are in *vulnerable* employment, which concerns 42% of the global labour force, or 1.4 billion people worldwide, and many of those belong to the working poor: some 29% of the labour force in developing and emerging economies earn less than US$3.10 per day (ILO, 2017).

The expression "informal economy" encompasses a considerable diversity of situations and phenomena. Indeed, the informal economy manifests itself in a variety of forms across and within economies. Formalization process and measures aiming at facilitating transitions to formality need to be tailored to specific circumstances that different countries and categories of economic units or workers face[63]. For women, informal employment is pervasive. In some parts of sub-Saharan Africa, the gender gap in informal employment is more than 20 percentage points. Among youth, the gender gap is even wider (ILO, 2018).

Work in the informal economy is often characterized by small or undefined workplaces, unsafe and unhealthy working conditions, low levels of skills and productivity, low or irregular incomes, long working hours and lack of access to information, markets, finance, training and technology. Workers in the informal economy are not recognized, registered, regulated or protected under labour legislation and social protection. The root causes of informality include elements related to the economic context, the legal, regulatory and policy frameworks and to some micro-level determinants such as low level of education, discrimination, poverty and, as mentioned above, lack of access to economic resources, to property, to financial and other business services and markets (ILO, 2019).

6.1.2 Informal employment in Africa: Overview

Informal employment is the main source of employment in sub-Saharan Africa, accounting for 89.2 per cent of all employment, or 76.8 per cent excluding agriculture. Within sub-Saharan Africa, informal employment is the main source of employment in Central Africa (91.0 per cent), Eastern Africa (91.6 per cent) and Western Africa (92.4 per cent). If agriculture is excluded, informal employment continues to dominate the structure of employment with a 78.8 per cent share in Central Africa, 76.6 per cent in Eastern Africa and 87.0 per cent in Western Africa. Southern Africa is the only subregion with less than half of the employed population in informal employment at 40.2 per cent, and 36.1 per cent excluding agriculture (ILO, 2018).

Table 1. Informal employment in Africa

Composition of informal employment in sub-Saharan Africa (2016)									
		Including agriculture				Excluding agriculture			
		Including agriculture	In the informal sector	In the formal sector	In households	Excluding agriculture	In the informal sector	In the formal sector	In households
Sub-Saharan Africa	Total	89.2	79.3	5.2	4.6	76.8	63.3	9.5	4.2
	Men	86.4	75.7	6.7	4.0	71.6	56.7	12.1	2.8
	Women	92.1	83.2	3.6	5.3	82.8	71.0	6.4	5.6

Source: (ILO, 2018)

[63] The WIEGO publication "The Informal Economy: Definitions, Theories and Policies" (Chen, 2012) provides an interesting overview of how the meaning of "informal economy" has evolved over time, and how it is being used by different organizations.

The vulnerable employment rate – the share of own-account workers and unpaid family workers in total employment – was estimated at 72 per cent in sub-Saharan Africa in 2017; extreme working poverty[64] on the continent was estimated at 36%, and moderate working poverty at 24% (ILO, 2018). In sub-Saharan Africa, 89.7 per cent of women's employment (including agriculture) is informal, in contrast to 82.7 per cent for men. The feminization of poverty, combined with discrimination by gender, age, ethnicity or disability, also means that the most vulnerable and marginalized groups tend to end up in the informal economy and this is especially the case for women and young people, who have no other choice than the informal economy for their survival and livelihood. Finally, self-employment constitutes a greater share of informal non-agricultural employment than wage employment; it accounts for as much as 53 per cent of non-agricultural employment in sub-Saharan Africa (ILO, 2015). In other words: informal economy is the rule in Africa, not an exception.

6.1.3 Informal economy policy frameworks ILO instruments

The 2002 Resolution and Conclusions on Decent Work and Informal Economy, adopted by the International Labour Conference (ILC) defined the term "informal economy" as "all economic activities by workers and economic units that are – in law or in practice – not covered or insufficiently covered by formal arrangements." This definition was endorsed 13 years later through the ILO Recommendation concerning the transition from the informal to the formal economy (R204), which further clarified that the term does not cover illicit activities, and that the expression "economic units" in the definition refers to units that (a) employ hired labour; (b) individuals working on their own account; and (c) cooperatives and social and solidarity economy units.

Recommendation R204 proposes in its article 31 that "Members (member States) should ensure that those in the informal economy enjoy freedom of association and the right to collective bargaining, including the right to establish and, subject to the rules of the organization concerned, to join organizations, federations and confederations of their own choosing", whereas article 33 suggests that "Employers' and workers' organizations should, where appropriate, extend membership and services to workers and economic units in the informal economy." R204 includes several references to cooperatives and the social and solidarity economy. This is also mirrored in the ILO Recommendation R193 (2002) on the Promotion of Cooperatives, which stipulates in its article 9 that "Governments should promote the important role of cooperatives in transforming what are often marginal survival activities (sometimes referred to as the "informal economy") into legally protected work, fully integrated into mainstream economic life."

[64] Moderate and extreme working poverty rates refer to the shares of workers living in households with income or consumption per capita between US$1.90 and US$3.10 per day (PPP) and less than US$1.90 per day (PPP), respectively.

The 2030 sustainable development agenda

Informality is addressed *directly* in just one Sustainable Development Goal (SDG) target, namely SDG 8.3 “promote development-oriented policies that support productive activities, decent job creation, entrepreneurship, creativity and innovation, and encourage formalization and growth of micro-, small- and medium-sized enterprises including through access to financial services”. In addition, SDG target 8.8 seeks to “protect labour rights and promote safe and secure working environments of all workers, including migrant workers, particularly women migrants, and those in precarious employment´,” whereas SDG target 17.17 “encourages and promotes effective public, public-private, and civil society partnerships, building on the experience and resourcing strategies of partnerships”. SDG target 16.7 calls for measures to “ensure responsive, inclusive, participatory and representative decision-making at all levels”. The latter two targets could be supported through organization-building in the informal economy. The global trade union movement is actively engaged in the pursuit of the 2030 Agenda, both at the global level and through their participation in the formulation of national sustainable development strategies (International Training Center (ITC), 2017).

The central ambition of the 2030 Sustainable Development Agenda to *leave no one behind* certainly resonates with the billions of informal economy workers around the world. It will be crucial to address the decent work deficits affecting informal economy workers so that they have a chance to escape from vulnerability and poverty.

6.2 Self-Organization in the Informal Economy

It would be a mistake to assume that, because of their precarious status, informal economy workers and operators are not organized. On the contrary, in the absence of any form of social protection, exposed to harassment, without rights nor recognition, informal economy workers have no alternative but to build organizations that provide them with a minimum of protection, support and empowerment.

Informal workers are organized in a variety of ways despite the difficulties they face, and their organizations are growing. These include trade unions, workers’ associations outside the formal trade union movement, farmers’ groups, market associations, cooperatives, and many other types of member-based organization (MBO). These MBOs are also diverse in geographical coverage, ranging from small (often fragile) local organizations, to national organizations, federations and alliances, regional networks and associations, and a variety of international organizational forms – both inside and outside the formally constituted institutions of the international trade union movement (Bonner & Spooner, 2011).

6. 2.1 Why do people organize?

The benefits of self- organizing in the informal economy may be of economic, social or societal nature, as summarized in figure 3.

Figure 1. Why do people organize?

Economic function: Economies of Scale	**Social** function: Mutuality & Reciprocity	**Societal** function: Voice & Representation
• Joint marketing and supply • Joint production • Joint premises, infrastructure and machinery • Joint transport • Financial intermediation • Shared services	• Mutual assistance and insurance • Community care • Care for children, the elderly, the disabled, the sick • Cooperative housing • Community-based education	• Collective negotiation with authorities and the private sector • Social dialogue • Representation of interests (local and national • Allocation of land or market stalls/vending spaces

Source: developed by the author

ECONOMIC BENEFITS

The economic benefits of organization building are of greater interest to informal economy *units*[65] (such as micro-enterprises) rather than to informal economy *workers*; those benefits include:

- Greater productivity and higher income through economies of scale and scope, and through the division of labour. For example, informal carpenters in many African cities often form clusters (many similar workshops located along the same street) with the aim of generating cost savings through an increased level of production (economies of scale) or the diversification of product lines (economies of scope). Further cost savings can be realized by dividing the production process into smaller steps (sawing, assembling, varnishing, etc.).
- Cost savings and higher income resulting from increased bargaining power and shared services made possible through collective economic action; such services may include joint purchase of goods and services, transport, raw material supply, marketing, energy and water supply, and many others. Shared service cooperatives are widespread in Europe[66], the US and Japan, but not very common in Africa yet. An example are the West African garment vendors, who may send one of their pairs to China to purchase textile products in bulk (Quartz, 2013).

[65] ILO Recommendation 204 on the Transition from the Informal to the Formal Economy covers both workers and economic units. Economic units include units that employ hired labour, units that are owned by individuals working on their own account, cooperatives, and social and solidarity economy units.

[66] The German Mittelstandsverbund, for example, acts as the apex organization of 310 small business associations (mostly cooperatives) with 230.000 member-enterprises (mostly SMEs) and 2.5 million workers.

- Higher and more stable income through better market access. This applies principally to small-scale agricultural producers (who fall under the definition of “informal economy”). The Oromia Coffee Farmers’ Cooperative Union in Ethiopia, for example, represents a network of 405 primary cooperatives with more than 400.000 household farmers. Through such federation small scale farmers can access the fair-trade market overseas; this in turn generates additional income which is used to finance community projects (schools, water supply, bridges, etc.).
- Access to financial services through credit unions (SACCOs)[67] and a plethora of informal and formal micro-finance institutions, such as rotating savings and credit associations (ROSCAS, or tontines), which are particularly widespread in Africa’s informal economy.

Different types of economic services may be rendered by the same informal economy organization. For example, an association of informal carpenters may facilitate input supply, market access and financial services at the same time.

SOCIAL BENEFITS

As informal economy workers and operators are often excluded from formal social protection schemes, they must rely on alternative arrangements such as traditional social solidarity groups, mutual health benefit groups, or community-based health insurance schemes.

Such traditional systems of cooperation, mutuality, reciprocity and solidarity exist in all African societies, where they have remained vibrant till today, in particular in rural areas and in the urban informal economy. Traditional African societies have always relied on kinship support in times of distress. Families, kinship groups and communities have evolved strategies to meet life contingencies faced by other members. For example, mutual funds and communal levies are common traditional forms of sharing risks (Kalusopa, Dicks, & Osei-Boateng, 2012). Quite frequently, such traditional financial systems link up with traditional health services provided by traditional healers using herbal medicines. Rotating savings and credit associations or ROSCAs (also known as “tontines” in French speaking Africa) are omnipresent on the continent and involve large numbers of people. Often, they include an element of mutual social assistance in addition to the savings and credit functions. Of great importance is the social aspect of these associations, i.e. the fact that they provide an opportunity to meet and celebrate as a group on a regular basis. Burial societies, which can be considered as a specific form of micro-insurance, are common especially in Southern Africa[68] and Ethiopia. Mutual

[67] According to the latest statistical report of the World Council of Credit Unions (WOCCU), SACCOs exist in 28 African countries; the movement comprises 37.607 credit unions, 29.6 million members and US$ 9.2 billion in assets.

[68]The National Stokvel Association of South Africa (NASASA) estimates that there are a total of 810 000 stokvels, burial societies and rotating savings and credit associations in South Africa, with about 11.5 million members. They cover between 6% (Eastern Cape) and 24% (Gauteng Province) of the population.

work-sharing schemes for large, labour-intensive ventures, such as house construction, land clearing or crop harvesting, can be found everywhere on the continent. Other traditional manifestations of mutuality provide social assistance to community members in need, a practice known as “Ubuntu” in Southern Africa, or as “Umoja” in East Africa. Those ancient traditions have successfully adjusted to modern times and continue thriving even among the African diaspora abroad.

Traditional African self-help groups share many of the values and principles of Western-style cooperatives but do not replace those; they rather co-exist with them until today. Cooperatives work well in traditional societies where mutuality and informal cooperative activities are embedded in the form of common property, shared water and grazing rights and informal financial sharing among vendors in markets.

The traditional African forms of cooperation and solidarity are often locally rooted, defined by the boundaries of the community and the social classes within that community. The groups and associations are usually, though not always, small in membership; the membership is based on a common bond derived from ethnic origin, social class, age group, income level, professional occupation, or a combination of those. Social capital and social control are of paramount importance since these groups may handle large amounts of cash without any collateral or security, or even accounts. They are based on trust and social cohesion, rather than written agreements. The groups are often temporary or periodic in nature and emerge when needs or opportunities arise; moreover, they seldom build higher level structures such as unions and federations. (Schwettmann, Cooperatives in Africa - Success and Challenges, 2016)

Traditional forms of social protection find their limits when the extent of the threat exceeds the response capacity of the group. Such systems inevitably collapse when a large number of community members are affected all at once, as it happened during the Ebola outbreak in West Africa or the HIV-AIDS pandemic in Southern Africa. Moreover, traditional forms of solidarity and intergenerational support, which are still widespread in rural areas, are beginning to erode in urban settings.

One of the greatest problems that informal economy workers face is the lack of rights, recognition, representation and voice. Informal economy workers are not covered by labour law and most international labour conventions; they are often harassed by the police or municipal authorities. They may see their goods confiscated and end up in prison for crimes such as “prowling around”. In May 2005, for instance, the Government of Zimbabwe launched the “Operation Restore Order” during which tens of thousands of “illegal” traders lost their shops, stalls and homes (Gumbo & Geyer, 2011). Officially justified by the fight against the “black market”, the operation was widely seen as an attempt by government to combat opposition forces. Similar operations have taken place in several African cities.

The formation of member-based organizations can provide informal economy operators with an instrument to obtain official recognition, as well as greater political bargaining power, as discussed in the section on collective bargaining. There are many examples from around the world showing that informal economy organizations can successfully fight for the rights and the dignity of their members and protect them against harassment and abuse. The defence of labour rights of informal economy operators can go hand-in-hand with the promotion of social and economic benefits. For example, a trade union of informal workers may also set up cooperatives, which may act as a trade union when negotiating with the authorities.

6.2.2 Types of informal economy organizations

A great variety of informal economy organizations exist around the world, but almost all of them belong to what is known as the "social and solidarity economy", defined by the ILO as "a concept designating enterprises and organizations, in particular cooperatives, mutual benefit societies, associations, foundations and social enterprises, which have the specific feature of producing goods, services and knowledge while pursuing both economic and social aims and fostering solidarity (ILO, 2009)". Social and solidarity economy entities:

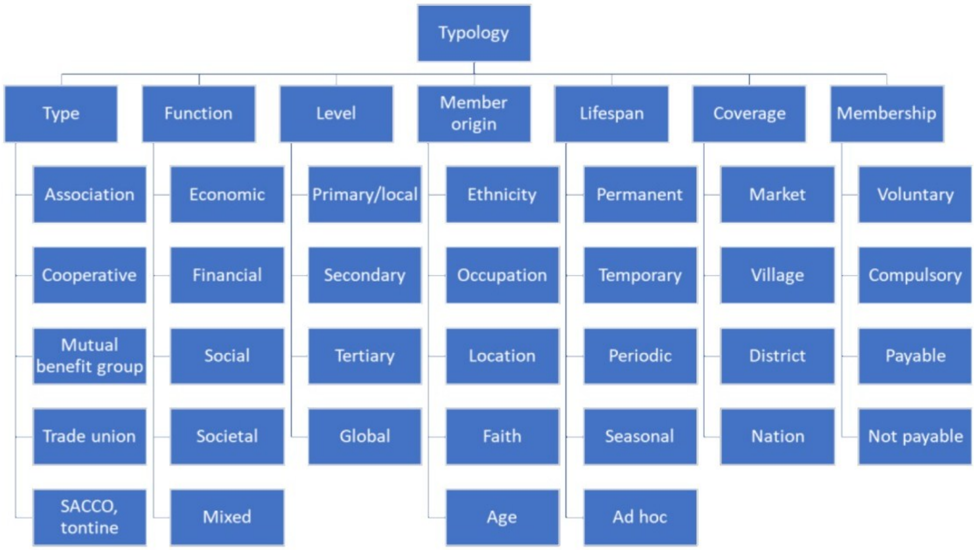
- recognize the primacy of people and work over capital;
- are flexible and innovative to address changing social and economic circumstances;
- incorporate the principles of solidarity, mutuality, reciprocity, cooperation and proximity;
- emphasize the importance of social capital in producing healthy societies;
- highlight the complementarity of the social, political, environmental and economic dimensions of development; and
- provide a platform for voluntary participation, member empowerment and personal commitment (Schwettmann, The Role of Cooperatives in Achieving the Sustainbale Development Goals - the Economic Dimension, 2014).

Social economy organizations can build a bridge between the informal and the formal economy, because the organizations as such are officially registered, and therefore belong to the formal sector, while their members usually remain in the informal economy.

Trade unions are generally not considered to be part of the social economy69, although they share many of its principles and values and have often formed alliances with social economy entities.

[69] Primarily because trade unions do not pursue economic objectives, whereas social economy units do.

Figure 2. A typology of informal economy organizations.



Source: developed by the author

Associations, trade unions, social networks, cooperatives - the kinds of organizations built at the base by informal workers can vary greatly. A key factor is the type of economic demand that they have. Own-account workers tend more towards cooperative-like organizations, while dependent workers rather opt for trade unions or other forms of workers' associations. Some, like SEWA, combine both (Mather, 2012).

ASSOCIATIONS

Associations, simply defined as "groups of individuals who voluntarily enter into an agreement to accomplish a purpose", are the most "informal" type of organization since they are easy to establish and need to meet very limited legal requirements; they may exist in the formal and in the informal economy and pursue societal, social, environmental, political or cultural goals. In French-speaking Africa, the legal status of associations is governed by local derivates of the French association law of 1901 (still applicable in France), which stipulates that an association must have at least two members and shall not pursue a profit-oriented activity. In English-speaking countries associations are known under different names, many of which may fall under specific laws, such as non-profit organizations, NGOs, charitable companies, friendly societies, community-based organizations, voluntary associations or common-law associations. In most cases the conditions to form an association are relatively easy to comply with, and registration procedures are simple. The legal form of an association is often chosen by informal economy operators to pursue non-economic goals, such as gaining voice and representation, engaging in collective bargaining with third parties and authorities, and taking part in political processes. Examples of such organizations include the Kenya National Alliance of Street Vendors and Informal Traders (KENASVIT), as well as the "Syndicat National des Travailleurs Autonomes de l'Economie Informelle du Niger" (SYNATRA), the "Fédération pour le Développement du Secteur Informel" (FEDESI) in Côte d'Ivoire and the Coalition of Informal Economy Associations of Eswatini (CIEAES).

COOPERATIVES

Cooperatives are defined by the International Cooperative Alliance (ICA) as "an autonomous association of persons united voluntarily to meet their common economic, social, and cultural needs and aspirations through a jointly owned and democratically-controlled enterprise"; the same definition appears in ILO Recommendation 193 (2002) on the Promotion of Cooperatives, as well as in many national cooperative laws around the world. The ICA asserts that the global movement represents 2.6 million cooperative societies with 1.2 billion members, and that 250 million people derive their livelihoods through cooperatives. This would make cooperatives the single largest movement in the world, far bigger in terms of membership than the global trade union movement.

On the African continent, Western-style cooperatives were introduced by the colonial powers and quickly became instruments of state-domination and political control after independence. Those pseudo-cooperative movements collapsed during the structural adjustment era imposed by the Bretton Woods institutions in the 1980s and 1990s. A new, authentic and autonomous cooperative movement has emerged since then in many African countries and provides important support services in numerous domains of economy and society in both rural and urban settings. It is estimated that around 7 per cent of the African population are members of a cooperative (Schwettmann, Cooperatives in Africa - Success and Challenges, 2016).

Particularly important to informal economy operators are the savings and credit cooperatives (also known as credit unions or peoples' banks) since these institutions provide basic financial services to those who, because of their low income, are often shunned by commercial banks. Credit unions exist in most African countries with some 25 African credit union movements being affiliated with the World Council of Credit Unions (WOCCU). They represent 21.724 units with more than 23 million members and have accumulated $9.2 billion in assets, much of which was contributed by Africa's informal economy. The growth of the credit union movement has been spectacular, but it may suffer in the future from the expansion of mobile banking services, such as the Kenyan M-PESA[70].

MUTUAL BENEFIT SOCIETIES

The European Parliament defines mutual benefit societies as "voluntary groups of (natural or legal) persons whose purpose is primarily to meet the needs of their

[70] M-Pesa is a mobile phone-based money transfer, financing and microfinancing service, launched in 2007 in Kenya. M-Pesa allows users to deposit, withdraw, transfer money and pay for goods and services easily with a mobile device.

members rather than achieve a return on investment. They operate according to the principles of solidarity between members, who participate in the governance of the business. Together with cooperatives, foundations and associations, mutual enterprises are one of the main components of the social economy, or third sector, in the European Union" (European Parliament - Directorate-General for Internal Policies, 2011). They exist in most countries of the world, including many African nations, yet following two distinct traditions: the French/Belgian model is geared exclusively towards health insurance coverage based on the principle of solidarity. Mutuals belonging to this model have formed the "Association Internationale de la Mutualité" (AIM), which in Africa has members in Burkina Faso, Burundi, Côte d'Ivoire, the DR Congo, Mali and Morocco. Interestingly, the African AIM member organizations are all targeting civil servants, not the private sector and certainly not the informal economy. Globally the AIM is present in 28 countries and represents 240 million individuals. Mutual insurers adhering to the "Anglo-Saxon model", which provides general insurance services based on the principle of mutuality, have formed the International Cooperative and Mutual Insurance Federation (ICMIF). ICMIF is present in 75 countries and has member organizations in 12 African countries[71]; those are mostly open to the general public, including the informal economy. In addition, community-based mutual health insurance systems, that are not affiliated to either AIM or ICMIF, operate in several African countries.

TRADE UNIONS IN THE INFORMAL ECONOMY

A trade union in the formal economy can be defined as an organization whose membership consists of workers united to protect and promote their common interests; its principal purposes are to (i) negotiate wages and working condition terms, (ii) regulate relations between workers and the employer, (iii) take collective action to enforce the terms of collective bargaining, (iv) raise new demands on behalf of its members, and (v) help settle their grievances.

As there is no employer-employee relationship in the informal economy a "trade union" existing in the latter cannot engage in actions under (i) and (ii) above; it can however pursue objectives (iii) to (v), albeit with different counterparts from the public and private sphere.

Informal economy associations in several African countries have evolved into "trade unions of the self-employed". These organizations consider themselves "trade unions" because they are:

- targeting trade, such a street-vending;
- engaged in collective bargaining, albeit not with employers, but with public and private stakeholders; and
- affiliated (not always, but often) with the national trade union centre.

[71] Algeria, Burkina Faso, Cameroon, Ghana, Kenya, Malawi, Morocco, Nigeria, Senegal, South Africa, Sudan and Tunisia. The ICMIF member page provides hyperlinks to the individual member organizations in these countries.

Such "informal economy trade unions" have emerged in several African countries, including Benin, Cameroon[72], Ghana, Kenya, Mozambique, Niger, Nigeria, Senegal, Sierra Leone, Tanzania, Togo, Uganda, Zambia and Zimbabwe, and many more are emerging on the continent.

VERTICAL AND HORIZONTAL INTEGRATION

Social economy organizations, as well as trade unions, often establish vertical structures such as sectoral or regional unions, national federations or confederations, as well as networks and alliances. In many instances, these structures transcend national borders with the aim of building regional or global networks. For example:

- Global advocacy bodies such as StreetNet International, WIEGO and the Global Alliance of Waste Pickers.
- Local agricultural marketing cooperatives forming regional unions for processing purposes and national federations for export marketing and other functions. An interesting example is the "Coopérative Agricole Marocaine" (COPAG) which grew from 2 to 14.000 members within 30 years of existence. Global cooperative bodies include ICA, ICMIF and WOCCU.
- Primary mutual benefit societies need to establish higher-level institutions at the regional or national level to pool risks that exceed the capacity of local mutual. Globally the mutual movement is represented by AIM and ICMIF.
- Trade unions in almost all countries worldwide have established national centres (sometimes more than one), as well as regional organizations such as ITUC-Africa and OATUU, sub-regional bodies such as EATUC and SATUCC, and international bodies such as the ITUC.

An interesting case is the Cross-Border Traders Association (CBTA) which was originally formed in Zambia in 1998 before spreading to several Southern and Eastern African countries. The association has 15.000 members in Zambia and 75.000 in other countries of the region and negotiates trade conditions on behalf of its members with the secretariats of COMESA and SADC as well as national governments (Nchito & Tranberg--Karen, 2010).

The formation of higher-level structures, also referred to as "vertical integration", has the potential to increase the economic benefits of organization building through greater economies of scale, its social benefits through a broader sharing of risks, and its political benefits through larger bargaining power.

Horizontal integration in contrast fosters collaboration between different types of organizations, be they from the same "family", or between families: trade union support to informal economy associations; partnership between mutual benefit

[72] For example: Departmental Drivers' Union of Mototaxis of Benoue-North (SDCMTACB), National Union of Farmers of Rural and Inter-urban Transportation Cars, Bus and Motorcycle of Cameroon (SYNEXPITAMOTOCAM), National Union of Cameroon Watchmen (SYNVEILCAM), Union of Motorcycle Conveyors (SYTRATAMO), Union of Mototaximen (SYMOTO); Drivers' Union Motorcycle Taxis (SYCOMOTA) (Tsafack Nanfosso, 2016).

groups and informal economy associations; or cooperation between agricultural and financial cooperatives. Africa's informal economy workers and operators could benefit from a *social movement approach* that would seek to harness synergies and complementarities between associations, cooperatives, mutual and trade unions.

6.3 Trade Unions organizing Informal Economy Workers

6.3.1 Policy orientations

The conclusions of the General Discussion on "Decent Work in the Informal Economy" that took place at the 90th Session of the International Labour Conference (2001) agreed that "an important objective for both employers' and workers' organizations is to extend representation throughout the informal economy. Workers and employers in informal activities may wish to join existing trade unions and employers' organizations, or they may want to form their own. Employers' and workers' organizations play a critical role in either strategy: extending membership and services to employers and workers in the informal economy and encouraging and supporting the creation and development of new member-based, accessible, transparent, accountable and democratically managed representative organizations, including bringing them into social dialogue processes." ILO Recommendation 204, adopted 14 years later, confirmed this statement in its article 33: "employers' and workers' organizations should, where appropriate, extend membership and services to workers and economic units in the informal economy".

> Organizing informal economy workers …. goes to the root of renewing the trade union movement through expanding membership coverage, increasing union density among all workers in order to make unions more representative; strengthening the collective voice of workers and their bargaining rights and ability to influence social and economic policies and measures in the interests of the people; and also achieving wider and better organization that allows trade unions to provide avenues for self-assistance and mutual benefit societies among workers.
>
> Kwasi Adu-Amankwah, General Secretary, ITUC Africa (cited in: (ILO ACTRAV, 2019))

"Organizing" is one of the five thematic priorities of the International Trade Union Confederation ITUC. More specifically the ITUC underlines that "only 60 per cent of the global work force of 2.9 billion is in the formal economy (…) while 40 per cent struggle to survive in the desperation of the informal economy where there are no rules, no minimum living wages, no rights and no social protection. The challenge for all levels of the global union movement is to organise – to organise both in the formal and the informal sector, and to do so in innovative ways. Organising to grow and strengthen unions can only be sustainable if we engage workers on the issues that will improve their lives including wages, safety, secure work, rights and social protection" (ITUC, 2017). The Congress of ITUC Africa, the African regional organization of the ITUC, adopted in 2011 a resolution on" Promoting Organization in the Informal Economy and a Solidarity-Based Economy for Better Development of Africa", which underlined the role of the social and solidarity economy in organizing the informal economy (Ulandssekretariate, 2015).

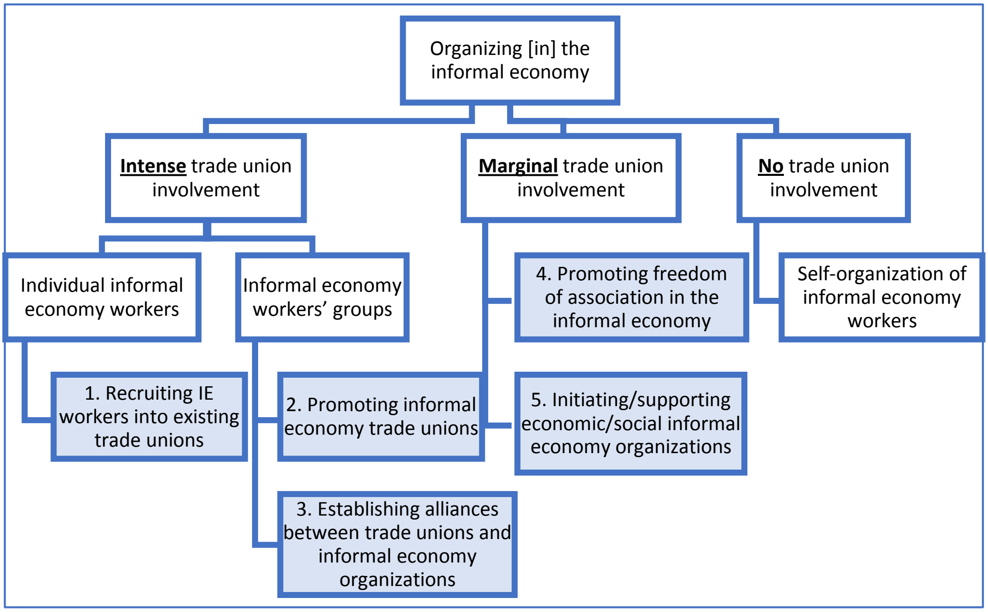
The Organization of African Trade Union Unity (OATUU), however, does not seem to have adopted a policy on engagement with the informal economy, but it is well known that many OATUU member organizations are actively reaching out to the informal economy.

The global policy orientations recognize that the informal economy is here to stay and cannot be cancelled at the stroke of a pen. These orientations call for a gradual, progressive process of formalization which would pave the way for a steady improvement in the working and living conditions in the informal economy.

6.3.2 Options and strategies

Throughout the world, unions have typically defined their membership as employees working for an employer or set of employers within an industry, or what can be called a "wage culture" and the first position taken by most unions in regard to informalization was to oppose it and exclude the workers involved. African trade unions have rarely represented a large proportion of the working population, and in pursuit of expanding the wage economy under difficult circumstances, they have concerned themselves almost exclusively with defending and advancing wage employment and those employed in the formal economy. In recent years, however, many unions have moved past this position and started to develop new approaches to including non-standard and informal economy workers (Schurman & Eaton, 2012).

Figure 3. Organizing in the informal economy – options for trade union involvement



Source: from the author

The figure above illustrates the options for trade union involvement in organizing the informal economy. If one excludes the self-organization of informal economy workers[73] (which does not require any trade union support, but is nevertheless of highest importance for the social and economic well-being of informal economy workers), the unions may pursue five distinct strategies to support the organization of the informal economy:

1. *Recruit individual workers* operating in the informal economy into existing trade unions; this can be achieved by establishing special membership categories for informal economy workers, by offering services that are relevant to them, by defending their interests vis-à-vis local and national authorities, etc. Informal economy workers will join trade unions when they see a benefit in doing so.
2. *Incorporate existing informal economy organizations* (those that consider themselves as trade unions or have a trade union character) as members within the ranks of the national trade union federations; this strategy is mutually supportive since it adds numerical strength and influence on both the trade union and the informal economy movements.
3. *Build alliances between trade unions and informal economy organizations* to pursue common goals and objectives. In this option, established trade unions form partnerships with informal economy associations and organizations, or with NGOs supporting them. Such alliances may be of temporary or permanent nature, and they may be subject-specific or pursue more general purposes. Both partners in the alliance, the trade unions and the informal economy associations, preserve their independence and autonomy.
4. *Assist in establishing a favourable climate* for the self-organization of informal economy workers and operators. Here, the involvement of trade unions will be limited to advocating the establishment of a conducive legal, policy and regulatory environment allowing informal economy organizations to emerge and flourish – or, in other words, to promote freedom of association in the informal economy.
5. *Provide organizational and political support* to initiate, strengthen and accompany member-based informal economy organizations that are not engaged in collective bargaining, but provide economic and social services[74]. This could be seen as a benevolent trade union activity which does not result in direct benefits to the trade union movement, but may benefit the general population of a country, and could as well be undertaken by NGOs or civil society organizations.

[73] Inevitably informal economy workers had already embarked on self-organizing initiatives before attracting the attention of trade unions. This has resulted in highly diverse strategies being employed by African trade unions, "ranging from antagonism to full integration." (Schurman & Eaton, 2012)

[74] After World War II the German trade union federation DGB, for example, played a central role in the establishment of housing cooperatives ("Neue Heimat"), consumer cooperatives ("Konsum", later "Co-op") and financial cooperatives ("Bank für Gemeinwirtschaft") – all of which, unfortunately, were plagued by episodes of mismanagement (Vogt, 2012).

Some national trade union centres have developed tools and training material on trade union involvement in organizing the informal economy; examples include UNSTB (Benin), TUC (Ghana), SLLC (Sierra Leone) and NOTU (Uganda) (Assens & Tabor, 2015). The IO has very recently (2019) published a trade union guide on "Organizing Informal Economy Workers into Trade Unions" (ILO ACTRAV, 2019).

6.4 Collective Bargaining and Social Dialogue in the Informal Economy

Collective Bargaining is usually understood as taking place between an employer and employees to achieve a collective agreement, primarily around wages and working conditions. (See article 2 of ILO C154: Collective Bargaining Convention, 1981 [No.154]). As most informal economy operators work on their own account (or that of the family), the term "collective bargaining" assumes a different meaning for them: the informal economy worker does not negotiate with an employer but with a wide range of counterparts: the national government, municipalities, the police, the private sector, and different local, regional and national authorities -occasionally with several of those at a time. For street vendors and waste pickers facing harassment or eviction, the counterpart may be those in the local municipal authority responsible for urban policy, for example. For dependent homeworkers, it may be the company that dominates their supply chain if they can identify it. For informal construction workers, it may be the agency that supplies them on-site, and so on (Mather, 2012).

Moreover, the subject of negotiation is different: informal economy workers do not bargain about wages and benefits but about prices, rates, rights, recognition, and many other issues. A recent WIEGO publication neatly summarizes the issues and challenges in organizing and negotiating in the informal economy (Budlender, 20013). Of all issues to be negotiated that of (de jure or de facto) recognition and respect seems to be the most important across all informal economy occupations. The social and economic inclusion and recognition of informal economy workers is the first and indispensable step towards formalization.

As the subjects of collective bargaining differ from those in the formal economy, the body that negotiates does not necessarily have to be a trade union. Certain issues affecting informal economy workers, such as access rights, official recognition, freedom of establishment and protection against harassment, can well be taken up by associations, cooperatives or similar member-based organizations which, nevertheless, may benefit from the larger influence and visibility of the trade union movement. An interesting example concerning street vendors from Johannesburg, South Africa, is cited below.

Informal economy workers cannot go on strike in the narrow sense[75] but they can apply similar strategies to further their demands. In many countries, informal economy workers ensure the provision of essential services, such as waste removal, domestic work, food production, transport of persons and goods, retail trade, etc.. The sudden discontinuation of such services as the result of a "strike" can force municipal authorities to enter into collective bargaining processes with informal economy

[75] Defined as "work stoppage or similar actions by worker to exercise pressure on the employer."

organizations, as illustrated by a few examples in the section on protest actions by informal economy associations.

Informal economy workers surely have an interest to take part in broader social dialogue processes that go beyond collective bargaining. Social dialogue[76] requires political will as well as commitment to and respect for the fundamental rights of freedom of association and collective bargaining. Every area of policy-making on the informal economy, whether it be skills policies or social security policies, requires that informal economy actors are able to organize, articulate their needs and have the opportunity to decide their own future while arriving at a consensus that meets social and economic goals. The case study of NASVI, India, demonstrates that well-organized street vendors can bring about important legal and policy changes at the national level. Another example comes from Ghana: the country has fairly developed and functional social dialogue processes including the National Tripartite Committee (NTC). In April 2015, the Ghana Trade Union Congress formed the Union of Informal Workers Associations (UNIWA) which participates, through the TUC, in the deliberations of the NTC (Ulandssekretariate, 2015). South Africa's social dialogue institution, the National Economic, Development and Labour Council (NEDLAC), has a community constituency in addition to the three traditional partners: government, employers and trade union, thus providing informal economy workers with access to national social dialogue. At the global level, organizations such as WIEGO, StreetNet and the International Domestic Workers Federation have played a decisive role in shaping international labour standards, such as ILO Informal Economy Recommendation R204 and the ILO Domestic Workers' Convention C189.

Three conditions must be fulfilled to enable the informal economy workers and operators to take part in social dialogue:

- Government policies and national legislation must guarantee the effective freedom of all workers and employers, irrespective of where and how they work, to form and join organisations of their own choosing without fear of reprisal or intimidation;
- Informal economy organizations must be effectively recognized and dispose of a defined interface with those with whom they need to dialogue. Without recognition by government authorities, informal organisations have no voice in public policy debates or access to the services and infrastructure they need to operate effectively and efficiently. This is particularly important at the local level to provide local interest groups of informal workers with an avenue for voicing their concerns and priorities and take part in policy debates.
- Once formed and officially recognized the informal economy organizations must acquire the necessary capacity to further strengthen and empower interest groups in the informal economy (European Commission, 2009).

[76] Social dialogue is defined by the ILO to include all types of negotiation, consultation or exchange of information between, or among, representatives of governments, employers and workers, on issues of common interest relating to economic and social policy. It can exist as a tripartite process, with the government as an official party to the dialogue or it may consist of bipartite relations only between trade unions and employers' organisations, with or without indirect government involvement (ILO, 2013).

6.5 Case Studies

6.5.1 Self-organization of the informal economy Africa-wide: Informal finance for the informal economy

The vast majority of workers and operators in the informal economy do not have a bank account but need financial services: savings facilities to accumulate portion of their daily income to finance monthly or yearly expenditures, such as rent and school fees, or longer-term investments; short-term loans for productive purposes or emergency loans in case of illness and death; and money transfer services to support relatives or receive remittances from abroad. Many of these financial needs can be met by informal financial institutions. An informal savings group is a social organization formed to help community members save money for specific purposes (at either individual or community level). The two most common examples are Rotating Savings and Credit Associations (ROSCAs) or Accumulated Savings and Credit Associations (ASCAs). ROSCAs (or tontines) function by taking monthly deposits (Olivier, 2016); ASCAs also require group members to make regular contributions. Instead of rotating payouts, the ASCA group fund is used to make loans that are paid back with interest. Loans are made to either group members or trusted third parties. After a certain period (often six months to a year) the group fund and its proceeds from interest are paid back to the original members. Groups usually have 15-20 members and are governed by a strict set of rules, either written or unwritten, depending on the group’s literacy. Breaking the rules is considered “taboo” and comes with social repercussions and possible financial penalties. According to a FinMark Trust survey, there were roughly 37 million people participating in informal savings groups in East Africa (Kenya, Uganda, Tanzania and Rwanda) as of 2009. In another survey, FinMark reported that 43% of households in the SADC region relied on informal financial mechanisms (FinMark Trust, 2018). In West

ROSCAs in Africa - Vernacular Names

Benin: Asusu, Yissirou, Ndjonu;
Botswana: Motshelo;
Burkina Faso, Mali: Tibissiligbi, Pari, Song-taaba;
Burundi: Upato
Cameroon: Jangi, Mandjon, Djapa;
Chad: Pare;
Congo: Ikilemba,
Egypt: Gameya, Jam'iyya;
Eswatini: Stokfel;**Ethiopia**: Ekub;
Gabon: Bandoi;
Gambia, Ghana, Liberia, Nigeria, Sierra Leone: Osusu, susu, esusu;
Ivory Coast: Moni, Safina,
Kenya: Mabati, Nyakinyua, Itega, Mkutano;
Madagascar: Fokontany;
Mozambique: Upato, Xitique; Niger: Adasse;
Senegal: Nath;
Somalia: Haghad, Shaloongo,
South Africa: Chita, Chitu, Stokfel, Mahodisana, Motshelo
Sudan: Khatta, Sanduk;
Tanzania: Upato, Fongongo;
Togo: Soo, Sodzodzo, Adakavi;
Tunisia: Noufi, Sanduk;
Uganda: Chilemba, Kiremba, Upato, Kwegatta; Kitemo,
Zambia: Icilimba, Upato, Chilenba;
Zimbabwe: Chilemba, Kutunderrera

(many more local terms can be found here.) Source: (Srinivas, Hari, kein Datum).

Africa, Nigeria had nearly 41 million people participating in such groups, while in Togo the number of tontine-members was estimated at 2.5 million in 2014 (58 per cent of the population aged 15 and above). In 2013, a study by the Cameroonian Ministry of Finance indicated that 58% of the population preferred tontines to banks because investment remuneration was higher and access to credit less restrictive (Olivier, 2016). Tontines, ROSCAs and ACSAS are omnipresent in sub-Saharan Africa, especially in rural areas and among informal economy workers; they are also particularly widespread among women.

The value that individuals gain from participation in a savings group includes both tangible economic benefits and intangible social benefits. South Africa, for example, has the most developed formal banking sector in sub-Saharan Africa, where 63% of the country has access to formal banking as of 2011. Yet, surveys have shown that nearly 90% of members that save primarily through informal mechanisms *also have a formal savings account*. These members choose to participate in an informal savings group, because the social structure it provides creates benefit that cannot be realized by saving at a bank (Invested Development, 2012). The social and societal aspects of informal savings groups are indeed of greatest importance as they provide a platform for mutual assistance, emergency aid and social networking. Tontines work because of the social capital they accumulate and the social control than ensures compliance among the members.

Nigeria: A federation-cum-trade union of informal workers

The Federation of Informal Workers' Organizations of Nigeria (FIWON) was launched in 2010 in Abuja by 24 organizations of informal workers drawn from eleven Nigerian federal states. Since then, FIWON has evolved as a common platform to share problems, solutions and aspirations of millions of working people, providing an important democratic space for workers in in the informal economy.

According to latest estimates Nigeria's informal economy employs 92.9 per cent of the country's labour force (90.8 per cent men, 95.1 per cent women) and contributes close to 60 per cent to the country's GDP. Informal employment is distributed as follows: agriculture (52.7 per cent), industry (6.9 per cent) and services (39.4 per cent) (ILO, 2018).

Despite constituting the vast majority of Nigeria's labour force, informal economy workers are absent from decision making processes and often subject to policy inconsistency and arbitrariness. FIWON considers that the informal economy includes self-employed workers, contributing family members and those moving from one form of jobs or location to another; it also includes some of those who are engaged in new flexible work arrangements, and who find themselves at the periphery of the core enterprise or at the lowest end of the production chain. The complaints expressed by informal workers include: arbitrary taxation, absence of social protection, poor access to the services of the formal financial institutions, poor occupational health and safety awareness and the consequent lack of the most rudimentary personal protection at work, lack of well-structured technical training and retraining in new production processes and technologies, lack of access to work-spaces with basic infrastructures among others (The Federation of Informal Workers' Organizations of Nigeria, 2015).

FIWON serves as a platform of advocacy and representation for informal workers, and as a provider of services meant to ameliorate the working and living conditions in the informal economy, namely:

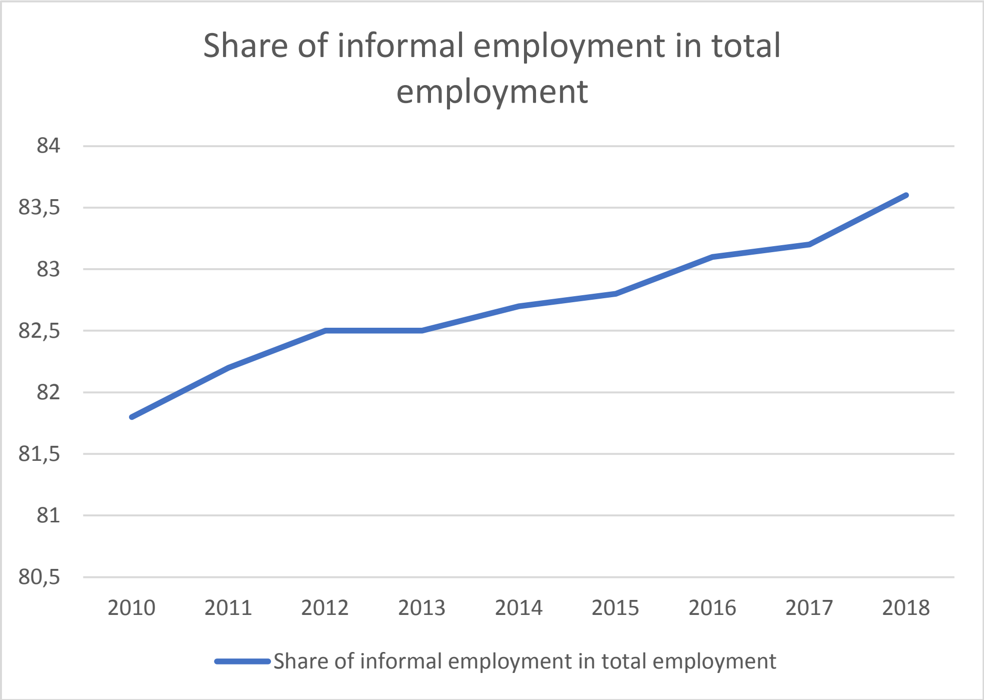
- *Civic and trade union education* to raise awareness about the rights and obligations of informal workers;
- *Leadership education;*
- *Organizing informal economy workers*: FIWON organizes informal workers across 28 sectors and sub-sectors of the informal economy;
- *Leading campaigns*, such as the campaign against demolition of informal housing in Abuja, July 2012, the campaign for social protection of informal workers with a Bill presented to the National Assembly, campaign against the ban of okada (motor-cycle taxis) on Lagos in the inner-city routes, etc.;
- *The FIWON directory*, an on-line database of FIWON members;
- *The FIWON Marketplace*: to enable informal businesses to market their products online;
- *FIWON Financial Services*, a program of mobile financial services to facilitate savings, loans, health insurance, pensions, mortgage, etc.; and
- *FIWON Legal Services* to provide legal assistance to informal economy workers.

FIWON has collaborated with the FES Nigeria Office since 2010 with a view to "helping FIWON affiliates set in motion processes for making necessary changes in their organizations in order to transform them into genuine democratic workers' organizations capable of representing their members more qualitatively" (Friedrich-Ebert-Stiftung, 2016).

Kenya: A national alliance of street vendors

Kenya's informal sector is by far the country's largest employer; in 2018, the informal sector created 762,200 new jobs, about ten times more than those created in the formal economy (Kenya National Bureau of Statistics, 2019). The majority of job opportunities in the informal economy are related to wholesale and retail trade. The share of informal employment (excluding small-scale agriculture) in total employment has been growing slowly, but steadily over the years. In absolute terms the number of Kenyans engaged in the informal economy grew from 9,327,100 in 2010 to 14,865,900 in 2018.

Figure 4. Kenya: Share of informal employment in total employment



Source: Kenya National Bureau of Statistics, 2019.

It is in this context that the Kenya National Alliance of Street Vendors and Informal Traders KENASVIT was formed. KENASVIT is a network of micro and small enterprises in Kenya operating in four sectors: manufacturing, agri-business, trade and services. The organization was initiated by a study conducted between 2002 and 2004 by the Institute for Development Studies (IDS) of the University of Nairobi. The study identified the need for street vendors and informal traders to form a member-based, professionally managed organization as a platform to enhance their bargaining power vis-à-vis an array of stakeholders including the government, local authorities, and development partners.

KENASVIT was informally set up in 2002 and was registered in 2006 under the Societies' Act of 1968. The organization represents an estimated 400,000 Informal entrepreneurs grouped in 16 chapters and urban alliances. The alliances' head office is located in Nakuru town.

KENASVIT is concerned by the constant harassment and victimisation of informal economy operators by the local and municipal authorities. In some cases, informal economy traders were subjected to punitive taxation. Moreover, poor market conditions and episodes of sexual harassment by the local authorities are issues of daily concern to the traders (Otieno, 2018).

The Alliance provides its members with various services, such as:

- *Organizing:* KENASVIT has created a network of grassroots community-based organizations of traders and links them to a local urban alliance at the town level. These local alliances form networks at the national level through affiliation to the national umbrella organization.
- *Capacity building and training*: The Alliance provides knowledge and skills training critical for street vendors and informal traders, including. For example, negotiation and leadership skills, information about the National Health Insurance Programme, as well as women's rights under the Kenyan Constitution.
- *Policy advocacy*: The Alliance maintains a regular dialogue with government authorities, and advances policies at the local, county, and national levels to promote both the rights and responsibilities of informal traders.
- Economic enhancement and access to credit: Initiated in 2008 after the post-election violence, the KENSVIT revolving loan fund programme provide affordable access to credit in case of special circumstances such as weddings, illness or funerals.
- *Inclusion and leadership of marginalized groups:* KENASVIT opposes discrimination and stigmatization of marginalised groups, particularly women, people with disabilities, youth, and people living with HIV/AIDS. These marginalised communities are represented in KENASVIT's local and national governance structures.

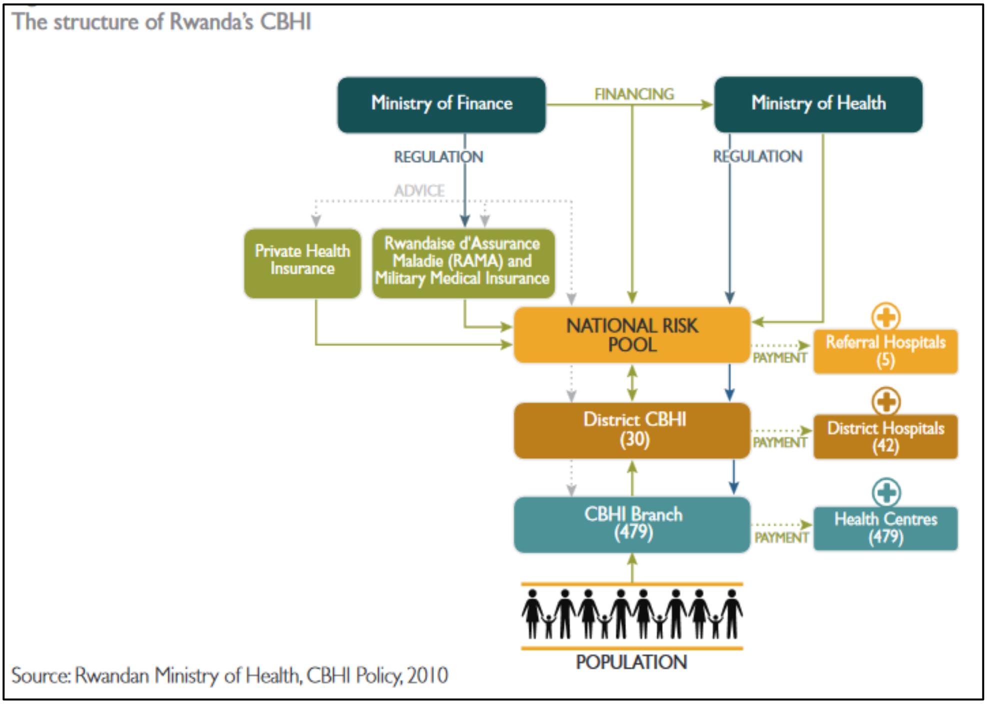
KENASVIT is not a trade union and is not affiliated with the Central Organization of Trade Unions of Kenya (COTU(K)), but would wish to establish closer links with the trade union movement.

Rwanda: Health insurance for informal economy workers

Rwanda's labour market is experiencing a structural transformation with a declining share of agriculture and a steady growth of the service sector. However, agriculture still employs 77% of the Rwandan labour force. The country has a high labour force participation rate (83%) as well as a high proportion of "working poor". The informal economy employs 91 per cent of the labour force in 2017 and contributes 46 per cent to the country's GDP (Danish Trade Union Council for International Development and Cooperation, 2018).

Rwanda has been recognized as having the most successful community-based health insurance (CBHI) scheme in sub-Saharan Africa and, indeed, one of the most successful in the world. In a few years the country went from having 7 percent of the informal sector population covered to 74 percent in 2013 (Kalisa I, 2015). The scheme is based on so-called m*utuelles de santé* (mutual benefit societies).

Figure 5. The Structure of Rwanda's health insurance system



CBHI is much debated as a way to tackle the challenge of providing access to health care for the poor in developing countries without worsening their economic situation. Proponents argue that CBHI schemes can be effective for reaching a large number of poor people who would otherwise have no financial protection against the cost of illness, especially in countries where national insurance schemes do not exist and/or where public health care funding is insufficient. They also maintain that schemes consider the views of the poor, who can be involved in decision-making. Opponents argue, however, that the risk pool is often too small; that adverse selection problems arise; that the schemes are heavily dependent on subsidies; that financial and managerial difficulties arise; and that the overall sustainability is not assured.

To address these shortcomings Rwanda has developed a scheme that is based on a strong partnership between the government and the communities who are highly involved in its oversight[77]. It has different levels of shared risk pools, subsidizes the poor, aims at minimising adverse selection, works hard to establish and maintain good financial and management systems, and is committed to sustainability.

CBHI beneficiaries are entitled to healthcare services provided at each level of the *public* health care delivery system (excluding private health care facilities): local health centres, district hospitals and national referral hospitals.

[77] To a much greater extent than the Tanzanian community health funds; the strong involvement of local communities has been singled out as one of the determining success factor of Rwanda's CBHI.

CBHI members are grouped by the communities themselves into three categories:

Categories of CBHI membership			
Group	**Description**	**Percentage of CBHI membership (2014)**	**Annual premium to CBHI**
Category 1	Very poor, no assets	27.2%	\$2.76
Category 2	Middle class	77.5%	\$4.14
Category 3	"Rich"	0.3%	\$9.65

The CBHI is a contributory scheme as shown above, but for category 1 members the premium is fully subsidized by the State. In addition to the annual premium, patients pay a flat fee of 200 Rwandan Francs (\$0.3) and 10% of hospital expenditures for each visit to the health centre. Again, the co-payment is fully subsidized by the State for category 1 members (Kalisa I, 2015).

The expansion of the CBHI scheme was accompanied by a massive growth in the number of medical personnel: Rwanda is divided up into 14 837 Villages, and each village has *three* Community Health Workers. They are community members who volunteer to be trained through a government program intended to ensure nobody develops any symptoms of illness[78] (Answer to Witchcraft in Rwanda: 45,000 Unpaid Community Health Workers, 2017).

The CBHI operates alongside the formal social security insurance run by the Rwanda Social Security Board (RSSB), which is compulsory for workers in the formal sector (11% of the labour force). One can therefore assume that 91 per cent of the Rwandan population is currently covered by health insurance (74% CBHI, 11% RSSB and 6% other private or semi-public insurance companies); this is the highest rate of health insurance coverage on the African continent.

The success of the CBHI can be attributed to the complementarity between a decentralized, participatory, community-based health financing and delivery system, and a centralized structure with professional oversight and central risk pooling. However, the scheme is still very donor-dependent since 50% of Rwanda's government resources are contributed by development partners.

India: A better deal for street vendors

Globalization necessitated economic reforms (or "structural adjustment") in India in the 1990s that opened opportunities for a few and made livelihoods more precarious for many. Under fierce competition from multinational corporations many domestic

[78] This approach is not without criticism since one cannot expect unpaid, poorly trained health volunteers to replace professional health workers.

Indian industries were forced to shut down, causing massive layoffs of labour force. For lack of other alternatives, many laid off workers and rural migrants ended up joining the informal economy as street vendors. While street vendors have always been providing goods and services to millions, growing informalization and unabated urbanization suddenly increased their numbers in Indian cities. Even though they contribute significantly to the urban economy, street vendors face humiliation, continuous harassment, confiscation and sudden evictions. The National Association of Street Vendors of India (NASVI) played a pivotal role in making street vendors a formidable force to reckon with.

The journey of NASVI began in the mid-1990s in the State of Bihar, where two NGOs, ADITHI and the Self-Employed Women's Association (SEWA), promoted the formation of an alliance of unorganized street vendors under the name "Nidan" (a Hindi word for "solution"). Nidan soon became the National Alliance of Street Vendors of India (NASVI), and Nidan's founder was nominated the coordinator of this alliance. In 2001 NASVI successfully advocated for the formulation of a national policy on street vending, and became a member of the drafting committee, set up to formulate the policy, which was finally approved by the Indian Cabinet in January 2004[79]. The policy:

- created a legal status for street vendors;
- provide civic facilities for urban spaces identified as vending zones;
- promoted organizations of street vendors;
- created a participatory planning service that incorporates civil society, local authorities, and street vendors;
- encourage street vendors to self-regulate and self-organize; and
- promoted access to skill development programs for street vendors.

NASVI's next challenge consisted in ensuring the effective implementation of the policy in all Indian States. This struggle was greatly supported by a verdict issued by the Supreme Court of India in October 2010 stipulating that street vendors had the fundamental right to carry on their businesses under Article 19 (1) g of the Indian Constitution and directing Government to enact legislation for vendors by 30 June 2011. After a long struggle led by NASVI the President of India promulgated in February 2014 the Street Vendors (Protection of Livelihood and Regulation of Street Vending) Act, 2014[80].

The enactment of this law, perhaps the first of its kind in the world, was a resounding success for NASVI; this accomplishment can be attributed to NASCVI's associational power (the association currently represents 952 affiliate organizations with 658,129 members), its policy of exercising relentless pressure on government and law-makers through campaigns, mass demonstrations and protests, its clever use of both traditional and modern media, as well as a strong team of legal advisors (Singh & Kumar, 2016).

[79] The policy was revised in 2009 and accompanied by a model law that federal States could use to support its implementation.

[80] The law *inter alia* defines the rights and obligations of street vendors, protects them from unlawful eviction, guarantees their legal recognition, and clarifies their relationship with municipal authorities.

6.5.2 Trade unions reaching out to the informal economy

Nigeria: A Workers' Union Embracing Self-employed Tailors[81]

The National Union of Textile Garment and Tailoring Workers of Nigeria (NUTGTWN) was one of the most dominant unions in the Nigerian trade union movement in the last three decades of the twentieth century, with membership well over 75,000 workers organized in 80 Branches (factories) and 14 geographic zones. At the time, the Nigerian textile industry was a critical segment of the emerging industrial sector; the share of the textile industry in employment and value added in manufacturing were estimated at 20 and 15 per cent, respectively. At its peak in the 1980s, the textile industry employed up to 500,000 workers directly, making it the second largest employer after the government. Yet the advent of structural adjustment in the mid-1980s with its standard policies of market liberalization and economic deregulation severely affected the Nigerian garment industry. As can be seen from the chart, employment, and hence union membership, declined dramatically during the past twenty years. The union responded to this drastic loss in membership through internal reforms and, in 2008, through a constitutional amendment that opened the union's door to self-employed tailors operating in the informal economy.

Figure 6. Employment in Nigeria's Textile Industry

Source: Nigeria National Bureau of Statistics, 2017.

Self-employed tailors in Nigeria were already organized into associations, albeit with differing strength across federal states. In several states in the South West, they are

[81] This paragraph is an excerpt of a much more detailed description contained in (Bello, 2016).

quite well organized, with the Nigeria Union of Tailors being the dominant association. In Lagos, the Tailors' Association has a history of over 50 years of organizing members. These associations are organized much more like cultural and social groups, although they occasionally evolve into cooperatives.

In some states, the self-employed tailors are recruited into the union through their association (the NUT) while in others, the self-employed tailors are recruited as NUTGTWN members directly. Where the recruitment occurs through the association, the leadership of the association and the NUTGTWN is often fused with the association asserting dominance. Both the formal textile industry and the informal tailoring and garment sectors are threatened by the pressure of imports and they both have common interests calling for protection by government. The NUTGTWN leadership saw the informal sector organizing as an opportunity to strengthen union membership and increase women's participation, since most self-employed tailors are women. However, *some* concerns of informal sector garment makers are different from those of industrial workers and may include issues such as access to credit, excessive taxation, fighting harassment by government officials, etc. Consequently, the NUTGTWN has designed specialized programmes that are aimed at addressing the specific needs of the self-employed tailors and strengthen the union's organizing process.

The transformation of NUTGTWN and the addition of self-employed tailors across Nigeria have helped the union to remain powerful and vibrant. The combined strengths of industrial and self-employed workers ensure that the union remains strong in collective bargaining (as it takes part in the National Joint Industrial Negotiating Council and the National Minimum Wage Committee), defence of workers' rights, campaigns and visibility in national and international trade union activism.

There is no doubt that informal sector organizing helps to consolidate existing structures and build the collective and associational power of the union. As the union hopes for revival in the industrial sector, it must continue to build the associational power resources of the self-employed tailors through creative organizing strategies. As it builds the trade union consciousness of the self-employed tailors through education and capacity building activities, it must also further expand opportunities for inclusion through constitutional changes and recruitment of young and vibrant tailors as informal sector organizers.

Sierra Leone: Trade Unions organizing the Informal Economy

The Sierra Leone Labour Congress (SLLC) has been reaching out to workers in the informal economy since the mid-1990s to promote their welfare, so as to enjoy decent work environment, and enhance their rights so as to have the voice needed to protect their interests. Capturing the lost members in the formal sector, adding to the numerical strength of the SLLC, and widening the scope of trade union support needed to create the desired impact of collective action are only some of the numerous reasons for organizing workers in the informal economy. In 2017 the Sierra Leonian trade union movement comprised 344,390 declared members, of whom 280,856 came from the informal economy (Danish Trade Union Council for

International Development, 2017) (out of over two million Sierra Leoneans believed to work in the informal economy). These trade unions operate in various sectors such as trading, transport, agriculture, fishing, services, entertainment, etc.

The SSLC has applied complementary outreach strategies to the informal economy, including:

- *Recruitment campaigns*: As a way of ensuring full recognition and formalising the operations of organisations in the informal economy, the SLLC assisted in the registration of organisations with full trade union rights;
- *Social protection*: The SLLC has agreed in principle with the National Social Security and Insurance Trust (NASSIT) to extend social security and insurance coverage to workers in the informal economy;
- *Access to credit*: informal economy operators borrow money from many sources to start or sustain their businesses. Because of the registration of informal economy trade unions, Government as well as banks now disburse low interest rates loans to the members of those unions;
- *Representation, lobbying and social dialogue*: The SLLC has been representing and advocating for the improvement of the work environment and working conditions, tackling harassment from state authorities[82], and promoting the development of state policies that create a conducive working environment. This strategy has enhanced the faith of informal economy operators to belong to the SLLC.
- *Education, training and capacity building*: With support from international partners, the SLLC is engaged in sensitisation programmes; skills development; human rights, democracy and leadership training programmes to increase capacity of informal economy workers.
- *Financial Contribution to the SLLC*: The SLLC charges organisations in the IE minimal service fees as opposed to per member fee charged to unions operating in the formal sector.

The right to organise and belong to a trade union is guaranteed by Section 26 of the Constitution of Sierra Leone, and government has established an appropriate legal framework for the operations of unions in the informal economy (Conteh, 2016).

East Africa: The ILO SYNDICOOP Project

SYNDICOOP was an ILO-implemented project which was run in East Africa from 2002 to 2006 and aimed at improving the working and living conditions of unprotected informal economy workers through collaboration of trade unions and cooperatives. The project covered Rwanda, the United Republic of Tanzania, Uganda and Kenya. An attempt to extend the project to South Africa was unsuccessful. At international and national level, the project was governed through formal relationships between trade

[82] For example, the Government wanted to halt the operations of bike riders; following the intervention of the SLLC and dialogue with government, a national bike riders' Code of Conduct specifying the various streets and areas of operations was developed.

union and cooperative structures. At international level, partners were the International Confederation of Free Trade Unions (ICFTU, now ITUC), the International Cooperative Alliance (ICA) and the ILO.

The design of the project followed the conclusions of ILC General Discussion on the Informal Economy in 2001 and the adoption of ILO Recommendation 193 on the Promotion of Cooperatives in 2002; both documents contained references to the mutually reinforcing roles of cooperatives and trade unions in organizing the informal economy.

Assetamorwa Rwanda – A SYNDICOOP Project

The members of Assetamorwa (Association de l'Esperance des Taxis Motor au Rwanda) are motorcycle taxi drivers in Kigali. Most drivers hire motorbikes from the owners and pay rental fees. After paying the owner, the petrol, and buying food, drivers were bringing home roughly 500 Rwandan francs per day -- less than US$1. However, those that owned their own bikes earned US$2 or US$3 per day. Other issues concerned crime: people can be injured or murdered for their bikes and suffer personal injuries, which are easy to sustain due to long working hours on poor roads. Nearly 85 per cent of motorcycle taxis in Kigali run on adulterated petrol. The resulting pollution poses serious health hazards to drivers, apart from damage to engines. A further obstacle faced by drivers can be the actions of the traffic police, who can determine where the drivers ply their trade and who can, or cannot, have a permit.

The drivers created Assetamorwa in 1994 in response to these problems. SYNDICOOP provided additional loan funds to expand services. The organization is registered as a trade union and affiliated with CESTRAR, the national trade union centre. The services the organization provides include:

- A savings and credit cooperative, which enables drivers to access long- and short-term loans as a proportion of the shares they own. Assetamorwa had been able to help 57 members to buy motorcycles at the time of a visit in 2005.
- Provision of equipment and uniforms for the drivers. All drivers wear a yellow tunic, so as to recognize fellow members and assist each other.
- "Auto Ecole" driving school, where students could learn their "trade" in courses such as the Highway Code and basic mechanics. *The graduates of this school are readily accepted by the authorities and given an operating licence*.
- A garage and spare parts depot that supplies better quality fuel and cheaper spare parts.
- “Collective bargaining” -- with the traffic police. This helps improve the drivers’ livelihoods by allowing them to wait for customers at certain places.

Assetamorwa has the characteristics of both a trade union and a cooperative. It provides many services to members that a trade union would not normally provide. It is affiliated to CESTRAR and so accepted as a trade union, but is also a federation of cooperatives, comprising 18 primary cooperatives and 2500 members with driving licences. Assetamorwa, founded in 1994 (long before the SYNDICOOP project began) became a cooperative federation registered under the name FERWACOTAMO in 2008.

In Uganda, it was estimated that SYNDICOOP helped establishing ten groups with 3,000 members. Rwanda developed between five to ten groups, with 2,500 members. Other groups were much smaller in Tanzania and Kenya, where less data was available, the average size of each group was around 50 to 60. It is possible that SYNDICOOP reached about 7,000 workers organized into cooperatives or trade unions. Most of these groups were some type of savings and credit cooperative (SACCOs). SYNDICOOP operated only in the urban informal economy and most groups involved market traders or small traders. They borrowed money through the SACCO to build up their business. The individuals no doubt benefited enormously and would have had some extra training and some association with a trade union, but otherwise, they could have been assisted by any mainstream microfinance programme.

An ex-post review (Smith, 2012) of the SYNDICOOP experience concluded that “in East Africa, the project served as a catalyst for the formation of a number of groups which improved or supported the livelihoods of several thousand individuals. However, it is not clear whether the project has been successful in resetting the general relationship between trade unions and cooperatives at the conceptual organizational level.” Moreover, the review stated that “SYNDICOOP, with its emphasis on the informal economy, was perhaps not a suitable vehicle for a comprehensive or systematic dialogue between cooperatives and trade unions. At most levels, the distance between them is so great that a good deal more preparatory work is necessary. It represents an unfinished and incomplete model.” One could argue that SYNDICOOP came about a decade too early, at a time when the East African trade unions were not ready to open to the informal economy.

6.5.3 Protest actions by informal economy associations: Country-specific examples

The power of building trade union – informal economy alliance-building was demonstrated in September 2016 by the largest general strike that India ever saw. According to union count, 180 million workers, both from the formal and informal economy, stayed home to demand a general minimum wage, the extension of social protection to all, and a reform of India’s labour laws. Those changes would have the greatest effect on those who toil in India’s vast informal economy, which by some measures includes 90% of the workforce, but lack health benefits, pensions and basic labour protections, including the ability to organize. Although these workers are not represented by conventional trade unions, their struggles have been adopted by public-sector unions seeking to expand their political base and raise pressure on the government (Los Angeles Times, 2016).

In Tbilisi, Georgia, about one thousand minibus drivers organized in the Georgian Motor Transport and Motorway Workers Union (MTMWETU) staged repeated protests and threatened strike action to demand a reform of the minibus traffic system which at the time was monopolized by “route owners”. In 2010 the Tbilisi Branch of the MTMWETU succeeded in signing collective agreements with four transport companies which de facto eliminated these route owners (Budlender, 20013).

In Johannesburg, South Africa, the Mayor decided in 2013 to evict street vendors in an operation called "clean sweep". Two organizations of street vendors referred the matter to the Constitutional Court of South Africa, where it was ruled, on 5 December 2013, that the Municipality had to allow the evicted street vendors and informal traders to return to their places of work. Similarly, after the 2010 FIFA World Cup, street vendors and informal traders in the South African city of Durban, who had been evicted with the promise that they would be able to return to their sites after the World Cup, found that they had been permanently removed and their sites had been earmarked for new developments. In response, the informal traders formed the Ubumbano Traders' Alliance, which comprised both street committees and organizations of informal traders, in November 2011. The alliance was recognized by the city management and took part in the design of an informal economy policy for the Durban municipality (Horn, 2014).

In March 2015, the leaders of five waste pickers cooperatives operating in Buenos Aires, Argentina, staged a hunger strike to demand fairer treatment by the city council that appeared to favour commercial waste removal companies which, however, did not perform any recycling (Federación Argentina de Cartoneros y Recicladores (FACyR), n.d.).

In October 2016 domestic workers from Ekhuruleni, South Africa, took their fight for better working conditions to the streets, demanding to be paid overtime, maternity leave, unemployment insurance benefits and, above all, the effective enforcement of labour laws (Komane, 2016).

Many South Korea's public schools employ so-called "irregular" (unofficial, unprotected and highly discriminated) workers who serve school lunches, run school libraries, aid science labs, assist disabled students, teach physical education, run after-school programs and perform administrative functions. As from 2011 these workers have formed four trade unions which organized massive strikes in November 2012 calling for legislation to regularize their status as public-sector education workers, the introduction of a pay scale and direct employment under the Education Commissioner. These strikes paved the way for some minimal improvements in the working conditions of the "irregular" education workers (Irregular Education Support Worker Engage in First Ever Strike at Korean Public Schools, n.d.).

The above examples further underline the importance of organizing the informal economy, because no strike action is possible without an organization driving it.

6.5.4 Global: Trade unions building alliances with informal economy organizations

In Uganda, in 2014, the Amalgamated Transport and General Workers Union (ATGWU) entered into a partnership with the Kampala Metropolitan Boda-Boda Association – KAMBA, which has 38,000 members. Through the inclusion of informal economy operators, the ATGWU currently has 60,000 members including a large number of informal transport workers, such as minibus taxi drivers, taxicab drivers and "boda-boda" (motor-cycle) drivers (Herberg, 2018).

In the Canadian province of Quebec, the longstanding, intense interaction between trade unions and social economy organizations has led to a high penetration rate of both movements (Poirier, 2010). The National Trade Union Congress of Singapore has established ten social enterprises and cooperatives, including the country's largest supermarket chain.

In Senegal the transport workers' trade unions (CNTS and CNTS FC) are actively involved in the design and implementation of a social health insurance scheme that aims to cover all transport workers and their families (some 400,000 people), including those working in the informal economy. In addition, the National Commission on Social Dialogue has actively engaged in developing a strategy to address the extension of social security to informal economy workers (ILO, 2013).

In Kenya, there are eleven umbrella associations representing more than 600 informal workers' groups in the country. Several of those collaborate with the Kenyan Central Organization of Trade Unions (COTU (K)) even though not yet affiliated (Danish Trade Union Council for International Development Cooperation, 2014). The Ghanaian Union of Informal Workers Associations (UNIWA) is the country's first national trade union for workers in the informal economy. It was established in 2013 and is affiliated with the Trade Unions Congress of Ghana. UNIWA represents 14 informal workers' associations with approximately 79,000 affiliated trade union members from the informal economy in 2016 (Danish Trade Union Council for International Development, 2016). In Zimbabwe, a group of 22 informal business associations came together in 2002 to form the Zimbabwe Chamber of Informal Economy Associations (ZCIEA), which comprises 150 member-associations grouped into 45 chapters. ZCIEA operates as a "third force", complementing the employer organization EMPCOZ and the trade union federation ZCTU (Danish Trade Union Council for International Development, 2015). A newly launched trade union grouping in South Africa formed in April 2017 – the South African Federation of Trade Unions (SAFTU) – promises to act as a voice for the growing numbers of unorganised and marginalised workers in the country and incorporates the South African Informal Traders Alliance. SAFTU, a break-away federation from the country's largest trade union COSATU, was designed right from the start as an umbrella for both formal and informal workers (The Conversation, 2017). The Malawi Union for the Informal Sector (MUFIS) was initiated in 2000 and officially registered in 2004. As of 2012, MUFIS had approximately 14,550 members, who work in the several informal occupations: home-based workers, street vendors, waste pickers, construction workers, domestic workers and small-scale tea farmers. MUFIS is an affiliate of the Malawi Congress of Trade Unions (MCTU) (WIEGO, 2017). In addition to those cases, the trade union federations of Benin, Mozambique, Nigeria, Tanzania, Sierra Leone, Togo, Uganda, Zambia among others have accepted various informal economy associations as their members (Schurman & Eaton, 2012).

At the international level, trade unions, informal economy organizations and civil society groups frequently form coalitions to pursue a specific agenda. Following the 2002 ILC General Discussion on the informal economy several trade unions, peasant organizations and global advocacy groups formed the (now defunct) International Coordinating Committee on Organizing in the Informal Economy (ICC). The IUF[83], a

[83] International Union of Food, Agricultural, Hotel, Restaurant, Catering, Tobacco and Allied Workers' Associations

Global Union Federations, closely cooperated with SEWA in leading a campaign that resulted in the adoption of the Domestic Workers' Convention C189.

6.6 Conclusions

The present paper sought to emphasize the importance of organization building in the informal economy. There is ample evidence that informal economy organizations do already exist everywhere, in all economic sectors, and in diverse forms and manifestations. The informal economy is organized, but its organizations are often not recognized and have no seat at the table where laws and policies affecting them are negotiated. There are different types of informal economy organizations, which may pursue economic, social, societal, political or cultural goals (and often several of them simultaneously), may be formally registered or exist "de facto" only, and may be local, sectoral, regional or national in nature. It appears that organizations providing economic services to members (such as credit unions, or the ACCZ Congo, or Assetamorwa Rwanda) enjoy greater longevity and stability since they generate their own income while providing their members with tangible benefits.

Trade unions in sub-Saharan Africa are embracing the informal economy, using diverse strategies: some recruit new members among the informal economy workers; some open existing, formal sector unions to the informal economy; some promote dedicated informal economy trade unions; and others build alliances with informal economy associations and cooperatives. In doing so the African trade unions can overcome the dichotomy between "formal" and "informal" and significantly enhance their numerical strength, visibility and relevance, as well as their associational and bargaining power for the benefit of both: the formal, salaried wage earners, and the informal, precarious own-account workers.

However, to achieve the goal of organizing the informal economy trade unions must overcome several obstacles:

- Informal economy workers face problems and pursue goals that are quite different from those of workers in the formal sector; trade unions must find ways to satisfy the needs of both groups.
- Unlike those in the formal sector, informal economy workers do not bargain with an employer but with a variety of local and national authorities, as well as with the private sector. Trade unions must adapt their collective bargaining strategies to the nature of these different partners.
- When a trade union opens to the informal economy it could lose its identity, gradually morphing into an informal economy body and dropping its traditional function. To counter this risk trade unions must find ways to harmonize both functions: remain engaged in collective bargaining on behalf of their formal economy members and develop new lines of action in support of their informal economy members.
- In the same vein, workers in the formal sector may react with suspicion to the trade union's outreach to the informal economy, because they may fear that

their concerns are watered down by those of the informal economy. Trade unions must be able to convincingly demonstrate that the amount of *common* interests shared by formal and the informal economy workers is greater than the amount of interests the two groups are pursuing separately.

- Informal economy workers may not be able to pay full membership fees, or to pay those on a regular basis. Trade unions must adjust their internal rules and regulations to the capacity of informal economy workers. Moreover, the check-off system applied to collect fees from wage-earning members cannot be applied to informal economy workers. Their fees must be paid/collected individually.

Moreover, people in the informal economy should not be seen as passive targets awaiting the rescuing hand of trade unions. Attempts at organizing across the formal–informal 'divide' should be assessed not merely from the vantage point of 'trade union renewal', but also from the perspective of informal actors. The latter, just like trade unions, have their own reasons to engage in, disengage from or avoid close relationships with trade unions (Idell, 2010).

Governments must create the framework conditions for allowing the informal economy to organize; they must guarantee the freedom of association for all, including those in the informal economy. They must adopt policies and laws that recognize and protect informal economy organizations and their members; and they must establish national and sectoral social dialogue structures and processes to the representatives of the informal economy.

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Chapter 7

Smart agricultural practices SEWA's Approach to tackling Agricultural Vulnerability of Smallholder Farmers

Reema Nanavati and Mansi Shah[84]

The informal economy accounts for more than 90% of India's work-force. India is largely an agrarian country and over 60% of its total workforce is mostly engaged in informal work in agriculture and allied trades. The majority of farmers in India are small and marginal landowners, who are resource-poor. Women are the backbone of such small and marginal farm-holder families and, since they typically put the family before themselves, they are the worst affected during crises.

Additionally, unlike other emerging economies, India is facing the challenge of a growing young generation of workers – especially in rural areas and the informal sector. The profile of these young workers is different from that of the older generation. Although these young workers lack the necessary skill-set and technical knowhow to get modern tech-savvy off-farm jobs in the urban areas, they do have a strong affinity to technology.

Having grown-up in rural areas where agriculture, animal husbandry and allied trades are the major employment areas, these workers already have basic skills in these trades. However, lack of exposure to, awareness of and affordable access to modern technology-based smart agriculture prevents them from making their farming activities sustainable, viable and profitable.

The present chapter aims to present the challenges in agriculture faced by over two hundred thousand smallholder farmers, members of Self-Employed Women's Association (SEWA), and SEWA's various agro-smart initiatives to tackle these challenges, thus improving the livelihoods and lives of its members.

7.1 Challenges in Agriculture

Agriculture has been one of the most prominent sectors of Indian economy since independence. Although contribution of agriculture and allied activities, like forestry, logging and fishing, to GDP declined from 35% in 1980's to around 18% in 2006-2007, still almost 60% of the population, mostly in rural India, continues to depend upon it for their livelihood (73% of India's rural employment is through agriculture as per the August 2007 Report of the National Commission for Enterprises in the Unorganized Sector (NCEUS) on Conditions of Work and Promotion of Livelihood in the Unorganized Sector).

[84] We are also thankful to brother David Kucera and brother Frederic Lapeyre from ILO for their continued guidance, encouragement, and support throughout the research process. We would like to record our appreciation of Prof. Rosanna De Galli for her thought-provoking ideas and inputs in conceptualizing this research. Last but not the least, we would like to thank Ms. Rasha Omar (IFAD), Mr. Konda (FAO) and Mr. Karthik Laxman (Independent researcher) for their very meaningful comments and suggestions that greatly improved the manuscript.

Table 1. Asia Indicators of Structural Transformation, 2015

No	Country	Share in Employment %	Share in GDP %	Average Productivity
1	China	35	10	0.29
2	Korea	7	2	0.29
3	Thailand	39	12	0.31
4	India	47	18	0.39
5	Indonesia	39	14	0.36
6	Pakistan	45	25	0.56
7	Malaysia	13	10	0.77

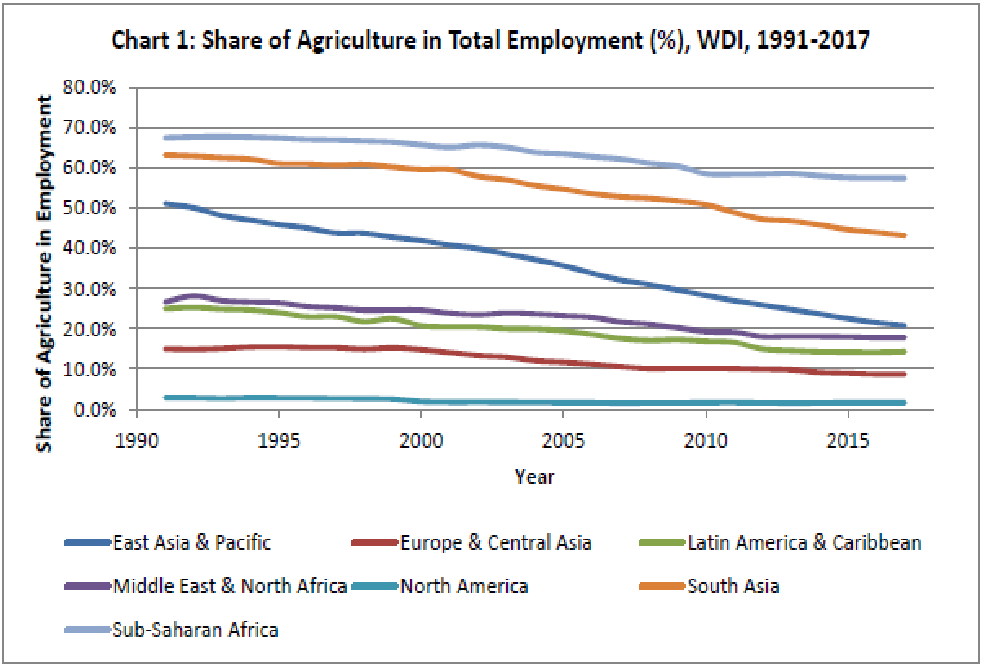
Source: Binswanger-Mkhize, H.P. (2012).

The Lewis model of economic development stated that there was a substantial difference in the average per worker productivity levels in agriculture and non-agriculture sectors. This provides a powerful impetus for industrialization. However, due to pre-mature de-industrialization in India and other countries of Global South, the shift of surplus labour from Agriculture to non-agriculture sector has slowed down. Table-1 shows the same in context of Asian countries[85].

One consequence of this process of "delayed structural transformation" is the accelerating difference in labour productivity in agriculture and non-agriculture sectors (Binswanger, 2012). It also leads to an increase in the demographic pressure on land, falling land-man ratios and a proliferation of small and marginal size landholdings (landholding size equal to or less than 2 hectares).

The following chart shows that, while there has been a decline in the workforce engaged in agriculture in various regions world over, agriculture still accounts for about 40-50% of the workforce in both South Asia and Sub-Saharan Africa regions. The share of agriculture in the workforce is markedly lower in all other regions (Chart 1).

[85] Source: World Development Indicators, www.worldbank.org



Source: World Development Indicators, www.worldbank.org

It is estimated that out of the 475 million smallholder farmers in the world in 2010, nearly 80 per cent were in Asia, with China (35%) and India (24%) together accounting for more than half of the total (FAO, 2016). Smallholder farmers constitute over 85 per cent of the total farmers in India; they operate about 45 per cent of the net sown area and produce at least half of India's food (Agriculture Census, 2011).

Table 2. Size Distribution of Landholdings in India, 2010 – 11

		No of Holdiings (000)		Area under Holdings (000 ha)		Average Size of Holding (Ha)
1	Marginal (<= 1 ha)	92826	67%	35908	22%	0.39
2	Small (1-2 ha_	24779	18%	35244	22%	1.42
	Total Smallholders (<= 2 ha)	**117605**	**85%**	**71152**	**45%**	**0.61**
3	Semi-Medium (2-4 ha)	13896	10%	37705	24%	2.71
4	Medium (4-10 ha)	5875	4%	33828	21%	5.76
5	Large (<10 ha)	973	1%	16907	11%	17.38
	Total	**138349**	**100%**	**159592**	**100%**	**1.15**

Source: Agriculture Census, 2011

Though many studies have shown that small holdings are more efficient in terms of resource utilization compared to larger sized holdings (Chand, et.al. 2011), smaller holdings require a lot of support to remain viable.

India's agricultural production has more than tripled between 1960 and 2015. However, in order to double the income of farmers by 2022, the total number of cultivators needs to decline by 2.4% every year. According to NSSO, the number of cultivators declined from 166.1 million during 2004-05 to 146.2 million during 2011-12. This number needs to fall further to 119.5 million by 2022.

However, this increased agricultural production has led to a significant expansion in the use of land, with the net sown area increasing from 91.5 million hectares in 1928 to 141 million hectares in 2017, in addition to water and other natural resources for agricultural purposes, putting enormous strain on the natural resource base of the economy (land, water and biomass) and is proven to be unsustainable in the long run (FAO, 2017).

Assessments and studies (Vijayshankar et.al. 2011) indicate that nearly 50% of India is facing problems of either quantitative depletion of groundwater or qualitative decline or both. There have also been several studies showing high land degradation, decline in soil organic matter levels and loss of soil fertility. As food grain production increased over time, the number of elements deficient in Indian soils increased from one (N) in 1950 to nine (N, P, K and micro-nutrients) in 2005–2006.

It is clear, therefore, that the Green Revolution pathway cannot be adopted for raising productivity of smallholder farmers. The alternative path of development must take Techno-Agro-Ecology at its core.

The impact of climate change is also becoming increasingly visible on the global temperatures, rainfall patterns and thereby on water security. In many parts of India, climate itself is a source of great vulnerability in Indian agriculture. The late onset and early withdrawal of monsoon as well as "gaps" (long spells of dry period without rain) in the rainy season are known sources of vulnerability. It has also led to rise in extreme climate events, high rainfall/floods as well as deficient rainfall/droughts. Climate change related events and conditions also include price shocks that can be linked to lower agricultural production; natural disasters that destroy poor people's assets; and health shocks that worsen with changed climate conditions (World Bank 2016).

Another big source of risk for the smallholder farmers is the market. While smallholder farmers are efficient producers, they face major problems accessing organized markets. These include "low volumes of produce to sell, variable quality, seasonality and limited storage, high transactions costs, poor market information and contacts, and limited ability to meet the high credence requirements of many high value outlets" (Hazell, 2011). Additionally, smallholder farmers usually operate in situations where commodity, credit and input markets are closely interlinked and often function in a highly exploitative manner (Bardhan, 1989; Bhaduri, 1983). Even when they have surplus to sell, they may be forced to exchange that with the trader-moneylender as repayment of loans taken at usurious rates of interest. Exposure to global markets has also resulted in price movements unrelated to national or local conditions, thus making it difficult for small farmers to anticipate market conditions.

The issues and challenges discussed above indicate that unfavourable market conditions, high climate risks and rising cost of cultivation together seem to be adversely affecting the growth in real farm incomes. This increases the vulnerability of smallholder farmers in particular. A recent study showed that the growth rate of real income per farmer was 7.46% per annum between 2004/05 and 2011/12. However, between 2011/12 and 2015/16, it rapidly declined to only 0.44% (NITI Ayog, 2017).

Workers in Indian agriculture comprise of cultivators (non-waged smallholder farmers, unpaid family helpers, tenants, sharecroppers) and agricultural labourers (waged permanent workers, casual seasonal and temporary workers, casual migrant workers)[86]. The line between them has been thinning over the years with the number of agricultural landholdings increasing from 71 million in 1970 to 120 million in 2000-01 and 138 million in 2010 (Agricultural Census report[87]) which has led to a decline in average landholding size from 2.28 ha in 1970-71 to 1.33 ha in 2000-01 and further to 1.15 ha in 2010-11. Many cultivators who operate small landholdings also work as agricultural labourers.

While the aforesaid challenges hold true for these agricultural labourers, they also face many other problems like irregularity of work, lowest and unequal wages (based on season, gender etc.), lack of social security, unskilled labour force, lack of employment opportunities, lack of skill development, degradation of the soil and other natural resources, lack of access to direct market and no income and food security despite working for long hours.

Structural changes in agriculture over time, such as decreasing landholding size, changing technology, men's out-migration and increased incidence of women farm management, changing nature of contracts towards tenancy, contract farming, corporate farming, increased volatility of agricultural prices and, lastly, climate change, are all bound to have effects on demand for agricultural labour, wages and hence overall income security.

When it comes to women's employment in India, the above grim picture becomes even more pronounced since the contribution of agriculture to women's employment is the highest in India with a greater part of the women's workforce (approx. 80%) in rural India employed in agriculture. Apart from the specific effects on agricultural workers discussed above, climate change has independent effects on time use of women in water and firewood collection and on their health.

7.2 Introduction to SEWA

The Self-Employed Women's Association (SEWA) is a trade union of poor self-employed women workers from the informal sector. With a membership base of over 1.5 million women workers, SEWA has spread it wings in 16 states of India as well as

[86] These categorizations are fluid, with a worker falling in more than one category. Permanent workers form less than 5% of agricultural employment in India (National Sample Surveys)

[87] http://agcensus.nic.in/document/analysis01natasg.htm

in neighbouring countries like Nepal, Pakistan, Sri Lanka, Myanmar and Afghanistan. Approximately 663,632 members are from the agriculture sector.

SEWA's main objectives are full-employment – i.e. food-security, income-security, work security and social security – and self-reliance, which encompasses healthcare, child-care and shelter. With Gandhian philosophy at the core of its activities and initiatives, SEWA has been working for almost 5 decades with its rural members to help them improve their livelihood through various initiatives in fields including, but not limited to, advanced technology, technical training, microfinance, market linkages, natural resource management, etc. across number of trades.

7.2.1 SEWA's experience with small farmers

From SEWA's experience from working with over 630 thousand smallholder farmers across 14 states of India for over 45 years, a general cash-flow scenario of a typical smallholder farmer having a landholding of 1 Acre for 1 cropping season is as shown in the table below.

Table 3. Typical smallholder farmer activities

Month	Activity/Description	Income (USD)	Expense (USD)
April	**Arranging Finances for the Season**		
	Seed Money (from personal saving)	27	
	Crop Loan taken at 4% interest rate	400	
	Crop Insurance premium		40
	Rainfall insurance premium (PMFBY)		20
	Soil preparation and Sowing		
	Cow-dung manure		54
	Deep Ploughing		26
	Rotovator		14
	Making V-groves		7
June	Sowing		6
	Fertilizers		
	DAP		24
	Urea		9
	FoS		12
	Zinc		5
	Seeds		
	Loose Seeds (3 bags @ 450 gm each)		22
	Intercrop planting labour charge		3
Jul – Oct	Weedicides		16
	Intercrop Weeding Labour charge		11

Month	Activity/Description	Income (USD)	Expense (USD)
	Irrigation		
	Cycles of Irrigation		28
	Electricity		27
	Pesticides		
	Medicines		20
	Labour		32
Nov-Dec	**Harvesting**		
	Labour		64
	Refreshment		4
	Transportation		4
	Total Expense		448
	Total Harvest per acre (in kg)	800	
	Cost/kg (for cotton crop)	0.75	
	Income per Acre	600	
	Loan repayment with Interest		416
	Gross Income (A)	1027	
	Expenses (B)		864
	Profit/Acre (A)-(B)	**163**	

Source: SEWA

The above table shows how, after toiling day-in and day-out for almost 6 months, the poor smallholder farmer earns USD 163. A small farmer having access to irrigation facility, generally takes 2 crops per year, thus barely having an earning of USD 350 annually, which is hardly enough to sustain a family of 4- 5 members.

The above table is a representation of financial situation of smallholder farmers growing cotton, which is one of the most important cash crops in Gujarat. In addition to cotton, these small farmers also grow crops like wheat, millet, castor, cumin, sesame, groundnuts, sorghum, mung beans, gaur, tobacco, pulses, mustard, vegetables and rice.

Due to lack of access to finance, many farmers are unable to take a 2nd crop in a season. In such situation, Animal Husbandry, which is the next major source of employment, comes to their rescue. Most of the small farmers (over 85% of SEWA's members) rear at least 2 cattle in their home earning a net income of USD 75 per month.

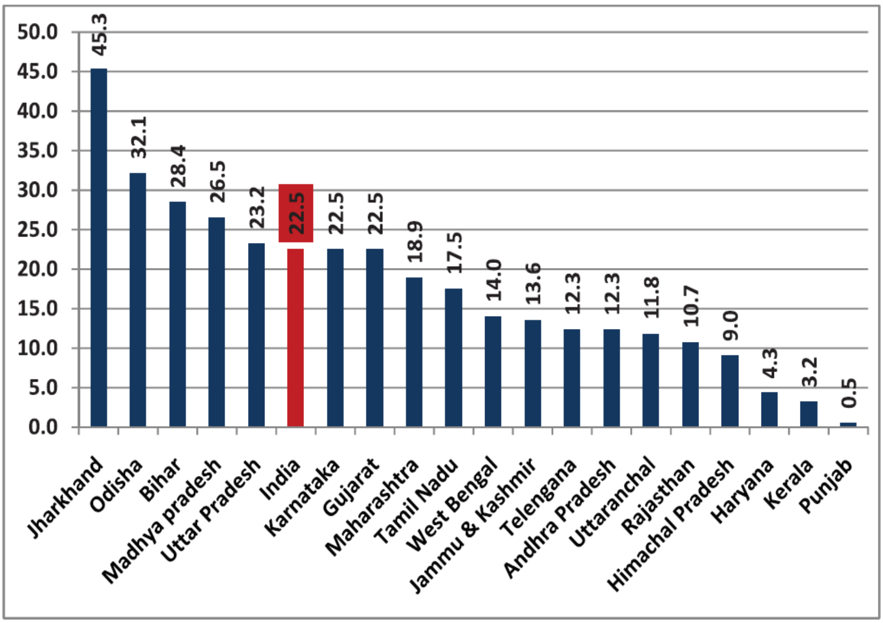
7.2.2 SEWA's agriculture campaign

Most of the SEWA members depend upon agriculture for their livelihood. They include not only small and marginal farmers, but landless agricultural sharecroppers and casual labourers as well. They are among the most vulnerable and needy groups in agriculture sector. Women are the worst affected as, in spite of contributing so much to the work, they do not have any recognition.

Small and marginal farmers need market information, linkages, and access. Moreover, they are also required to develop bargaining power to get a fair price. Currently, they are devoid of all of these. Thus, despite putting in financial investment and labour in agriculture, a small and marginal farmer in India remains hungry.

The NSSO data on Consumption Expenditure survey for year 2011-12 reveals that more than one-fifth of rural households with self-employment in agriculture as their principal occupation[88] were earning income below the poverty line.

Figure 1. Farm Households in Indian States with income below poverty line, 2011-12



Source: Estimated from unit level Consumption Expenditure Survey data 2011-12, NSSO.

SEWA has realized that the problems of a small and marginal farmer are not limited to unavailability of credit or financial services only. They face various challenges such as lack of support services such as capacity building, healthcare, market information, technical education, access to tools and equipment, organizing, and market linkages. It is the lack of these services, rather than unavailability of micro-credit, that is often responsible for the financial exclusion of a small and marginal farmer.

Especially in the recent years, some of the major challenges of the small and marginal farmers in India, becoming increasingly serious, are the frequently increasing climate shock and market shocks and the changes in the land and affiliated acts.

[88] Such households fit into the definition of farmers

The rainfall pattern is becoming more and more irregular year on year. Since most of the agriculture in India is rain-fed, poor small farmers have to continuously adapt to these changing rainfall patterns and change their cropping patterns.

Understanding this, SEWA initiated agriculture campaigns, nationally and regionally, and based on its extensive experience from working with small and marginal farmers, it etched out a working model of agriculture development for its small farmer members, which emphasizes on developing the farm as an enterprise and shifts the focus from mere subsistence to viability and profitability.

To address the dire need for resilience-building against the frequent and intense climate shocks and market shocks faced by these rural workers, the campaign focuses on developing and facilitating adoption of a climate-smart agricultural model that interweaves climate-resilient agricultural practices.

Given the grave situation of agriculture, motivating the second generation of the farmers to take up agriculture as a sustainable livelihood is one of the major challenges faced by small and marginal farmers. The profile of these young workers is completely different from their predecessors as they have a natural affinity towards modern tech-savvy jobs.

Therefore, facilitating affordable access to modern tools, equipment and techniques in agriculture would not only improve the productivity but also intrigue the youth workers, thus curbing their out-migration to urban areas in search of modern tech-savvy jobs.

7.2.3 Climate resilience practices by SEWA

At SEWA, we strongly believe that, if tactfully applied, advanced technology can not only help in improving the productivity and, thus, the profitability and viability of agriculture for the smallholder farmers, but also generate smarter and decent employment opportunities in the rural areas. Additionally, converting villages to smart villages by deploying advanced technologies in various areas in a rural setting would have several allied benefits including but not limited to:

- accessibility to information related to rural trades through mobile phones/radios, thus ensuring the workers could access it at any time without compromising their daily livelihood activities;
- creation of smart tech-savvy employment opportunities in village resulting in curbing of out-migration of rural youth in search of modern tech-savvy jobs;
- converting traditional rural jobs to smart decent jobs, hence fostering a sense of dignity in rural youth towards their traditional trades;
- preservation of traditions and culture;
- /reduction/mitigation of risks related to climate and market shocks, thus making agriculture sustainable and viable;
- increased agricultural productivity and thus ensure food security; and

- reduction in input cost and increase in output, thus leading to a rise in overall profitability of rural trades, thereby ensuring a better lifestyle and nutrition security for rural workers, etc.

However, the major setback is the awareness, accessibility and affordability of such technological advances in the rural areas, especially for the small and marginal farmers. The government of India does provide subsidies and schemes for farmers in this context time but again, due to lack of awareness regarding such schemes and programs, the small and marginal farmers are hardly able to take advantage of such programs.

Therefore, SEWA realized that in order to safeguard the farmers against climate and market shocks, there is a need to have an integrated farm planning and management package in place that includes technological interventions at multiple stages including but not limited to:

- providing access to technical trainings and agri-advisory inputs;
- establishing tools and Equipment library;
- spot and future-prices;
- offering Customized Rainfall Insurance Product;
- affordable access to farm-top renewable energy;
- access to finance and credit, market support etc.;
- incorporating digitization; and
- generating smart secondary source of employment to supplement traditional livelihoods.

The present chapter aims to explore the impact of implementing SEWA's initiatives for agro advisory services; spot and future prices advisory; customized rainfall insurance; establishing tools and equipment library; affordable access to renewable energy; and access to finance and credit, market support, etc.

7.3 Providing Voice/SMS based Agro-advisory

Agriculture in India is predominantly rain-fed; especially in case of smallholder farmers. Scientific studies on climate and meteorology focusing on India show significant increase in the variability and frequency of extreme climatic events. The increased variability of weather patterns places a huge constraint on farmer's ability to make strategic agricultural practice decisions. Agro-advisory services have played a significant role in addressing this issue for big farmers in different parts of the world.

Even in rural India, affluent big farmers have been availing such services. However, the poor smallholder farmers hardly had access to such services. They would simply follow the actions of neighbouring big farmers without understanding the logic/reasoning behind these actions. This would often lead to over application of pesticides/fertilizers, over/under irrigation, early/late sowing etc. resulting in increased input cost, reduced productivity, reduced soil fertility and in many case losses of crop – thus pushing the poor small farmer into a vicious circle of debt and poverty.

To address this challenge, SEWA in collaboration with agricultural experts and agricultural institutes designed a voice based agro-advisory system in year 2016. Since most of SEWA's members were illiterate/semiliterate, providing SMS-based agro-advisory was not expedient, thus SEWA designed this customized agro-advisory system wherein information regarding weather forecasts, the correct time to put fertilizers and pesticides

Jahuben from Sedla village in Surrendranagar district had a standing crop of wheat in her field. One night in March 2017 (a week before her planned harvest), she received agro-advisory about unseasonal rains from SEWA. Despite ridicule from her neighbours, she harvested 1400 tonnes of wheat overnight, with help of her family and stored it in her home.

As informed in the voice message, it rained heavily the next morning and most of the villagers lost their standing crops.

"I have complete faith in my SEWA. As soon as I received message from SEWA about unseasonal rain, I acted and saved my crop. Thanks to the voice message, we sold our harvest, paid off our debts and made good profit. These agro-advisory messages are like boon for us. Now all the fellow villagers have subscribed to this service."… says Jahuben

on the crops, the prices of these products and various other information required by the farmers to make a sound judgment, was provided daily in pre-recorded voice. The pilot of the service was rolled out with 200 registered small farmers in Bayad district, Gujarat.

Some of the key benefits of the pilot are as below:

- Daily weather forecast information helped farmers take informed decisions about application of fertilizer/pesticides, thus reducing wastage and saving in cost of fertilizer/pesticide as well as labour.
- Information about viral pest infestation in the area alerted the small farmers of possible pest infestation/attack on their fields, thus providing them with lead time to respond to the pest attack and save their crop.
- Information about market prices helped farmers decide when to sell their harvest and in which market, thus obtaining optimum price for their produce. It also reduced exploitation of small farmers at the hands of middle-man and traders.

Based on the success of the scheme, SEWA expanded the agro-advisory services to 3 districts in Gujarat and provided agro-advisory to over 4500 registered small farmers. The topics covered were also increased to include information about government schemes and subsidies, health information, important announcement etc.

Over time, the level of education of the rural youth has improved. Access to smartphones has also become affordable and common in the rural areas, with every household having at least one smartphone. Therefore, to facilitate better access to information for its members, SEWA has also started linking its farmer members having access to smartphone to government "Khedut Mitra App", which provides complete information from land preparation to harvesting phase, covering areas like land preparation, seed selection, seed rates, fertigation schedule, weed control, pest and disease control, market rates of selected Market Yard along with that Agriculture News, Weather etc.

Table 4. SEWA's Voice-based SMS user data

Year	**District**	**No. of members registered to receive message**	**Pick-up rate**	**Details**
2016	Arvalli	1500	52%	Messages provide information on (1) Weather forecast (2) Spot prices for agricultural produce (3) Information about prominent crops in the region (4) Advisory on Animal Husbandry (5) Govt schemes and subsidies related to Agriculture and Animal Husbandry
	Chota Udaipur	1500	75%	
2017	Arvalli	1500	45 - 50 %	
	Chota Udaipur	1500	60 - 65 %	
	Surrendranagar	1500	70 - 75 %	

Source: SEWA.

Today, SEWA has successfully linked over 60% of its small farmer members in 14 districts of Gujarat to the government's "Khedut Mitra App".

7.4 Establishing Tools and Equipment Library

Most members of SEWA are poor small farmers, who have a small piece of land and cannot afford to incur expenses on buying tractors and other required tools. Therefore, they generally follow traditional farming practices resulting in low productivity and long hours of drudgery.

As a part of technical trainings in Agriculture, SEWA advocates deep ploughing as well as mud and sand filling in the fields. Deep ploughing increases soil fertility and reduces need for fertilizer & pesticides. Similarly, mud and sand filling improve the land quality, increases moisture retaining capacity and decreases salinity. Thus, deep ploughing along with mud and sand filling increases the productivity and the yield by 2-3 times per acre of land.

This kind of agricultural practices require the use of mechanized tools, which these small farmers must rent from the well-established farmers at a high rate. Many a times, despite being willing to pay high rent, they do not get access to these tools and equipment on timely basis. As a result, they are not able to reap a good yield from their farms, thus making their agriculture non-sustainable and non-profitable.

Understanding these challenges in terms of access to modern tools and equipment, SEWA has implemented an environment–friendly initiative through the practical approach of pooling of agricultural equipment – The Agriculture Tools and Equipment Library. This library is centrally located and run by the village farmer development group. It is equipped with modern agricultural tools and equipment needed by the members. Members can borrow these tools by paying a nominal service charge to the library, which is much lower than the rent they paid to large farmers.

Positive effects of this initiative include the following:

- Members can borrow costly and/or infrequently used tools whenever they need them for their field by paying only a nominal rent rather than spending money on buying them.
- The library is owned and managed completely by the members themselves through their own collectives/cooperatives, thus creating joint assets in the name of the women.
- The library is managed by the villagers' groups themselves and the rent for the same is also set by them in such a way that it covers the cost of repairs and maintenance of the tools and equipment library. This ensures sustainability of the tools and equipment library. The surplus income from the library is used to invest in more and better tools and equipment.
- It also creates an additional employment opportunity through the maintenance and operation of these tools and equipment
- The easy access and affordability of modern tools and equipment has helped improve the agricultural yield to a great extent.
- Access to modern mechanized agricultural tools and equipment has led to awareness about the benefits of mechanized farming.
- The rural youth has a natural affinity to modern tech-savvy jobs. Affordable access to mechanization in agriculture has helped re-kindle their waning interest in agriculture, and has led to curbing of out-migration.

In year 2006, farmer members of SEWA from Surrendranagar district, Gujarat, built a tools and equipment library by taking out a loan from SEWA district federation.

Using the library, small and marginal farmers in Surrendranagar district were able to efficiently cultivate 500 to 800 bighas of land and even the salt farmers in the district benefitted from the diesel pumps.

The farmer group running the library earned net profit in the amount of Rs. 200 thousand in a year which was used to pay off the loan and maintain the library. "This library has been beneficial to a lot of small farmers like me. Once the loan is completely paid off, we plan to purchase many more advanced tools like drones for sprinkling pesticides, sprinkler irrigation systems etc. in the library" … says Ansuyaben from Ajitgadh village in Surrendranagar district, Gujarat.

Responding to its members' needs, in 2016, SEWA establish its 7th Tools and Equipment library in Thada village of Surrendranagar District. Table 4 below shows the number of members using the library per cropping season over the past two years and the hourly savings per tool availed by the members using the library. For farming on a field of 1 acre, a small farmer has to use each of these tools for an approximate duration of 1 hour. Therefore, if a smallholder farmer obtains all of the 5 tools/ equipment from the library, instead of the market for 1 hour each during a cropping season, she will be able to save INR 1150 per crop.

Table 5. Usage data of SEWA's Tools and Equipment Library at Thada, Surrendranagar

		Name of Tool / Equipment				
		Rotovator	Orani	Thresher	Tractor	Trolley
2016	How many members used	120	147	190	110	110
	Market rate (INR/Hour)	800	1000	800	500	500
	Library rate (INR/Hour)	650	700	500	300	300
	Savings per hour	150	300	300	200	200
2017	How many members used	140	150	200	150	150
	Market rate (INR/Hour)	850	1200	1000	700	700
	Library rate (INR/Hour)	700	900	700	500	500
	Savings per hour	150	300	300	200	200

Source: SEWA

As of date, ***7 tools and equipment libraries are being run benefitting 15,000 farmers from three districts.*** Both agriculture labourers, who do not have small equipment for their work, and small farmers can garner benefits by getting the equipment on time and at a reasonable rent.

A study on SEWA's Tools and Equipment library has revealed that ready availability of tools and equipment through the library has increased the income of farmers by 30%. For example, seed-sowing machines allow more efficient use of inputs (such as seeds/fertilizers) thus reducing the overall input cost. Additionally, the direct cost of renting tools and equipment has come down by 20%. Members of SEWA have invested the additional income in better nutrition, children's education, reducing debts, asset creation and other activities.

7.5 Spot and Future Prices

One of important challenges faced by the small farmers in India is the lack of access to direct market and awareness of the current trends and demand-supply in the market, especially with regard to commodities. Since the marketplaces for commodities are mostly located in larger towns, small farmers have to either incur hefty transportation charges to transport their harvest to the marketplace or sell their produce to the middleman visiting their villages. Lacking knowledge of the spot prices, these small farmers are therefore forced to sell off their produce at whatever price is offered by the traders or the middleman, thus getting exploited to a large extent.

Additionally, due to lack of knowledge and awareness of future market trends and demand-supply, small-farmers choose the crops for season based on previous years market demands. Consequently, they very often end up with crops that are not in demand at the time of harvest, hence not getting significant price advantage. This has an adverse effect on the small farmers financial situation, too. Small farmers usually do not have surplus cash and, therefore, have to rely on cash advances from traders and loans for cultivation. In case of low commodity prices at the time of harvest, small farmers are not able to repay the loans, thus getting trapped in the vicious circle of debt and poverty.

Table 6. Typical Price Board for posting pot and future prices

Crop	**Breed and Place**	**Last year price**		**Spot price**	**Futures Market**	
		Month	**Up/down**		**Month**	**Price**
Kapaas	Shankar Cotton (Villages in 20 km radius of Rajkot, Gondal, Kadi and Vijapur)					
	V797 Cotton (Villages in 20 km radius of Surrendranagar					
Castor	Aranda Disa (Villages in 20 km radius of Disa)					
	Aranda Bhabhar (Villages in 20 km radius of Bhabhar)					
	Aranda Rajkot (Villages in 100 km radius of Rajkot)					
Gaur seeds	Jadhpur (Villages in 100 km radius of Jadhpur)					

Source: SEWA

Realizing these challenges faced by its members, in 2007, SEWA collaborated with NCDEX to study the effectivity of disseminating commodities' spot and future prices for crops like cotton, castor and gaur to over 108 villages. Since the concept of spot and future prices was completely new for the small farmers, SEWA and NCDEX conducted several awareness-raising and training sessions for about 200 grass-root leaders from these villages. These leaders were trained on the importance of spot and future prices and how to use futures prices with a view to guiding their price expectations and making more efficient sowing decisions.

Two grass-root women were trained and appointed as price-posters in each village. Future Prices obtained from NCDEX were sent out to price-posters weekly through SMS. They in turn would post these prices on boards displayed in each village, often on the walls of frequented spots: milk cooperatives etc.

Multiple surveys conducted over the decade to analyse the impact of these initiatives indicate that in the initial years, farmers were very sceptical about the validity of the spot and future prices and refrained from using them. However, with passage of time, their confidence in this information has increased and they have started taking advantage of them. Some of the positive impacts of the initiative are as follows:

- Majority of small farmers in Surrendranagar district, Gujarat, grew cotton as their main crop. After monitoring the future prices, over 60% small farmers in Surrendranagar district have started alternating between Castor and Cotton. This has led to an increase in their income by almost 30 – 40% per harvest season;
- Small farmers select varied crops every year based on futures market. This variation/rotation in crop has led to improvement in soil health and, therefore, enhanced productivity leading to increased income;
- Availability of spot prices helps small farmers take informed decision on when to transport their produce and to which marketplace, thus curbing exploitation to a great extent;
- Knowledge of spot prices has helped strengthen the bargaining power of small farmers, thus reducing the extent of exploitation by traders and middlemen;
- Awareness of future market trends helps small farmers to take efficient financial decisions, thus reducing their financial burdens and increasing profitability.

Two years after SEWA started posting the spot and futures prices, a short survey was carried out covering 1080 farmers across 54 villages where spot and futures prices were displayed, and showed the following results.

Table 7. Impact of spot and futures price information dissemination

Question	Yes	No
Have heard about Spot and Futures Prices	89%	11%
Do you feel these prices are trustworthy	65.1%	34.9%
Percentage using futures prices to decide which crops to plant	39.8%	60.2%
Did future price affect your decision to cultivate		
• Cotton	55.64%	44.36%
• Castor	56.64%	43.36%
• Gaur	27.27%	72.73%
What information do you use to decide which crop to plant?		
• Futures Prices	35.1%	
• Recent Spot prices	64.9%	

Source: SEWA

The above table clearly shows that *over 50% farmer-members in study-villages used the information on future prices to decide which crop to grow in their fields. Also, 35% of farmers used the future price information to decide which crop to sow.* Since gaur is a robust crop requiring hardly any care or irrigation and is used for cattle-feed, there was no impact of spot and futures prices on the decision regarding its cultivation.

As the information spread through word of mouth, in addition to the villages where the spot and future prices were posted, the effect of this information on sowing decisions and crop choice was also reflected in neighbouring villages where the information was not displayed. About 16% cotton-farmers members in villages where the spot and future price information was not displayed, switched to castor after receiving the information through word of mouth from neighbouring villages where the information was actually displayed. SEWA also started receiving numerous requests from its farmer members in non-pilot villages to initiate such information dissemination in their villages.

Safinaben from Patadi taluka in Surrendranagar district says… "SEWA started providing us with Spot and Future prices in 2007. I was in-charge of posting these prices in my village and 15 other neighbouring villages. Initially, no one cared for these prices and even mocked me for wasting my time in posting them.

I had strong belief in SEWA and therefore, I decided to experiment on my own field. During that period, no one cultivated castor in our region. Everyone grew cotton. The future prices indicated castor as a high-income crop – the labour involved in growing castor was also very less as compared to cotton and the chances of pest infestation were also low.

In 2010, I cultivated castor in my field. The price of castor was 600 INR/ton more than that of cotton. Also, I hardly spent anything on labour and pesticides. Thus, with low input cost, I reaped a bountiful harvest. Looking at my experience, more members started believing in the spot and future prices. Today almost 30 – 40% members in our region are cultivating castor.

Now SEWA has stopped posting spot and future prices, but we continue monitoring them through our smartphones and internet. SEWA has helped us to use technology for our benefit"

As a part of the study-program, SEWA posted spot and future prices for 5 years until 2015. However, the study created awareness amongst the small farmers regarding the benefits of information regarding spot and future prices. Owing to this awareness, the small farmers have continued monitoring these prices by their own means (internet or enquiring at SEWA's district office) to date and take informed decisions accordingly. This is a solid example of the fact that if apt technology is placed in the hands of the poor rural workers, the rate of adoption and adaptation is very high.

7.6 Customized Rainfall Insurance

Farmers face floods, drought, pests, diseases, and a plethora of other natural disasters. Especially in the case of small and marginal farmers, these risks are magnified. Therefore, the government of India started offering widespread crop insurance in 1985 with the comprehensive crop insurance scheme, which was then replaced by the National Agriculture Insurance Scheme. However, the scheme has run at huge losses while not delivering an effective product.

In 2005, SEWA organized a workshop on Disaster Mitigation involving farmers from around Gujarat. The main topic of discussion was crop insurance programs. The workshop found interesting results; farmers were suffering crop losses due to abnormally high levels of rainfall. This elevated the importance of finding a way to mitigate rainfall risk and promoted rainfall insurance at SEWA.

An irregular distribution of rainfall not only affects crops directly, but also affects agriculture as a whole directly and indirectly. Without insurance, a failed monsoon may force a household to sell productive assets, forgo medical care, or reduce food consumption. Moreover, anticipating this probable risk, many small and marginal farmers defer from planting high-yield crops which produce more but are more vulnerable to rain shortfalls.

To study the feasibility of reducing the vulnerability of smallholder farmers and agriculture workers through insurance, *SEWA initiated a pilot initiative offering "Rainfall Insurance" to its 1500 members across 33 villages in 3 districts (Anand, Patan and Ahmedabad) of Gujarat*. SEWA collaborated with ICICI Lombard in 2006 to offer rainfall insurance, which provided protection to small and marginal farmers not only against rainfall deficit but also excess rainfall. For a premium of INR 144 to INR 259 per acre, the policy provided a cover of INR 1500 per acre.

Looking at the popularity of the pilot and the members uptake, the area of study was expanded to cover 60 villages across the 3 districts in 2007. To date over 3000 small and marginal farmers and agricultural workers have been regularly purchasing rainfall insurance.

A study to analyse the impact of rainfall insurance on the financial activities of the members indicates the following:

- The amounts borrowed by members who had obtained rainfall insurance have decreased steeply since 2010 as compared to the amounts borrowed by the families who had not taken rainfall insurance.
- Following a productivity shock due to excess/deficit rainfall, members having the insurance were in a financially more comfortable position and were even able to lend money to peers.
- Poor small farmers hardly had cash-in-hand and, therefore, had to rely on crop loans for cultivating their fields. In such cases, many members who had not obtained rainfall insurance found themselves in extremely vulnerable situations forcing them to migrate in search of livelihood.

Rukhiben from Patan district says… "I and my neighbour Labhuben always cultivate our fields together. SEWA has always advised us about the importance of rainfall insurance. So, this year when we applied for crop loan, I paid INR 450 for insurance cover, but she didn't. We both took out a loan on INR 25000 each.

We used a considerable amount of the loan in field preparation and cultivation. However, there was hardly any rainfall this year, so all our money is lost.

The govt has declared draught this year. Therefore, I got an interest subsidy on my loan and also got INR 18000 as insurance cover.
Although, it will be difficult year, I was at least able to pay back the loan.

Poor Labhuben, she didn't take insurance cover. So, she will have to repay the entire loan by herself. I was really sad to see that she and her entire family had to migrate to Morbi where they work as construction workers. I wish she would have joined SEWA and understood the importance of Rainfall insurance."

Although the farmers have been taking crop insurance through various government/private schemes, the rainfall insurance offered a better safety net due to its various features as shown in table.

Table 8. Benefits of rainfall insurance over crop insurance

Crop insurance	Rainfall insurance
It is crop specific	It is completely based on rainfall
There is no transparency in claims disbursement decision	Since the disbursal is completely dependent on amount of rainfall, it ropes in complete transparency
Crop Insurance premium is available at a subsidized rate through Govt.	Despite no Govt. subsidy for Rainfall insurance, the premium is affordable to small farmers.
Only smallholder farmers can avail this insurance	Agricultural labourer, Sharecroppers, tenant farmers as well as smallholder farmers can avail this insurance.
Claim disbursal takes over 1 year	Claim disbursal is done within 2 months

Source: SEWA

The table below shows the number of policies purchased over the span of the study (10 years), premium paid and the amounts received in claims. Although the rainfall insurance has come to the rescue of the poor farmers in calamities like rainfall deficit or excess rainfall however, as we can see from the table, the amount received as reimbursement is not as significant as expected.

Table 9. Rainfall insurance data

Details	2006	2007	2008	2009	2010	2011	2012	2013	2014	2015
No. of villages	32	52	52	60	60	60	60	60	65	68
No of members buying policy	92	984	603	765	1725	1212	724	812	191	200
Total no of policies bought	908	1026	603	1442	1775	2226	1264	1529	191	200
Premium paid	144 - 247	86	190	145 - 250	150	190	200	200	200	200
total claim disbursed	-	-	-	81077	500498	26623	82920	13650	85778	66941
Average claim per policy	-	-	579	169	487	144	193	52	449.15	334.7
No of members receiving claims	-	-	184	566	1381	195	255	80	153	200

Source: SEWA

While the rainfall insurance has been beneficial to the small farmers in many instances, there are a few discrepancies in the product that may be addressed to design a better product, which could benefit small farmers more effectively such as:

- Number of consecutive dry days for the insurance to trigger is fixed. If the rainfall occurs one day prior to the dry day, the insurance doesn't trigger in, however, the crop has already been affected. In order to address this issue, the number of dry days needs to be decided based on the crop.
- The villages in district are spread far and wide apart. Therefore, the rainfall data collected at the weather stations may not be accurate for all the villages in any given district. This can be addressed by collecting rainfall data at village-level.

Owing to the aforesaid deficiencies in providing effective safety-net to its members, SEWA discontinued its Rainfall insurance initiative in 2015 and re-initiated a search for a better insurance product.

In 2016, the government of India introduced a newer modified crop insurance scheme, the "Pradhan Mantri Fasal Bima Yojana (PMFBY)", which provides comprehensive risk coverage from pre-sowing to post-harvest losses due to unpreventable natural disaster risks. Adhering to its policy of not running parallel programs, SEWA started facilitating its members in taking the insurance cover under the PMFBY. SEWA also helps its members in the process of claim reimbursement under the PMFBY.

To date, SEWA has facilitated crop insurance cover to over 75% of its smallholder farmer members under the PMFBY. **SEWA has also worked diligently with its 366 members, helping them to have their claims reimbursement processed under the PMFBY.**

7.7 Affordable Access to Farm-top Renewable Energy

A need assessment study conducted by SEWA revealed that women spend 40% of their time and up to 25% of their incomes on accessing energy mainly for lighting, pumping and running small tools.

> **Rekhaben, from Arvalli district says… "This solar water pump has come as a boon for me and my family. With the savings in irrigation cost, transportation cost and the increased income due to increased crop yield, I have purchased more land and thus almost doubled my land holding. Now I can irrigate the fields at my convenience – thus saving a lot of time. I use the time thus saved rearing cattle thus earning an additional income.**
>
> **I am very happy to have this solar pump. In addition to financial security, it has brought me dignity and respect. I am very thankful to SEWA for thus changing my life and helping me secure a better future for my children"**

While the majority of villages in India are now electrified, the supply of electricity is very irregular, with power cuts ranging from a few hours to few days. This absence of electricity translates into difficulty in lighting, pumping, running small tools and accessing water for drinking and irrigation. Difficulty in lighting means women have less time to do their household chores and ought to finish them during day-light hours – thus less time to work. Difficulty in pumping and running small tools means women have to depend on costly diesel oil, thus increasing their agricultural input cost and reducing their overall profit. Difficulty in accessing water for drinking and irrigation means, women must walk long distances to fetch water – thus again less time to earn a livelihood.

When women have less time to work, it impacts the income of the family. Women have a natural tendency of putting their family first. As the family's income shrinks, it impacts the ability to fulfil their daily needs like food and clothing. With less money to spend, food supply diminished and as the women gives priority to male members and children of the family, often there is hardly any nutritious diet left for the women, thus affecting their health. This is an example of the nexus of women, water, energy and food.It is an undeniable fact that many villages in India face the acute problem of inaccessibility to water and energy. It is the root cause of the burning issue of very low agricultural yield faced by smallholder farmers. This in combination with frequent climate and market shocks has resulted in agriculture becoming increasingly unsustainable for these poor farmers, forcing them to work as unskilled casual labour.

An average small farmer ends up spending 800 - 1000 INR per day in purchasing diesel to run pump-sets to irrigate their field and run other small tools. Lack of access to pump-sets forces many of these farmers to purchase water for irrigation from large farmers at highly inflated price. Unavailability of funds prevents these farmers from cultivating more than one crop per year on their fields thus affecting their households' income.

Therefore, to address this nexus of women, water, work, food and energy, SEWA launched its integrated energy initiative "Hariyali" that focuses on enabling affordable access to clean, green farm-top renewable energy solutions, such as solar pumps for agriculture, farm-top solar for home electrification and small tools operation and facilitating access to solar lanterns and solar-powered fans as well as access to clean cooking solution, thus strengthening the agriculture and livelihood of poor small farmers.

While the implementation of activities under the Hariyali initiative saw many challenges in terms of awareness-raising regarding the efficacy of renewable energy solutions, the end results are highly encouraging. Some of the positive outcomes of the initiative are:

- Savings in cost of irrigation by about INR 45/hour translating to approximately INR 2200 per crop per acre and increase in the cultivated area as well as cropping intensity up to as much as twice, due to easy and affordable access to irrigation, have led to strengthening the livelihoods of small farmers;
- Farm-top energy solutions provide support to allied activities like Animal Husbandry leading to an increase in income/savings amounting to INR 3000 - 4000 per year;
- Scope of additional income due to time-savings result in more time for earning livelihood;
- Saving in time and reduction in hassle in accessing energy;
- Reduction in drudgery;
- Reduced environmental pollution due to use of renewables;
- Asset creation in the name of women;
- Contribution to UN's SDGs and India's NDC by reducing carbon footprint; to date SEWA's members have contributed to a reduction of over 75 tons of CO2 by switching to renewable sources of energy – a minor yet firm contribution towards SDG 13.

7.8 Developing customized Mobile Apps for Small Farmers

India and many other south-Asian countries have a growing young workforce. With the changing demographics, SEWA's membership profile is also changing. Today, almost 35 - 40% of SEWA's membership comes from the young generation. The profile of these workers is completely different. They have a natural affinity to modern, smart tech-savvy jobs.

SEWA realized that the advanced digital technology, if tactfully employed, can play a significant role in combating rural poverty and fostering sustainable development by generating modern smart tech-savvy employment opportunities for the rural youth, thus leading to overall growth and development of not only individuals but the community as well.

However, the current ICT tools and apps available in the market are all designed for the educated urban users. There are hardly any tools or apps geared towards the needs of the poor informal sector workers, who are generally illiterate to semi-literate. SEWA strongly believes that if the technology implementation is in the form of customized apps and tailor-made initiatives, need-based, linked to their trades and designed to help overcome the challenges and barriers faced by poor informal women workers in their day-to-day lives and livelihood, then the uptake of such technology is much faster.

Our experience working with poor women workers from informal economy also shows that the poor do not want charity, but rather need enabling policy frameworks and financial tools that can facilitate easy, affordable access to modern tools and technology. Any initiative/programme, including the digital tools and initiatives when made contributory, brings in a sense of ownership amongst the workers towards that initiative along with dignity, self-confidence and respect from community and society.

Thus, understanding the need of the hour, SEWA decided to develop in-house customized apps for its members involving them in all phases from design to implementation. SEWA successfully created a very unique process of incorporating digitization in its various on-going programs and initiatives through the Membership App, the RUDI Sandesha Vyavahar (RSV) App and the savings/Credit App (m-Bachat) by developing the apps based on the need and demands of the members and also implementing and monitoring it through the members – all the while focusing on preserving the traditional value-based organizing process, thus creating a confidence amongst the users - majority of whom are poor illiterate/semi-literate women who had never even used a smart-phone in their lives.

With SEWA's multiple initiatives and programs regarding migration to mobile platforms, purchase and use smartphones/tablets would help members by saving their time and energy, making them more efficient and productive and yet be cost effective. Incidentally, the price of smartphones has also dropped to approximately 4000 – 5000 INR. The children of SEWA members can also use this tablet/smartphone in their academics. It also facilitates asset creation in the name of the women which we, at SEWA believe, is the surest way to fight poverty.

Therefore, to enable easy and affordable access to smartphones and tablet computers, SEWA also ensured easy-repayment loans for its members. At SEWA, we agree that none of us have a monopoly in all the competencies. Expertise in technology represented by IT companies is the competency that NGOs like SEWA need, and SEWA has access to women who are change-makers in their societies. Coming together will make extraordinary work happen. Such NGO-Corporate collaborations need to be considered as not just CSR but an investment for the overall growth of the nation. Working along these lines, SEWA has partnered and collaborated with several corporates including (but not limited to) Microsoft, Google, Sasken Technologies Pvt. Ltd, Vodafone India, etc. to design, develop and implement several of its technology-based initiatives.

7.9 RUDI – Access to Direct Market

To address the issue of direct market access for the small and marginal farmers, SEWA established RUDI – Rural Distribution Network – a for-profit agri-business company fully owned and operated by over 250,000 small scale women farmers – connecting farmers to end-users. The company has its own procurement channels, processing centres, packaging units and a distribution network.

The smallholder farmers sell their produce to RUDI, which is then graded, processed and packaged into affordable small packages and then redistributed into the villages by SEWA's sales-force - called Rudibens or Rudi Sisters. It brings nutrition and food security to over a million households today. In this process, the farmers get fair returns and the landless laborers get employment. RUDI has been very successful in transforming the adverse agriculture situation of smallholder farmers into a favourable and viable one, providing sustainable food and nutrition security to farmers' household.

Today, approximately 15,000 small and marginal farmers sell their produce to RUDI, at their doorsteps and at rates that are 20% to 30% better than those offered by traders. RUDI has generated employment opportunity for over 300 marginalized women at RUDI processing centres, who earn between INR 5000 and INR 8000 per month.

Table 10. District-wise no of RUDI saleswomen using tablets for sales in 2017.

No	District / State	No. of Rudiben using RSV3
1	Ahmedabad	324
2	Anand	285
3	Gandhinagar	315
4	Kheda	95
5	Kutch	262
6	Mehsana	481
7	Patan	251
8	Dungurpur, Rajasthan	109
9	Sabarkantha	373
10	Surrendranagar	493
	Total	2988

Source: SEWA

Additionally, it has also generated employment opportunities for over 2,000 landless laborers who work as saleswomen taking RUDI products to rural households, thereby earning a monthly income between INR 2000 and INR 5,000.

Thus, RUDI helps farmers adopt modern agricultural practices, and links them with various other initiatives of SEWA that help farmers practice sustainable cultivation and achieve better yields.

Rudibens travel door-to-door in villages assigned to them to take orders from customers. These orders are then transferred to the PC where they are processed and handed over to the Rudibens for delivery to customer. Until 2011, this entire process was done manually leading to a lag of almost a week between the customer placing the order and receiving the products. A lot of time and effort were wasted travelling back and forth multiple times between villages and the PC. In the absence of real-time information exchange, PCs were struggling to manage the inventory. The time lag between orders and deliveries led to many lost orders, hence loss of income, for RUDI.

To overcome these challenges, in January 2012 SEWA developed a java-based mobile app, RSV1, that could be used on any basic feature mobile phone. It was soon replaced by an upgraded version, RSV2, in January 2013. By 2016, more than 90% of Rudibens were efficiently using RSV2 on their mobile phones. Again, with most of Rudibens migrating to smartphones by 2016, SEWA launched the smartphone-based RSV3 app in Jan 2017.

Figure 2. Java-based mobile app

Developing RSV

To tackle the aforesaid challenges faced by Rudibens there was a need for real-time information exchange, which necessitated ICT penetration at field level. Back in 2011, this was a herculean task in itself, as the poor SEWA members couldn't afford expensive gadgets like smart-phones and laptops. Studies indicated that mobile technology had good penetration in rural areas in terms of network coverage and many Rudibens had access to basic feature phones. Thus, SEWA's ICT team decided to leverage this mobile technology using basic feature phone as a vehicle to enable real-time information exchange in RUDI.

Various solutions were tried to enable this information exchange such as: voice calling, text messaging and toll-free calls. However, these solutions were not viable due to various challenges like high operational cost, poor network connectivity, illiteracy of members etc. Therefore, a tailor-made solution to address this issue was needed.

SEWA collaborated with Ekgaon Technologies Pvt. Ltd., a Madurai based company, to design a java-based application for basic feature phones to address this issue. This led to the development of Rudi Sandesh Vyavahar – RSV1 in 2011, which was succeeded by a better java-based, improved and robust version, RSV2, in November 2013.

By 2015, all of SEWA's over 2,000 Rudibens were using RSV2. The sales of RUDI had been stabilized at a minimum of 3 - 4 orders per Rudiben per day. RSV2 was becoming increasingly ineffective in handling this kind of volume. This paved the path for the smartphone based RSV3 application, which was launched in January 2017.

To make the apps relevant to the members, SEWA created a unique participatory development process for all the apps, wherein the data-base creation, forms design, web application requirements etc. were conducted by the members themselves with the support from SEWA's ICT team. Only the coding was outsourced to different IT companies.

The application developer for RSV1 and RSV2 was a non-Gujarati company, which is unaware of the culture and local behavioural patterns of rural Gujarati natives. This made it very difficult for SEWA to explain its requirements and expectation from RSV. Language barrier was also a major hurdle faced by SEWA during the first-user trainings, which were imparted by the developer, which was tackled with the aid of an interpreter. To avoid repeating such situation, a Gujarat-based developer was selected for the development of RSV3.

Today, more than 4,000 Rudibens are using RSV3 with most of them earning an average monthly income of INR 8000 – 10000. RSV3 has also helped streamline RUDI's inventory management and sales. RUDI sells over 131 products, and its annual turnover is currently over INR 120 million. The use of RSV not only has it helped RUDI to efficiently manage its inventory but has also eased the process of order-taking for the Rudibens, thus increasing their monthly income manifolds.

7.10 Incorporating Digitization

Almost 2/3 of SEWA's members belongs to rural areas with agriculture and animal husbandry as their primary occupations. At SEWA, we have always believed in keeping ourselves and our members abreast with the latest technologies. SEWA has understood that for its rural members to benefit from the advancing technologies of the 4th Industrial Revolution, AI, IOT etc., they need to be adapted to suit the needs of these poor small and marginal farmers. And to do so, there is a need for relevant, authentic and accurate data. Year on year, SEWA generates a lot of such relevant data from its membership renewal process. Also, as a part of its agricultural campaign, SEWA has initiated several trainings, capacity building initiatives and other programmes specifically intended to strengthen the livelihood of small and marginal farmers, which generate a lot of data related to the members as well as their agricultural activities. However, as the data is captured manually, its usability is limited. Moreover, the lack of a common digital platform also hinders the integration and analysis of such data.

Therefore, SEWA embarked on a journey to digitize its membership data by developing a "SEWA Compass" – a common platform where data of all the members from all trades, generated through all the varied initiatives are integrated. These integrated data, could then be used for data analytics to design programs relevant to the needs of the members. It can also be used to enable policy level interventions and implementvarious developmental initiatives and programs.

Kapilaben from Anand district says… "Till last year, we were collecting all the members data manually. Therefore, when needed, it was very difficult to derive any information from this data. This year, we have digitally recorded all the members data. In one village, while I was renewing membership, I came across a family where there was a decrease in number of family members. Upon inquiry, we found that one of the family members met with an accident recently and passed away.

Our data reflected that the member's husband had availed life insurance for the entire family through Govt. scheme, but she wasn't aware of it and hence we immediately facilitated her compensation. Within a month she received life cover for the deceased member.

This is the power of real-time data availability. This is just the beginning. We now realized the importance of data and the benefits of data digitization."

As a first step towards this, in May 2017, SEWA designed an app for its membership registration and renewal that enabled members' data digitization at the source. A cadre of 1500 grassroot leaders were given internet-enabled tablet computers with the Membership app installed in it. These leaders personally visited the members to renew their membership as usual, in that year however, instead of manually renewing the membership, they did it digitally using the app also uploading a picture of the member and their Aadhaar number. By the end of 2018, 60% of SEWA's membership would be digitized.

Simultaneously, SEWA also started integrating the data generated from its other apps like RSV, m-Bachat (Savings and Credit app) and MIS into a common master data base.

7.11 Generating Smart Secondary Source of Employment to supplement Traditional Livelihoods

Under its climate-smart agricultural practices, SEWA always advises its members to pursue a secondary source of livelihood that can supplement their income from the primary occupation and also provide a safety-net for them to withstand the effects of the increasingly frequent climate and market shocks.

In this context, with the aim to generate fresh employment opportunities for its rural members using their own assets, SEWA launched its e-hospitality initiative ("Hum Sab Ek Hai") in January 2017, using the unused portions of members' homes and converting them into homestays.

Sixty-five-year-old Valiben from Vadu village in Mehsana District of Gujarat says… "I have listed my home as rural homestay since past 2 years and have been able to earn more than INR 18000 per month.

But additional income is not the only benefit. "Hum Sab Ek Hai" has brought some very positive changes in our lives. Interaction with educated guests from other parts of our country and world has motivated my grandchildren to take their education seriously and they now aspire to pursue higher education and tech-savvy jobs.

Youth workers in my neighbourhood have started working on their communication and linguistic skills to take-up jobs as interpreters. Travel service operators have started getting more business for airport pick-up /drop as well as car-rental services. We also get an opportunity to revive and propagate our culture, tradition and food in front of people from different parts of the world."

Some of the direct and indirect benefits of this e-retailing initiative of SEWA are as follows:

- Provision of a secondary source of income using existing assets, thus leading to improvement in the life quality of hundreds of rural non-members as well as members of SEWA;
- Development of rural tourism while preserving the rich cultural and traditional heritage of villages;
- Apart from providing an additional source of income for the homeowners, this model also generated an array of subsequent employment opportunities for the younger generation, such as tourist guides, travel/transport service providers, local artisans, interpreters etc. Thus, digital technology has opened up a plethora of smart tech-savvy employment opportunities accessible to the rural youth in their local community;
- Availability and accessibility of newer forms of employments in their own areas prevents the young from out-migrating to cities in search of jobs;
- Homestays offer the rural younger generation an opportunity to interact with people from varied cultures, fields and regions, which helps them broaden their knowledge about the world outside their villages, thus their outlook, as well as inspiring and motivating them to explore newer career-paths;
- Rural homestays enable direct interaction between both ends of the food-supply chain, i.e. producers and consumers. The first-hand knowledge and experience of the hardships endured by a small farmer in growing the food grains, reinforces the importance/value of food amongst the consumers, thus promoting responsible consumerism.

Table 11. Earnings of member households listed online on e-hospitality websites (from Jan 2017 to May 2018).

District	Year	Homes	Night Booked	Total Income	No. of Guests
Mehsana	2017	5 Home Stay	24	123077	59
	2018	9 Home Stay	45	129306	102
Surrendranagar	2017	4 Home Stay	50	133076	130
	2018	7 Home Stay	27	54710	59
Patan	2017	3 Home Stay	33	128700	87
	2018	6 Home Stay	18	47293	44
Chhota Udaipur	2017	2 Home Stay	4	17654	20
	2018	3 Home STay	3	5384	9

Source: SEWA

SEWA launched this e-hospitality initiative in Jan 2017. To date *properties of 39 members have been listed online* on e-hospitality websites, thus *generating employment opportunities for 39 families as well as hundreds of their fellow villagers in hospitality-related trades like travel and tourism, pottery, traditional arts and crafts, clothing, culinary etc. The hosting members have reported* 8 - 10 guests per month from all over the world staying for an average of 3 – 5 days each and *a marked net increase in their income by approximately INR 18000 – 25000 per month. It has also helped revive old traditions and cultures of the village.*

7.12 Conclusion and Way forward

Through years of experience, SEWA has demonstrated that women are the best agents to engineer change and address new aspects of development in a society. With Indian agriculture becoming more and more unsustainable due to the increasingly frequent and intense climate and market shocks, the problems of a farmer are getting closely intertwined with the challenges her family faces. In such circumstances, if equipped with the right tools and technology, women are best placed to tackle such problems and work towards economic and social security of their families.

The successful implementation, adoption and sustained use of SEWA's various technological initiatives reaffirms that "technology when put in the hands of the poor, they know exactly how to use it to their benefit".

Some of the key attributes of the strategy adopted by SEWA that can be considered and applied elsewhere, are listed below. These attributes can serve as guiding principles for interested NGOs, financial institutions, government agencies, and policy makers:

- **Research rural-oriented technology:** All the hardware/software currently available in the market have been designed with the educated formal sector in mind. SEWA's experience with digital enterprises shows that modern technology can be used to generate smart and better employment opportunities for the rural youth at a large scale. To enable this, thorough research needs to be undertaken to design and develop hardware/software specifically for the rural communities so that they can access and adopt these technological advancements seamlessly in their lives and livelihood.
- **Research accessibility and affordability of advanced technologies in agriculture:** Looking at the scenario of agriculture, especially from the standpoint of a smallholder farmer, it is clear that the agricultural productivity is largely dependent on the availability and affordability of irrigation facilities. In order to address this issue, there is a need for extensive research on accessibility and affordability of newer irrigation techniques and technologies, like sensor based precision irrigation technology, which will not only regulate the amount of water needed but also optimize the water usage, thus decreasing the irrigation cost, improving the soil and plant health and increasing the agricultural productivity.
- **Encourage digital enterprise formation:** Policy shift to encourage the formation and operation of digital enterprises equipped with necessary infrastructure and an environment that provides awareness of, access to and training in modern digital technology to grassroot communities, especially poor women from rural areas, so as to make their livelihoods smart and sustainable.
- **Promote collective farming:** Uptake of several new techniques/technologies and government schemes is low amongst small farmers. Given the meagre landholding of small farmers, the procedures needed to access these schemes/technologies are too costly compared to the perceived benefits. Therefore, to improve uptake of these schemes and realize economies of scale, SEWA advocates collective farming by encouraging farmers with contiguous landholdings to form Farmer Interest Groups (FIGs). SEWA has successfully piloted such a model in the "Vanlaxmi Tree-growers Cooperative" in Ganeshpura, Gujarat, that can serve as an example encouraging and facilitating more such collective initiatives.
- **Technology education:** Through our experience from working with women of various age-groups, we have learned that the young grassroot leaders are able to promptly adopt modern technology, but it takes several months of perseverance to get the older generation of grassroot leaders to do so. These older generation workers are reluctant/afraid to learn and use modern technology. They find it very difficult adapt to and adopt this technology. To overcome this challenge, government needs to design and implement large-scale technology education programs for adults similar to the adult education programs carried out in past. These programs will help older generation workers become familiar with modern technology and prevent them from becoming marginalized. Additionally, these programs need to adopt the traditional hands-on classroom teaching methods

using tools like videos, charts and animations, instead of e-learning modules, to effectively reach out to the older generation rural communities.

Advanced technologies like AI, blockchain, IOT etc. are now coming to the global south, thus making it necessary to focus on how to shape the process. In this context, there is a crucial need to set-up a special skills fund that will enable workers, including the rural workers and small farmers in the informal economy, to be ready for this transition. There is also a need for appropriate training and capacity building by developing toolkits for AI, blockchain, IOT etc., which will be beneficial for the rural workers and prepare them to collectively adopt AI in agriculture, animal husbandry etc. Finally, the regulatory framework should enable the small farmers to access platforms, strengthen their collective bargaining power by negotiating contracts that enable access to personal as well as customer data on the platforms.

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Chapter 8

Informal Skills Pathways to Formal Qualifications South African Insights on Technical and Vocational Skills

Lesego Moshikaro and Mbofholowo Tsedu

South Africa's Manpower Training Act 56 of 1981 facilitated skills development through the promotion and regulation of training apprentices and employees across all sectors of the economy (Department of Labour, 1981). Apprenticeship was the only route to artisanship. The apprenticeship system at the time flourished in state-owned companies (SoCs) as well as in the private sector including the major automotive manufacturing companies. The system was regulated by Industry Training Boards (ITBs) and a nationally recognised trade test with a uniform standard of competence was established. The Manpower Training Act suffered from a range of challenges including limited access to training on the grounds of race and gender, a lack of investment in education and training in the workplace, poor linkages between training and industry needs and a lack of a coherent and systematic approach to the upgrading of skills for the South African workforce as a whole (Local Government SETA). Additionally, the decline in the economy in the late 1980s resulted in some SoCs cutting their training budgets and moving towards privatisation and corporatisation. This meant that SoCs ceased to play a role in training artisans to meet the demand for skills in the economy.

As part of the Accelerated and Shared Growth Initiative for South Africa (AsgiSA)[89], between 2007 and 2008, the government initiated the Joint Initiative on Priority Skills Acquisition (JIPSA) process, which sought to assess skills shortages constraining the economy, with a focus on weaknesses in the artisan system. Findings from the JIPSA report concluded that 'the principal reason for the shortage of artisans lay in the decline of the apprenticeship system'.

The lack of skilled artisans has been singled out as a major barrier to employment creation and economic growth. South Africa produces too few artisans to support the country's planned economic growth trajectory. There is currently a shortfall of approximately 40,000 qualified artisans in South Africa (IOL, 2017). The National Development Plan (NDP) set a target of producing 30,000 artisans per year by 2030, more than double the average number of artisans currently produced. This will involve a huge financial commitment from both the government and employers.

There are approximately 24,000 candidates registering for artisan training per year, however only 13,000 on average manage to pass the trade test to qualify as artisans (NADSC, 2016). The need to develop qualified artisans to support the economy remains

[89] AsgiSA was South Africa's government's new growth initiative with the core objective of eradicating poverty, reducing unemployment and creating jobs by 2014. Under AsgiSA, skills programmes and learnerships replaced replacing apprenticeships.

a high priority, especially in light of government's intention to strengthen manufacturing, construction and engineering sectors. Artisans are the mainstay of the manufacturing sector. According to a Department of Trade and Industry (DTI) report (2016), qualified artisans represent an overwhelming majority of 71% of the technical workforce in manufacturing. Given the changes in demand related to the increased mechanisation and automation in manufacturing processes, a study by Singizi (2018) highlights how these changes have led to the transformation of industry occupational structures, which in turn have led to an increase in the demand for a highly skilled technical workforce with a particular focus on specialists, technicians and associated tradesmen, including artisans. A skilled workforce is the backbone of the manufacturing sector because it gives industry the resources it needs to be efficient and competitive. Akoojee (2011, 108) maintains that if the South African artisanship system is to be revived, significant institutional and governmental support in the form of incentives or encouragement for employers is necessary, particularly for the Artisan Recognition of Prior Learning (ARPL) programme.

Working as a qualified artisan provides great career opportunities for unqualified trades and craftsmen in informal employment. In a tracer study by the Swiss-South African Cooperation Initiative (SSACI) (2016), it was revealed that 73% of artisans are in wage-employment. Although this highlights that the artisan system is producing a relatively high rate of employment for qualified artisans, the quality of artisans produced has been called into question (GTAC 2014). Consequently, training and skills development of artisans in South Africa suffers from negative reputational challenges, and the conflated and confusing sector–based skills development system with multiple routes has created huge blockages and inefficiencies in artisan development.

The informal economy serves as a pool of skilled unqualified individuals who learned and practice trades in both the formal and informal economy. The utilisation of this untapped pool of skills could alleviate the shortage of artisans in the country. By implication, the need to progressively integrate informally practicing unqualified artisans into the formal economy should thus be supported (Jordaan *et al.,*2018). This is one of the reasons that artisan development is one of the key priorities of the Department of Higher Education and Training (DHET). South Africa has a large share of experienced, competent and semi-skilled workers working in informal employment, who have learned and practiced artisan trades and are well prepared to transition to formality (Jordaan *et al.,*2018). As unqualified artisans acquire the necessary technical skills through experience in the formal economy, often, most leave formal employment to work in the informal economy, where they are can undercut rates and prices charged by enterprises in the formal economy. However, for others, the informal economy serves as an alternative to the limited opportunities available in the formal sector, particularly for individuals without formal education and qualifications.

Producing individuals with the appropriate technical skills promotes entrepreneurship which is critical to the progression of the South African economy. This is because industry is only able to absorb a certain number of individuals, the unemployment rate baring testimony to the general gap between job seekers and job opportunities. The dire need to reduce unemployment in South Africa is not the only reason why technical skills are important. Research has shown only a weak correlation between educational attainment and potential (James, 2018). This suggests that the current education model, which is academically inclined, is failing some individuals within the system. Technical and Vocational Education and Training (TVET) colleges may thus provide a viable alternative to those who are not suited to the traditional formal education system. However, technical skills should not be seen as a sub-alternative to the traditional education model. TVET colleges not only provide important technical skills and training, but in doing so, TVET colleges also generate soft skills that produce critical thinkers and problem solvers (SEIFSA, 2018). Technical skills therefore provide a certain kind of flexibility and adaptability, the lack of which has been associated with hampered economic growth (Payle, 2013).

This paper highlights the various routes to becoming an artisan in South Africa, and reports on a process model for ARPL in informal employment, the implementation of the ARPL model and integrating skilled trade and craftsmen into a recognised training qualification and ultimately decent work in formal employment. Additionally, the paper makes recommendations to effectively implement the ARPL model and improve outcomes for skilled unqualified artisans.

8.1 Skills and Qualification Pathways

8.1.1 The TVET system

Technical and Vocational Education and Training (TVET) colleges are administered in terms of the Continuing Education and Training Act, No 16 of 2006. The colleges provide technical and vocational education and training programmes to learners, who completed at least Grade 9 at school level. In general, TVET colleges provide three broad categories of qualifications and part-qualifications, namely:

1) The National Certificate (Vocational) (NC(V)) that is offered at three levels, i.e. levels 2, 3 and 4 of the National Qualifications Framework (NQF). The NC(V) is an alternative vocational learning pathway to Grades 10, 11 and 12 of the schooling system.
2) The Report 191 National Technical Education programmes, or commonly known as NATED certificates, are offered at six sub-levels (N1 to N6) for Engineering Studies and three or four sub-levels (Introductory N4 to N6) for Business and General Studies. These part-qualifications culminate in a National Diploma on condition that students meet the requirements of work experience. Students enrolled for Business or General Studies programmes require 18 months (2 000 hours) of applicable work experience, while those enrolled for Engineering Studies programmes require a minimum of 24 months (2,670 hours) of applicable work experience, or a relevant trade test certificate to obtain the National N-Diploma at NQF Level 6.
3) Occupational qualifications and part-qualifications, inclusive of workplace-based learning (WPBL) and Competency Based Modular Training (CMBT), are closely linked to workplace demands and opportunities. Many of the occupational learning programmes are funded by Sector Education Training and Authorities (SETAs) and the National Skills Fund (NSF) through the levy grant system.

The formal apprenticeship is the most common route, used by candidates with a technical matric and/or a NATED or NCV qualification, who are contracted by an employer onto an apprenticeship. However, multiple pathways exist for candidates to qualify as artisans, and subsequently may contribute to high throughput rates in the artisan development system.

The Department of Higher Education and Training is responsible for the Technical Vocational Education and Training (TVET) colleges (formerly the Further Education and Training Colleges). A sequence of mergers created 50 colleges enrolling around 400,000 (full and part-time) students in 2011.[90] Enrolment in TVET colleges reached 705,397 students in 2016 and of those only 4% (approximately 28,000 individuals) enrolled in vocational studies. According to DPME (2018), those who attended TVET displayed low employment rates post-TVET, however national certificates and training with pathway to vocational certificates made an impact on employment prospects with between 50%-60% of students finding employment after the skills intervention.

TVET colleges provide the type of skills that enable individuals to find jobs much quicker than those with academic qualifications from universities. This is because technical qualifications are gained much faster than degrees and, therefore, necessitate fewer use of already scarce resources (James, 2018). More importantly, the skills gained at a TVET institution are practical as opposed to the theoretical knowledge associated with a degree. As a result, the school to work transition is likely to be much quicker for those graduating from a technical institution as opposed to a university (SEIFSA, 2018).

An effective TVET system is, therefore, a critical component of a good quality education and training system. A good quality TVET college system would promote access to the labour market and increase labour productivity. In particular, the development of human capital by TVET colleges can improve the country's competitiveness, innovation and economic growth (DED, 2011). In South Africa however, the challenges faced by TVETs are many. The TVET system suffers from negative perceptions emanating from poor partnerships with industry, and the inadequacy and misalignment of the system in responding to skills requirements of industry and to the transition into suitable jobs (Tlhomedi, 2018).

TVETs are faced with poor quality training as reflected by the lack of appropriate machinery and equipment in workshops, shortage of experienced teaching and training staff with adequate technical skills and knowledge to use workshops efficiently and effectively, and poor leadership and management skills (Tlhomedi, 2018). All these factors compromise the employability and ability of TVET graduates to create self–employment. The post training employment trajectories of artisans are a key indicator of the effectiveness of the training system. For vocational training to play a meaningful role in solving skills shortages and unemployment, there needs to be better alignment between the TVET system and the practices and needs of the workplace, and teachers need to be involved with continuous training to keep their skills relevant and up to date.

[90] In addition, 521 registered private providers enrol 150 000 students. No public funding goes directly to these colleges, or to their students through the student support system.

8.1.2 Artisan development system

The current artisan development system is highly complex, with multiple routes to becoming a qualified artisan. The Competency Based Modular Training (CMBT) is a well-established training system implemented by TVET colleges, Sector Training and Education Associations (SETAs), private and state-owned companies for apprentices, who are interested in learning a trade. According to SSACI (2016), 91.1% of learners they interviewed were in the standard CBMT training system. An apprenticeship based on CBMT means that an apprentice must pass relevant modules and phase tests, as well as a final trade test to be recognised as an artisan. CBMT strongly focuses on practical application of trade requirements for a period of three to four years. In South Africa, the artisan who operates in the formal sector is accounted for by means of the SETAs[91].

Routes to becoming a qualified artisan

The steps to becoming an artisan through the CBMT system are shown in Figure 1 below. These steps follow a natural logical progression and are a simple to understand process for becoming an artisan.

Figure 1. Steps to Being a Qualified Artisan

Source: NADSC (2018)

Step 1: The first step for artisan development is to get young people from Grade 7 to start thinking about career options in technical and vocational programmes that would ultimately lead to their becoming qualified artisans.

Step 2: This step involves finding a workplace-approved employer who enters into either an apprenticeship or learnership contract with the learner. A critical part of Step 2 is the allocation of funding for artisanal learners through grant payments from SETAs, which form an integral part of the contract.

Step 3: The dual apprenticeship system integrates vocational learning through the basic schooling system or at technical and vocational education and training colleges (TVETs) with trade occupational knowledge and workplace learning simultaneously.

The majority of artisan training and learning occurs at the workplace, because this is where apprentices get to apply the theory and practice they have acquired at TVETs.

Step 4: Artisan Recognition of Prior Learning (ARPL) allows candidates, who do not have the required minimum level of education but have served at least four years in industry or in the informal sector, to apply for the trade test. These are applicable to all trade

[91] Botha et al., (2012, 609), however, report that SETAs do not consider artisans who operate in the informal sector.

test centres whether they are operated by government or private and state-owned companies. For ARPL candidates, the Department of Higher Education and Training (DHET) requires that these candidates conduct evaluation or interview checklists and phase assessments before they can go for trade testing.

Step 5: Once the learner has successfully completed the knowledge, practical and workplace components, the Act requires that the learner undergoes a trade test before they can be certified as a qualified artisan. All trade testing in South Africa is regulated by National Trade Test Regulations issued under Section 26D (5) of the Skills Development Act. These are applicable to all trade tests.

For Steps 6 and 7, quality assurance is built into the artisan programme, right from qualification development, learner selection, trade testing and certification. Certification and quality assurance fall under the legislative control of the Quality Council for Trades & Occupations (QTCO) but are delegated to NAMB through a service-level agreement. The QCTO issues a Red Seal certificate to successful candidates who pass the trade test.

To overcome the numerous challenges from the CMBT system, the Department phased out the CMBT system to an occupational qualifications system requiring that the curriculum components of the apprenticeship are delivered in an integrated dual apprenticeship system whereby apprentices move from the workplace to the TVET (workshop) in an uninterrupted learning succession, see Figure 2. The Department of Higher Education and Training (DHET), through the National Artisan Moderation Body (NAMB), has developed a framework for a single national artisan development programme that is known as the 7 Steps to Becoming a Qualified Artisan of the 21st Century. The foundation and delivery of the Artisan of the 21st (A21) apprenticeship will adopt the dual system principles applied within the South African context incorporating lessons from the Swiss and German dual apprenticeship systems; the Dual System Apprenticeship Pilot (DSAP)[92] and the Deutsche Gesellschaft für Internationale Zusammenarbeit (GIZ) Dual System Pilot Project (DSPP).

Figure 2. Steps to Being a Qualified Artisan: CMBT vs the new A21

Steps to Being a Qualified Artisan (CMBT)

Source: NADSC

[92] This programme adapted the Swiss and German models and has involved a number of key partners piloting the dual artisan programme in public TVET colleges with the support of GIZ from the NCV, currently the NATED qualification, into the new occupational qualification. The programme focuses on learning about the viability of these models and attempts to document these experiences to support the policy and curriculum development process

Steps to Being a Qualified Artisan (A21)

Source: NADSC

Learner contracting is placed before knowledge learning (see Figure 2) in order to mitigate challenges of learners accessing workplace learning. The dual apprenticeship system integrates Steps 2, 4 and 5 into Step 3 where learners are continually exposed to both educational knowledge and practical training and workplace learning simultaneously. Step 6 comprises trade testing and ARPL which are separate, and all trade testing in South Africa is regulated by National Trade Test Regulations issued under Section 26D (5) of the Skills Development Act. These are applicable to all trade test centres whether they are operated by government or private and state-owned companies. Step 6, trade testing, is also known as EISA. ARPL candidates, previously in the CMBT system, could 'walk-in' to a trade testing centre and take their trade test, however based on its new requirements for ARPL candidates, the Department of Higher Education and Training now requires that ARPL candidates conduct evaluation or interview checklists and phase assessments before they can go for trade testing. Step 7 informed apprenticeship training in the CMBT system, however it was not regulated. In the new system, quality assurance is built into the programme, right from qualification development, learner selection, trade testing and certification.

8.2 Outcome Trends

8.2.1 Artisans throughout

Trade testing is governed by the National Trade Testing Regulations developed by NAMB. The Regulations provide coordination mechanisms for trade testing by setting the criteria for minimum entry testing, trade testing, certification and quality control considerations. The Trade Testing Regulations replaced industry and sector-based trade testing systems through the reintroduction of a uniform assessment standard in all sectors throughout the country. This ensures that all artisans receive the same test regardless of region and company.

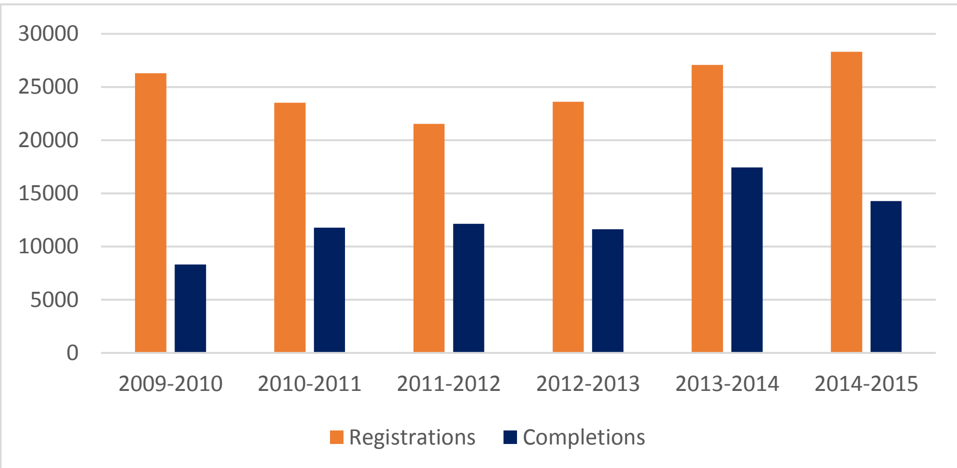
According to the National Artisan Development Support Centre (NADSC) (2016), on average, 13,363 (52.7%)[93] artisans pass their trade test every year. The fact that the pass rate is only 52.7% can be seen as an indicator of mismatch between the curriculum and the trade test or inadequate training. The Indlela pass rate is 55%; it includes a large

[93] The pass rate concerns first attempt passes. Many candidates pass on their second attempt, so the overall pass rate for any given annual cohort will always be higher than the average pass rate for individuals. A person who is not competent after three attempts at the trade test within the learning programme agreement period will be referred to ARPL.

portion of 'walk-ins' by ARPL candidates. The low pass rate could be due to one of two reasons: either the standards set by NAMB are too high, or the standard of learners is low. However, the precise reasons for the low pass rate are rather more complex and varied. This relates to the complex institutional legislation and policies governing artisan development in South Africa and the impassive commitment of industry to training artisans.

Figure 3 below shows an upward trend in artisan completion rates from 2009-2010 to 2011-2012, while the number of registrations for artisanal training were declining in the same period. However, from 2012-2013 to 2014-2015, registrations were on a steady increase.

Figure 3. Throughput: Trade test completions and registrations



Source: NADSC (2016)

In 2009-2010, there were 26,301 registrations, but only 8,328 (31,6%) of candidates qualified as artisans. The very low artisan throughput in 2009-2010 represents a crisis in the artisan development system, particularly relating to the governance of the system. The newly assumed responsibility for skills development by the Department of Higher Education and Training, previously controlled by the Department of Labour (DoL), and the change in the SETA landscape disrupted the artisan system. Moreover, the decline in completions in 2009 could be a result of the global financial crisis and its impact on manufacturing, mining and engineering sectors in South Africa – key sectors in artisan development. Consequently, the ability of these sectors to train learners, particularly for the structured workplace learning component of the artisan curriculum, was constrained. The implications of the crisis for skills development and training included constraint training budgets, the closure of companies, retrenchment of workers as well as production slowdowns and shutdowns, thereby limiting the number of opportunities available for supervised learning at the workplace (HSRC, 2012). The increasing number of registrations from 2012-2013 could be attributed to the formalisation and re-establishment of structured artisan programmes that include learnerships, apprenticeships, skill-based programmes and the ARPL, therefore creating multiple pathways for new registrations into artisanship. The renewed emphasis on apprenticeships with a structured curriculum, quality assured trade testing and the quality assurance of the artisan development system by the QTCO could have resulted in the slight drop in completion rates in 2014-2015.

Registration and completion rates are an important measure of throughput; however, they are separately recorded, suggesting that the completions in one year is not necessarily drawn from the registrations in that same year[94]. This is because traditionally, artisan training spans a period of three to four years, therefore it is likely that the 2014-2015 completions cohort had registered in 2011-2012. The completion and registration data do not represent all registrations and completions in artisan training across the country. SoCs who conduct their own artisan training do not report it to the NADSC and therefore their training data – ranging between 2000 to 3000 – is not part of the NADSC data (SSACI, 2015).

Accurate record keeping in one database by the NADSC is key to identify trends in the artisan development programme and accurately track newly qualified artisans from qualifying as artisans to the labour market or self-employment.

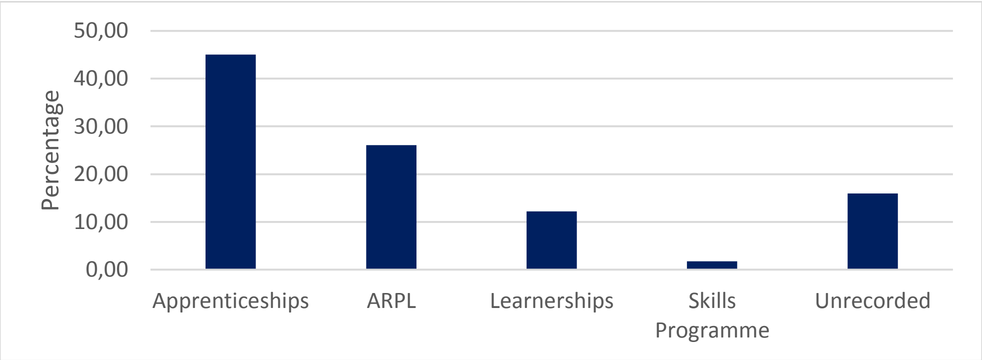
The national throughput is estimated at 65% for first attempt passes; when including second and third attempt passes, the national throughput rate is approximately 75% (SSACI, 2016; DHET, 2015). The successful completion rates in artisan training, including ARPL, would be higher with the inclusion of second and third attempt passes, thus, in this scenario the NDP should achieve its target by 2030.

8.2.2 Artisan throughput based on different programmes

Based on Figure 4, throughput in 2014-15, 45% of all completions (i.e. individuals who passed the trade test and qualified as artisans in that year) came via the apprenticeship route, of which 25% were from the ARPL and 12% were graduates of learnerships. Figure 4 not only shows the importance of ARPLs contribution to increasing the pool of qualified artisans and strengthening the artisan system, but it also reveals the great potential of ARPL candidates to attain a formally recognised artisan qualification. The data does not show the route taken by 16% of artisans who qualified in 2014-15, which is an indication of poor administration and record-keeping by SETAs. Companies are also not aware of the various routes to qualification as evidenced in GTAC (2014). When a small company was asked at an interview which route of artisanship they preferred to recruit from, they replied that they did not understand the different routes and how they work. However, they knew the trade test and that was what they looked for when recruiting artisans – 'if it does not align with the trade test, then we do not want it' (GTAC, 2014: 2).

[94] Indlela ARPL candidates are an exception to this record because they can register and test in the same year.

Figure 4. Throughput based on different programmes to becoming an artisan (2014-2015)



Source: SSACI (2016)

A similar finding from the research undertaken for this study found that although companies looked for a trade test qualification when recruiting artisans, they preferred recruiting artisans from the company's own apprenticeship programme. A training manager from a large equipment manufacturer indicated that they were hesitant to recruit newly qualified artisans trained outside the company, particularly from the ARPL programme. A newly qualified ARPL individual was recruited by the company, however the artisan lacked literacy and communication skills. Although not important to demonstrating competency and technical abilities, in this instance, the artisan could not read or write or understand drawings, which affected their ability to perform assigned tasks. The company enrolled the artisan for Adult Basic Education and Training (ABET) classes and demoted them to working on the shop floor, because keeping them in the production line risked productivity, throughput and quality losses for the company.

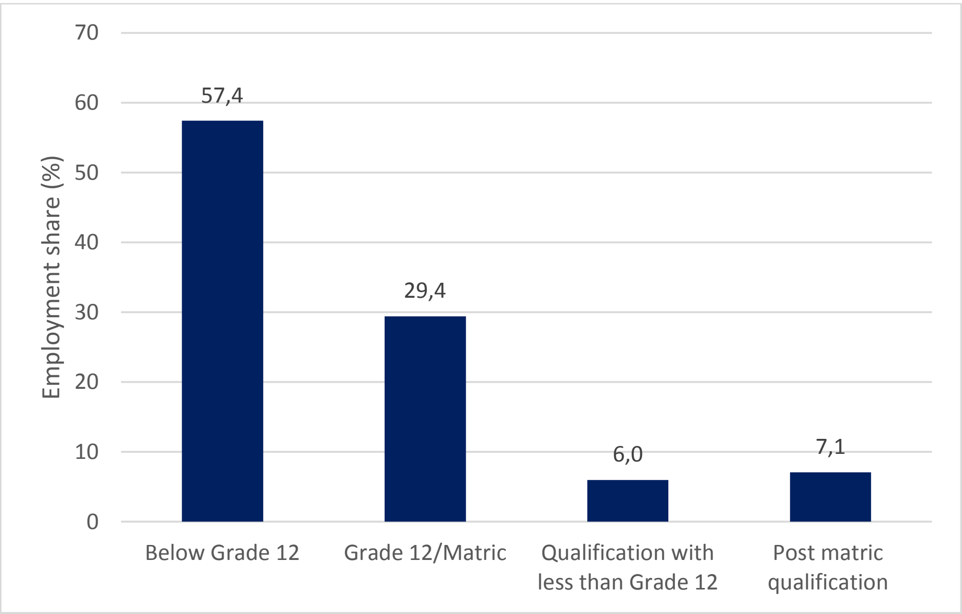
According to the Department of Higher Education and Training (DHET) and the Chemical Industries Education and Training Authority (CHIETA) (2014), many employers in industry applied discriminatory practices against ARPL candidates, however with the introduction of the Skills Development Act, discrimination against this group of artisans was eliminated through the implementation of a single certification process (DHET, 2012). This lack of distinction does place the onus on the Department of Higher Education and Training (DHET) and the Quality Council for Trades & Occupations (QTCO) to ensure that the quality of the apprentices being certified is the same irrespective of the route of artisanship they have followed.

8.2.3 Unqualified artisans

A skilled workforce is the backbone of the manufacturing sector, because it gives industry the resources it needs to be productive, efficient and competitive. Based on the above, it can be argued that unqualified artisans, who operate in the informal economy, would not necessarily be able to keep up with the latest technological advancements in the manufacturing industry. It is thus very likely that they lack specific training, development and experience in technologically advanced areas and would therefore need to be linked to formal training and skills development (Prinsloo, 2011). Informality, whether in the informal economy or informal employment is associated with low productivity, lack of social security protection and income inequality. The low productivity in the manufacturing industry has to do with the low skills levels of many of the workers, the low use of technology and the low levels of capital.

Based on a study by the Department of Trade and Industry (dti) (2015), it was reported that most artisans are unqualified, with 57% having less than Grade 12 (with no additional qualification), see Figure 5. 29.4% have a Matric, and only 6% have the required artisan qualification with less than Grade 12, while 7% have a post-matric artisan qualification. 57% of unqualified artisans in manufacturing probably have significant experience, however it appears that inadequate effort is made by the industry to support a form of certification and qualification such as through the ARPL.

Figure 5. Highest level of education among artisans/tradesmen in manufacturing



Source: DTI (2015)

ARPL

Stuart (2010) explains that the ARPL system in South Africa is based on the need to provide access to learning and qualifications for workers who have informal skills and knowledge that could be recognised formally. It is important that South Africans have an avenue through which their prior knowledge, skills and competencies are recognised. Connellan (2011) defines recognition of prior learning as 'the identification of learning acquired through work and other life experiences outside the formal education system'.

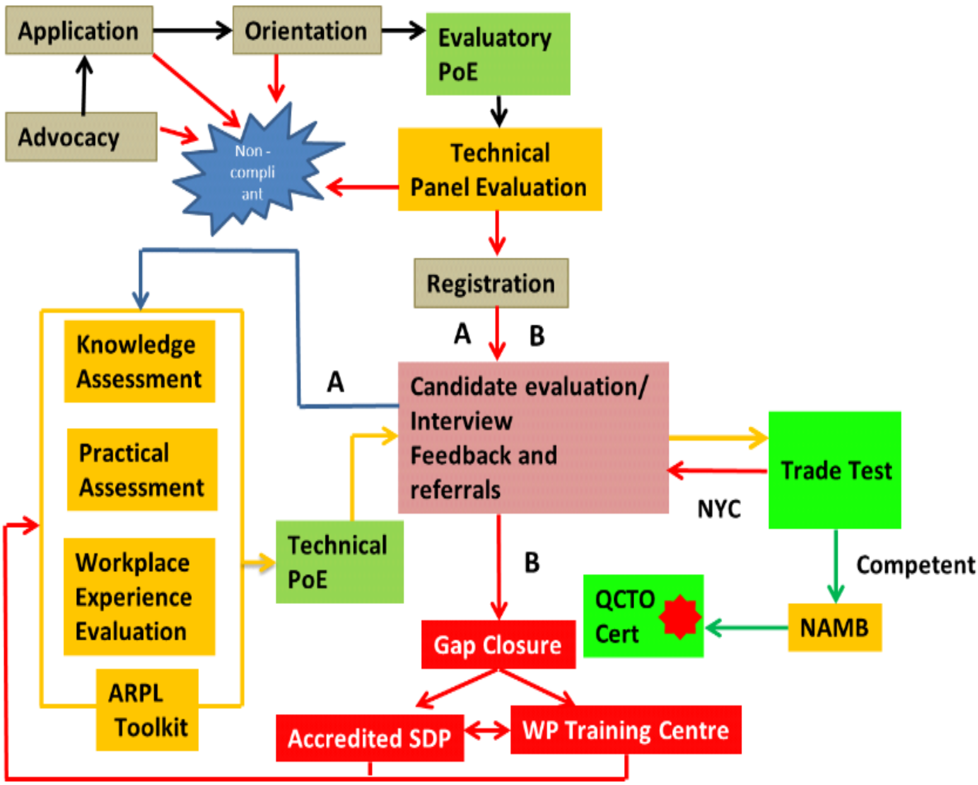
ARPL individuals, although having gained the necessary skills, never received formal training, testing and certification. With the opening up of labour market opportunities many candidates in the formal and informal economy have found themselves with skilled traders and craftsmen whose informal training and education has gone unrecognised and uncertified (DHET, 2015). The ARPL provides an access pathway to the trade test and a formal qualification for a large group of unqualified, but skilled and competent artisans with limited career growth and mobility across industries. According to DHET (2015), the goal of the ARPL is driven by the continuous need to redress historical imbalances in access to education and skills development, to improve access to a trade test as well as the national pass rate in trade test, and mitigate the reluctance by employers and learning institutions alike to give formal recognition to learning that has been acquired outside of formal institutions of learning or formal workplace training (Stuart, 2011). Formal recognition, through proper assessment processes, opens doors of opportunity for large numbers of adults, either for decent work and career advancement or for further learning.

ARPL candidates have accumulated years of trade experience in both the informal and formal economy but have never had the opportunity to turn this gained learning experience into a qualification. In 2013, the Department of Higher Education and Training piloted an ARPL model with the aim of developing a system that effectively addresses skills gaps existing in artisans employed in the informal economy.

Although skilled, unqualified artisans in informal employment often lack technical knowledge with no or very limited access to technical skills upgrading. This unfortunately extends the cycle of basic, low productivity and limited technical skills among workers. Stuart (2010) further writes that artisans may underperform because they do not possess the requisite technical and theoretical knowledge. As aides and assistants to qualified artisans, these individuals perform an essential function in ensuring the efficiency of the production process. On the other hand, their practical knowledge may compensate for the lack of theoretical and technical knowledge and needs to be met with efforts for certification through ARPL and formal skills upgrading (Stuart, 2010; Connellan, 2011).

The new guidelines for the ARPL process will change the current approach to what are commonly Section 28 ARPL candidates, as applicants will no longer allow individuals or groups to apply directly or walk into for the trade test, but instead, will have to follow the guidelines in the ARPL Toolkit, see Figure 6.

Figure 6. APRL Model



Source: NADSC (2019)

As shown in Figure 6, with the new artisan development system, ARPL candidates are required to take a self-evaluation assessment or interview in order to assess their trade test readiness. If gaps are identified, then then they will be referred for gap training. The completion of the gap training will result in the compilation of a technical Portfolio of Evidence (PoE), which is necessary to recommend candidates for trade testing (DHET, 2015). All candidates seeking access to a trade test must have accumulated at least five years' relevant verifiable work experience for a trade. The minimum years of work experience may be accumulated from various traceable employers or services provided to customers in the relevant trade, this is applicable to both the formal and informal economy. The trade test is designed to allow experienced candidates to attain a qualification even though they have not received formal training. The estimated cost of the ARPL assessment and testing is approximately R3000 at Indlela (DHET, 2018). False Bay TVET College offers fully funded ARPL training with the trade test. An effective TVET system is therefore a critical component of quality training for ARPL. A good quality TVET college system would promote access to the labour market and increase labour productivity for ARPL candidates. The certification of ARPL candidates through the Red

Seal certificate gives South African qualified artisans access to international market. This is because qualified artisans can earn high salaries in international markets compared to South Africa. Although Gordon (2012) notes that this has left South Africa with a deficit of qualified artisans in the past, the result is that local employers are prepared to pay improved salaries for qualified artisans.

The following section takes and in-depth examination of trades (plumbers and electricians) and the related educational trends in South Africa.

8.2.4 Focus: Plumbers and electricians

Plumbers and electricians (and artisans more broadly) are a critical skill component for any growing economy. These technical trades are intrinsically linked to both the manufacturing and the construction sectors, two core sectors of the real economy. There are currently over 2 million "craftsmen" and "tradespeople" employed in the South African economy; manufacturing employs just over 460,000 tradespeople while the construction sector employs over 800,000 tradespeople. According StatsSA (2016), 17,000 plumbers and 44,000 electrical contractors were employed in the construction sector accounting for 12.2% of employment in construction. Plumbers and electricians are also employed in insurance, government and manufacturing sectors.

Both plumbers and electricians feature on the DHET List of Skills/Occupations in High Demand - electricians are rated among skills with "Highest" demand, while plumbers are rated with "Higher" demand. The list is based on several sources including the Labour Market Intelligence Partnership (LMIP).

Most plumbers and electricians providing trade services in townships are unqualified artisans, because they can offer the same level of skills and competency as firms in the formal economy but at a lower cost (TIPS, 2019). The skills of the unqualified artisans operating in township areas are gaining demand as costs in the formal economy rise. Unqualified artisans are widely used by householders and smaller firms in township areas because of their relatively low rates and proximity (Altman, 2007).

The challenge is that many untrained staff members appear to be stuck in low levels of formal qualification with little opportunity for them to receive further formal training during their work time. Not surprisingly, many owner respondents reported that they did not send their staff on training, or that their staff was sufficiently trained. Plumbers that are licensed are not perceived by the market as being more valuable and qualified than unlicensed plumbers. Many firms in plumbing identified the importance of upskilling staff and improving their qualifications, which shows a demand for training and qualifying plumbers.

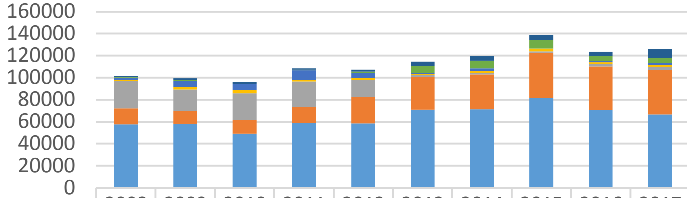
ARPL in plumbing and electrical can encourage a genuine movement out of informality. Plumbers operate as self-employed, informal or small businesses in South Africa. The plumbing industry is characterised by far more informal activity than formal, with the number of formal enterprises declining every year and the number of informal operations increasing. About 50% of formal self-employed plumbers and electricians have a university degree, or post matric diploma which includes artisan training. Tradesman with TVET qualifications or certificates or diplomas tend to earn the most, likely due to the sorts of qualifications being necessary to operate in the formal sector. Self-employed earn more than their employed counterparts, with difference being more pronounced among White tradesman and less for Black African and Coloured tradesman. The plumbing industry is in a gradual process of improvement and professionalisation. The industry is increasingly regulated. This means that formally registered and competent plumbers must compete against informal and unregistered plumbers, while at the same time consumers and the construction industry are under pressure to pay lower and lower fees. This undermines investment in the plumbing industry, which then directly affects skills development and improved productivity in the industry. The Plumbing Industry Registration Board (PIRB) has identified the need for ARPL in the industry and has begun putting together a strategy to assist candidates in navigating the ARPL process in partnership with training providers, industry and the Department of Higher Training and Education.

Figure 7 shows that there are many workers in the plumbing industry that have not completed matric. The number of workers with a matric qualification has increased to several times the number of workers with vocational qualifications. It is not clear what the experience levels of these workers are and whether they would qualify for ARPL to ensure that they are placed on an upgrading pathway. The findings indicated that the two sectors could be linked through a dedicated ARPL system backed by a process of gap training. In a stakeholder engagement with IOPSA, it was highlighted that employers are interested in the ARPL and getting their employees involved, however the concern is that it might be too costly for the company.

Jordaan *et al.,* (2016) argue that although ARPL works to qualify artisans, many firms would still rather employ fewer artisans and provide them with support. Jordaan *et al.,* (2016) further argues that economic restraints have forced the unqualified artisan to accept their subservient positions because jobs are scarce, and unless they hold onto their posts, they can be easily replaced. Firms may also resist the unqualified artisan's attempts to change their qualification status, because this would undermine firms' potential to earn extremely high profits.

From Figure 7, the number of employees without a matric has been growing, and so has the number of artisans with a matric. The latter may be the result of the more recent phenomenon of Grade 12 being the entry requirement. Although the level of experience of the individuals is unknown, it remains a concern that over 50 000 employees are 'stuck' in the trade with a formally recognised qualification, and therefore ARPL can play a vast and significant role in this field.

Figure 7. Highest qualifications of employees in plumbing



	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017
University qualification	946	1869	2107	1347	1711	4027	4299	4465	3985	7872
Certificate/diploma with matric	404	680	0	484	1358	6164	7074	7572	4484	4731
Certificate/diploma without matric	2094	5448	5233	8697	4532	927	2496	0	1153	1760
N4-N6	1266	2315	3211	1359	1677	1083	1813	2703	1402	1676
N1-N3	24595	19440	24258	23307	15380	1605	1041	1108	2259	2940
Matric	14592	11574	12397	14206	24142	29807	31741	40953	39632	40358
Incomplete matric	57507	58220	49060	59137	58452	70808	71292	81739	70580	66696

Incomplete matric
Matric
N1-N3
N4-N6
Certificate/diploma without matric
Certificate/diploma with matric
University qualification

Source: TIPS (2019)

8.2.5 Artisan population

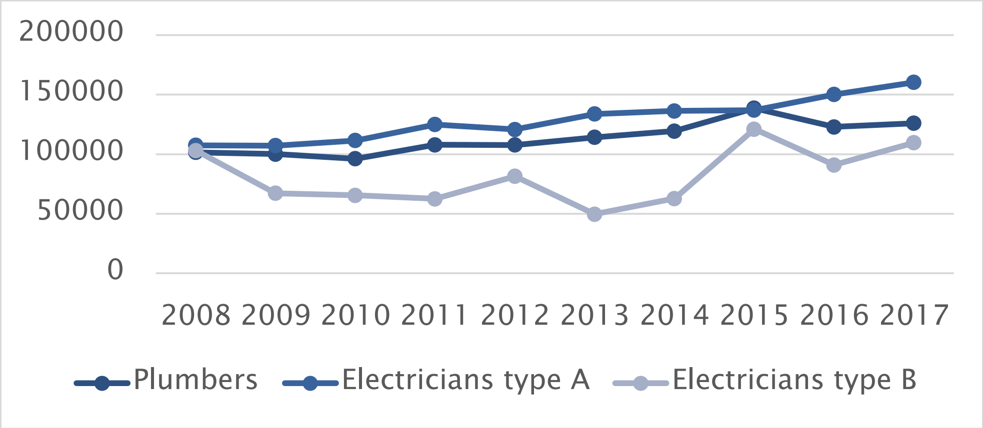
Figure 8 presents the number of plumbers and electricians[95] [96] across the period 2008-2017. Results suggest that there was a consistent increase in the number of plumbers and type A electricians[97]. The number of type B electricians, however, fluctuated across the period. These findings show that in 2017 there were approximately 125 000 plumbers, 160 000 type A electricians and 110 000 type B electricians. Due to the substantial degree of volatility in the number of type B electricians, the authors are not as confident regarding the current number of type B electricians as opposed to the number of plumbers and type A electricians in South Africa. Nevertheless, these estimates are likely to reflect the speciality of work done

[95] This portion of the report presents statistical analyses on plumbers and electricians using the Labour Market Dynamics (LMD) survey data (2008-2017) conducted by Stats SA

[96] Plumbers and electricians are derived from the occupation question asked in the survey which uses the South African Standard Classification of Occupations (SASCO) 2003 codes. Classification 713 represents "Building finishers and related trade workers". Plumbers are derived from unit code 7136 and type A electricians are derived from unit code 7137. Classification 724 represents "Electrical and electronic equipment, mechanics and fitters". Unit codes 7241/7242/7243/7245 represent type B electricians.

by type B electricians, where such a job market may exhibit greater volatility than that of plumbers and type A electricians.

Figure 8. Number of tradesmen, 2008-2017

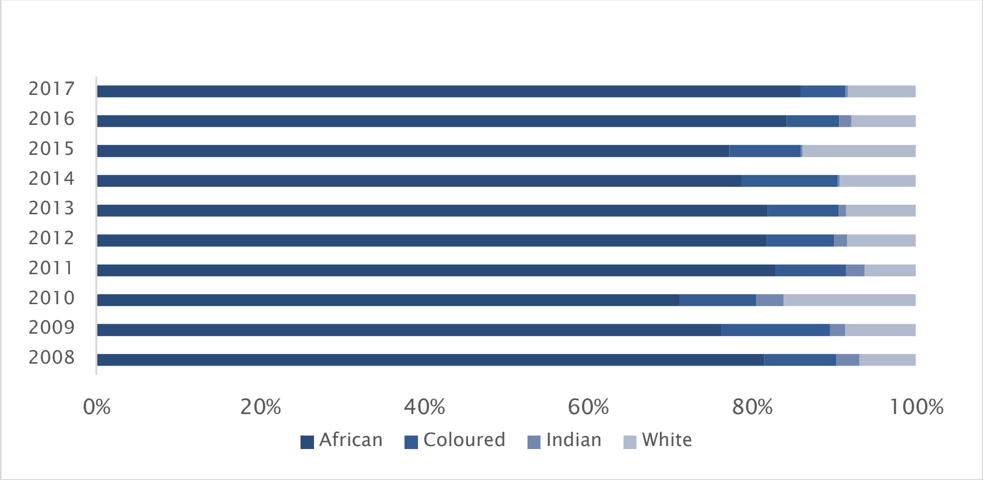


Source: TIPS (2019).

Racial composition

The following figures respectively illustrate the proportion of Black Africans, Coloureds, Indians and Whites who identify themselves as plumbers, type A electricians and type B electricians.

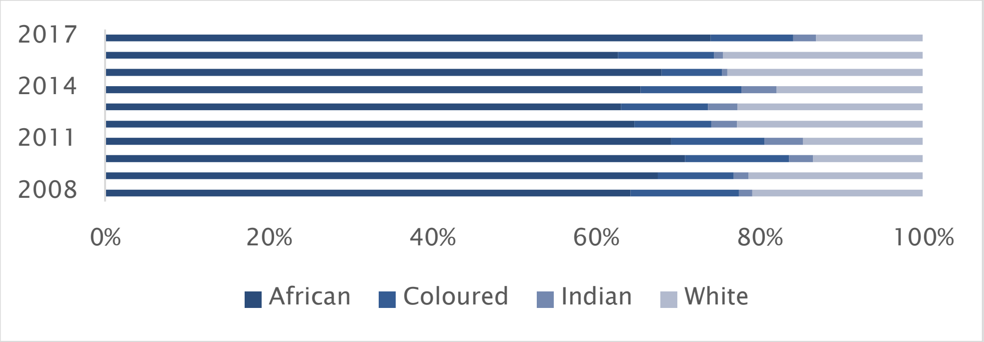
Figure 9. Plumbers by race, 2008-2017



Source: TIPS, 2019.

It is unsurprising that Figure 9 shows the largest portion of plumbers to be Black African, as the LMD is a nationally representative survey and Black Africans are the largest race group in South Africa. Nevertheless, these results show that Indians form the smallest portion of plumbers, and the proportion of Coloured plumbers is slightly less than the proportion of White plumbers. The overall racial composition has not changed drastically over the survey period, but a point of note is the dwindling portion of Indian plumbers (2.8% in 2008 as compared to 0.3% in 2017).

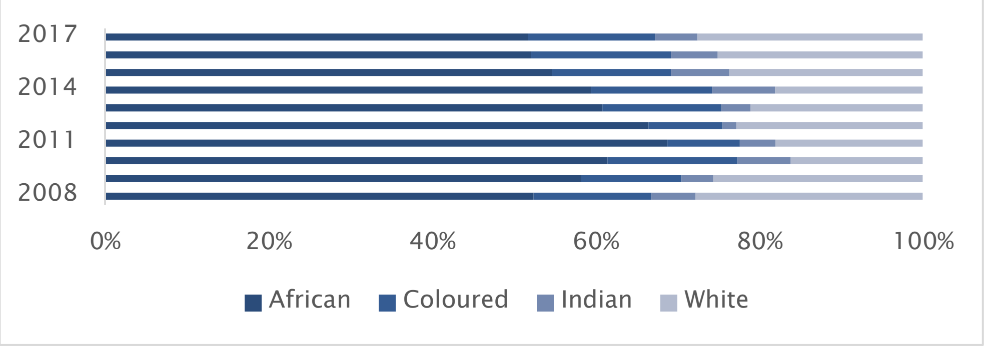
Figure 10. Type A electricians by race, 2008-2017



Source: TIPS, 2019.

Figure 10, which presents the racial composition of type A electricians, largely follows the racial distribution of plumbers in Figure 9. The key difference, however, is that there is a considerably greater proportion of White Type A electricians. Although this report is not intended to be a comparative analysis of plumbers and electricians in terms of racial demographics, results suggest that there is a greater concentration of Whites working as electricians relative to Whites working in the plumbing industry. This point is further accentuated in Figure 11, which shows that White type B electricians make up approximately 25% of all type B electricians.

Figure 11. Type B electricians by race, 2008-2017



Source: TIPS (2019).

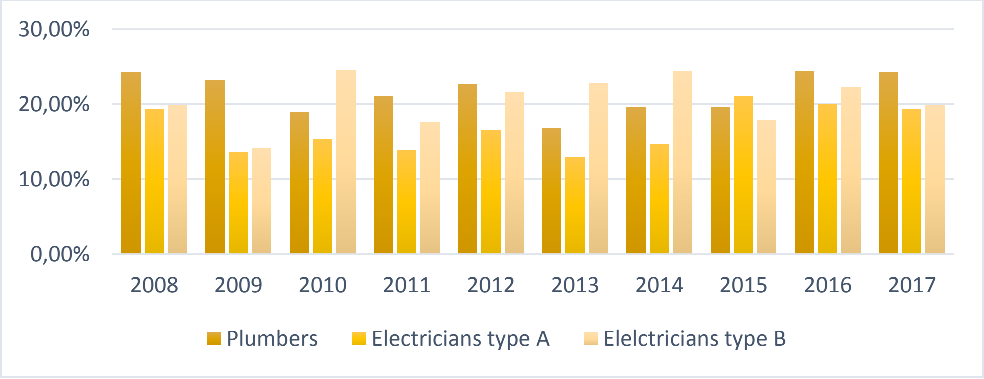
Informality

Informality has different economic consequences for the plumbing and electrical industries. Consumer protection laws and regulations in South Africa are making it harder for people to prosper in the informal sector (TIPS, 2019). In plumbing, regulations are focused on the installation and maintenance of hot water systems. In the electrical field, the regulations are more restrictive because of the dangers and liabilities involved in illegal or unregulated electrical work (TIPS, 2019). All suitably qualified persons are required by law to register with the Department of Labour before they may work on electrical equipment or infrastructure. This means that in the electrical field informality is undesirable, however it still exists.

It is illegal for employers to hire workers without drawing up a proper contract. In addition to this, it is illegal for any person to work on the electrical wiring system or systems of a building or perform any maintenance on electrical equipment unless they have the appropriate qualifications, but this is much harder to regulate in the informal industry where consumers are not as well informed about their rights. The implication is that informal electrical contractors who employ workers informally violate the law on several grounds.

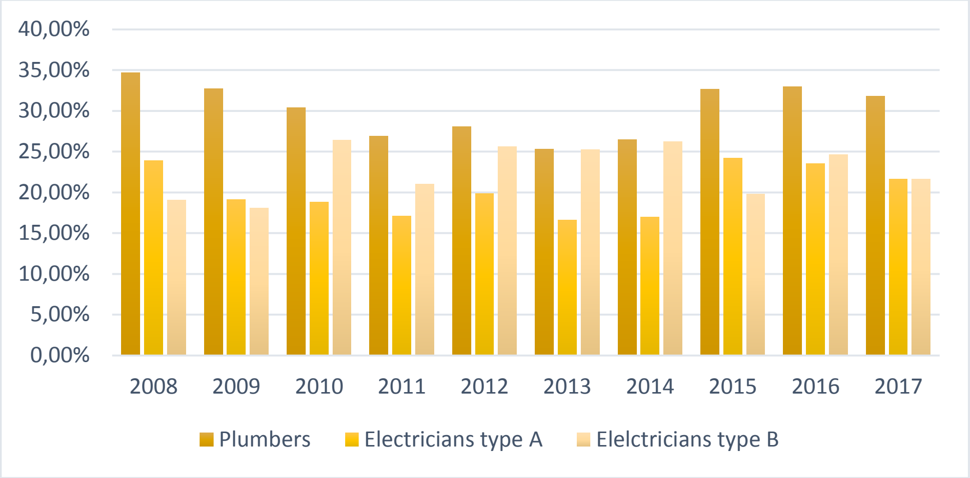
The LMD provides two measures of the informality of work: informal sector (of operation) and informal employment. The informal sector variable is derived from a logical series of questions pertaining to whom the respondent works for; whether the respondent reports income tax deductions; whether the respondent's place of employment is registered for VAT; whether the respondent's place of employment is registered for income tax; and the number of employees in the organisation. The indicator of informal employment is extended to identify those respondents that are in precarious employment positions such as those working but not receiving pay, those receiving pay but not entitled to basic benefits and those working in the informal sector. Figure 12 and Figure 13 respectively present the proportion of tradesmen who report working in the informal sector and in informal employment.

Figure 12. Proportion of tradesmen working in the informal sector, 2008-2017



Source: TIPS (2019).

Figure 13. Proportion of tradesmen working in informal employment, 2008-2017



Source: TIPS (2019).

The proportion of all tradesmen working in informal employment is larger than the proportion of tradesmen working in the informal sector across all years, except for type B plumbers in 2008. This is expected since informal employment also considers whether respondents work in the informal sector. It is therefore troubling that the results indicate consistently higher rates of informal employment compared to the proportion of tradesmen working in the informal sector, sometimes substantially larger. This reflects the precarious work many tradesmen find themselves in.

Despite not receiving basic benefits (it is unlikely that these respondents do not earn any pay), the greater issue is that this type of employment is likely to be subject to greater vulnerability and less certainty of future work thus making these tradesmen more susceptible to spates of unemployment.

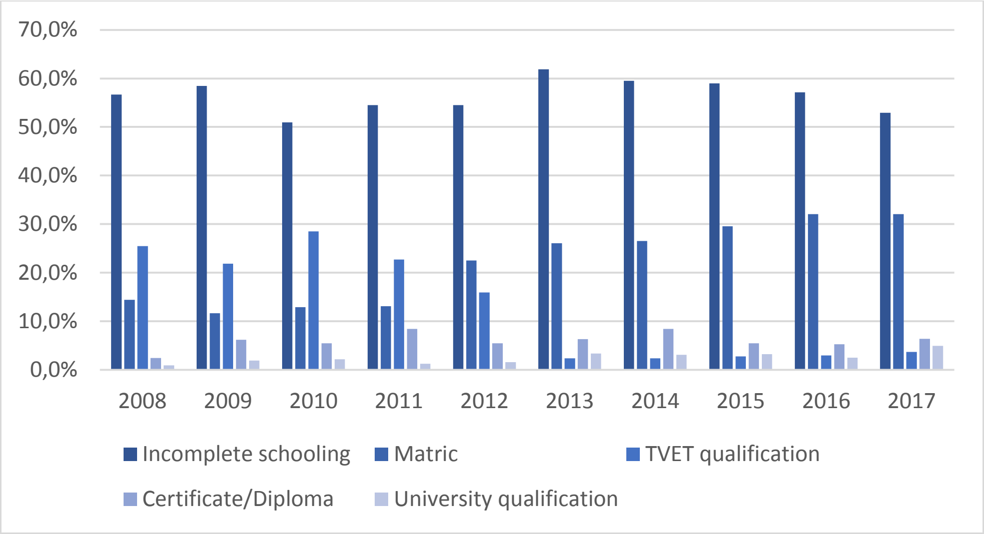
Plumbers and electricians only make up a fraction of those who work in the construction industry, thus making it difficult to draw reliable conclusions as to whether their informality rates are troubling. Nevertheless, the above findings suggest that there is a greater degree of informality (sector and employment) in the construction industry than for plumbers and both types of electricians. This feature is more pronounced for informal employment, as the rate of informal employment in the construction industry is approximately 45% across the period whereas the highest proportion of any tradesmen working in informal employment is less than 35%. The proportion of tradesmen working in the informal sector is lower than the industry average but not by much.

8.3 Skills & Qualifications

The LMD captures respondents' highest level of education successfully completed. For the following analysis, education is separated into five categories: incomplete education (less than grade 12), matric (grade 12), TVET qualification (N1-N6/NTC1-NTC6), Certificate/Diploma (with and without matric) and university qualification (bachelors and postgraduate qualifications).

Figure 14 shows the highest level of education successfully completed by plumbers. The proportion of plumbers that have not completed education is disturbing, as the percentage exceeds 50% for all years. In earlier years, the second largest category for plumbers had attained a TVET qualification. It is very concerning that post-2010 there has been a consistent decline in the proportion of plumbers who have a TVET qualification. In 2017, only 3.7% of plumbers had a TVET qualification.

Figure 14. Plumbers' highest level of education, 2008-2017



Source: TIPS (2019).

Table displays the mean age of plumbers by highest level of education successfully attained corresponding to the analysis from Figure 14. The ages of plumbers with incomplete education is particularly troubling as respondents in their late 30s/early 40s are quite unlikely to go back into the education system and graduate as qualified plumbers. The ARPL is well suited to target unqualified plumbers in their late 30s/40s as these workers are not only skilled, but they are also highly likely to possess the five years of experience required to register for the ARPL programme. The average ages for plumbers with a matric tend to be much lower than plumbers with incomplete education. Since these estimates are averages, these findings suggest that are plumbers in their 20s who may be brought into the formal space by getting them qualified. Figure 14 showed a decline in the proportion of plumbers with a TVET qualification post-2012. It is quite perplexing to note the increase in the average age of plumbers with a TVET qualification after 2012. One would expect the decline in TVET qualified plumbers to be a result of retiring plumbers which should translate to lower mean age, but results suggest quite the contrary.

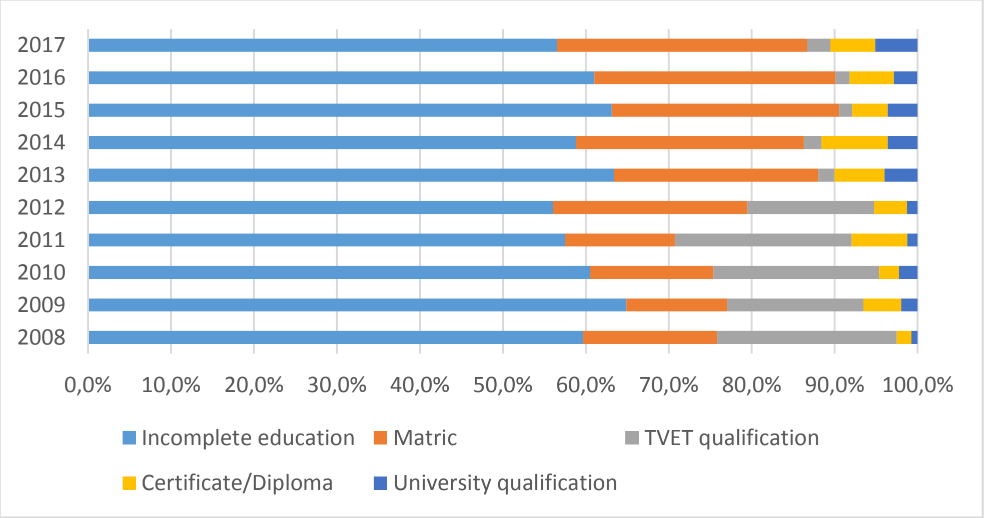
Table 1: Plumbers' highest level of education and average age, 2008-2017

PLUMBERS' EDUCATION	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017
INCOMPLETE EDUCATION	57%	58%	51%	54%	55%	62%	60%	59%	57%	53%
MEAN AGE	**39**	**41**	**42**	**40**	**41**	**40**	**39**	**38**	**38**	**38**
MATRIC	14%	12%	13%	13%	23%	26%	27%	30%	32%	32%
MEAN AGE	**31**	**35**	**32**	**34**	**35**	**36**	**34**	**35**	**36**	**36**
TVET QUALIFICATION	26%	22%	29%	23%	16%	2%	2%	3%	3%	4%
MEAN AGE	**35**	**35**	**34**	**37**	**35**	**40**	**39**	**41**	**35**	**37**
CERTIFICATE/DIPLOMA	2%	6%	5%	8%	5%	6%	8%	5%	5%	6%
MEAN AGE	**41**	**37**	**39**	**35**	**38**	**37**	**39**	**37**	**39**	**40**
UNIVERSITY QUALIFICATION	1%	2%	2%	1%	2%	3%	3%	3%	3%	5%
MEAN AGE	**41**	**36**	**38**	**36**	**43**	**46**	**43**	**40**	**41**	**47**

Source: TIPS (2019)

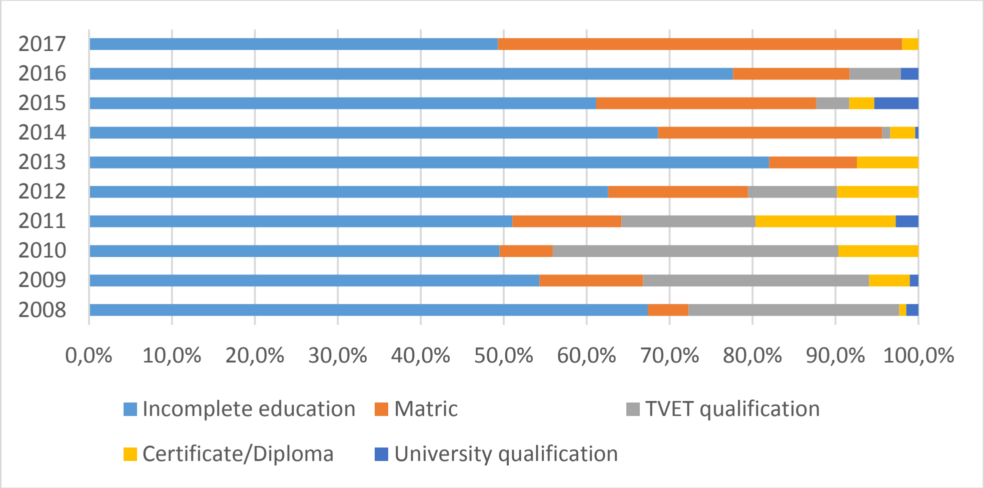
To further decompose the trends in the education of plumbers, the following figures display the highest education level attained by race.

Figure 15. Black African plumbers' highest level of education, 2008-2017



Source: TIPS (2019).

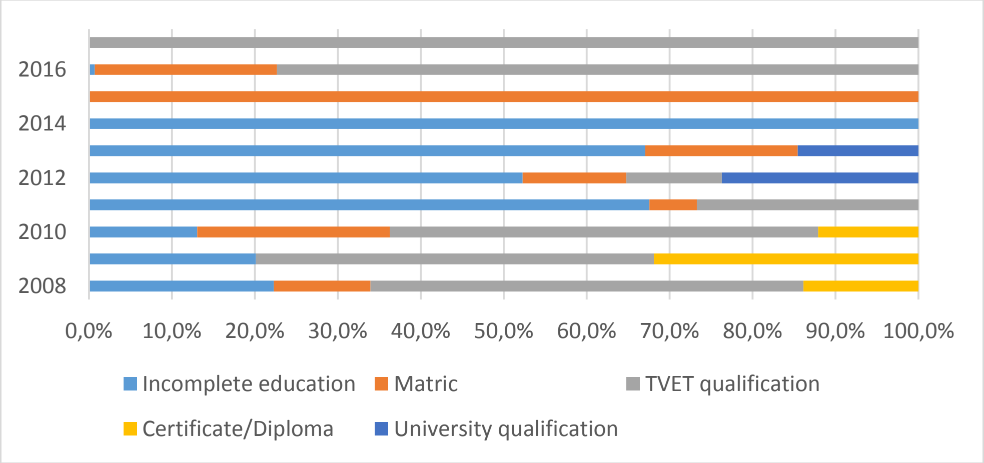
Figure 16. Coloured plumbers' highest level of education, 2008-2017



Source: TIPS (2019).

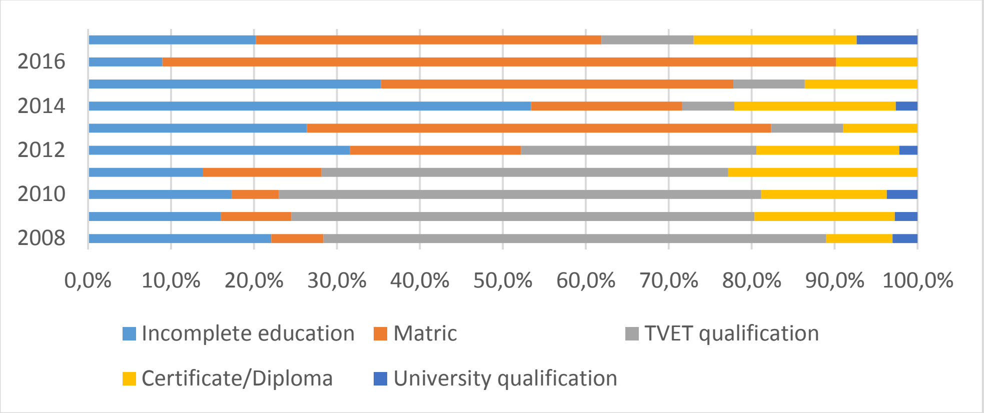
Black African and Coloured plumbers display a similar pattern in their education levels although the rate of incomplete education for Coloured has varied considerably across the period. For Whites however, their education estimates differ substantially compared to the other races. The overall finding regarding the education of plumbers relevant to this report is that there has been a substantial decrease in the rate of TVET qualifications. It is therefore interesting to see that all race groups are contributing to this patter with a consistent contraction in the proportion of plumbers reporting TVET qualifications post-2012.

Figure 17. Indian plumbers' highest level of education, 2008-2017



Source: TIPS (2019).

Figure 18. White plumbers' highest level of education, 2008-2017

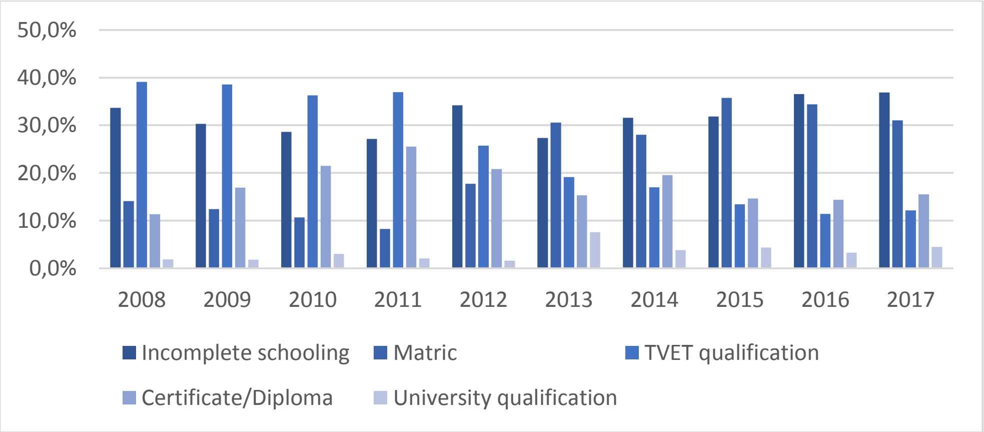


Source: TIPS (2019).

Prior to comparing plumbers' education by race, and in general for all racial comparisons, it is imperative to note that the sample size for Indian plumbers is very small. Nevertheless, corresponding estimates are presented for all race groups for the purpose of completeness.

Figure 19 displays the highest level of education successfully completed by type A electricians. The findings for type A electricians with respect to the proportion that have successfully attained a TVET qualification is very worrying. Across the survey period there has been a consistent decline in the proportion of type A electricians who possess 'technical skills' (39% in 2008 and 12% in 2017). However, since 2013 the decline in TVET qualifications has been matched with an increase in the proportion of respondents who have successfully completed matric. This may translate to higher TVET qualification in future.

Figure 19. Type A electricians' highest level of education, 2008-2017



Source: TIPS (2019).

Table 2. Type A electricians' highest level of education and average age, 2008-2017.

TYPE A ELECTRICIANS' EDUCATION	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017
INCOMPLETE EDUCATION	34%	30%	29%	27%	34%	27%	32%	32%	37%	37%
MEAN AGE	**40**	**40**	**42**	**41**	**39**	**38**	**40**	**40**	**40**	**41**
MATRIC	14%	12%	11%	8%	18%	31%	28%	36%	34%	31%
MEAN AGE	**33**	**35**	**34**	**34**	**37**	**36**	**36**	**35**	**35**	**36**
TVET QUALIFICATION	39%	39%	36%	37%	26%	19%	17%	13%	11%	12%
MEAN AGE	**36**	**35**	**36**	**37**	**38**	**38**	**35**	**40**	**41**	**37**
CERTIFICATE/DIPLOMA	11%	17%	22%	26%	21%	15%	20%	15%	14%	16%
MEAN AGE	**34**	**34**	**34**	**37**	**38**	**38**	**37**	**36**	**39**	**39**
UNIVERSITY QUALIFICATION	2%	2%	3%	2%	2%	8%	4%	4%	3%	4%
MEAN AGE	**33**	**39**	**40**	**35**	**45**	**40**	**41**	**43**	**45**	**44**

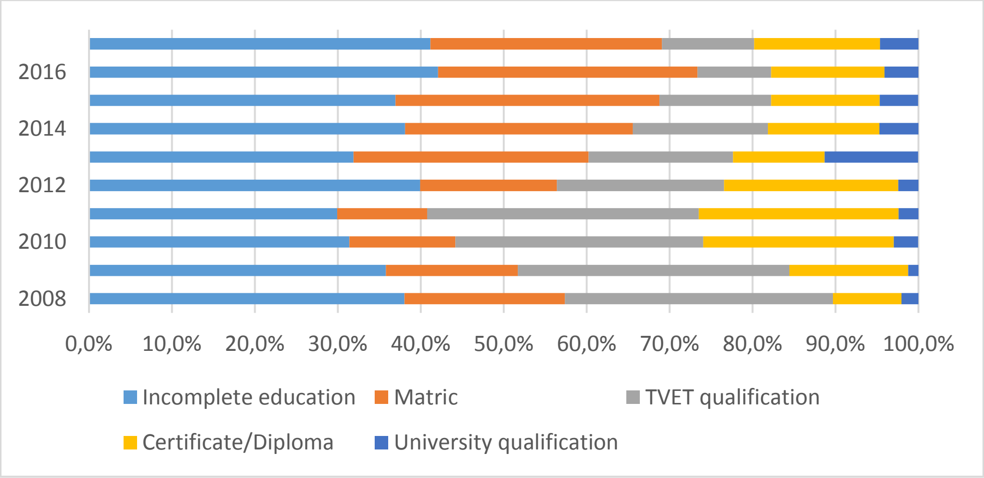
Source: TIPS (2019).

On average, the oldest type A electricians have either attained a university qualification or have not completed secondary education. These estimates enable inference regarding the age of type A electricians operating in different spaces based on their qualification.

The mean ages, however, do not explain the declining proportion of type A electricians with a TVET qualification as there does not seem to be an adequately large change in the average age corresponding to the period of declining TVET qualifications.

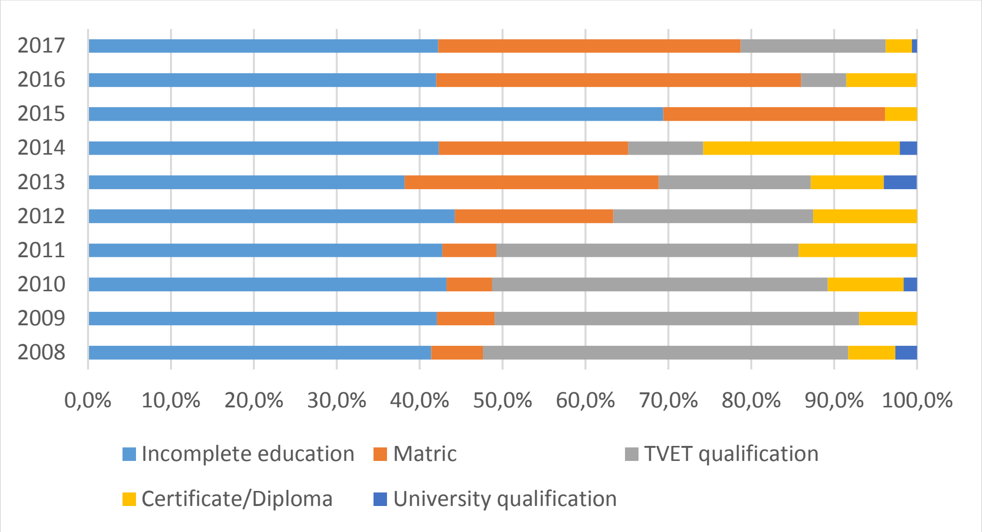
As in the case of plumbers, the following figures decompose education by race for type A electricians.

Figure 20. Black African type A electricians' highest level of education, 2008-2017



Source: TIPS (2019).

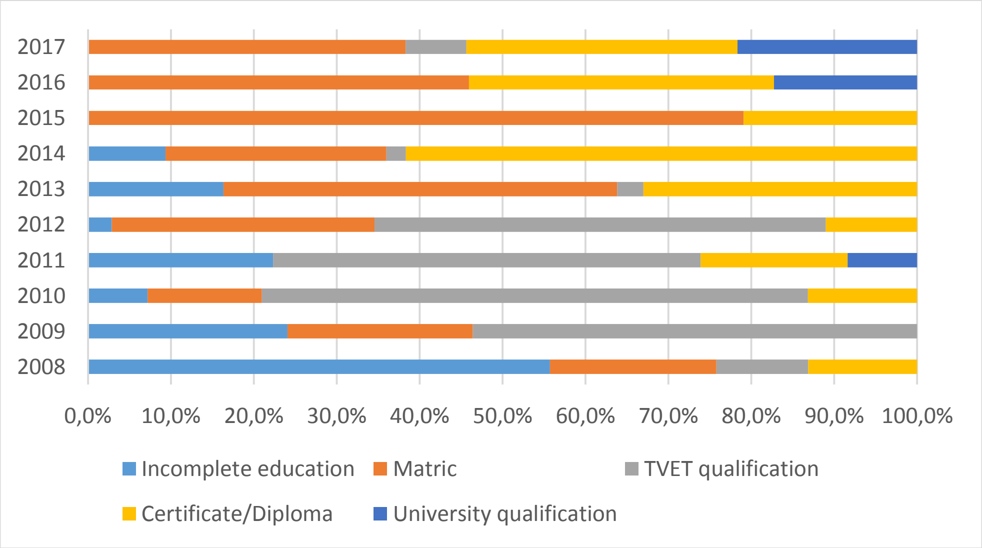
Figure 21. Coloured type A electricians' highest level of education, 2008-2017.



Source: TIPS (2019).

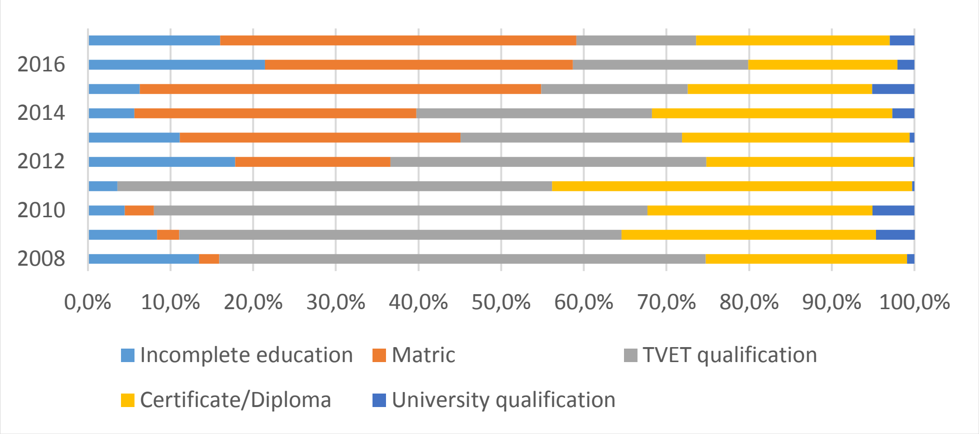
Figure 20 and Figure 21 shows the highest level of education successfully completed by Black African and Coloured type A electrician, respectively. With the exception of 2016, these results are quite similar and show that the largest portion of tradesmen in these groups do not possess a formal qualification.

Figure 22. Indian type A electricians' highest level of education, 2008-2017



Source: TIPS (2019).

Figure 23. White type A electricians' highest level of education, 2008-2017

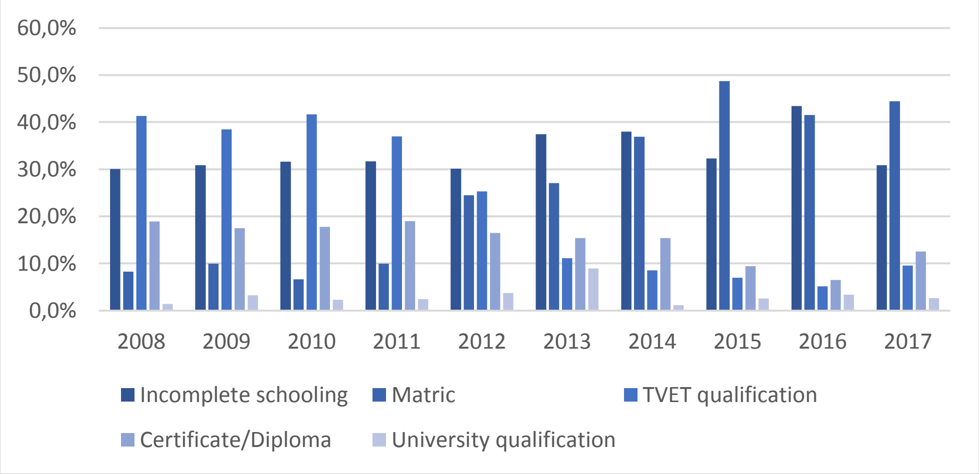


Source: TIPS (2019).

Most Whites have some post school education or training, although this proportion has been decreasing in recent years. Nevertheless, these findings not only represent the difference in education levels of type A electricians by race but also enable inference regarding which spaces these respondents operate in. These findings also lay the foundation for the income analysis by race to follow later in the report.

Figure 24 presents the highest level of education successfully completed by type B electricians.

Figure 24. Type B electricians' highest level of education, 2008-2017



Source: TIPS (2019).

It is somewhat perplexing to find that the trend in TVET qualifications across the survey years for type B electricians mirrors that of type A electricians, especially since the job requirements of type B electricians are likely to necessitate specialist skills. It may be that there were many older electricians retiring and being replaced by younger ones. Nevertheless, the results are troubling and necessitate further investigation.

Table 3: Type B electricians' highest level of education and average age, 2008-2017

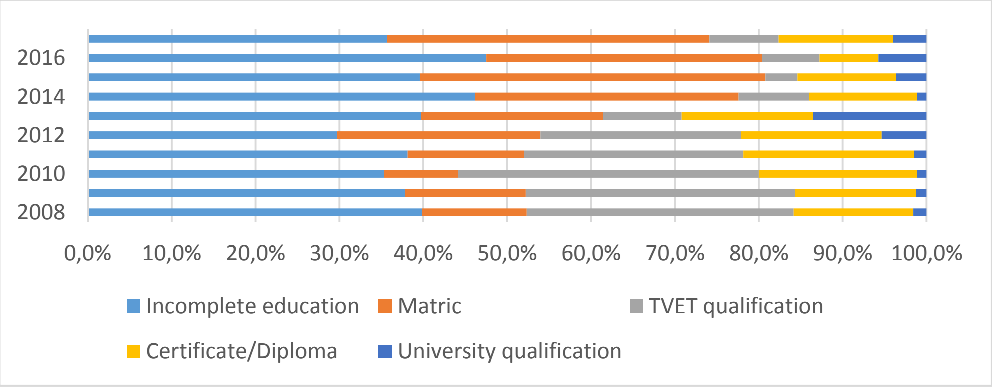
TYPE B ELECTRICIANS' EDUCATION	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017
INCOMPLETE EDUCATION	30%	31%	32%	32%	30%	37%	38%	32%	43%	31%
MEAN AGE	**40**	**40**	**40**	**40**	**38**	**36**	**41**	**39**	**38**	**39**
MATRIC	8%	10%	7%	10%	24%	27%	37%	49%	42%	44%
MEAN AGE	**36**	**37**	**32**	**40**	**37**	**38**	**36**	**35**	**36**	**36**
TVET QUALIFICATION	41%	38%	42%	37%	25%	11%	9%	7%	5%	10%
MEAN AGE	**35**	**36**	**34**	**37**	**37**	**43**	**37**	**40**	**33**	**32**
CERTIFICATE/ DIPLOMA	19%	17%	18%	19%	16%	15%	15%	9%	6%	13%
MEAN AGE	**35**	**38**	**36**	**36**	**38**	**37**	**34**	**39**	**33**	**39**
UNIVERSITY QUALIFICATION	1%	3%	2%	2%	4%	9%	1%	3%	3%	3%
MEAN AGE	**43**	**43**	**35**	**33**	**38**	**38**	**37**	**52**	**49**	**37**

Source: TIPS (2019).

Table 3 refutes the previous notion that the decline in the proportion of type B electricians is due to a substantial number of older electricians retiring. The age analysis presented here does not provide reasonable evidence to suggest a substantial change in the average age of respondents in general. Although these estimates provide important insight into these respondents, further analysis is needed to identify the reason for the decline in the proportion of qualified tradesmen.

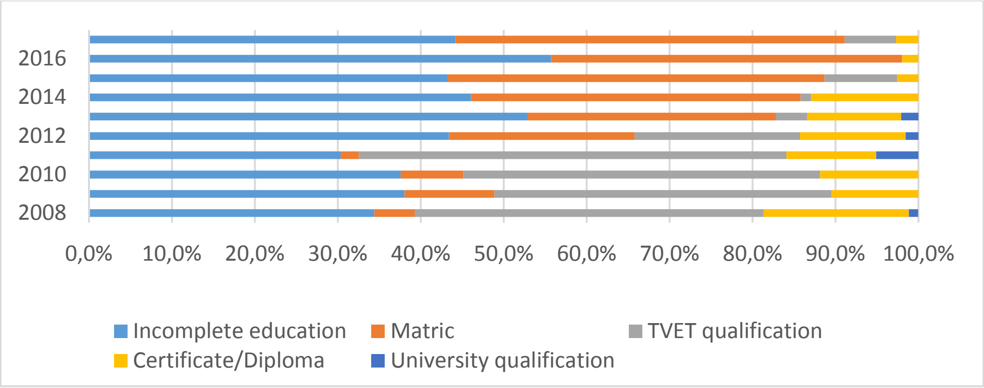
The following figures present the education estimates for type B electricians by race.

Figure 25: Black African type B electricians' highest level of education, 2008-2017.



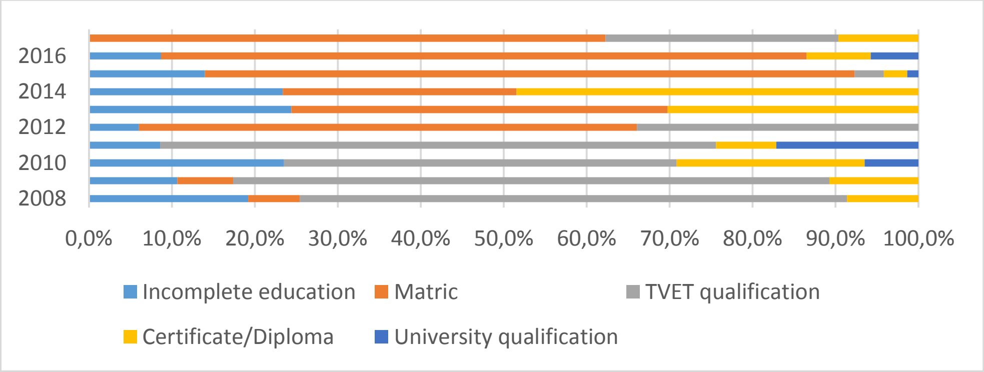
Source: TIPS (2019).

Figure 26. Coloured type B electricians' highest level of education, 2008-2017.



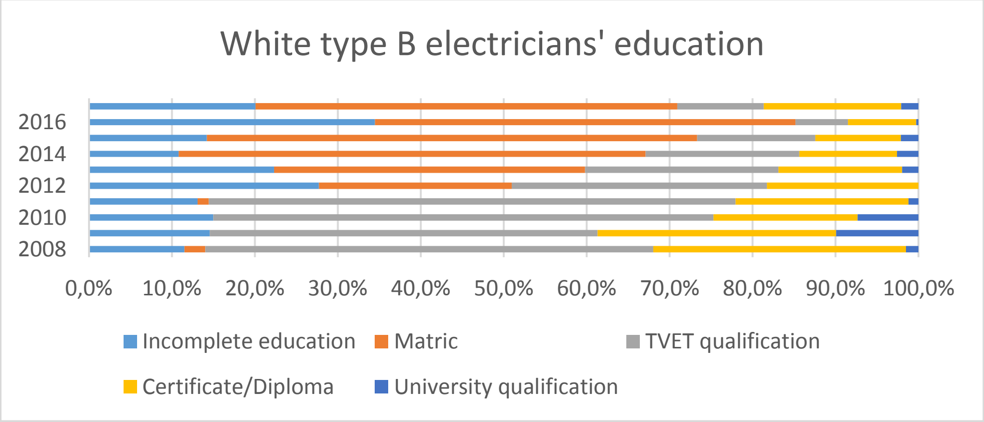
Source: TIPS (2019).

Figure 27. Indian type B electricians' highest level of education, 2008-2017.



Source: TIPS (2019).

Figure 28. White type B electricians' highest level of education, 2008-2017



Source: TIPS (2019).

These estimates follow the previous results for the education of plumbers and type A electricians by race: lack Africans and Coloureds display similar education level proportions, while Whites have high levels of post schooling education, with the general trend being a decrease in TVET qualifications for all tradesmen across the analysis period. However, there are two salient differences. In recent years there has been a greater proportion of Black African Type B electricians with post school qualifications relative to Coloureds and, very alarmingly, the decline in the proportion of White TVET graduates seems to be replaced by respondents with incomplete education.

8.4 Key Insights

8.4.1 Scope for increased Certification and Qualifications through RPL

This research confirmed that a strategy should be developed to successfully link informal and formal artisan training, through focused training opportunities resulting in a successful ARPL process. The plumber and electrician data illustrate the extent of skilled artisans not formally qualified.

The ARPL programme is key for upskilling experienced workers who may be 'stuck' in a job with no apparent prospects for advancement. The government, together with industry, should develop a shared understanding of ARPL opportunities for existing unqualified workers. Moreover, the ARPL process must be acceptable and trustworthy to industry.

The government can subsidise the ARPL through incentives for employers. There are also macro-economic interventions related to rising demand for infrastructure investment for example, that is more supportive of long-term accumulation by small and medium sized firms.

8.4.2 Certification and Qualification increases outcomes for artisans

The analysis firstly presented the number of plumbers, type A electricians and type B electricians across the period 2008-2017. There was an overall increase in the number of tradesmen throughout the analysis period. This was also the case when considering the proportion of tradesmen relative to the work force. However, in proportional terms, there were fewer type B electricians in 2017 than there were in 2008.

In terms of the racial composition of tradesmen, Black Africans were the largest race group among all tradesmen. The racial decomposition of tradesmen revealed two prominent findings: (1) The proportion of Indians working as plumbers decreased substantially between 2008 and 2017, although there were few Indians working as plumbers in the first place; and (2) there is a substantially larger portion of Whites working as electricians than as plumbers, and among electricians, there is a greater proportion of White Type B electricians than there are White Type A electricians.

The incomes of all tradesmen have increased in nominal terms over the period 2008-2017. Compared to electricians (especially type A), plumbers' incomes are much lower with the majority earning less than R5 000 per month. Tradesmen who possess TVET qualifications or certificates or diplomas tend to earn the most, which is likely due to the fact that these sorts of qualifications are necessary operate in the formal sector. Black

Africans and Coloured earn similar incomes, while White tradesmen earn the most. This finding follows from the education analysis by race, where White respondents exhibit high proportions of post school education. A key finding from this report is that although self-employed tradesmen earn more than their employed counterparts, this premium is more pronounced among White tradesmen than among Black African and Coloured tradesmen for whom it is quite small. This is likely due to a high proportion of Black African and Coloured respondents working in the informal sector.

8.5 Conclusion and Recommendations

Significant and large industries, such as manufacturing and construction, employ and provide livelihoods to many and contribute to GDP. Large employers and small firms are able to improve conditions and qualifications for artisans by supporting upskilling and certification of their employees. As highlighted by the ARPL, there are pathways for informal, skilled artisans to acquire formal qualifications. This would expand the scope for professionalisation and formalisation of especially informal businesses, increasing incomes and quality-assured services to clients.

From this perspective, a collaborative model relating to the TVET curriculum should be developed where industry would take an active and leading role in providing contemporary skills by collaborating and establishing networks with the government and other curriculum development bodies, thereby minimising the current misalignment between TVET colleges and industry. A comprehensive strategy needs to be developed outlining industry’s involvement. All artisan related training, whether in private or public institutions should be delivered according to industry requirements, and industry should also lead in designing trade test tasks. Ideally, government should design the necessary policies and regulations tailored to facilitate what industry needs from stakeholders in artisan development. A Monitoring and Evaluation process should be implemented to assist with improving the performance of TVET colleges in artisan training and achieve throughput targets for TVET learners who complete an artisan programme and quality as an artisan.

Finally, TVET college management also needs to be proactive and forge partnerships with industry – with accurate market insights from industry on the demand and supply of artisans and the types of trades, TVET colleges should then train learners according to what industry and the economy need. Previous studies had shown that industry is willing to offer workplace exposure and technical learning opportunities for TVET instructors, however these efforts have not materialised because of rigid TVET structures. This provides for a short to medium term solution that equips instructors with the technical knowledge they need to conduct effective training at TVET colleges.

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Part 3: Policy challenges of newer forms of informality

Chapter 9

Dependent Self-Employment and newer Forms of informal Employment: Trends, Challenges and Policy Responses in the EU

Colin C Williams and Frédéric Lapeyre

Over the past few decades, there has been recognition that the 'standard employment relationship' (SER) of formal, full-time and permanent waged employment is becoming ever less the standard relationship. Given that the SER has been the key vehicle for allocating rights and social protection, its diminution poses challenges for the operation of regulatory frameworks and raises issues regarding working conditions, rights and benefits. This challenge to the SER is coming from not only non-standard forms of employment (NSE) such as part-time, fixed-term and agency employment (Hatfield, 2015; Eichhorst *et al.*, 2013; Pedersini and Coletto, 2010), but also a growing participation in both undeclared work and self-employment, neither of which is usually covered by the umbrella of protective rights for the worker and responsibilities for the employer. Although protective rights are being gradually extended to employees in NSE in many countries (ILO, 2016), this has not been often the case for the 'self-employed', who have been treated as a residual group largely outside of the purview of labour standards and regulation. This is because they are not perceived to have an employment relationship with their clients, but rather a contract for services or civil contract with those to whom they supply their labour.

However, the growth of self-employment in general, and 'dependent' self-employment more particularly, whereby workers are self-employed but have a *de facto* - if not *de jure* -employment relationship, not least because they only work for one employer, has led to a burgeoning literature on dependent self-employment (Kautonen *et al.*, 2010; Thörnquist, 2014, 2015). This has highlighted both the growing prevalence of such dependent self-employment and the potentially precarious working conditions of those in such an employment relationship. The aim of this chapter is to contribute to this small but rapidly expanding literature, by charting not only the trends in dependent self-employment in the EU but also the challenges that result from its emergence and the potential policy measures that might be taken.

Technological changes are transforming the nature and quality of existing and new jobs. The expansion of work organised through online platforms and mobile device applications (apps), such as Uber and Lyft, has provoked a debate on whether the dependent self-employed often found in these realms need to be reclassified as dependent employees or they should be reclassified in a new, third category of workers, somewhere between dependent employment and self-employment, so that such workers enjoy protections typically associated with traditional employment relationships. In short, this is a debate not about making all work standard but all work decent. It is about securing decent work that is productive and delivers a fair income;

that ensures security in the workplace and social protection for families, better prospects for personal development and social integration, freedom for people to express their concerns, organize and participate in the decisions that affect their lives, and equality of opportunity and treatment for all women and men (ILO, 2016).

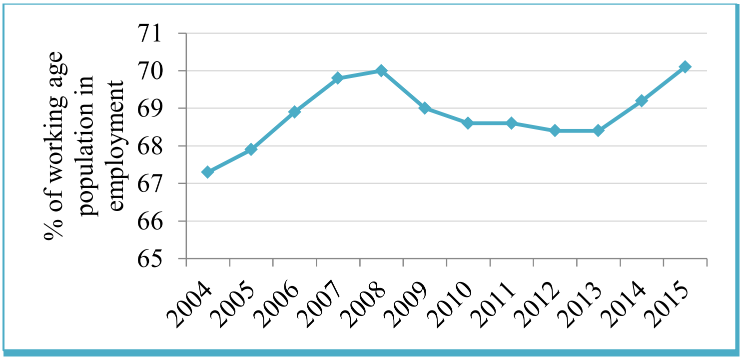
To commence, the next two sections show employment trends in the European Union in terms of employment participation rates and the changing nature of employment relationships, especially about the growth of self-employment. The next section then reports the evidence from the 2015 European Working Conditions Survey on the prevalence and nature of dependent self-employment in the EU, including the job quality and working conditions of workers in this form of employment relationship. The fourth section then turns attention to what can be done about dependent self-employment and the final section to the implications for the future of work.

9.1 Employment Trends in the European Union

9.1.1 Employment participation rates

Across the EU, social inclusion is largely equated with insertion into employment. The barrier to achieving social inclusion, however, is that there is a significant gap between the employment participation rate and full-employment. Figure 1 displays that in 2015, 70.1% of the working age population (aged 20-64 years) in the EU28 were in jobs. For all working age citizens to be employed in the EU28, therefore, there would need to be a 43% increase in the number of jobs (i.e., one additional job for every 3.3 jobs that currently exist). However, the Europe 2020 strategy seeks only to achieve a 75% employment participation rate for people aged 20 to 64 by 2020. How the 1 in 4 working age people that will remain jobless is to be socially included has been little discussed.[98]

Figure 1. Employment rate of population in EU28, aged 20-64



Source: Eurostat

[98] This will require consideration of not only the distribution of employment across the population (e.g., issues such as the six-hour day or lifetime hours of employment), but also whether income and employment should continue to be inextricably tied together, or whether a guaranteed basic income independent of one's economic activity might be a way forward (van Parijs, 2004).

It is not only the quantity of jobs (i.e., the 'jobs gap') that is problematic in the EU28. So too is the type and quality of employment being created, exemplified by the emergence of new forms of NSE and the increase in the 'working poor', meaning that not all are equally 'socially included' through their insertion into employment (ILO, 2016).

9.1.2 Beyond the standard employment relationship (SER)

The 'standard employment relationship' generally refers to an employment relationship that is full-time, open-ended, and based on a direct subordinate and bilateral employment relationship between an employee and employer (ILO, 2016). Non-standard forms of employment (hereinafter 'non-standard employment', or 'NSE') thus comprise four alternative employment arrangements, namely:

1. Temporary employment: fixed-term contracts including project- or task-based contracts; seasonal work; and casual work, including daily work;
2. Part-time and on-call employment: normal working hours fewer than full-time equivalents, including zero-hour contracts;
3. Multi-party employment relationships, also known as 'dispatch', 'brokerage' and 'labour hire', which covers temporary agency work and subcontracted labour; and
4. Disguised employment, also known as 'dependent', 'sham', 'bogus' or 'misclassified' self-employment.

These, however, are all different forms of formal dependent waged employment. There are also two other forms of work that are not the SER, namely:

1. undeclared work, which covers 'any paid activities that are lawful as regards their nature but not declared to public authorities, taking account differences in the regulatory systems of the Member States' (European Commission, 2007: 2), for tax, social security and/or labour law purposes when it should be declared, and
2. self-employment. In the European Labour Force Survey (ELFS), self-employed persons are defined as working in their own business, farm or professional practice, who meet one of the following criteria: work for the purpose of earning profit; spend time on the operation of a business; or are currently establishing a business. A self-employed person is the sole or joint owner of the unincorporated enterprise (one that has not been incorporated, i.e. formed into a legal corporation) in which he/she works, unless they are also in paid employment as their main activity (in which case they are considered employees in the ELFS).

The emergence of NSE is problematic because working conditions and rights have been conventionally based on the SER. The SER in principle provides workers with high security in the labour market (due to its open duration), social benefits (i.e., social protection, unemployment benefits) and rights (i.e., representation rights) (Eurofound, 2012a). Workers in NSE, in terms of either the existence or duration of a contract, working hours, or type of employer, have conventionally had fewer rights and benefits. As such, NSE poses risks for workers, firms, labour markets and society.

For workers, NSE, especially when involuntary, is more likely to be detrimental compared with the SER in terms of job security, earnings due to wage penalties, control over hours, occupational health and safety risks (e.g., due to poor induction, training and supervision), social security inclusion (since short hours may lead to limited benefits during unemployment or retirement), on-the-job training, as well as representation and voice. For firms, over-reliance on NSE can gradually erode firm-specific skills, limiting its ability to respond to changing market demand. Although there may be some short-term cost and flexibility gains from NSE, in the long run, these may be outweighed by productivity losses. There is evidence that firms using NSE more, tend to underinvest in training, both for temporary and permanent employees, as well as in productivity-enhancing technologies and innovation. For labour markets and society, meanwhile, the widespread use of NSE leads to labour market segmentation and greater volatility in employment with consequences for economic stability (ILO, 2016).

NSE, therefore, is characterised by a higher degree of decent work deficits including lower earnings, reduced social security coverage and poorer working conditions, fewer prospects for personal development, and less voice (ILO, 2016). It is thus important to understand whether there is a decline in the SER and rise in NSE in the EU28. Examining the trends using the EU Labour Force Survey, the following conclusions can be reached:

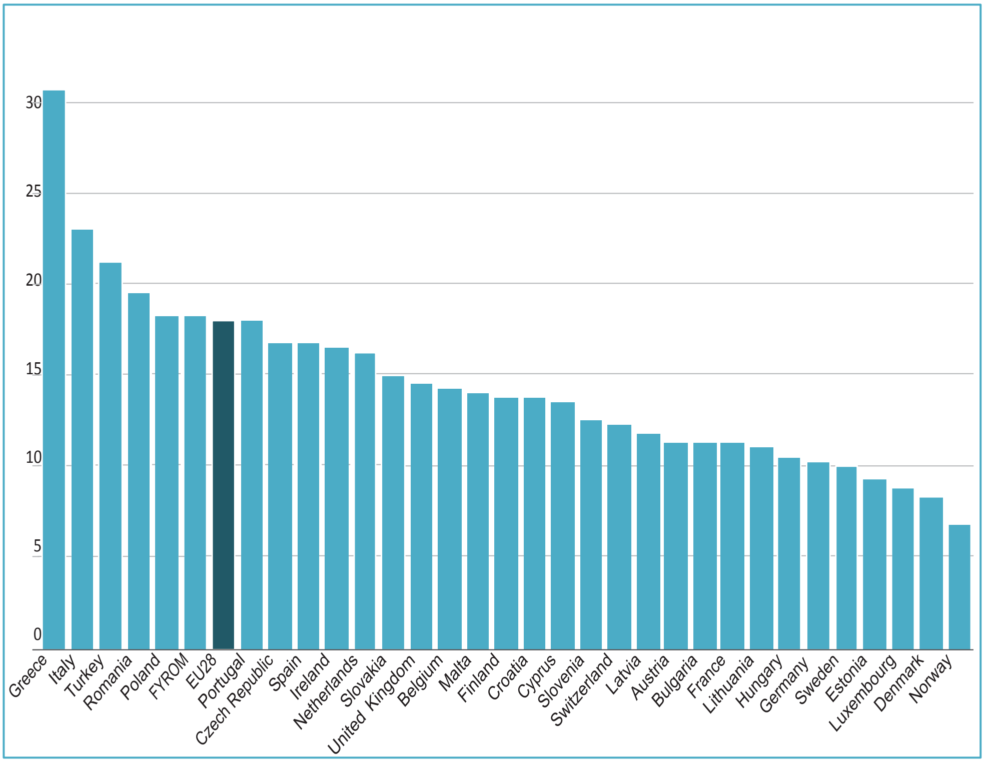
- in 2015, although 70.1% of the working age population (aged 20-64 years) in the EU28 were in jobs, the ***full-time equivalent (FTE) employment participation rate*** for the working age population was just 64%, suggesting that one additional FTE job is required for every two currently in existence for all working age citizens in order for the 'FTE jobs gap' in the EU28 to be eradicated;
- ***part-time employment*** in the EU steadily grew from 18% of total employment in 2005 to 20% in 2015, and this growth occurred among both men (rising from 7% to 10%) and women (rising from 31% to 33%);
- ***temporary employment*** remained relatively stable at 12% of total employment between 2005 and 2015;
- ***undeclared work*** decreased in magnitude from 21.8% in 2005 to 17.9% of GDP in 2016 (Schneider, 2016); and
- ***self-employment*** remained relatively stable at 15-16% of total employment between 2005 and 2015.

Hence, the growth of NSE should not be over-exaggerated, including self-employment.

9.1.3 Self-employment: trends and challenges

Although the share of self-employment in total employment has been relatively stable over the past decade in the EU28, it varies widely from 7% of total employment in Norway to 31% in Greece, with generally higher rates of self-employment in Southern and East-Central European countries (see Figure 2). Indeed, between 2005 and 2015, the share of self-employed increased in 12 Member States but decreased in 10 (Hatfield, 2015). In Southern and East-Central Europe, self-employment remains relatively high, but these countries are yet to see a growth in total employment. In Western Europe and Nordic nations, meanwhile, member states are beginning to see rising employment, while the number of self-employed workers has fallen.

Figure 2. Self-employment as a share of total employment, by country (%)



Source: EU-LFS 2015 (from Eurofound, 2016)

Self-employment is a challenge, because employees enjoy the full protection of labour law, which may include minimum wages, working time legislation, protection in case of redundancy and, typically, provisions regarding social security. This is less the case for the self-employed. They are in principle not covered by labour law and they are socially hardly (or not at all) protected. Similarly, the self-employed are not protected by legislation and regulations on health and safety in most countries, and they generally pay lower social contributions and are less covered by social security systems. The difference in terms of social security protection varies from country to country, leading to what has been termed a 'social gap' (Jorens *et al.*, 2009). Table 1 provides a summary of this gap across the EU28.

Table 1. Entitlement of self-employed to social benefits, July 2015

	Unemployment benefits	Sickness benefits	Pensions
Greece	yes	no	yes
Italy	no	no	yes
Romania	voluntary	yes	yes
Poland	yes	voluntary	yes
Portugal	yes	yes	yes
Czech Republic	yes	voluntary	yes
Spain	voluntary	yes	yes
Ireland	no	no	yes
Cyprus	no	yes	yes
Netherlands	no	no	yes
Slovakia	yes	yes	yes
United Kingdom	no	yes	yes (contributory basic retirement pension only)
Croatia	yes	yes	yes
Malta	no	yes	yes
Belgium	no	yes	yes
Finland	voluntary	yes	yes
Slovenia	yes	yes	yes
Bulgaria	no	voluntary	yes
Austria	voluntary	yes	yes
France	no	yes	yes
Lithuania	no	voluntary	yes (if income declared as wages)
Latvia	voluntary	yes	yes
Hungary	yes	yes	yes
Germany	voluntary	yes (some categories only)	yes
Sweden	voluntary	yes	yes
Denmark	voluntary	yes	yes
Estonia	no	yes	yes
Luxembourg	yes	yes	yes

Source: Fondeville et al. (2015: Table 12)

In the Netherlands, for example, the self-employed have no benefits in the case of sickness or incapacity to work; nor do they have access to unemployment benefits. In Belgium as well as France, there is no unemployment insurance scheme for the self-employed. In Spain, in case of unemployment, they are entitled to an out-of-work benefit (Prestación por cese de actividad), but only if they opted for insurance coverage. In Germany, unemployment insurance for the self-employed is also voluntary - i.e. there is no compulsion on the people concerned to have the protection that this provides.

However, if the self-employed lack enough income or disposable assets, they are, in principle, entitled to the standard allowance provided to jobseekers (Arbeitslosengeld II) to ensure that they have enough for subsistence at least. In the UK, as well as having no protection in the event of work-related accidents or occupational diseases – which is also the case in the Czech Republic –, the self-employed are not entitled to a state earnings-related pension and have no access to unemployment benefits, though, as in Germany, they can claim means-tested assistance if they become unemployed. In Poland, the self-employed pay only a minimum level of social contributions and are so entitled to a minimum retirement pension. In a number of other countries, many of the self-employed choose to pay lower contributions and, therefore, have lower entitlements to social benefits. The self-employed, therefore, have little recourse to basic employment rights, such as paid sick leave, holiday and maternity leave, which means greater risk of financial instability and vulnerability. They are also less likely to have paid into a private pension scheme, and their work can be irregular and insecure.

To differentiate types of self-employment, the primary distinction is whether they have employees. Fondeville et al. (2015) reveals that 10.3% of those in employment are self-employed without employees (own-account workers), and 4.1% self-employed with employees. Although the number of self-employed (i.e., independent workers) with employees increased by more than the number of self-employed without employees between 2004 and 2007, the reverse was the case between 2007 and 2014. The number of self-employed without employees increased by more than (or declined by less than) those with employees in 21 of the 28 EU member states; and in the majority of them, by more than the total employed (in 16 Member States, it rose by more or fell by less).

The growing number of self-employed without employees is not evenly distributed. In 2014, the self-employed without employees accounted for only 4% of total EU employment among those aged 18-24, but 13% for those aged 50-64 and 36% for those aged 65-74 (Hatfield, 2015). There are also marked variations across occupations and sectors. 47% of agricultural workers are self-employed without employees, but only 16% of managers, 15% of craft workers and 9% of professionals. They also constitute 42% of total employment in the agricultural sector, 17% in construction and 15% in other services (Hatfield, 2015). Examining the reasons for self-employment, the sixth European Working Conditions Survey (EWCS) (Eurofound, 2016) in 2015 reveals that while 60% of the self-employed opted for this employment status through personal preference, this was the case for 71% for the self-employed with employees. The 'no other alternatives' option was stated by 24% of the self-employed without employees (Eurofound, 2016). Few of these self-employed without employees take on employees (Fondeville et al., 2015).

There was also a rise in the proportion of the self-employed working part-time in the EU (Eurofound, 2016; Fondeville et al., 2015; Hatfield, 2015). Between 2007 and 2014, the average number of hours worked by the self-employed without employees declined by just over two hours a week, which is over twice the reduction in the average hours worked by all in employment (Fondeville et al., 2015). Much of this seems to have been involuntary. Between 2007 and 2014, the proportion of self-employed working part-time in the EU reporting that they did so because of being unable to find full-time work increased by 6 percentage points (Fondeville et al., 2015).

In recent years, therefore, a debate has emerged about whether all of these self-employed without employees are self-employed in the traditional sense, or engaged in dependent self-employment (Fehringer, 2014; Forde and MacKenzie, 2007; Gialis et al., 2015).

9.2 Evaluating Dependent Self-Employment in the European Union

In most legal systems, a binary divide between dependent employment and self-employment prevails, with dependent employment serving as the basis for labour regulation (Countouris and Freedland, 2013). Although a 'grey area' between the two legal categories has always existed, a concern is that, in the last few decades, the shift towards greater outsourcing and sub-contracting, coupled with technological developments, has resulted in the expansion of workers occupying this grey area, variously termed 'fake', 'false', 'sham', 'dependent', 'misclassified' and 'bogus' self-employment, or 'disguised' employment (Behling and Harvey, 2015; Harvey and Behling, 2008; Jorens, 2008; Pedersini and Coletto, 2010, Thörnquist, 2013). As the ILO (2016: 36) highlights, the categories of work occupying the middle of the spectrum between pure self-employment and pure dependent employees include: i) 'disguised employment relationships', in which 'an employer treats an individual as other than an employee in a manner that hides his or her true legal status as an employee'; and ii) 'dependent self-employment', in which 'workers perform service for a business under a contract different from a contract of employment, but depend on one or a small number of clients for their income and receive direct guidelines regarding how the work is done'.

The main reason cited for the growth of this 'grey area' is that it is cheaper for employers to hire self-employed persons to perform work than to hire employees. Indeed, a UK report estimated that the true cost difference ranges between 35% and 50% (Jorens, 2010: 29). These lower costs provide the incentive for employers to hire more self-employed workers through outsourcing and sub-contracting arrangements. Indeed, it is suggested that in practice employees are fired and then re-hired as self-employed to perform the same work. The price of hiring somebody on a self-employed basis is unrelated to the minimum wage or other wage-setting methods, such as collective agreements. In addition, no social security contributions are paid when hiring a self-employed, whereas the law obliges employers to adhere to many costly standards for employees, such as compensation in the case of dismissal, higher wages based on seniority, holiday payments and a right to be paid even if an employee is sick and incapable of work. Dependent self-employment thus circumvents collective agreements, labour laws, employment tax and other employer liabilities that would otherwise be implied in a standard contract of employment (Thörnqvist, 2011: 102).

Here, therefore, we will first evaluate the prevalence and nature of dependent self-employment, including its distribution across both countries and population groups, and secondly analyse the views of those in dependent self-employment regarding the conditions of their employment, and compare them with all others in employment, as well as another form of precarious work, namely those with no written contract. This will then set the scene for an evaluation of what might be done to tackle dependent self-employment.

9.2.1 Prevalence and nature of dependent self-employment

Few countries collect data in labour force surveys on the number of workers in dependent self-employment. Here, therefore, one of the few cross-national comparative surveys measuring the prevalence and growth of dependent self-employment is reported, namely the European Working Conditions Survey (EWCS).

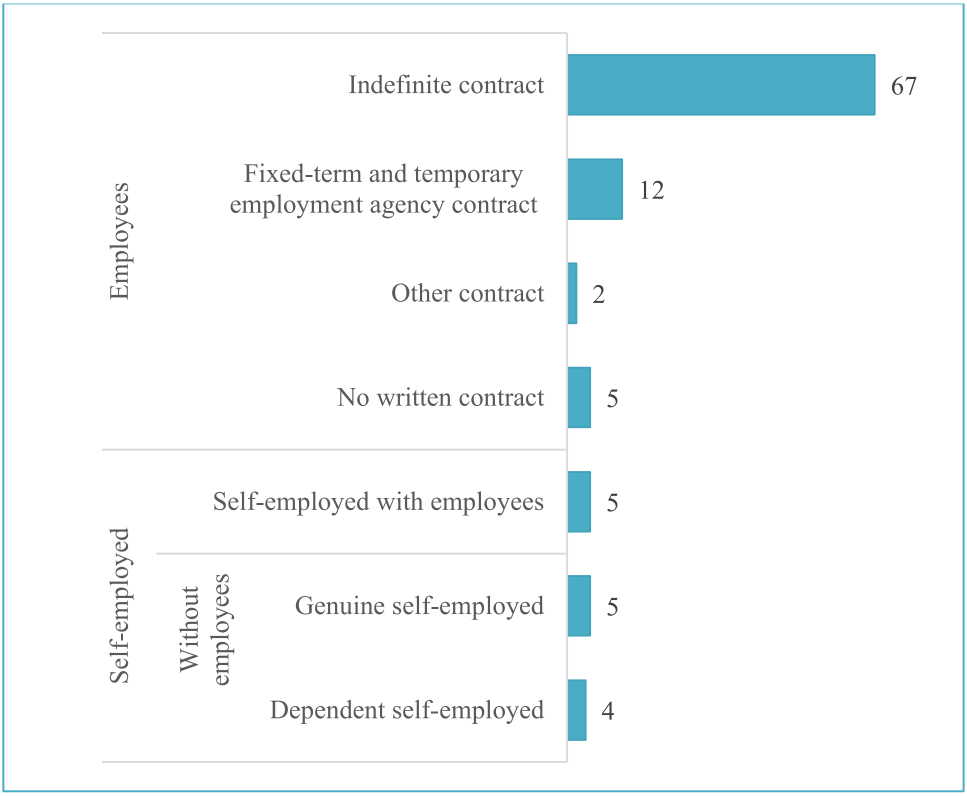
In 2010 (and subsequently in 2015), three questions were asked to estimate whether the 'self-employed without employees' are self-employed or economically dependent workers (Eurofound, 2013a). The criteria are as follows:

- a self-employed person without employees should have more than one client to be considered self-employed;
- a self-employed person without employees should be able to hire employees if necessary;
- a self-employed person without employees should be able to make the most important decisions about how to run their business.

A self-employed person without employees who met fewer than two of above three criteria was dependent self-employed; conversely those who complied with two or more of them were considered to be self-employed without employees. The self-employed without employees considered to be dependent self-employed are thus those who have: (1) only one client, (2) no authority to hire staff, and/or (3) no authority to make important strategic decisions. In 2010, 0.9% of total employment in the EU27 was pure dependent self-employment meeting fewer than two of these three criteria, with cross-national variations from a statistically negligible proportion in Sweden to over 3% of non-agricultural private sector employment in the Czech Republic, Greece, Italy and Slovakia. When agriculture is included, this figure is 1.3% in the EU27.

In 2015, the sixth EWCS interviewed almost 44,000 workers (both employees and self-employed people) in 35 European countries: the 28 EU Member States, the five EU candidate countries plus Norway and Switzerland (Eurofound, 2016). This 2015 survey includes the same questions, namely: (1) number of clients; (2) authority to hire and dismiss employees; and (3) decision-making autonomy. In 2015, 1.4% of total employment in the EU28 was pure dependent self-employment meeting fewer than two of these three criteria (compared with 1.3% in 2010). However, an additional 2.9% of total employment in the EU28 was in a 'grey zone' comprising self-employed workers who comply with only two of the three criteria (compared with an additional 4.0% in 2010 in the EU27). The result is that in 2015, 4.3% of total employment in the EU28 can be classified as dependent self-employment comprised of self-employed workers who do not comply with one or more of these three criteria (compared with 5.3% in 2010 in the EU27). This is graphically portrayed in Figure 3.

Figure 3. Types of employment relationship in the EU28 (%, 2015)

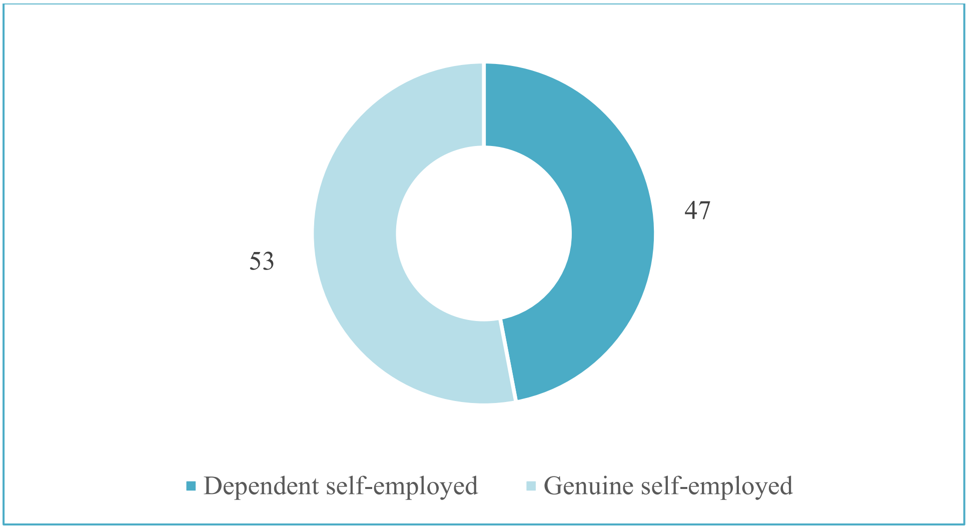


Source: EWCS 2015 (own calculations)

Indeed, in 2015 53% (compared with 51% in 2010) of the self-employed without employees were 'genuine' independent self-employed workers (fulfilling all three criteria), while 47% (51% in 2010) were dependent self-employed, with 15% (12% in 2010) meeting none or only one of the three criteria, and 32% (39% in 2010) meeting only two of the three criteria. When the self-employed with employees are included, 31% of all self-employed are dependent self-employed (compared with 36% in 2010).[99]

[99] The same trend persists when the agricultural sector is excluded. Between 2010 and 2015, 'pure' dependent self-employment (i.e., complying with fewer than two of these three criteria) increased from 0.9% of total non-agricultural employment to 1.1%. When those complying with only two of the three criteria are included, an additional 3.3% of total non-agricultural employment was dependent self-employment in 2010 and 2.5% in 2015. Hence, dependent self-employment (failing to meet one or more of these three criteria) accounted for 4.2% of total non-agricultural employment in the EU27 in 2010, versus 3.6% in the EU28 in 2015.

Figure 4. Self-employed without employees in EU28 (%, 2015)



Source: EWCS 2015 (own calculations)

How, therefore, does the prevalence of dependent self-employment vary cross-nationally in the EU28? And who engages in dependent self-employment across the EU28, and in what types of sectors, organisations and occupations is it most likely to be found?

9.2.2 Cross-national variations

Figure 5 charts the cross-national variations in the prevalence of dependent self-employment. The first column depicts the share of dependent self-employment in total employment in a country , the second column the share of dependent self-employment in total self-employment and the third column the distribution of dependent self-employment across the EU28. Analysing the cross-national variations in the share of total employment, the first column reveals that dependent self-employment ranges from 9% of total employment in Portugal, and 8% in Italy, Greece and Romania, to 1% of total employment in Denmark and Sweden, and 2% in Belgium, Estonia, France and Germany. Therefore, there appears to be a broad East-West and North-South regional divide, with dependent self-employment accounting for a greater share of total employment in Eastern and Southern European member states, and a lower share in Western and Nordic member states.

Turning to dependent self-employment as a share of total self-employment, it is again the case that there are stark variations cross-nationally, with dependent self-employment ranging at the upper end from 63% of all self-employment in Romania, 52% in Slovakia, 43% in the UK and Austria and 42% in Lithuania and Poland, to at the lower end 18% of total self-employment in Germany and Belgium, 12% in Sweden and 11% in Denmark.

The final column in Figure 5 illustrates the concentration rate of dependent self-employment in the EU28 countries. This reveals that dependent self-employment is heavily concentrated in just two countries, with 20.6% of all the dependent self-employment in the EU28 located in the UK and 18.2% in Italy. Just under 2 in every 5 dependent self-employed in the EU28, therefore, are located in these two countries.

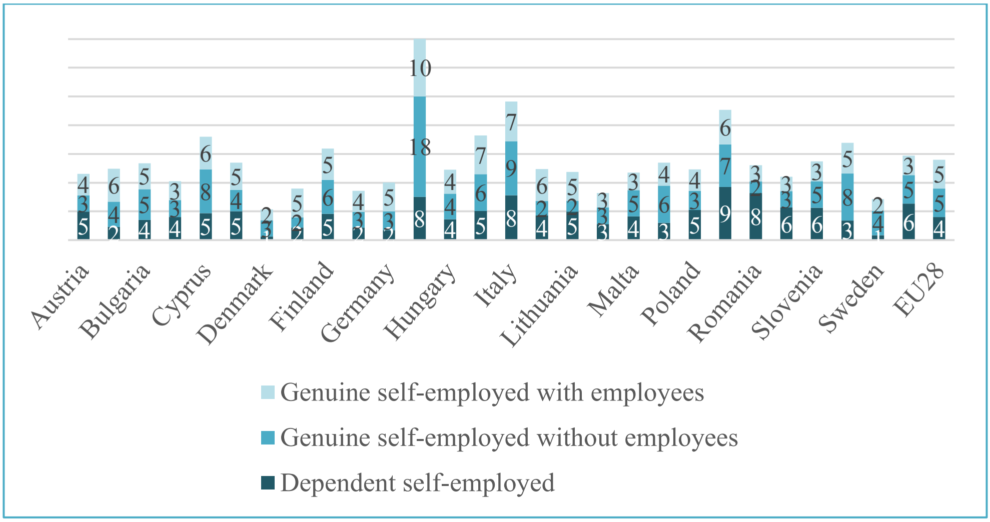
Figure 5. Cross-national variations in the prevalence of dependent self-employment

Country	Dependent self-employed		
	Percent of:		Of which:
	All employment	Self-employed	
Austria	5	43	2.2
Belgium	2	18	1.1
Bulgaria	4	26	1.1
Croatia	4	39	0.6
Cyprus	5	26	0.2
Czech Republic	5	37	2.7
Denmark	1	11	0.2
Estonia	2	24	0.1
Finland	5	29	1.2
France	2	26	6.1
Germany	2	18	7.4
Greece	8	21	2.8
Hungary	4	30	1.6
Ireland	5	28	1.0
Italy	8	32	18.2
Latvia	4	35	0.4
Lithuania	5	42	0.7
Luxembourg	3	34	0.1
Malta	4	35	0.1
Netherlands	3	23	2.6
Poland	5	42	8.7
Portugal	9	41	4.3
Romania	8	63	7.2
Slovakia	6	52	1.5
Slovenia	6	41	0.5
Spain	3	20	6.4
Sweden	1	12	0.4
United Kingdom	6	43	20.6

Source: EWCS 2015 (own calculations)

Figure 6, meanwhile, displays the composition of self-employment in each of the 28 member states of the European Union (EU28) in terms of the shares of self-employment with employees, genuine self-employment without employees and dependent self-employment in total employment.

Figure 6. Nature of self-employment in EU28, by country (% of all employment)



Source: EWCS 2015 (own calculations)

9.2.3 Who engages in dependent self-employment?

To begin analysing whether certain socio-demographic and socio-economic groups are more likely to engage in dependent self-employment than others, Figure 7 examines whether participation in dependent self-employment varies by gender. This reveals that 5% of all men in employment are dependent self-employed compared with just 4% of all women in employment. However, only 29% of men in self-employment are dependent self-employed compared with 36% of women who are self-employed. Despite this, 58% of all dependent self-employment is undertaken by men and just 42% by women.

Figure 7. Participation in dependent self-employment, by gender

Gender	Dependent self-employed		
	Percent of:		Of which:
	All employment	Self-employed	
Male	5	29	58
Female	4	36	42

Source: EWCS 2015 (own calculations)

As Figure 8 reveals, participation in dependent self-employment also varies according to age. There is a steady rise in the proportion of the total workforce employed in dependent self-employment as age increases, surging from 3% of the workforce under 35 years old to 6% of the workforce aged 50 and over. This is also reflected in the distribution of dependent self-employment in that 46% of dependent self-employment is conducted by those aged 50 and over. This form of employment, therefore, is conducted mostly by men and those aged 50 years and over.

Figure 8. Participation in dependent self-employment, by age

Age	Dependent self-employed		
	Percent of:		Of which:
	All employment	Self-employed	
Under 35 years	3	41	21
35 - 49 years	4	27	33
50 years and over	6	32	46

Source: EWCS 2015 (own calculations)

The interesting finding in Figure 9, however, is that the dependent self-employed are most likely to be found in households where all contribute equally to the household income. Whereas 4% of those who assert that they contribute the most to the household income are in dependent self-employment, and 4% of those who assert that they do not contribute the most, as high as 7% of those who contribute equally to the household income are in dependent self-employment. Nevertheless, most (54%) of those engaged in dependent self-employment tend to be predominantly the main breadwinner in their household. Only 1 in 3 (34%) of the dependent self-employed assert that they are not the main breadwinner and less than 1 in 8 (12%) that they contribute equally to the household income. Therefore, dependent self-employment is the principal source of household income for the majority engaged in such endeavour.

Figure 9. Participation in dependent self-employment, by main breadwinner

Are you, in your household, the person who contributes the most to the household income?	Dependent self-employed		
	Percent of:		Of which:
	All employment	Self-employed	
Yes	4	26	54
No	4	45	34
All equally	7	33	12

Source: EWCS 2015 (own calculations)

9.2.4 Distribution across sectors, organisations and occupations

Turning to the sectors, organisations and occupations that use dependent self-employment, Figure 10 reveals that such a form of employment falls markedly as the number of employees in a business grows. Indeed, dependent self-employment is concentrated in sole trader businesses; 27% of those who classify themselves as sole traders in the EU28 are dependent self-employed, and 64% of all dependent self-employment is among sole traders. It is similarly the case that even in businesses with employees, it is smaller businesses which have a higher proportion of dependent self-employed. Indeed, 5% of all employees in businesses with 2-9 employees are dependent self-employed and a further 24% of all dependent self-employed are in such businesses. Actually, only a very small proportion of the dependent self-employed are in medium and larger sized businesses, 8% and 4%, respectively. Dependent self-employment, therefore, does not appear to be predominantly a result of medium and large businesses pursuing a strategy of outsourcing and sub-contracting to the dependent self-employed, at least directly. It rather appears to be predominantly the result of sole traders being dependent self-employed and micro-enterprises employing workers on a dependent self-employed basis.

Figure 10. Participation in dependent self-employment, by firm size

Firm size (no. of employees)	Dependent self-employed		
	Percent of:		Of which:
	All employment	Self-employed	
1 employee (interviewee works alone)	27	38	64
2 - 9 employees	5	18	24
10 - 249 employees	1	33	8
250+ employees	1	68	4

Source: EWCS 2015 (own calculations)

In what occupations, therefore, do the dependent self-employed work? Figure 11 reports the findings. This reveals that some 30% of all skilled agricultural, forestry and fisheries workers are dependent self-employed, outweighing by far all other occupations. The next nearest is craft and related trade workers and elementary occupations; 5% of total employment in these occupations is dependent self-employment. Given that skilled agricultural, forestry and fisheries workers are a relatively small occupational group, the net outcome is that 20% of all dependent self-employment is in this occupation, 19% among professionals, 14% among elementary occupations and 13% among craft and related trade workers.

Figure 11. Participation in dependent self-employment, by occupation

Occupation	Dependent self-employed		
	Percent of:		Of which:
	All employment	Self-employed	
Managers	4	13	5
Professionals	4	33	19
Technicians and associate professionals	3	27	11
Clerical support workers	1	33	1
Service and sales workers/ Armed forces	3	22	12
Skilled agricultural, forestry and fishery workers	30	51	20
Craft and related trades workers	5	27	13
Plant and machine operators, and assemblers	3	45	5
Elementary occupations	5	65	14

Source: EWCS 2015 (own calculations)

Turning to the sectors in which the dependent self-employed are found, Figure 12 demonstrates that dependent self-employment is not confined to the private sector. Although 5% of all employment in the private sector is dependent self-employment (1 in every 20 private sector jobs), it is in the not-for-profit sector that this employment relationship is rife with 9% of all not-for-profit sector employment being dependent self-employment. Nevertheless, given the small size of the not-for-profit sector, the importance of this should not be exaggerated. Some 87% of all dependent self-employment is located in the private sector, and just 7% in the not-for-profit sector.

Figure 12. Participation in dependent self-employment, by private/public sector

Sector	Dependent self-employed		
	Percent of:		Of which:
	All employment	Self-employed	
The private sector	5	30	87
The public sector	1	37	4
A joint private-public organisation or company	2	32	2
The not-for-profit sector or an NGO/ Other	9	48	7

Source: EWCS 2015 (own calculations)

Figure 13 provides a more detailed breakdown by sector of participation in dependent self-employment. Starting with the first column, this compounds the earlier finding regarding the concentration of dependent self-employment in occupations associated with agriculture, forestry and fishing. Some 27% of all employment in the agriculture, forestry and fishing sector is dependent self-employment. The next closest sector is the household services sector where 13% of all employment is dependent self-employment followed by the arts, entertainment and recreation sector. It should be noted that dependent self-employment is not as rife in the construction sector (7% of all construction jobs) as in the other sectors. Examining the self-employed rather than total employment, however, it is in the household services sector that this employment relationship thrives. Some 84% of all the self-employed in the household services sector are dependent self-employed. Across all sectors, nevertheless, it is the agriculture, forestry and fishing sector that employs 22% of all the dependent self-employed, with a further 14% of the dependent self-employed in the arts, entertainment and recreation sector and 11% in professional, technical and scientific and administrative services. Only 9% of all dependent self-employed are in the construction sector.

Figure 13. Participation in dependent self-employment, by sector

NACE Revision 2	Dependent self-employed		
	Percent of:		Of which:
	All employment	Self-employed	
Agriculture, forestry and fishing	27	51	22
Industry (except construction)	2	25	7
Construction	7	28	9
Wholesale and retail trade; repair of motors	3	18	10
Transportation and storage	4	44	5
Accommodation and food service activities	2	10	1
Information and communication	5	32	3
Financial and insurance/ real estate activities	3	22	3
Professional, scientific, technical + administrative activities	5	26	11
Defence, education, human health, social work	2	33	10
Arts, entertainment and recreation + others	11	42	14
Activities of households as employers	13	84	5

Source: EWCS 2015 (own calculations)

Finally, Figure 14 examines the gendering of employment. This reveals that dependent self-employment is more prevalent in workplaces where mostly men have the same job title as the dependent self-employed, but is most prevalent in workplaces where nobody else has the same job title as the dependent self-employed person.

Figure 14. Participation in dependent self-employment, by gendering of employment

At your place of work are workers with the same job title as you …?	Dependent self-employed		
	Percent of:		Of which:
	All employment	Self-employed	
Mostly men	3	30	24
Mostly women	1	23	8
Approximately equal numbers of men and women	3	37	17
Nobody else has the same job title	13	30	51

Source: EWCS 2015 (own calculations)

To evaluate whether these trends from the above descriptive statistics remain significant when one controls for other variables and keeps them constant, Table 2 presents a logistic regression analysis of the prevalence of dependent self-employment. In order to enable a comparison with other forms of precarious employment, the second model reveals the results for those who are employed without a written contract.

For a quarter of century across the EU28, the Employment Information Directive of 1991 (91/553/EEC) has stated that every employee (however defined by member state law) has the right to a written statement of the terms and conditions of their employment. Employers violating the labour laws of their member state by not issuing a written contract or terms of employment therefore do so to evade paying tax and social contributions that would be due if they formally employ an employee. Annex II provides descriptive data on the share of total employment comprising those without a written contract of employment, along with descriptive data on their socio-demographic and socio-economic characteristics.

Starting with the characteristics of who is more likely to engage in dependent self-employment, the finding is that none of the socio-demographic variables is strongly significant. The propensity to engage in dependent self-employment is not significantly associated with either gender, age, educational level, whether the worker's parents were born in the country, the size of the household in which the worker lives, or whether they find it difficult to make ends meet (i.e., a proxy indicator of poverty). The only significant correlation is related to whether they are the main breadwinner in the household. Compared with those who contribute most to the household income, the propensity to engage in dependent self-employment is significantly higher among those who are not the main breadwinner in the household and those who contribute equally to the household income. Dependent self-employment, therefore, is not a practice prevalent among those who contribute the most to the household income.

When it comes to occupational, organisational and sector characteristics however, there are some significant differences in the propensity to engage in dependent self-employment:

- Workers in firms with employees are significantly less likely to be dependent self-employed than sole traders;
- Workers in workplaces where men are more likely to have the same job title as them are significantly more likely to be dependent self-employed than workers in workplaces where women are more likely to have the same job title as them, but workers are less likely to be dependent self-employed in workplaces where men and women are equally likely to have the same job title as them;
- Workers in the public sector are significantly less likely to be dependent self-employed than workers in the private sector;
- Compared with managers, professionals, and skilled workers, agricultural, forestry and fishing workers are significantly more likely to be dependent self-

employed, and clerical support workers are significantly less likely to be dependent self-employed;
- Those employed in the agricultural, forestry and fishing sector are significantly more likely to engage in dependent self-employment than workers in all other sectors.

Comparing the characteristics of the dependent self-employed with another group of precarious workers, namely those working without a written contract of employment, the interesting finding is that there are some significant differences. The first important difference is that while socio-demographic characteristics were seldom significantly associated with the dependent self-employed as group, there are some significant socio-demographic characteristics associated with those working without a contract. They are significantly more likely to be younger, have solely primary education, live in single person households, have difficulty making ends meet, and not to be the main contributor to the household income.

Many of the occupational, business and sector characteristics of the dependent self-employed and those working without contract, nevertheless, are similar. Both types of workers are significantly more likely to be sole traders, employed in workplaces where men are more likely to have them same job title as them, and to be employed in agriculture, forestry and fishing, and craft and related trades. Workers without contract differ to the dependent self-employed in terms of the business, occupations and sectors in which they work in that they are also significantly more likely to be also found in the household services sector, and compared with managers, are also more likely to be found among services and sales workers, and elementary occupations.

As such, although there are some similarities between the dependent self-employed and workers without a written contract, especially in terms of the occupations, firm size and sector, there are also significant differences. While the dependent self-employed appear to come from across the demographic and socio-economic spectrum, those working without contract tend to be significantly more likely to belong to vulnerable and marginalised groups of the population.

Table 2. Logistic regressions of the propensity for a worker to be dependent self-employed or employee with no written contract, socio-demographic and business characteristics.

Variable	Dependent self - employed		Employees with no written contract	
	Beta	Standard error	Beta	Standard error
Gender (Female)				
Male	-0.00543	0.147	0.112	0.126
Age	-0.0431	0.0270	-0.184***	0.0194
Age squared	0.000539*	0.000283	0.00215***	0.000212
Education (Early childhood education/ Primary education)				
Lower secondary education	0.0192	0.212	-0.140	0.175
Upper secondary education	0.126	0.202	-0.339**	0.166
Post-secondary non-tertiary education	-0.234	0.260	-0.470*	0.254
Short-cycle tertiary education	-0.00509	0.280	-0.0692	0.273
Bachelor or equivalent	0.287	0.287	-0.279	0.259
Master/ Doctorate or equivalent	0.270	0.292	-0.190	0.289
Respondent's parents born in the country (No)				
Yes	-0.193	0.158	-0.138	0.139
Household size (1 person)				
2 persons	-0.190	0.155	-0.464***	0.142
3 persons	-0.180	0.170	-0.535***	0.158
4 persons	-0.168	0.180	-0.404**	0.178

5 and more persons	-0.372	0.230	0.107	0.202
Household ability to make ends meet (Very easily/ easy)				
Fairly easily	0.142	0.144	0.139	0.147
With some difficulty	-0.0394	0.166	0.490***	0.143
With difficulty/ great difficulty	0.175	0.190	1.049***	0.151
The person who contributes the most to the household income (The respondent)				
Other person	0.460***	0.157	0.890***	0.121
All equally	0.867***	0.196	0.466**	0.205
Number of employees in the company (1 - interviewee works alone)				
2-9 employees	-2.101***	0.166	0.204	0.171
10-249 employees	-3.350***	0.231	-0.784***	0.194
250+ employees	-3.892***	0.360	-1.377***	0.222
Workers with the same job title as the respondent at the workplace (Mostly men)				
Mostly women	-0.522**	0.221	-0.713***	0.169
Approximately equal numbers of men and women	0.411**	0.196	-0.244	0.165
Nobody else has the same job title	-0.00734	0.174	-0.260	0.173
Sector (The private sector)				
The public sector	-0.630**	0.295	-0.240	0.183
A joint private-public organisation/company	0.145	0.332	-1.151***	0.344
The not-for-profit sector or an NGO/ Other	0.0566	0.206	0.523***	0.168

Occupation (Managers)				
Professionals	0.752**	0.302	-0.251	0.426
Technicians and associate professionals	0.390	0.269	0.218	0.422
Clerical support workers	-1.168***	0.436	0.449	0.430
Service and sales workers/ Armed forces occupations	-0.352	0.270	1.019***	0.371
Skilled agricultural, forestry and fishing	0.714**	0.312	0.0182	0.488
Craft and related trades workers	0.165	0.273	0.464	0.390
Plant and machine operators, and assembly	0.00409	0.299	0.696	0.472
Elementary occupations	0.249	0.277	1.403***	0.389
Economic activities, NACE rev. 2 (Agriculture, forestry and fishing)				
Industry (except construction)	-1.207***	0.305	-1.449***	0.308
Construction	-0.667**	0.284	-0.501*	0.300
Wholesale and retail trade; repair of motors	-1.149***	0.265	-1.286***	0.281
Transportation and storage	-0.237	0.287	-1.278***	0.419
Accommodation and food service activities	-1.916***	0.351	-0.225	0.296
Information and communication	-0.873**	0.385	-1.116**	0.495
Financial and insurance/ real estate activities	-1.249***	0.364	-1.755***	0.491

Professional, scientific, technical + administrative activities	-1.467***	0.301	-0.890***	0.284
Defence, education, human health, social work	-1.696***	0.301	-0.409	0.289
Arts, entertainment and recreation + others	-0.653**	0.277	-0.222	0.295
Activities of households as employers	-1.740***	0.345	0.812***	0.280
Constant	0.510	0.711	1.037	0.682
Observations	32,008		32,008	
F	25.20		22.82	
p >	0.000		0.000	

Notes: All coefficients are compared to the benchmark category, shown in brackets.

Significant at: *** p<0.01, ** p<0.05, * p<0.1.

Source: EWCS 2015 (own calculations)

9.3 Working Conditions of the Dependent Self-Employed

9.3.1 Physical environment

The dependent self-employed are more likely than other employees to be exposed to a range of physical hazards in the workplace for a quarter of their time or more (see Table 3). Overall, therefore, the physical environment in which they work is worse than for other employees. Yet, there are exceptions. For example, a greater proportion of the dependent self-employed are less exposed for a quarter of their time or more to noise so loud that you must raise your voice to talk to people. Is it also the case, however, that the physical environment in which they work is worse than that experienced by employees with no written contract? As shown, the dependent self-employed are more likely to be exposed for a quarter of their time or more to physical hazards in the workplace, and thus work in a poorer physical environment than employees without a written contract. This is reflected in their mean index score (see Appendix for further details of how this mean index score was calculated).

Table 3. Physical environment index, by employment status, EU28

	Dependent self-employed	Employees with no written contract	All employment
			Proportion of workers (%): A quarter of the time or more
Vibrations from hand tools, machinery	22	17	19
Noise so loud that you would have to raise your voice to talk to people	23	23	27
High temperatures which make you perspire even when not working	28	27	23
Low temperatures whether indoors or outdoors	32	27	21
Breathing in smoke, fumes (such as welding or exhaust fumes), powder or dust (such as wood dust or mineral dust)	17	11	14
Breathing in vapours, such as solvents and thinners	12	10	11
Handling or being in skin contact with chemical products or substances	20	17	17
Tobacco smoke from other people	10	12	9
Handling or being in direct contact with materials which could be infectious, such as waste, bodily fluids, laboratory materials, etc.	11	11	14
Tiring or painful positions	51	46	43
Lifting or moving people	8	12	10
Carrying or moving heavy loads	40	34	31
Repetitive hand or arm movements	66	59	61
Mean index score (0-100)	**82**	**84**	**84**

Source: EWCS 2015 (own calculations)

9.3.2 Work intensity

Table 4 reports whether the dependent self-employed are more likely to suffer work intensity in their working conditions compared with all others in employment and those working without a written contract. This is the only working conditions index where a small value means that the job quality is better. As can be seen, on issues of work intensity, the dependent self-employed are less likely to suffer worse work intensity than all others in employment, and those without a written contract of employment are even less likely to suffer work intensity problems than the dependent self-employed. This is the case across all three sub-indices of work intensity. The dependent self-employed are less likely to suffer work intensity problems than all in employment both with regard to quantitative demands, pace determinants and inter-dependency as well as emotional demands. It must be concluded, therefore, that work intensity problems are less commonly witnessed by the dependent self-employed compared with all in employment.

Table 4. Work intensity index, by employment status, EU28

			Dependent self-employed	Employees with no written contract	All employment
			Proportion of workers (%)		
Quantitative demands	Working at very high speed (three-quarters of the time or more)		29	27	33
	Working to tight deadlines (three-quarters of the time or more)		32	25	36
	Enough time to get the job done (never or rarely)		6	9	10
	Frequent disruptive interruptions (never)		36	36	22
	Index dimension – mean score (0-100)		*32*	*30*	*39*
Pace determinants and interdependency	Interdependency: three or more pace determinants		12	24	32
	Work pace dependent on:	The work done by colleagues	15	31	39
		Direct demands from people such as customers, passengers, pupils, patients, etc.	64	56	67
		Numerical production targets or	36	29	42

		performance targets			
		Automatic speed of a machine or movement of a product	12	12	18
		The direct control of your boss	14	34	35
	Index dimension – mean score (0-100)		*26*	*30*	*39*
Emotional demands	Hiding your feelings at work (most of the time or always)		25	28	31
	Handling angry clients, customers, patients, pupils, etc. (three-quarters of the time or more)		15	12	16
	Being in situations that are emotionally disturbing (a quarter of the time or more)		26	23	30
	Index dimension – mean score (0-100)		*25*	*23*	*30*
		Mean index score (0-100)	**28**	**27**	**36**

Source: EWCS 2015 (own calculations)

9.3.3 Working time quality

Table 5 reports whether the dependent self-employed are more likely to suffer work time quality issues compared with all others in employment and those working without a written contract. As can be seen the working time quality is slightly lower for the dependent self-employed compared to all in employment, suggesting that the working conditions in this respect are slightly worse for the dependent self-employed. This is not the case on all sub-indices, however. Although on issues of duration and atypical working time, the dependent self-employed have worse working conditions than all in employment, they have better working conditions than all in employment in terms of having control over working time arrangements and flexibility. Overall, nevertheless, they are more commonly subject to slightly worse working conditions than all in employment in terms of working time quality.

Interestingly, on the issue of work intensity, they are also more likely to suffer worse work intensity issues in the workplace than those without a written contract of employment, who in fact are less likely to suffer work intensity problems than all in employment.

Table 5. Working time quality index, by employment status, EU28

		Dependent self-employed	Employees with no written contract	All employment
				Proportion of workers (%)
Duration	Long working hours (48 hours or more a week)	29	11	16
	No recovery period (less than 11 hours between two working days)	27	21	23
	Long working days (10 hours or more a day)	38	18	32
	Index dimension – mean score (0-100)	*69*	*83*	*76*
Atypical working Time	Night work	19	14	19
	Saturday work	71	53	51
	Sunday work	40	30	30
	Shift work	5	11	20
	▪ Daily split shift	17	8	7
	▪ Permanent shift	28	42	40
	▪ Alternating/rotating shifts	31	43	49
	▪ Other type of shift work	24	7	4
	Index dimension – mean score (0-100)	*67*	*74*	*72*
Working time arrangements	Control over working time arrangements: Set by the company	11	45	56
	Control over working time arrangements: Can choose between different schedules	5	5	9
	Control over working time arrangements: Can adapt working hours	16	23	19
	Control over working time arrangements: Entirely determined by self	68	27	16

	Change in working time arrangements	No regular change	62	67	69
		Change the same day	23	9	5
		Change the day before	2	14	8
		Change several days in advance	10	8	13
		Change several weeks in advance	3	2	5
	Requested to come to work at short notice (at least several times a month)		19	19	12
	Index dimension – mean score (0-100)		*91*	*86*	*87*
Flexibility	Very easy to arrange to take an hour off during working hours to take care of personal or family matters		48	35	25
	Work in free time to meet work demands (at least several times a month)		31	18	22
	Index dimension – mean score (0-100)		*74*	*74*	*70*
		Mean index score (0-100)	**75**	**79**	**76**

Source: EWCS 2015 (own calculations)

9.3.4 Social environment

Table 6 reports whether the dependent self-employed are more likely to suffer from a worse social environment when working compared with all others in employment and those working without a written contract. As can be seen, the social environment is overall similar for the dependent self-employed and all in employment. However, there are marked differences in the two sub-indices. Although the likelihood of the dependent self-employed witnessing adverse social behaviour is very much on a par with all in employment, the social support index manifested in terms of receiving help and support from colleagues is markedly lower than for all in employment. Only 47% of the dependent self-employed assert that they receive help and support from colleagues most/all of the time, compared with 71% of all others in employment.

Table 6. Social environment index, by employment status, EU28

			Dependent self-employed	Employees with no written contract	All employment
			Proportion of workers (%)		
Adverse social behaviour	In the last month	Exposure to verbal abuse	9	8	12
		Exposure to unwanted sexual attention	2	2	2
		Exposure to threats	4	2	5
		Exposure to humiliating behaviours	6	5	6
	Over the last 12 months	Exposure to physical violence	1	1	2
		Exposure to sexual harassment	0	1	1
		Exposure to bullying /harassment	2	3	5
	Index dimension – mean score (0-100)		*96*	*97*	*96*
Social Support	Help and support from colleagues (most of the time/always)		47	61	71
	Index dimension – mean score (0-100)		*53*	*64*	*72*
		Mean index score (0-100)	**85**	**86**	**85**

Source: EWCS 2015 (own calculations)

9.3.5 Skills and discretion

Table 7 reports whether the dependent self-employed are more likely to suffer worse working conditions with regard to use of skills and discretion compared with all others in employment and those working without a written contract. As can be seen, the skills and discretion index for the dependent self-employed is overall slightly better for the dependent self-employed compared with all in employment, and much better than for those working without a written contract. However, there are marked differences in the two sub-indices. Compared with all others in employment, the likelihood of the dependent self-employed to experience problems is greater on the cognitive dimension, and very markedly lower on the training dimension (i.e., they receive very poor training). However, on the decision latitude and organisation participation dimensions, the dependent self-employed score markedly higher than all others in employment. For example, they are more likely to have the ability to choose or change their order of tasks or rate or speed of work, and are more likely to feel that they have been consulted on changes in the workplace, to be able to improve work process and to influence decisions that are important to their work.

Table 7. Skills and discretion index, by employment status, EU28

		Dependent self-employed	**Employees with no written contract**	**All employment**
		Proportion of workers (%)		
Cognitive Dimension	Solving unforeseen problems	84	66	83
	Carrying out complex tasks	53	34	62
	Learning new things	65	42	71
	Working with computers, smartphones and laptops, etc. (at least a quarter of the time)	38	21	57
	Ability to apply your own ideas in work (‘sometimes’, ‘most of the time’ and ‘always’)	92	71	78
	Index dimension – mean score (0-100)	*62*	*43*	*64*
Decision latitude	Ability to choose or change order of tasks	79	66	68
	Ability to choose or change speed or rate of work	84	73	71

	Ability to choose or change methods of work	82	69	69
	Having a say in choice of work colleagues ('always' or 'most of the time')	46	26	29
	Index dimension – mean score (0-100)	*78*	*64*	*62*
Organisational participation	Consulted before objectives are set for own work ('always' or 'most of the time')	57	42	46
	Involved in improving the work organisation or work processes of own department or organisation ('always' or 'most of the time')	64	40	49
	Ability to influence decisions that are important for your work ('always' or 'most of the time')	78	42	47
	Index dimension – mean score (0-100)	*73*	*50*	*57*
Training	Training paid for or provided by employer over the past 12 months (or paid by oneself if self-employed) (%)	13	11	38
	On-the-job training over the past 12 months (%)	13	14	34
	Index dimension – mean score (0-100)	*13*	*12*	*36*
	Mean index score (0-100)	**56**	**42**	**55**

Source: EWCS 2015 (own calculations)

9.3.6 Job and career prospects

Table 8 displays that the dependent self-employed are more likely to perceive themselves as suffering worse job and career prospects than all others in employment, but are less likely than those without a written contract of employment. Indeed, this is the case across all three sub-indices related to career prospects, job security and the prospect of downsizing. The view of the dependent self-employed on job and career prospects is, actually, markedly worse than for all others in employment, but not as poor as of those without a written contract or terms of employment.

Table 8. Prospects index, by employment status, EU28

		Dependent self-employed	Employees with no written contract	All employment
		Proportion of workers (%)		
Career prospects	My job offers good prospects for career advancement (strongly agree and tend to agree)	36	21	38
	Index dimension – mean score (0-100)	*45*	*32*	*48*
Job security	I might lose my job in the next six months (strongly agree and tend to agree)	19	27	16
	Index dimension – mean score (0-100)	*70*	*61*	*74*
Downsizing	During the last three years (or last year according to seniority in the company), has the number of employees at your workplace increased, stayed the same or decreased: decrease in employment	10	17	22
	Index dimension – mean score (0-100)	49	47	50
	Mean index score (0-100)	**54**	**48**	**57**

Source: EWCS 2015 (own calculations)

9.3.7 Is dependent self-employment significantly worse?

To evaluate whether these marked differences in the working conditions and job quality of the dependent self-employed persist when other variables are considered and controlled for, such as their age, gender, educational level, firm size, sector and occupation, a logistic regression analysis was undertaken. Table 9 reveals some very different results to the crude descriptive statistics above on job quality and working conditions. The finding is that the dependent self-employed are not significantly more likely to suffer poorer working conditions with regard to five of these six indices of job quality. Indeed, it is only on the social environment index that the dependent self-employed suffer significantly worse working conditions than all others in employment. The dependent self-employed, therefore, have a significantly poorer social environment in their workplace.

This is not the case, however, for those without a written contract. After taking into account and controlling for other characteristics, they suffer from significantly worse working conditions compared with all others in employment not only in terms of the indices of work intensity but also skills and discretion, and job and career prospects.

Table 9. Logistic regressions of the propensity for a worker to be dependent self-employed or an employee with no written contract: socio-demographic and business characteristics and job quality indices

Variable	Dependent self - employed		Employees with no written contract	
	Beta	Standard error	Beta	Standard error
***Gender* (Female)**				
Male	-0.00220	0.147	0.185	0.129
Age	-0.0509*	0.0276	-0.179***	0.0206
Age squared	0.000607**	0.000291	0.00205***	0.000225
***Education* (Early childhood education/ Primary education)**				
Lower secondary education	0.0275	0.219	-0.107	0.178
Upper secondary education	0.131	0.206	-0.275	0.171
Post-secondary non-tertiary education	-0.170	0.262	-0.372	0.258
Short-cycle tertiary education	0.0278	0.285	0.145	0.290
Bachelor or equivalent	0.334	0.291	-0.132	0.264
Master/ Doctorate or equivalent	0.321	0.301	0.0330	0.300
***Respondent's parents born in the country* (No)**				
Yes	-0.199	0.162	-0.0545	0.142
***Household size* (1 person)**				
2 persons	-0.168	0.156	-0.397***	0.145
3 persons	-0.140	0.174	-0.448***	0.162

4 persons	-0.116	0.183	-0.304*	0.184
5 and more persons	-0.318	0.232	0.272	0.205
Household ability to make ends meet (Very easily/ easy)				
Fairly easily	0.143	0.148	0.0755	0.153
With some difficulty	-0.0599	0.168	0.322**	0.147
With difficulty/ great difficulty	0.132	0.196	0.781***	0.162
The person who contributes the most to the household income (The respondent)				
Other person	0.444***	0.163	0.829***	0.124
All equally	0.909***	0.197	0.527**	0.207
Number of employees in the company (1 - interviewee works alone)				
2-9 employees	-2.068***	0.170	0.188	0.183
10-249 employees	-3.305***	0.235	-0.822***	0.207
250+ employees	-3.851***	0.371	-1.286***	0.237
Workers with the same job title as the respondent at the workplace (Mostly men)				
Mostly women	-0.514**	0.226	-0.687***	0.172
Approximately equal numbers of men and women	0.344*	0.200	-0.292*	0.170
Nobody else has the same job title	0.0577	0.176	-0.211	0.185
Sector (The private sector)				
The public sector	-0.609**	0.293	-0.147	0.197
A joint private-public organisation/company	0.149	0.337	-1.078***	0.349
The not-for-profit sector or an NGO/ Other	0.102	0.219	0.579***	0.179
Occupation (Managers)				
Professionals	0.745**	0.307	-0.457	0.431

Technicians and associate professionals	0.341	0.272	0.0229	0.428
Clerical support workers	-1.325***	0.456	0.135	0.434
Service and sales workers/ Armed forces occupations	-0.424	0.273	0.619*	0.376
Skilled agricultural, forestry and fish	0.635*	0.328	-0.356	0.493
Craft and related trades workers	0.104	0.283	0.0804	0.395
Plant and machine operators, and assembly	-0.0796	0.305	0.158	0.483
Elementary occupations	0.0881	0.306	0.813**	0.399
Economic activities, NACE rev. 2 **Agriculture, forestry and fishing**				
Industry (except construction)	-1.206***	0.309	-1.532***	0.315
Construction	-0.644**	0.287	-0.477	0.306
Wholesale and retail trade; repair of motors	-1.135***	0.268	-1.336***	0.288
Transportation and storage	-0.266	0.284	-1.345***	0.426
Accommodation and food service activities	-1.877***	0.353	-0.266	0.305
Information and communication	-0.821**	0.384	-1.166**	0.491
Financial and insurance/ real estate activities	-1.280***	0.372	-1.653***	0.491
Professional, scientific, technical + administrative activities	-1.471***	0.311	-0.938***	0.288
Defence, education, human health, social work	-1.718***	0.309	-0.485	0.296
Arts, entertainment and recreation + others	-0.683**	0.282	-0.206	0.301

Activities of households as employers	-1.740***	0.362	0.780***	0.283
JOB QUALITY INDICES				
Physical environment index	-0.139	0.491	0.0670	0.484
Work intensity index	-0.549	0.411	-0.652*	0.349
Work time quality	0.000185	0.387	0.268	0.318
Social environment index	-1.015***	0.365	0.543	0.334
Skills and discretion index	-0.142	0.313	-1.721***	0.287
Prospects index	-0.198	0.315	-1.166***	0.273
Constant	2.038**	1.006	2.187**	0.914
Observations	31,884		31,884	
F	22.55		22.13	
p >	0.00		0.00	

Notes: **All coefficients are compared to the benchmark category, shown in brackets.**
Significant at: *** p<0.01, ** p<0.05, * p<0.1.
Normalized indices included (0 to 1).

Source: EWCS 2015 (own calculations)

9.4 Implications of newer Forms of Informality

This section addresses the implications of two specific new forms of informality, namely dependent self-employment and the platform economy, in terms of the coordination mechanisms and regulatory frameworks required to tackle them.

9.4.1 Tackling dependent self-employment

There has been a growing concern that some employers are deliberately misclassifying employees as self-employed. Within most legal systems, a 'binary divide' exists between dependent employment and self-employment, with dependent employment serving as the basis for labour regulation and protection. The regulatory and tax gaps that exist between dependent employment and self-employment in many countries lead some employers to misclassify workers as self-employed. Workers are falsely classified as self-employed so that employers can circumvent collective agreements, labour laws (e.g., minimum wages, working time legislation, holiday pay, sick leave, protection in case of redundancy), employment tax and other fiscal and social liabilities implied in the standard contract of employment (Conaty et al., 2016; Cremers, 2010; Eichhorst et al., 2013; Eurofound, 2013, 2016a, 2016b; Gialis et al., 2017; Giraud and Lechevalier, 2018; Hatfield, 2015; ILO, 2013; Marín, 2013; OECD, 2000; Westerveld, 2012; Williams and Lapeyre, 2018; Williams and Horodnic, 2019).

To tackle dependent self-employment, therefore, national legal systems must be able to differentiate between dependent employment, self-employment and dependent self-employment. The Employment Relationship Recommendation No 198 adopted at the 2006 International Labour Conference is useful here. It sets out a series of principles to help countries tackle employment misclassification. Recommendation No 198 establishes the principle of the 'primacy of facts', whereby determining the existence of an employment relationship should be guided by the facts relating to the actual performance of work, rather than on how the parties describe the relationship. Many jurisdictions use this principle either statutorily or via case law (see ILO, 2006, 2016). A second principle is that workers possessing certain characteristics should be deemed to be employed or self-employed. Two key criteria are economic dependence, where a worker generates their income from one or mainly from one employer, and personal dependence, which refers to subordination and lack of authority on working methods, content of work, time and place (Böheim and Mühlberger, 2006; Eichhorst et al., 2013).

Analysing the data on dependent self-employment, the ILO (2018a) concludes that a limitation of the current measurements is the focus upon the self-employed who have one or a limited number of clients. This leads to considering as dependent self-employed those genuine self-employed who might have a limited number of clients, such as in their early stages, and to exclude those working in the gig economy who have multiple clients but at the same time their access to the raw materials or to the market is controlled by another company and therefore, should be considered dependent self-employed (ILO, 2018a).

A way forward proposed by the ILO (2018a, b) at the 20th International Conference of Labour Statisticians (10-19 October 2018) is to include a category of 'dependent contractors' in the revised International Classification of Status in Employment (ICSE-18) to replace ICSE-93 adopted by the 15th International Conference of Labour Statisticians (ICLS) in 1993:

> 'Dependent contractors are workers who have contractual arrangements of a commercial nature to provide goods or services for or on behalf of another economic unit, are not employees of that economic unit, but are dependent on that unit for organisation and execution of the work or for access to the market' (ILO, 2018a, b).

This inclusion of dependent contractors in the classification of employment status results in two different hierarchies, one based on the type of authority, classifying workers as independent workers versus dependent workers, and one based on the type of economic risk, classifying workers as workers in employment for profit and workers in employment for pay (ILO, 2018b). These hierarchies are displayed in Box 1.

The ILO (2018b, p.50) provides a proposed measurement approach by outlining the characteristics of a dependent contractor:

a) 'their work is organised or supervised by another economic unit as a client, or as an entity that mediates access to clients;
b) the mode of payment is by way of a commercial transaction;
c) the price paid for the goods produced or services provided is determined by the client or an intermediary;
d) access to raw materials, equipment or capital items is controlled by the client or an intermediary;
e) their actual working arrangements or conditions may closely resemble those of employees;
f) the entity on which the worker is dependent does not withhold income tax for the worker;
g) the worker is responsible for arranging their own social insurance and other social contributions.'

This enables clear boundaries to be established between dependent contractors, dependent employees and self-employed people, hence avoiding the above problems with previous definitions of dependent self-employment.

Once clear legal boundaries are established, the next step is to make the costs of misclassifying workers outweigh the benefits. To do so, countries can raise the costs by increasing the sanctions for misclassification (i.e., ranging from requalification of the employment relationship into the correct contractual relationship to criminal penalties, with various civil and economic sanctions in between) and the risks of detection of misclassification. Increasing the risk of detection, nevertheless, is difficult. There is currently a lack of information available to workers to find out whether they are misclassified (e.g., online tools to evaluate their employment status) and even if they exist, workers fear dismissal if they report their situation. For enforcement authorities, meanwhile, there tend to be poorly developed risk assessment systems for identifying dependent self-employment via data mining and matching, and the time, costs and uncertainty involved around the outcome of administrative or judicial authorities currently restricts this type of action.

Rather than punish non-compliance by raising the costs of misclassification, countries can also increase the benefits of correct classification. Incentives to classify employment relationships appropriately include:

- making the financial costs of employers outsourcing to self-employed equal to using dependent employment;
- making it easier for employers to legitimise their employment relationships; and
- extending social protection to the self-employed (or even dependent contractors) so that there are fewer advantages associated with misclassifying employment relationships.

These policy initiatives are based on the view that dependent self-employment is always purely a rational economic calculation. However, this is not always the case. Non-compliance also often results from a lack of trust in the state and/or a lack of understanding of the benefits of compliance. Education and awareness-raising campaigns therefore play a key role in tackling employment misclassification and this is where social partners can play a central role.

In Member States where a hybrid category of employment has been introduced to cover bogus self-employment, there is also a role for social partners in forging collective agreements specifically aimed at dependent self-employment.

Even if the misclassification of employment is tackled and social protection is equalised across all employment relationships, a key problem remains so far as social inclusion and protection is concerned. In many countries, there is insufficient formal employment for all working-age people to achieve social inclusion and protection through employment. Even if a 75 percent employment participation rate is achieved, it will still mean that one additional formal job will be required for every three that exist to provide full social inclusion and protection. It is therefore necessary to rethink whether social protection and inclusion should be so directly and inextricably tied to employment.

At least two options exist for dealing with this problem: a) individualisation of social protection (such as individual activity accounts) and b) making social protection universal. Each of them is discussed separately below.

As the World Employment Confederation (2016) asserts, social protection could be organised over an entire career rather than through an employment contract or job status. In the modern labour market, social benefits need to satisfy three conditions: they need to be portable and attached to individual workers, rather than to their employers; they need to be universal, applying to all workers (regardless of their employment status) and all forms of work; and they need to be pro-rata, linking employers benefit contributions to time worked, jobs completed, or income earned.

To achieve this, social protection funding needs to be separated from regular payroll contributions. One option is to develop an ‘individual social account’ that a worker keeps throughout their life. This would give a citizen access to all social rights (unemployment benefits, pension, education, social security, employee savings funds) and be used when required (e.g., to cover a leave of absence, training programme, or to take early retirement). Workers would contribute to the social account based on years worked and employers would fund and operate it like a social drawing rights system. The account might be accessed by a citizen at a time of professional difficulty (to provide an income during a period of unemployment), when facing personal problems (to reorganise working time or to take a sabbatical), or simply to fulfil a desire for professional development. An example is the individual activity account (compte personnel d’activité/CPA) implemented in France as of January 2017. This covers three social benefits: pensions, entitlement to life-long learning services and a ‘time saving scheme’. It aims to make individual rights transferable from one work status to another and link social entitlements to the individual rather than to employment status (Spasova et al., 2017).

Equally, working time could be calculated over an entire career, with citizens having to fulfil a specific number of hours to be eligible for a full pension, regardless of their situation (employed, self-employed, etc.). In the Netherlands, an example is the savings account system for pensions which has been in place for a decade or so. This allows workers to save a portion of their annual salary (up to 12 percent of annual income) in a savings account and then to use that money to fund unpaid leave (to care for children or elderly parents, to adopt, take parental leave, a sabbatical or to leave for early retirement). This account stays open even if the employee changes jobs and is attached to the individual (ILO, 2016).

Another option is to make social protection universal. If one accepts that not all working-age citizens can be in employment, and that there has never been a period of full employment for everyone (Beck, 2000; Giddens, 1998; Gorz, 1999), then an alternative to employment is needed for providing access to social protection. This could be either some passive welfare benefits system, an individual social activity account, or payment for active citizenship.

If the latter is pursued, then an option is to pursue a 'full-engagement' (rather than full-employment) society that provides enough work (both employment and other means of livelihood) and income to enable citizens to satisfy their basic material needs and creative potential (see Beck, 2000; Williams and Windebank, 2003). To achieve this, the first step is to recognise and value work beyond employment, including family work, parental work, caring labour, work for oneself and voluntary work. Once recognised and valued, the second step would be to give such work equal status to formal employment. Currently, there is considerable investment in helping citizens enter employment (through, for example, active labour market policies), but little if any resource is given to help citizens participate in work beyond employment. One option here is a universal basic income (van Parijs, 2004; van Parijs and Vanderborght, 2017). This would enable citizens to choose whether to engage in more employment to earn income to pay formal employees to provide their goods and services, or whether to provide such goods and services themselves or in alternative ways. There are several options for introducing and financing such a scheme, each of which presents advantages and risks. A discussion of these, however, is beyond the scope of this report.

In addressing these wider issues of social inclusion and protection, this section reveals that tackling informality, and especially this new form of informality, is a matter of structural transformation and requires much wider institution-building than falls within the remit of enforcement bodies, such as labour inspectorates and tax administrations.

9.4.2 Tackling informal work in the collaborative economy

Besides dependent self-employment, there is also a view that informality is growing due to the growth of the collaborative economy. This refers to:

> 'business models where activities are facilitated by collaborative platforms that create an open marketplace for the temporary usage of goods or services often provided by private individuals. The collaborative economy involves three

> categories of actors: (i) service providers who share assets, resources, time and/or skills – these can be private individuals offering services on an occasional basis ('peers') or service providers acting in their professional capacity ('professional services providers'); (ii) users of these; and (iii) intermediaries that connect – via an online platform – providers with users and that facilitate transactions between them ('collaborative platforms'). Collaborative economy transactions generally do not involve a change of ownership and can be carried out for profit or not-for-profit' (European Commission, 2016a, p. 3).

Examining the impact of the collaborative economy on the informal economy, there is no evidence that employers operating on collaborative platforms are more likely to use informal waged employees or to pay envelope wages than employers operating in the non-collaborative economy.

However, collaborative platforms do appear to increase the prevalence of dependent self-employment, not least when there are ambiguities around the relationship between platforms and the labour service providers (Eurofound, 2016a; Heyes and Hastings, 2017). As platforms are intermediaries between service providers and service users, it is not always clear if a worker is self-employed or an employee of the platform. If workers set their own prices, determine their own hours of work and do not receive instructions from the platform, they are likely to be genuinely self-employed. However, the standards of service to be provided or the price of the service are in some cases determined by the platform, which would imply a dependent employment relationship and, therefore, that workers are not genuinely independently self-employed.

Collaborative platforms also appear to increase informal self-employment. By breaking down previously larger jobs into multiple smaller tasks, collaborative platforms make it easier for the genuine self-employed, who would anyway be intentionally non-compliant, to find markets for their services. There is also evidence that collaborative platforms increase participation in unintentional informality among self-employed service providers when service providers are confronted with:

- lack of clear guidance on whether their own-account activities on platforms are classified as non-commercial or commercial activities;
- unclear guidance on whether their activities need to be declared for tax, social security or labour law compliance purposes, and/or
- complex procedures for declaring services provided via platforms.

This is clearly displayed by the 2018 Flash Eurobarometer 467 survey. This reveals that in the European Union, the most common problems of operating in the collaborative economy are:

- the lack of clarity around how to provide the service legally (stated by 22 percent of service providers);
- complicated systems for paying tax (19 percent);

- it is complicated or difficult to provide the service legally (13 percent), and
- the impact on their employment status is unclear (9 percent).

This strongly suggests the existence of unintentional non-compliance by service providers due to insufficient information on how to provide the service legally, the perception that the system for paying tax is too difficult and the perception that it is complicated or difficult to provide the service legally. Given the above, there is a need for educational initiatives as well as simpler compliance (e.g., platforms deducting taxes owed).

If such educational initiatives and simplification of compliance are pursued, not only would the prevalence of informal work on collaborative platforms be reduced, but also collaborative platforms would gain more service providers. The 2018 Flash Eurobarometer 467 survey reveals that of those who have not provided services via a collaborative platform, 22 percent state that they have not done so because of a lack of clarity about how to provide the service legally, 16 percent that the systems for paying tax are complicated and 13 percent that the impact on their employment status is unclear. Providing clear advice and information on how to operate legally and simplifying compliance will therefore significantly increase the number of service providers on collaborative platforms.

What educational initiatives and simplification of compliance might therefore be pursued? Initiatives required include:

- State authorities: providing advice and guidance to service providers on the tax, social security and/or labour law obligations of their platform activity via information websites and hotlines; directly contacting platform service providers advising them they need to declare income received; demanding that collaborative platforms disclose data on service providers, such as their names, contracts and/or transactions; licensing service providers, and simplifying tax and labour laws for service providers on collaborative platforms., and
- Platforms being required to: inform service providers of their tax, social security and/or labour law obligations; ensure that the service providers are licensed/authorised; impose limits on the number of registered service providers; collect tax revenues owed from service providers and forward them directly to the tax authority; and clearly define and communicate to service providers the difference between commercial and non-commercial activities.

Implementing these policy initiatives, therefore, can reduce the prevalence of informality in the collaborative economy and, at the same time, increase the number of service providers on platforms by addressing the barriers that prevent many from participating on platforms as service providers.

9.5 Afterword: Self-Employment, Wage-Employment and the Future of Work

A recent ILO report on 'Non-standard employment around the world' (ILO, 2016) shows that over the past few decades in industrialized countries, there has been a marked shift away from standard wage-employment100 to non-standard employment (NSE)101 and self-employment and EU countries experienced the same trends. The model of stable full-time wage-employment providing a professional career perspective, which had been dominant from the 1950s until the end of the 1970s, has gradually entered into crisis. There has been a development of precarious forms of work that has severely impacted the wage-employment model which was at the heart of post-WW2 welfare state societies. For Castells (1996: 268), 'The traditional form of work, based on full-time employment, occupational clear-cut assignments, and a career pattern over the life cycle is being slowly but surely eroded away'. This phenomenon tends to completely reverse the balance between what was called the 'typical' and the 'a-typical' jobs that are becoming the new standard of employment.

In this context, the development of self-employment has emerged in recent years as a core issue in the employment policy debates in EU countries. The growing number of self-employed but also the new discourse and measures aimed at promoting entrepreneurs are linked to: i) some demands from workers for more autonomy, ii) new opportunities related to information technologies and iii) the evolution of the labour market with the scarcity of the standard form of employment opportunities leading workers to find alternatives to wage-employment, including accepting more or less voluntary self-employment. Technological change and the development of the platform economy have fostered the development of self-employment as a main source of income or very often as an additional source of income.

This trend is associated with a new dominant paradigm which exalts self-employment and the entrepreneurial spirit as a positive feature of the labour market to the detriment of the standard wage employee. The last three decades in the EU are marked by this growing negative perception by many employers and policy makers of standard wage-employment. The problem posed by the need for labour and wage flexibility in a global economy marked by increased competition led to negative issues, in the form of dismantling part of the labour market institutions established to secure both a welfare state and a compromise of capital/labour, without substitution of other collective principles linking productivity gains with working conditions' gains.

9.5.1 Efficiency, fairness and the role of standard forms of employment

During the so called 'Fordist era' (Boyer, 1986) or the 'golden age of capitalism' (Bowles and Gintis, 1995) in industrialized countries, one of the fundamental changes that took place is the emergence of a relatively explicit compromise on the sharing of the fruits of growth. The new growth model or regime of accumulation, i.e. post-WWII Fordism, was based on major institutional transformations to allocate productivity gains, innovation and better living and working conditions to the population. In the

[100] Here understood as work that is full time, indefinite, as well as part of a subordinate and bilateral employment relationship.

[101] Here understood as : i) temporary employment, ii) part-time work, iii) temporary agency work and other forms of employment involving multiple parties and iv) disguised employment relationships and dependant self-employment

context of a national modernisation, the particularity of Fordism was the synchronisation of mass consumption and mass production. Indexing real wages on productivity resulted in a steady increase in demand for consumer goods, which allowed the expansion of the industry of mass production, a systematic exploitation of returns to scale and optimal programming of investments. This resulted in strong endogenous growth over a long period. Between 1960 and 1973, the OECD countries experienced annual growth rates of real GDP close to 5%, and Western Europe built an unprecedented European Social Model. The new regime of accumulation in place was based on an inclusive approach of growth through a fair redistribution of productivity gains between capital and labour (in other words, an increase in the real wage), the development of standard wage employment offering greater security to workers and, finally, a welfare state guaranteeing stability of purchasing power of individuals through the growing importance of indirect income and the establishment of comprehensive systems of social protection. As Esping Andersen (1994: 3) points out, 'Economically, it departed from the orthodoxy of the pure market nexus and required the extension of income and employment security as a right of citizenship. Morally, it sought to defend the ideas of social justice, solidarity and universalism'.

But the late 1960s were marked by new conflicts over the distribution of income resulting from a slowdown in productivity gains, while conflicts in the productive sphere were proliferating based on workers' discontent with the alienating labour organisation; those conflicts were mainly translated into wage increase demands. The progressive exhaustion of productivity gains from the Fordist and Taylorist organisation of work, coupled with increased labour cost, led to the breakdown of the previous regime of accumulation that linked wage increases, technical innovation and productivity gains. From a core component of a virtuous growth model, standard wage-employment progressively became an obstacle to flexibility and competitiveness for firms. As a result, they reorganised the productive sphere through two main strategies in order to face the new challenge of global competition. Firstly, the geographical restructuring of production, and the development of global supply chains, that aimed at taking advantage of world-wide cost differentials, led to increased competition between territories to obtain foreign direct investment or supplier contracts through offering the best business environment (in terms of taxation, infrastructure, training, labour laws, etc.). Secondly, there was the transition to a regime of flexible accumulation based on the search for maximum flexibility in terms of labour, management and production. In this context, firms have outsourced some of their activities to subcontractors or service companies and they have increased labour flexibility – notably through the evolution of human resource management which greatly contributed to the weakening of the employment relationship, leading to the development of NSE and the shift from labour contracts to commercial contracts for a growing number of self-employed.

The paradox is that the current debate on self-employment contributed to reopening the debate on the future of wage-employment and its role in firms' organisation of work. To get a better grasp of the implications for the future of work, it is important to understand that the employment relationship is marked by its incompleteness, because it deals with the sale of the labour force and not of labour. It is a kind of 'mutual bet' taken by employees and employers based on two uncertainties: (i) the employer's uncertainty about the quantity and quality of the work they will obtain from the employee, and (ii) the employee's uncertainty about the actual results of the enterprise and the fair distribution of its gain. Favereau (2016) clearly emphasises that the importance of work for the firm cannot be properly understood unless one takes into account its three dimensions and how they are interrelated. He stresses the need to consider work as: (i) production capacity; (ii) capacity for cooperation; and (iii) capacity for innovation and learning. Too often, only the first and second are considered, which tends to give priority to the product of work, its counterpart in terms of the effort of the worker, and finally the strategic and incentive means to make employees to comply in a context of subordinate relationship.

However, a very important dimension of work, that is underestimated in current debates on economic efficiency and competitiveness, is the capacity of innovation which results from individual and collective learning processes. First at the individual level, because a solution to a collective problem always originates in a person (an individual body and an individual brain); then its transmission to the collective level in order to put it in the memory of the firm. It is therefore necessary to consider a possibility of cooperation which is neither 'forced' nor 'purchased' as in traditional mainstream models. Cooperation continues to be subordinated, but it is built on a cooperative global scheme in which the employee has enough confidence in the firm to which they belongs to be ready to share their most personal resources (creativity, imagination, intelligence) to the point of transferring (by objectification) the fruit of their learning process to the firm which will benefit from it and transform it into collective learning. The key problem of incorporating individual learning into the collective scheme of the firm is that of an intersection between efficiency and equity from a dynamic perspective. For organizational learning to take place, the discoveries of those who have learned, their interventions and their evaluations must be recorded in the organisational memory, otherwise the individual has learned but not the organisation. (Argyris and Schön, 1978). Such a vision of work and cooperation leads to viewing the firm as a system of collective wealth creation providing an enabling environment for the transformation of individual learning into collective learning. For this to happen, nevertheless, loyalty and the feeling of belonging and fairness are essentials. The mere fact that people interact with one another over time in a firm in the framework of an employment relationship increases the value for each to continue to interact and play a cooperative game.

From this perspective, the development of NSE and self-employment poses the problem of cooperation and innovation in any situation where mutual gains are not realised and where loyalty and trust are impacted by the nature of the employment relationship. Indeed, the normal behaviour of non-altruistic actors, when they decide to play a cooperative game (for example, to commit to cooperation and collective learning), is strongly associated with some expectations in terms of fairness. They will participate only if they trust their firm and if they do not prefer to be cautious, wait, or exit, which are different ways to stymie collective learning (Reynaud, 1997). In other words, any firm, whatever its management model, is based on a quasi-social pact articulating economic efficiency and fairness. Workers will play the cooperative game only if they think that the rules of the game are fair, and that they will benefit from their individual investment in a collective scheme. It can be in their long-term interest to suspend their short-term interest and opportunism. But it remains to be understood why/when a rational agent decides to do so. This decision is taken ex ante, i.e. before knowing exactly what they will get from their cooperation. It means that the actors have to take a gamble and trust their firm. As Bowles and Gintis (1995) argue, '[m]ore equal societies may be capable of supporting levels of co-operation and trust unavailable in more economically divided societies. Both co-operation and trust are essential to economic performance, particularly where limited or asymmetric information make both state intervention and market allocations inefficient'.

The future of standard wage employment is more than ever at the heart of the thinking on the future of work because it is strongly connected to the development of our societies. It is clear that the more negativity is attached to the concrete nature of wage employment, the more the labour market will be flexible and the more the labour market will resemble a market like the others. Conversely, the more the positive role of wage employment is acknowledged in innovation and collective learning, the less the labour market will resemble a market as the others, and the more job creation and human resource management will result from a different logic than that of the market. (Favereau, 2016: 33).

9.5.2 Why the nature of the employment relationship does matter

The inability of firms to accurately measure the amount of effort their workers are putting forth, and the fact that employers need to motivate workers, change fundamentally the character of labour markets. Over the last three decades, the mainstream theory (notably contract theory, implicit contract theory, efficiency wage theory or the new theory of property rights) aimed at explaining why firms may find it optimal to manage the 'internal market' for labour and refrain from cutting wages in recessions even though wage reductions would decrease labour costs (Campbell and Kamlani, 1997). The failure of firms to reduce wages in the face of unemployment must mean that for some reason it is unprofitable for them to do so (Bulow and Summers, 1985). The potential importance of the linkages between the level of wages and workers' productivity is at the heart of a large and rich extended standard theory of labour markets.

As a result of the incompleteness of employment contracts, employers and workers cannot foresee everything, and it would be too costly or impossible to write off everything. The employment relationship and the employment contract are subject to the distinction between 'neat' work (respecting the spirit of the contract) and 'basic' work (respecting only the letter of the contract). Only the latter can be imposed by the employer (or sanctioned by a competent authority). The former remains at the discretion of the employee (Lopes, 2016). A key distinctive feature of the Hart and

Moore (2008) model is that it assumes that only ‘perfunctory performance’ is subject to contract. The ‘consummate performance’, which is what is in the ‘spirit of the contract’, is not subject to contract. Workers may like to ‘do their best’ but they only make an exemplary effort if they feel well treated. What the contracting parties think they are entitled to is determined by the (incomplete) contract they sign ex ante. Extended standard theories show that where firms cannot monitor workers perfectly, they will pursue policies that will cause workers to value their jobs (Bullow and Summers, 1985). Better working conditions improve the discipline of the workers, give them a more loyal interest in the institution and raise their personal efficiency. In addition, firms’ desire to decrease hiring and training costs and to retain workers – in particular because of the growing importance of immaterial work – with firm-specific human capital is an important factor explaining the rigidity of wages, particularly for white collars.

Doeringer and Piore (1971) have developed a dual labour market model where jobs in the primary sector are good jobs (high wages, job security, ladders for internal promotion) while jobs in the secondary sector are characterised by low wages and casual attachment between workers and firms. They emphasise that members of disadvantaged groups are confined to the secondary sector with low wage and low security jobs in contrast with ‘good high wage jobs’ in the primary sector. In their model, the labour market is not a market like the others as it is characterized by ‘internal markets’ where coordination is not based on market mechanisms. All surveys of wage rigidity have found that concerns for fairness play an important role in the functioning of such ‘internal markets’, and in particular in explaining why firms normally refrain from cutting wages in recessionary periods. An internal labour market is none other than a set of procedures by which workers within the organisation are protected from the competition of outsiders. It is because of this protection, and therefore possible permanence, that the collective knowledge and learning process required for production and innovation can be created and expanded. The possibility of organisational learning, along with its implications in terms of efficiency and productivity gains (in the future), compensates for the neutralisation of competition with its inefficiency and unproductivity implications (in the present) (Favereau, 1989: 307)

Work is a specific human activity, which can be the subject of employment contracts or commercial contracts. But the effectiveness of the employment contract in relation to the commercial contract increases with the difficulty of evaluating and measuring performance, that is as uncertainty about the worker's behaviour increases (Holmström and Milgrom, 1994). The key point to remember here is that the employer can legitimately direct certain aspects of employees’ behaviour within the employment relationship. Labour law gives the employer the right to ‘cooperation’ of the employee in areas not covered by explicit and implicit agreements. In this context, employment relationships are more effective than commercial contracts to the extent that they provide flexibility: The fact that, through the subordination relationship, the employer can determine which tasks are to be performed facilitates the adaptation to uncertainty once it is lifted, and this without any cost. In commercial contracts, on the other hand, tasks are defined in advance and cannot be adjusted to unforeseen circumstances without (costs of) renegotiation (Lopes, 2016).

We must view from a dynamic perspective the efficiency gains associated with the temporal dimension of learning, which is itself deeply related with standard forms of employment. The employee does not merely try at a given moment, they also participate in a movement, in an acquisition, in increasing firm's efficiency (Reynaud, 1997). Employees, recognising that their working conditions are relatively secured by an 'internal market' are therefore willing to invest their cognitive resources in improving the internal functioning of the firm employing them; at least if they can hope to share with their employer the benefits of productivity and competitiveness gains in various forms (higher wages, reduced working hours, improved working conditions, etc.). As we have seen above, an individual agent will play the game of cooperation, accepting that their solutions fall into the public domain within the organisation, if they believe in an equitable functioning of the latter. Here, equity promotes efficiency, which in turn will promote equity by fostering self-interested altruism or enlightened selfishness (Simon, 1983: 53). Cooperation within the firm requires minimal legitimacy and therefore the presence in collective representations of a reduced model of social link, which will serve as a reference for judging unforeseen contingencies in the course of the contractual relationship between the employer and the employee. The wage rule is a convention that makes sense only within a wider interpretative grid of the type of social pact that the firm conveys (Favereau and Lazega, 2002)

9.5.3 From material to immaterial work: implications for the employment relationship

We must first recognise that the 'old' type of material work is still dominant in the world. But progressively in some areas of the global economy, work in its immaterial form is tending to become hegemonic. This shift to the hegemony of a new type of work appears only as a global trend, but this trend sheds light on the current dynamics and the stakes for the future of work as we are now witnessing the rise of the immaterial economy. This does not mean that factories and industrial workplaces disappear, but simply that the most important share of added value in any production (agricultural, industrial or service) is concentrated in the upstream and downstream sectors. It is the design, delivery network, learning and accumulation of information and knowledge about the customers that matter the most in wealth creation nowadays. The activity in collaborative networks, the linguistic and symbolic relations that weave together human beings constitute the main source of productivity gains, creativity and wealth (Moulier-Boutang, 2015).

What is the value of a company in post-industrial times? Its value today increasingly depends on intangible assets such as 'goodwill' and transformative capacities, which can be created and destroyed very quickly (Hard and Negri, 2015). The emphasis on innovation, as a condition of competitiveness, leads firms to solicit a new type of work which is deeply involving the personality of employees. It is 'the soul' of the worker which is mobilised by the firm. The quality and quantity of work are reorganised around its immateriality (Negri, 2010). As a consequence, work in the post-industrial era plays a more important role in the life of employees; it is less instrumental and more identity related because employees are invited to commit themselves without reservation, in all dimensions of their humanity.

In the Fordist era the skilled worker developed knowledge and know-how which were mainly linked to a specific workplace and thus to specific coordination and cooperation schemes. But emotional and intellectual skills, the ability to create networks, communication and other skills that characterise the new nature of work do not generally depend on a specific workplace. The power of immaterial work – which includes affective, communicative, scientific and intellectual activities – is not reduced to the sum of simple work or cooperation (whatever its complexity); it is characterised by creativity – as an expression of the common.

This transformation of work affects workers in different ways, depending on their functions in the hierarchy of the firm and the economic sector where they work, and it is now an irreversible process. It is deeply linked to the development of information technologies, data mining, computational statistics and other sub-fields of Artificial Intelligence (AI) and to the price decline in the real cost of computing. Moreover, computerisation of work based on algorithms and big data is now rapidly expanding and affects routine and non-routine cognitive tasks (Brynjolfsson and McAfee, 2011). This is likely to change the nature of work across industries and occupations. But the new frontier of accumulation and productivity gains will depend upon the tasks computers are able to perform, which ultimately depend upon the ability of a programmer to have access to the relevant set of information, derived from different sources, in such a way as to be able to write a set of procedures or rules that appropriately direct the technology in each possible contingency (Frey and Osborne, 2013). To do that and define the right algorithm, programmers need the cooperation of workers and users. This process requires workers' engagement with AI technologies throughout the process of completing a task and supervision related to the monitoring, licensing, and repair of AI (US Department of State, 2016).

We are therefore coming back to the central idea of collective learning which is nourished by individual learning. An individual agent will play the game of cooperation, accepting that their solutions fall into the public domain within the firm if they believe in the equitable functioning thereof (Favereau, 1994). Such a commitment involves their flesh and heart, and requires that their work be part of a community of people, a system of lasting relationships where their personal investment is recognized. (Favereau, 2014). Computerisation will thus be determined not only by technological advances but by the nature of cooperation in the firm. Immaterial work is thus at the heart the new phase of capitalism as both AI workforce and users who operate those applications in specific settings will drive fundamental advances in AI and related fields, refine AI methods for specific applications, and contribute to pushing the boundaries of productivity gains (US Dept, AI, 2016).

This trajectory of the world of work towards immaterial work has a great importance for human resource management in the firms and for the future of the employment relationship. Indeed, employers exercise more and more their functions of control and oversight from outside the productive process, since the content of the process belongs more and more to another mode of production, to the social co-operation of immaterial work. That new type of work is increasingly inclined to generate its own forms of social co-operation and to generate value added in an autonomous way.

Henceforth, wage-employment has the potential for personal fulfilment and collective innovation, which feeds entirely new expectations on the part of both employees and management. However, its current mode of exercise and organisation, mainly through labour market flexibilisation, far from releasing this potential, has rather hindered or even crushed it. The shift towards NSE is at the heart of a process of dereliction – in other words, a state of complete neglect and moral loneliness – of wage-employees in firms. This situation is associated with a type of suffering unprecedented in the history of industrial civilisation: typical examples are ‘burn out’, moral harassment, suffering at work, and extreme professional stress, and risk of suicide. It is now common to group them under the label ‘psycho-social risks’. With this consequence that the desire to work, this essential and enigmatic thing, is gravely threatened but also this other essential and enigmatic thing which is the capacity of collective learning which is at the heart of firms’ wealth collective creation (Favereau, 2016).

This severe deterioration of the employment relationship and trust within firms increase workers’ feeling of ‘indignation’ towards the functioning of the firm. In such a context, making the minimum effort and not playing the cooperative game risk becoming the standard behaviour. Hence the risk for the capitalist system is no longer the multiplication of open conflict but the exodus, in other words a process of withdrawal from the relationship with capital, and the fostering of a non-cooperative game within the firm.

The evolution of the employment relationship has a great impact on exit and voice options by workers (Hirschman, 1970). Voice always reflects the decision to ‘stick’ with the deteriorating firm or organisation and this decision is in turn based on: i) an evaluation of the chance of getting the firm ‘back on the tracks’ through one’s own action and through that of others; and ii) loyalty. Voice has the function of alerting a firm or organization to its failing and it is at the heart of any cooperative game. What is killing innovation and collective learning is less open or latent conflicts – that can be managed through conflict management mechanisms (based on the sequencing conflict – bargaining process – compromise) – rather than the exit option. The presence of loyalty makes exit less likely; in other words, it can neutralise within certain limits the tendency to exit. Loyalty is associated with the reasonable expectation that improvement can be achieved from within. It reflects the willingness to fight for change from within. Loyalty is deeply related to trust and to the feeling of belonging associated to the employment relationship.

Not all forms of subordination within the firm are the same. Some are more effective at providing an enabling environment for collective learning, which requires true (not artificial) interactions between employees, including their managers. A wage-employment system only stimulates the acquisition of individual skills and collective learning if employees do not opt for withdrawal or caution, seeing the immobility. The employment relationship is a convention that makes sense only within a wider analytical framework on the type of social pact the firm conveys (Favereau, 1999: 172). Cooperation within the company requires minimal legitimacy and, therefore, the presence in collective representations of a model of fairness which will serve as a reference for judging unforeseen contingencies in the course of the contractual relationship between the employer and the employee. With self-employment, or the most precarious segments of NSE, including bogus self-employment, dissatisfaction is more likely to take the form of silent exit. The evolution of the labour market with the erosion of institutional affiliations, the deterioration of legal protection for the most vulnerable, and the individualisation and quantification of performance and evaluation criteria is a source of disengagement of workers blocking initiatives of change from above – or of driving dynamics of endogenous innovations within the firm. It is expressed in the firm through resistance to change or restraining to strict 'basic work'. Short-term efficiency based on the flexibilisation of the labour market raises major issues about long-term efficiency, which is deeply interrelated with the feeling of fairness experienced or not by workers.

This evolution of the labour market is a concern, because these employment arrangements are often associated with greater insecurity for workers when compared with standard wage-employment. NSE and self-employment, particularly when they are not voluntary, may increase workers' insecurities in different areas, including: i) employment security and mobility with the possibility of transitioning to better jobs being less likely; ii) earnings security because of the dependence on commercial contracts and substantial wage penalties relative to comparable standard workers; iii) working time with workers in on-call employment, casual arrangements or commercial contracts typically having limited control over when they work with implications for work-life balance but also income security; iv) occupational health and safety (OSH) with significant OSH risks due to a combination of poor induction, training and supervision, communication breakdown and fractured or disputed legal obligations; v) social security as workers in non-standard employment and self-employment face a lack of continuity in employment and short working hours, which may result in inadequate coverage or limited benefits during unemployment and retirement; vi) training as it is less likely to receive on-the-job training which can have negative repercussions on career development or adaptive capacity to technological change, and finally vii) representation as the workers in NSE and self-employment have more tenuous attachment to the workplace and are faced with constraints and vulnerabilities which do not provide an enabling environment for joining an employers and workers' organization.

Unleashing the full potential of immaterial work calls for the construction of an alternative business model, which will be organised mainly around the 'innovation capacity' dimension of wage employment. Its objective will be to transform profits (redefined as corporate collective income) into jobs; but meaningful jobs which have been the subject of continuous exploration and collective deliberation: what to produce and how to produce it? If the specialisations of individuals can constitute a first source of value (by the gains of individual productivity, plus the positive externalities expected of the combinations between specialisations), a rich and dense network of relations between subjects having their share of autonomy will open the way to additional creations of value, bringing about new positive externalities, unexpected, creating new unexpected specialisations.

To conclude, one of the major challenges for the world of work in the 21st century is the evolution of wage employment in firms. Either firms will continue to deconstruct and weaken the employment relationship on the same slope as in the past 30 years – at the risk of self-destruction of the conditions of accumulation, or they will seize the opportunity offered by the new modalities of work to both reconstruct the human foundation of a democratic capitalism and shift towards a human-centred business and economic model. Such a process could precisely bring about a democratisation of the organisation of the firm and a new social pact built on a renewal of the wage-employment form.

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APPENDIX

Technical notes to European Working Conditions Survey

Data used

The report used the 2015 European Working Conditions Survey (EWCS). The sample used in the EWCS is representative of those aged 15 and over (16 and over in Bulgaria, Norway, Spain and the UK) living in private households and in employment who did at least one hour of work for pay or profit during the week preceding the interview. The sample in each country was stratified by region (NUTS 2 or equivalent) and degree of urbanization. The sixth edition of the EWCS covers the 28 EU Member States, Norway and Switzerland and Albania, the Former Yugoslav Republic of Macedonia, Montenegro, Serbia and Turkey and comprise 43,850 interviews out of which 35,765 conducted in the EU28 Member States.

Analytical methods

For the purpose of this study (to compare working conditions of workers in precarious work), only the individuals who answered to the questions ***Q7*** (*Are you working as an employee or are you self-employed?*), ***Q9*** (*Regarding your business, do you: a) Have the authority to hire or dismiss employees?; b) Get paid an agreed fee on a weekly or monthly basis?; c) Have employees –(working for you); d) Generally, have more than one client or customer*), ***Q91e*** (*To what extent do you agree or disagree with the following statements? I make the most important decisions on how the business is run)* and ***Q11*** (*What kind of employment contract do you have in your main job? a) Contract of unlimited duration; b) Contract of limited duration; c) A temporary employment agency contract; d) An apprenticeship or other training scheme; e) No contract; f) Other*) were kept in the analysis (35,259 individuals). Based on these four questions, the workforce was divided in seven categories, namely: self-employed without employees (dependent self-employed or genuine self-employed), self-employed with employees, and employees (with indefinite contract, with fixed-term and temporary employment agency contract, with other type of contract or with no written contract).

For both the descriptive statistics and regression analysis, weighting schemes were used as recommended in EWCS 2015 technical report. Country level post-stratification weight (w4) has been used to carry out analysis for country comparisons. When carrying out analysis on an aggregate level (EU28), a different weighting scheme was used (w5_EU28) which takes the relative size of the workforce in each of the countries into account. The variables used in the analysis are listed in Table A1. For the descriptives, we analysed all cases available for each analysed variable (don't know and refusal were excluded). However, individuals for whom there were available data on each and every independent variable were kept in the regression analysis.

The six job quality indices are measured on a scale from 0 to 100. They comprise the same dimensions as the Eurofound overview report (2016), except the *social environment index* where the *management quality* dimension was excluded because it is not available for self-employment, and the *prospects index* where the *employment status* dimension was excluded because it is used as a dependent variable in the regression analysis. With the exception of *work intensity*, the higher the index score, the better the job quality. Thus, except the *work intensity*, the variables were normalized and rescaled with value 0 for the lowest level of the variable (the worse condition for the worker) gradually increasing to 100, the highest level of the variable (the best condition for the worker). For work intensity the values were set in the reverse order. Each of the job quality indices comprise a number of sub-dimensions with their indicators. All indicators and sub-dimensions were given the same weight when calculating the job quality indices mean (the correlation matrix is available in Table A3).

Table A1. Variables used in the analysis

Variable	Description
Dependent variables	
Dependent self-employed	1 = Yes; 0 = Otherwise
Employees with no written contract	1 = Yes; 0 = Otherwise
Independent variables	
Gender	1 = Male; 0 = Female
Age	Respondent exact age. Age squared is also included in the regression analysis
Education	1= Early childhood education/ Primary education; 2 = Lower secondary education; 3 = Upper secondary education; 4 = Post-secondary non-tertiary education; 5 = Short-cycle tertiary education; 6 = Bachelor or equivalent; 7 = Master/ Doctorate or equivalent
Respondent's parents born in the country	1 = Yes; 0= No

Household size	1 = 1 person; 2 = 2 persons; 3 = 3 persons; 4 = 4 persons; 5 = 5 persons or more
Household ability to make ends meet	1 = Very easily/ easy; 2 = Fairly easy; 3 = With some difficulty; 4 = With difficulty/ great difficulty
The person who contributes the most to the household income	1 = The respondent; 2 = Other person; 3 = All equally
Number of employees in the company	1 = 1 - interviewee works alone; 2 = 2-9 employees; 3 = 10-249 employees; 4 = 250+ employees
Workers with the same job title as the respondent at the workplace	1 = Mostly men; 2 = Mostly women; 3 = Approximately equal numbers of men and women; 4 = Nobody else has the same job title
Sector	1 = The private sector; 2 = The public sector; 3 = A joint private-public organisation/company; 4 = The not-for-profit sector or an NGO/ Other
Occupation	1 = Managers; 2 = Professionals; 3 = Technicians and associate professionals; 4 = Clerical support workers; 5 = Service and sales workers/ Armed forces occupations; 6 = Skilled agricultural, forestry and fish; 7 = Craft and related trades workers; 8 = Plant and machine operators, and assembly; 9 = Elementary occupations
Economic activities (NACE rev. 2)	1 = Agriculture, forestry and fishing; 2 = Industry (except construction); 3 = Construction; 4 = Wholesale and retail trade; repair of motors; 5 = Transportation and storage; 6 = Accommodation and food service activities; 7 = Information and communication; 8 = Financial and insurance/ real estate activities; 9 = Professional, scientific, technical + administrative activities; 10 = Defence, education, human health, social work; 11 = Arts, entertainment and recreation + others; 12 = Activities of households as employers
Physical environment index	Mean (rescaled 0 to 100) of 13 indicators

Work intensity index	Mean (rescaled 0 to 100) of three dimensions: quantitative demands (4 indicators), pace determinants and interdependency (6 indicators) and emotional demands (3 indicators)
Work time quality	Mean (rescaled 0 to 100) of four dimensions: duration (3 indicators), atypical working time (4 indicators), working time arrangements (2 indicators) and flexibility (2 indicators)
Social environment index	Mean (rescaled 0 to 100) of two dimensions: adverse social behaviour (7 indicators) and social support (1 indicator)
Skills and discretion index	Mean (rescaled 0 to 100) of four dimensions: cognitive dimension (5 indicators), decision latitude (4 indicators), organisational participation (3 indicators) and training (2 indicators)
Prospects index	Mean (rescaled 0 to 100) of three dimensions: career prospects (1 indicator), job security (1 indicator) and downsizing (1 indicator)

Table A2. Dependent self-employed and employees with no written contract, by socio-demographic characteristics

Variable	**Dependent self-employed**			**Employees with no written contract**		
	Percent of:		Of which:	Percent of:		Of which:
	All employment	Self-employed		All employment	Employees	
Gender						
Male	5	29	58	4	5	47
Female	4	36	42	5	6	53
Age						
Under 35 years	3	41	21	6	6	33
35 – 49 years	4	27	33	3	4	28
50 years and over	6	32	46	6	7	39
Education						
Early childhood education/ Primary education	11	45	7	16	21	10

Lower secondary education	6	35	19	9	11	26
Upper secondary education	4	31	40	5	6	45
Post-secondary non-tertiary education	3	24	5	3	4	4
Short-cycle tertiary education	4	30	7	3	4	5
Bachelor or equivalent	4	31	12	2	3	6
Master/ Doctorate or equivalent	4	26	10	2	2	4
Respondent's parents born in the country						
No	5	38	13	5	6	14
Yes	4	30	87	5	6	86
Household size						
1 person	5	36	16	6	7	17
2 persons	4	32	32	5	5	30
3 persons	4	30	22	4	5	20
4 persons	4	28	21	4	5	19
5 and more persons	4	32	9	8	9	14
Household ability to make ends meet						
Very easily/ easy	4	24	27	3	3	17
Fairly easily	4	32	33	4	4	25
With some difficulty	4	35	23	6	7	30
With difficulty/ great difficulty	7	44	17	13	15	28

The person who contributes the most to the household income						
Yes	4	26	54	4	4	44
No	4	45	34	7	8	49
All equally	7	33	12	4	6	7
Number of employees in the company						
1 employee (interviewee works alone)	27	38	64	14	51	31
2-9 employees	5	18	24	9	12	41
10-249 employees	1	33	8	3	3	20
250+ employees	1	68	4	1	1	8
Workers with the same job title as the respondent at the workplace						
Mostly men	3	30	24	4	5	30
Mostly women	1	23	8	3	3	20
Approximately equal numbers of men and women	3	37	17	4	4	18
Nobody else has the same job title	13	30	51	9	17	32
Sector						
The private sector	5	30	87	5	6	78
The public sector	1	37	4	2	2	9
A joint private-public organisation/company	2	32	2	1	1	1

The not-for-profit sector or an NGO/ Other	9	48	7	16	20	12
Occupation						
Managers	4	13	5	2	3	2
Professionals	4	33	19	1	1	5
Technicians and associate professionals	3	27	11	2	2	6
Clerical support workers	1	33	1	2	2	4
Service and sales workers/ Armed forces	3	22	12	7	8	31
Skilled agricultural, forestry and fishery workers	30	51	20	12	28	7
Craft and related trades workers	5	27	13	4	5	8
Plant and machine operators, and assemblers	3	45	5	2	3	4
Elementary occupations	5	65	14	14	16	33
***Economic activities* (NACE Rev. 2)**						
Agriculture, forestry and fishing	27	51	22	15	32	12
Industry (except construction)	2	25	7	1	2	5
Construction	7	28	9	6	9	7
Wholesale and retail trade; repair of motors	3	18	10	3	4	10

Transportation and storage	4	44	5	2	2	2
Accommodation and food service activities	2	10	1	12	14	12
Information and communication	5	32	3	2	3	1
Financial and insurance/ real estate activities	3	22	3	1	1	1
Professional, scientific, technical + administrative activities	5	26	11	3	4	7
Defence, education, human health, social work	2	33	10	3	3	15
Arts, entertainment and recreation + others	11	42	14	12	16	13
Activities of households as employers	13	84	5	44	52	15

Source: EWCS 2015 (own calculations)

Table A3. Correlations between the job quality indices (N=31,884)

	Physical environment index	Work intensity index	Work time quality	Social environment index	Skills and discretion index
Physical environment index					
Work intensity index	-0.31				
Work time quality index	0.23	-0.31			
Social environment index	0.08	-0.15	0.12		
Skills and discretion index	0.16	0.09	-0.05	0.18	
Prospects index	0.15	-0.04	0.02	0.15	0.35

Source: EWCS 2015 (own calculations)

This diverse collection of essays on the transition to formality across different parts of the world entails a rich juxtaposition of analyses and evidence. The central premise of this volume is that the challenge of structural transformation – i.e. moving people and resources out of low productivity to high productivity sectors –primarily occurs along the formal-informal divide. It shows that while sustained economic growth eventually leads to a sustained reduction in the size of the informal economy, the process is too long and uncertain. Hence, policy activism is required based on a holistic strategy cutting across macroeconomic, sectoral, labour market and regulatory policies. This message is in striking contrast to the view that the transition to formality essentially presupposes a reduction in the regulatory burden on the business community that will incentivize opportunistic actors to step out of the shadows and operate in a transparent and accountable environment. The numerous novel insights and conclusions generated by the authors of the book provide vital information to guide global and national policies to improve the world of work of those deriving their livelihood from the informal economy.

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