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FLEXIBILITY AND SECURITY

IN THE LABOUR MARKET

LABOUR MARKET INSTITUTIONS AND PERCEIVED JOB SECURITY IN EUROPE

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Organization

Flexibility and Security in the Labour Market

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Foreword

The research for this series of *flexicurity* papers has been guided by the International Labour Organization (ILO) Employment Sector's main activity, the Global Employment Agenda for the pursuit of Decent Work for All, approved by the ILO Governing body in March 2003. One key element of the Global Employment Agenda is successful management of labour market changes, provoked by global competition and technological progress, mobility and flexibility of workers, requiring adequate employment and income security in exchange. While the Agenda provides a framework for this debate and policy implications, the flexicurity papers contribute to its further elaboration and implementation in the regional and national context.

More specifically, these papers are the first outcomes of an ongoing ILO technical project on *flexicurity*, being carried out for Central and Southern Eastern Europe countries; this cash surplus funded project intends to combine research, technical cooperation activities and advocacy among policy makers. Therefore, each of the *flexicurity* papers has been discussed during national tripartite seminars to initiate dialogue on the formulation of policy options based on a good balance between flexibility and security. The intention is to facilitate the implementation of the flexicurity approach by mainstreaming it in the design of National Employment Action Plan(s).

The labour markets of the former command economies of Central and Eastern Europe have gone through profound transformation since the start of their political, economic and social reforms. While in the past full employment had been guaranteed by the State and the countries had even experienced labour shortages, after 1989 they were suddenly confronted with accelerating unemployment, which despite expectations on its temporary character remained fairly high and persistent. Neither the labour legislation nor labour market institutions were able to handle this new situation properly. Enterprises requested more freedom to reduce massive labour hoarding and adjust their workforce to production and economic changes, while large numbers of laid-off workers needed assistance in finding new jobs, improving their skills and managing an abrupt loss of income. National authorities responded by amending labour legislation and establishing national employment services aimed at providing job search assistance for the unemployed. They also introduced labour market policies for improving jobseekers' employability and for interventions on both the demand and supply sides of the labour market.

The exposure of enterprises from emerging economies to competition in global markets has been forcing them to rationalize production costs, including costs of labour, and react rapidly to market changes. Besides downsizing, they have also started offering time-limited labour contracts, contracts regulated by the Civil Code or informal employment with no contract at all, and making partial payments of wages "under the table" to evade taxation.

However, confronted with this tendency towards flexible forms of employment and higher informal employment, and the consequent significant weakening of workers' employment and social protection, governments have had to further amend existing labour legislation but also to think about more effective assistance to workers. Social dialogue has been playing an increasingly important role in this process, at both the national and enterprise level. The issue is now to find a new balance between appropriate adjustment flexibility for enterprises, which would remove impediments to productivity improvements, and reasonable employment and income security for workers, contributing towards reduction of unemployment and poverty.

The present study is part of the ILO's flexicurity papers which include a series of national reports on Bulgaria, Croatia, Hungary, Lithuania and Poland as well as two cross-country papers. While the first report looked at the wage dimension of flexibility and security in the labour market, this study analyses perceived job insecurity in Central and Eastern European countries in comparison with Western European countries.

Sandrine Cazes, Alena Nesporova

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Contents

	<i>Page</i>
Foreword	iii
Acknowledgements	v
Executive Summary	1
Abstract	3
Chapter 1: Introduction	5
Chapter 2: Theoretical Considerations	7
Chapter 3: Related Literature	9
Chapter 4: Data and Methodological Questions.....	11
4.1 Data.....	11
4.2 Methodology.....	12
Chapter 5: Evidence of Low Job Security in CEE Countries	15
Chapter 6: Why is Subjective Job Security Low in CEE Countries?	25
6.1 Bivariate Analysis	25
6.2 Multivariate Analysis: Decomposing the Differential.....	28
6.3 Bringing the Results Together	34
Chapter 7: Conclusion	37
References	39
Appendix: Scatter Graphs	41

Executive summary

The idea to combine flexible labor markets with social protection, termed *flexicurity*, has been pursued by the ILO since the early 2000s. This article analyzes the security aspect of the *flexicurity* concept by putting particular focus on Central and Eastern European (CEE) countries in comparison to Western European (WE) countries. The article presents an empirical analysis of the differences in perceived job security between CEE and WE countries and seeks for an explanation of these differences. The results show that self-reported satisfaction with job security is considerably lower in CEE countries than in WE countries, and that fewer workers in CEE countries consent to the statement ‘my job is secure’. In WE countries a smaller fraction of employees reports a risk to lose their job, a much higher fraction reports to be sure not to get fired, and a much higher fraction reports to be sure to find a similar job if they had to. This shows that job security in CEE countries is lower not only because the risk of losing ones job is higher, but also because the consequences of losing it are more severe: it is more difficult to find a new job. Not surprisingly, job security is more highly valued in CEE countries. Workers in CEE countries report more frequently that job security is important, while in WE countries an ‘interesting job’ is mentioned more often than job security among the important features of a job. Over the last two decades, the share of workers who mention job security as important in a job increased markedly in CEE countries but not so much in WE countries. This underlines the difficulties of the transition process, during which enterprise restructurings and job reallocation took place and jobs in CEE countries became more insecure than they had formerly been.

The literature has proposed that subjective job insecurity can be understood as reflecting two dimensions, namely (1) the probability of a job loss, and (2) the consequences or costs of a job loss. This implies that even if the probability of a job loss is high, workers can be satisfied with their job security if the consequences of a job loss are not so severe. This is in effect revealed by the data. Employees from some countries, in particular Austria and Denmark, report very high satisfaction with job security, while rating the actual security of their jobs not particularly high. This implies that satisfaction with job security is not only influenced by actual provisions that prevent people from losing their jobs (e.g. employment protection legislation), but also by arrangements that support workers after a job loss by giving income support and assistance in finding a new job (e.g. passive and active labour market policies). From this understanding of the determinants of job security, the article proceeds in investigating the determinants of the gap in subjective job security between CEE and WE countries.

The evidence from cross-country correlations of labour market institutions and subjective job security is consistent with the hypothesis that active labour market policies increase the

ease of finding a new job, that the incidence of fixed term contracts decreases subjective job security, and that higher payroll taxes decrease job security by increasing the risk to lose ones job and by decreasing the chances to find a new job. The bivariate cross-country analysis in this study can not substantiate statistical significant effects of spending on passive labour market policies and of the EPL index on job security. However, the sign of the influences suggests that passive labour market policies may have a potential to increase job security, while there appears to be a risk that EPL can have a negative impact by reducing the chances for the unemployed to get hired in a new job.

The multivariate analysis to explain the differential in perceived job security between CEE and WE countries decomposes the differential into a part due to differences in relevant characteristics, such as labour market institutions, and differences in the effects of these characteristics on perceived job security. The decomposition suggests that about one third of the differential can be explained by the high unemployment rates in CEE countries. A quarter of the differential can be explained by lower expenditure on labour market policies relative to GDP, whereby the data suggest that differences in expenditures on passive labour market policies are more relevant than those on active labour market policies in explaining the differential. The analysis also shows that negative effects of EPL strictness on the satisfaction with job security are more pronounced in CEE countries than in WE countries, which contributes also to the differential. The positive effects of education and expenditure on labour market policies appear stronger in CEE countries, which has prevented the differential from being even wider. This implies that the returns to increases in educational attainments of the work force as well as to spending on labour market policies are higher in CEE countries than in WE countries.

Abstract

The paper analyses perceived job security in Central and Eastern European (CEE) countries in comparison with Western European (WE) countries. The results show that in CEE countries satisfaction with job security is much lower, the importance attached to job security is higher, the perceived risk of losing one's job is higher and the perceived chances of finding a new job are lower than in WE countries.

The findings concerning the determinants of perceived job security are consistent with the hypothesis that the low level of perceived job security in CEE countries is due to low spending on active and passive labour market policies and high payroll taxes. Employment protection legislation and the incidence of fixed-term contracts are not found to have a clear-cut effect on perceived job security.

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Chapter 1

Introduction

The stability of the job, along with wages and other working conditions, is one of the key features of the employment relationship. The decision to continue an employment relationship is a joint decision of the worker and the employer. If one side decides to terminate the employment relationship, this has repercussions on the other side. This paper analyses the stability of jobs from a workers' perspective. It looks into the determinants of perceived job security.

Looking into the determinants of job security is important as, according to international survey results, job security is one of the aspects of a job that is most valued by workers (Clark 2005). Economists and other researchers have found important consequences of job security: medical research has shown that the absence of job security has detrimental effects on health (Bartley 2005). But job security matters not only for worker well-being. It also matters for the organisation of the firm. Some studies have found that job security is positively related to organisational commitment and job performance (Yousef 1998), while others stress the detrimental effects of job insecurity on the organisation of work and on workplace flexibility (Pearce 1998). Finally, job security seems to have impacts on macro-economic performance. Job insecurity has been found to have a moderating effect on wages (Campbell et al. 2001, Hübler et al. 2006) and there are indications that it may depress household consumption and aggregate demand in the economy (Benito 2004).

Policy-makers have recognised both the importance of job security and the need for labour market flexibility. The idea of combining flexible labour markets with social protection has been termed *flexicurity* in the political discussion. The ILO has developed this concept since the early 2000s (see for example Auer and Cazes 2003). *Flexicurity* was one of the four topics of the ILO 7th European Regional Meeting held in Budapest in February 2005. The OECD discusses the *flexicurity* concept in its Employment Outlook 2004 (OECD 2004a). In 2006 the Austrian government included the topic of *flexicurity* among the key topics of its EU presidency and jointly with the ILO and the European Commission it invited Eastern European countries to discuss the relevance of *flexicurity* for their labour markets. Discussions and an informal ministerial meeting on this topic have taken place in the framework of the International Labour Conference 2006 of the ILO in Geneva.

This paper is inspired by this political discussion. It analyses the security aspect of the *flexicurity* concept and focuses particularly on Central and Eastern European (CEE) countries in comparison with Western European (WE) countries. There is a gap in perceived job security between these two groups of countries. International survey data reveal that workers in CEE countries report much lower values of perceived job security than workers

in WE countries. This paper seeks to explain the gap by paying particular attention to the role of labour market institutions.

The paper proceeds as follows: Chapter 2 considers the concept of job security and its determinants from a theoretical point of view. Chapter 3 reviews related literature. Chapter 4 describes the data and methodology used in the analysis. Chapter 5 reports empirical evidence of a gap in subjective job security between CEE and WE countries. Chapter 6 seeks an explanation of the gap through socio-demographic characteristics of the work force as well as employment and unemployment indicators and labour market institutions. Chapter 7 contains conclusions.

Chapter 2

Theoretical Considerations

In their introduction to the concept of job insecurity, Klandermans and Van Vuuren (1999) stress that it is important to distinguish between objective and subjective job insecurity. When firms face conditions that increase the risk of a downsizing of their workforce, we can say that there is objective job insecurity for workers in these firms. Reasons for this can be, for example, macroeconomic instability, increased competition from new or stronger firms, etc. The extent to which such objective job insecurity translates into subjective feelings of job insecurity can depend on personality traits such as pessimism or self-esteem. Even though there is this purely subjective dimension to job insecurity, several studies have confirmed that objective job insecurity and subjective job insecurity are in fact correlated¹. Objective measures of job insecurity may sometimes be available only at firm level (e.g. the business expectations of the firm) or at regional level (e.g. the local or national unemployment rate) but not at individual level. However, it is likely that individuals in a given firm or a given region are very heterogeneous with respect to their risk of job loss. For example, in a firm that faces difficulties it may be especially the less skilled workers or workers with short tenure in the firm whose jobs are most at risk. The individual worker may be able to evaluate his personal risk of losing his job based on his age, education or position in the firm quite accurately. Then, in addition to the purely subjective character of perceived job insecurity (personality traits) there may also be an informative subjective content. The subjective measure may then be a better measure of individual job insecurity than a firm-level, regional-level or national-level objective measure.

Klandermans and Van Vuuren (1999) and other authors (Clark and Postel-Vinay 2005, OECD 1997) have suggested that subjective job insecurity can be understood as having two dimensions, namely (1) the probability of a job loss, and (2) the consequences or costs of a job loss, which may be linked multiplicatively. From this understanding several determinants of job security can be derived, which may play a role in explaining the gap in subjective job security between CEE and WE countries:

¹ Klandermans and Van Vuuren (1999) analyse three firms at two different points in time. The firms that experience rising job insecurity by objective standards (increased downsizing, increasing uncertainty) also show increasing perceived job insecurity by the work force; the firm that has decreasing objective job insecurity also shows decreasing perceived job insecurity. Green et al. (2001) find that workers' subjective perceptions of their probability of becoming unemployed are strong predictors of actual unemployment experiences occurring in the subsequent year.

Depressed **labour demand** increases the risk of losing one's job as well as the chances of finding a new job. Workers in CEE countries may indeed have a higher risk of layoffs and worse chances of reemployment because of higher job destruction and lower job creation than in Western European countries. In fact, the comparatively high recent GDP growth rates in many CEE countries have not been matched by a corresponding growth in employment. Employment rates in these countries remain comparatively low and unemployment rates high (Cazes and Nesporova 2003, 2007). One reason contributing to this situation may be **payroll taxes**, which are relatively high in many CEE countries, exceeding those of Western European countries (Cazes and Nesporova 2007, OECD 2004b). **Employment protection legislation** (EPL) can be expected to increase the security of jobs currently held, but it may also dampen recruitment and thereby reduce chances of finding a new job. The expected effect on job security is thus ambiguous. Cazes and Nesporova (2007) find that on average in Central and South Eastern European countries EPL is slightly less strict than the EU average. It could therefore be part of the explanation for the gap in subjective job security.

The chances of finding a new job can be enhanced by **active labour market policies**, which can include training in order to improve skills but also raising search effort and motivation. **Passive labour market policies**, primarily unemployment benefits, although they might pose disincentives to take up work, certainly lower the income loss associated with a job loss and therefore can be expected to increase perceived job security. Through a generous unemployment benefit system even a country with a high probability of job loss may have high levels of perceived job security because the expected income loss associated with a job loss is low. An often-cited example where this is the case is Denmark (see for example OECD 2004a, which presents Denmark as a prime example of *flexicurity*).

The aforementioned labour market characteristics and institutions are country characteristics. For the explanation of subjective job security **individual socio-economic characteristics** will be also included in the analysis. Research on job satisfaction has shown that subjective variables are systematically related to characteristics such as age, sex, education etc. (Warr 1999, Frey and Stutzer 2001). Moreover, not only subjective labour market outcomes but also objective labour market outcomes, such as unemployment, depend on age and education. Including these variables in the analysis is therefore necessary to adjust for the effects of the composition of the work force on unemployment.

Chapter 3

Related Literature

There is an ample literature on the effects of institutions (EPL, unemployment benefits and others) on labour market performance as measured by different indicators. Some studies include job security among these indicators.

Nickell (1997) underlines that some labour market rigidities (institutions) can be expected to have adverse impacts on labour market performance, but others serve useful purposes². He uses a sample of two cross-sections of countries to explain unemployment and employment by institutions at country level implementing a random effects model. The results suggest that generous unemployment benefit regimes with high replacement rates and long duration can increase unemployment, but that active labour market policies can offset this increase. High union coverage with collective bargaining can increase unemployment, but good co-ordination among unions and among employers can offset the effect. Furthermore, he finds that high overall tax rates on labour can increase unemployment. Nickell (1997) concludes from a literature review that high minimum wages for young people combined with high payroll taxes have been found to increase youth unemployment in some countries, that poor educational standards at the bottom end of the labour market increase the unemployment of unskilled labour, and that strict employment protection legislation and general labour legislation have no impact on unemployment.

Cazes and Nesporova 2003 run cross-country regressions of different labour market performance measures on labour market institutions. They find no impact of EPL on the unemployment rate, but they find a positive impact of EPL on employment and participation rates in CEE countries. In WE countries this influence appears to be negative. They furthermore find that collective bargaining and active labour market policies increase labour market performance, and that high payroll taxes decrease labour market performance.

² A similar view is put forward by Agell (1999), who argues that one has to distinguish between good and bad rigidities (institutions), and that many of the good rigidities (institutions) can be thought of as remedies for market failures. He argues that some institutions serve an insurance function and that therefore the process of globalisation, which is likely to increase the economic uncertainty, may actually lead to an increased demand for rigidities/institutions. For an opposite view on institutions see Siebert (1997).

Burgess, Knetter and Michelacci (2000) present an analysis that differs from other studies of the impact of EPL on labour market performance in that they look at the impact on the adjustment of output and employment to shocks. They find that those countries with higher EPL regulation have a lower adjustment speed (e.g. continental European countries as opposed to US, Canada, Japan).

In a cross-country study Böckerman (2004) presents evidence that the national unemployment rate, the labour regulation strictness and the EPL strictness are associated with higher perceived job insecurity, while the unemployment benefit replacement rate is associated with lower perceived job insecurity. This analysis linking institutions to perceived job security relies on bivariate correlations.

OECD (1997) seeks to explain the rise in perceived job insecurity in many industrialised countries. The following cross-country relationships are found: EPL measures are negatively but insignificantly correlated with insecurity, the extent of fixed-term contracts is not related to insecurity, the unemployment benefit replacement rate is negatively and significantly related to insecurity (for example, Japan, the United Kingdom and the United States have low replacement rates and high insecurity), and collective bargaining is negatively related to insecurity.

Clark and Postel-Vinay (2005) find that when looking at the raw country-level correlations there appears to be a negative association between EPL and job security and a positive one between unemployment insurance benefits (UIB) and job security. They verify the bivariate results in multivariate regression analyses whereby they run different regressions for private temporary, private permanent and public sector employees and control for selection into job types and for individual random effects. They find that in general the bivariate correlations remain, e.g. EPL is negatively associated with job security and UIB positively associated, but that these correlations are absent in the sample of public sector employees, suggesting that the latter are more insulated from market fluctuations. They note that the interpretation of the results would be different if the causality of the effects was reversed and that the endogeneity of institutions is likely to be important, but that with the data available to them they cannot take it into account directly.

Chapter 4

Data and Methodological Questions

4.1 Data

The present analysis is based on three international survey data sets: the European Values Survey (EVS), the European Social Survey (ESS) and Eurobarometer (EB). All three surveys include Western European and Central and Eastern European countries.

The European Values Study (EVS) is a cross-national and longitudinal survey of values. Surveys have been carried out in 1981, 1990 and 1999/2000. In 1995–1997, European countries were surveyed in the framework of the very similar World Values Survey. There are therefore altogether at present 4 waves of the value surveys with information on European countries.

Besides the socio-demographic characteristics of the individuals, the survey focuses on moral, religious, political and social values. In wave 2000 the satisfaction with job security was surveyed. In all 4 waves it was asked which aspects of a job people think are important, and ‘good job security’ was one of the response options. In the three data sets used in the present analysis, this is the only job security question that has been asked repeatedly over time.

So far, two waves of the European Social Survey (ESS) are available: wave 2002 and wave 2004. Job security was surveyed only in the latter wave. The survey asks respondents to rate how true they esteem the statement ‘my job is secure’.

Eurobarometer (EB) is a series of regularly performed surveys of European countries on behalf of the European Commission. The Standard Eurobarometer targets EU member countries. Between 2001 and 2003 the Candidate Countries Eurobarometer was carried out in order to survey residents in the countries applying to the European Union. The Candidate Countries Eurobarometer surveys have gathered very similar information to that of the Standard Eurobarometer so that using both surveys allows a comparison of EU member countries and candidate countries.

After the EU enlargement in 2004, the new member countries have been integrated into the Standard Eurobarometer, and the remaining candidate countries are intermittently surveyed by the Standard Eurobarometer.

In the present analysis the 2003 Candidate Countries Eurobarometer and the corresponding Standard Eurobarometer are used. These include questions on agreement with the following

statements relating to job security: “There is a risk that I will lose my job”, “I am pretty sure I won’t get fired” and “I am pretty sure I could find the same kind of work at the same salary, if I had to.”

As individual characteristics the analysis uses sex, age, union membership and the level of education. In addition, national level variables that cover labour market institutions are added to the analysis. These include indicators of job opportunities and labour market slack, such as the unemployment rate and the participation rate. Furthermore, employment protection legislation is covered by an EPL strictness index based on an OECD methodology as well as by the share of fixed-term contracts in total employment. Active and passive labour market policies are measured by the share of the respective expenditures in GDP. Payroll taxes are measured by the average percentage tax burden of employer and employee contributions on wages. The data are derived from different sources. An overview of the country level variables and their sources is given in Table 6 (pp. 26–27).

4.2 Methodology

Chapter 5 will present descriptive statistics in order to analyse the differential in subjective job security between WE and CEE countries. Averages will be computed as weighted means using the sample weights provided in the data sets. These include two types of weights: weights in order to adjust the sample of each country so as to be a representative sample of the whole population with respect to certain individual characteristics (e.g. sex, age and education), and weights to adjust for the total population of each country when computing averages for groups of countries.

Chapter 6 deals with the analysis of the determinants of satisfaction with job security. Satisfaction with job security is coded as an ordinal variable from 0 meaning dissatisfied to 10 meaning satisfied. Appropriate econometric models to describe an ordinal variable are the ordered probit and the ordered logit model.

The aim of Chapter 6 is to explain the differential in the satisfaction with job security by means of an Oaxaca-Blinder decomposition (see, for example, Greene 2003, pp. 53f). The decomposition has as starting point two separate regressions for CEE and WE countries. The fitted values of these regressions can be written as:

$$\hat{y}_i^C = x_i^C \cdot \hat{\beta}^C \quad (1)$$

$$\hat{y}_i^W = x_i^W \cdot \hat{\beta}^W \quad (2)$$

where \hat{y} denotes the fitted values of satisfaction with job security, x is a vector of explanatory variables and $\hat{\beta}$ is the estimated parameter vector. The equation labelled with C refers to CEE countries and that with W to WE countries and i indexes the observations.

In the linear regression model the mean of the fitted values is equal to the mean of the observed values of the dependent variable, i.e. $\bar{\hat{y}} = \bar{y}$. The observed differential in average satisfaction with job security between CEE and WE countries can therefore be written as:

$$\Delta = \bar{y}^W - \bar{y}^C = \bar{\hat{y}}^W - \bar{\hat{y}}^C = \bar{x}^W \cdot \hat{\beta}^W - \bar{x}^C \cdot \hat{\beta}^C \quad (3)$$

After adding the term $x_i^W \cdot \hat{\beta}^C - x_i^W \cdot \hat{\beta}^C$, which is zero and therefore does not change the value of the differential, the equation can be transformed into:

$$\Delta = (\bar{x}^W - \bar{x}^C) \hat{\beta}^C + \bar{x}^W \cdot (\hat{\beta}^W - \hat{\beta}^C) \quad (4)$$

This means that the differential in the satisfaction with job security between WE and CEE countries has been decomposed into two parts. The first part captures the difference in job security due to different levels of the unemployment rate and of institutions in CEE and WE countries, i.e. differences in endowments with the explanatory variables (X). The second part captures differences that are due to differing effects of unemployment and institutions on job security in the two groups of countries, i.e. differences in the regression coefficients (β).

While a similar decomposition has been developed for the non-linear probit and logit model by Fairlie (2006), it seems not to have been extended to the ordered probit model. The satisfaction with job security will therefore be analysed in the framework of a linear regression model.

Two further econometric issues can potentially pose a problem in the present analysis: omitted variable bias and simultaneity. Omitted variable bias can occur because countries differ in many respects and usually only a limited number of characteristics are observed that can be included as control variables. Especially when looking at bivariate cross-country correlations of institutions and job security, the associations may reflect spurious correlations which can be caused by omitted country characteristics that are correlated with both institutions and job security. The present analysis addresses this problem by complementing the bivariate analysis with a multivariate analysis. Unfortunately, the present data do not include repeated observations on subjective job security for a broad set of countries, so that including country fixed effects in order to hold unobserved time-constant country characteristics constant is not an option.

The second problem, simultaneity, occurs if causality operates in both directions: institutions influence job security, but job security also influences institutions, for example in the sense that low job security triggers the build-up of institutions. If both directions of causality operate, the effects measured in a single equation model are biased and should therefore not be used to draw policy conclusions. For example, a negative effect of EPL strictness on job security need not necessarily indicate that strict EPL reduces labour market performance and therefore job security, because it can also mean that low job security leads to the introduction of stricter EPL. Furthermore, institutions are likely to influence each other, because some may be complements and some substitutes in the labour market policy mix.

One way to disentangle such simultaneous effects is to estimate a system of simultaneous equations, in which all institutions are regarded as endogenous. In order to identify the simultaneous effects, however, suitable instrumental variables are needed. For each endogenous variable (all institutions and job security) we would need an exogenous variable that is related to the endogenous variable in question but not related to the other endogenous variables. As the characteristics available in the present data set are very limited, there is little scope for finding such instrumental variables in the data used for the present analysis.

Including country fixed effects and disentangling the effects in a simultaneous equations model must be left for further research with a more comprehensive data base.

Chapter 5

Evidence of Low Job Security in CEE Countries

This chapter draws on descriptive statistics computed from the EVS, the ESS and the EB surveys that present empirical evidence for a gap in perceived job security between CEE and WE countries. The next chapter will seek to explain the gap.

Table 1 summarises satisfaction with job security, which has been surveyed in the EVS wave of the early 2000s in 7 WE countries and 4 CEE countries. Satisfaction was measured on a scale from 1 (dissatisfied) to 10 (satisfied). The difference between the WE and CEE countries is striking. Mean satisfaction with job security differs by nearly 2 units (7.6 versus 5.8) and the proportion reporting a value higher than five is also considerably higher in WE countries (0.81) than in CEE countries (0.54).

A slightly different question was asked in the 2005 round of the European Social Survey. It was asked how true workers rate the statement ‘my job is secure’. The answers are recorded on a scale from 1 (not at all true) to 4 (very true). Due to the different dataset, the set of countries is different from the one in the preceding table. Table 2 reports the results. Here, the difference between WE and CEE countries is again very clear although less dramatic. While 65% of workers from the surveyed WE countries rated the statement ‘my job is secure’ as either ‘quite true’ or ‘very true’, only 59% of those from CEE countries did so. Within the CEE countries, there is also important variation. Estonia stands out by reporting one of the highest job security scores even when compared with Western European countries, and the value for Slovenia is clearly above the Western European average, while the values reported by Hungarian employees can be compared to those of some Western European countries. The Czech Republic, Poland and Slovakia have mean values far lower than the Western European countries.

Table 1: Satisfaction with job security**Survey question: How satisfied are you with your job security? (1 = dissatisfied, 10 = satisfied)**

Western Europe	Mean	Fraction reporting value > 5	N
Austria	7.9	0.83	762
Denmark	8.4	0.90	618
Great Britain	7.1	0.77	493
Iceland	8.1	0.89	743
Ireland	7.4	0.70	400
Italy	7.1	0.75	1,040
Northern Ireland	7.6	0.80	486
Weighted Mean	7.6	0.81	4,542

Central and Eastern Europe	Mean	Fraction reporting value > 5	N
Croatia	5.8	0.54	510
Czech Republic	6.1	0.57	993
Lithuania	4.6	0.37	505
Slovenia	7.2	0.74	540
Weighted Mean	5.8	0.54	2,548

Source: EVS, survey period 1999–2004.

In general, countries that report higher perceived job security (Table 2) also report higher average satisfaction with job security (Table 1). This is the case, for example, for the 2 CEE countries that appear in both tables. Compared with Slovenia, the Czech Republic scores lower in terms of reported job security and satisfaction with job security. It is remarkable, however, that employees from some countries, in particular Austria and Denmark, report very high satisfaction with job security (Table 1), while rating the actual security of their jobs not particularly high (Table 2).

This suggests that satisfaction with job security is influenced not only by actual provisions that prevent people from losing their jobs (e.g. employment protection legislation), but also by arrangements that support workers after a job loss by giving income support and assistance in finding new jobs (e.g. passive and active labour market policies). The latter can lead to high satisfaction with job security even though actual job security is not rated as high.

This can also be the reason why the differential between WE countries and CEE countries is smaller in Table 2 than in Table 1. The question “how true is the statement: my job is secure” (Table 2) may focus more narrowly on the probability of job loss, while the broader question on the satisfaction with job security (Table 1) may encompass also the consequences of a job loss. This would suggest that part of the gap between CEE and WE countries might be due to the consequences of a job loss being worse in CEE countries than in WE countries.

Table 2: Self-reported job security

**Survey question: Please tell me how true the following statements is about your current job:
My job is secure. (1 = not at all true, 4 = very true)**

Country	Mean	Fraction reporting 3 or 4	N
Austria	2.92	0.72	837
Belgium	3.09	0.77	709
Denmark	2.93	0.70	711
Finland	3.04	0.78	882
France	2.71	0.58	786
Germany	2.63	0.58	1,066
Greece	2.59	0.53	594
Iceland	3.18	0.80	308
Ireland	3.12	0.77	846
Luxembourg	3.18	0.78	696
Netherlands	2.79	0.68	758
Norway	3.00	0.76	937
Portugal	2.70	0.57	691
Switzerland	3.23	0.85	952
Spain	2.91	0.65	694
Sweden	2.93	0.72	976
United Kingdom	2.94	0.72	759
Weighted Mean	2.82	0.65	13,202

Country	Mean	Fraction reporting 3 or 4	N
Czech Republic	2.31	0.44	1,063
Estonia	3.13	0.79	876
Hungary	2.64	0.65	554
Poland	2.58	0.53	577
Slovakia	1.97	0.31	541
Slovenia	2.88	0.71	580
Weighted Mean	2.52	0.59	4,191

Source: Wave 2004 of ESS, sample: employees.

Table 3: Proportion of people mentioning a given job characteristic as important in a job

Survey question: Here are some more aspects of a job that people say are important. Please look at them and tell me which ones you personally think are important in a job?

	Western Europe ^a	Central Europe ^b	Baltic ^c	South-Eastern Europe ^d
Number of observations:	22,873	6,337	3,036	9,671
Good pay	0.76	0.85	0.86	0.86
Good job security	0.63	0.73	0.55	0.74
A job that is interesting	0.65	0.67	0.59	0.60
Good hours	0.49	0.46	0.43	0.53

Notes: a) Austria, Belgium, Denmark, Finland, France, Germany, Greece, Iceland, Ireland, Italy, Luxembourg, Netherlands, Portugal, Spain, Sweden, Great Britain, Northern Ireland
 b) Czech Republic, Hungary, Poland, Slovakia, Slovenia,
 c) Estonia, Latvia, Lithuania
 d) Albania, Bosnia and Herzegovina, Bulgaria, Croatia, Republic of Moldova, Romania, Macedonia, Serbia and Montenegro
 e) Belarus, Kyrgyzstan, Russian Federation, Ukraine

Source: EVS, survey period: 1999–2004.

With respect to subjective views on job security, the data used in this paper provide a further dimension: the importance of job security. The EVS data set asks respondents to choose between different aspects of a job and to say which they find important. This question is asked of all people, not only those in employment. Table 3 shows the proportion of people who mentioned the respective job characteristic as important. Besides job security, ‘good pay’, ‘an interesting job’ and ‘good hours’ are shown. The numbers are broken down by region in order to allow comparisons between WE and CEE countries. This survey question was asked in a larger number of CEE countries so that a breakdown between Central European, Baltic and Southeast European countries is possible.

The unifying result is that good pay stands out as the characteristic mentioned by the largest proportion of people in all groups of countries. Job security also seems to be a very important item, but more so in Central and Southern European countries, where it ranks second after good pay in Table 3. In Western European countries and in the Baltic countries, an ‘interesting job’ ranks before job security. A possible explanation of this is that Western European and Baltic countries have reached higher levels of job security so that other job characteristics gain more importance.

The EVS has actually asked this question in successive waves. At present it is the only subjective job security question in the three data sets that is available at different points in time. Table 4 presents the data for all countries and for all the 4 waves of the EVS. From the early 1980s through the 1990s to the early 2000s the proportion of people mentioning job security as important rose in all sub-regions. When comparing the time periods around 1990 and 2000 (columns 2 and 4 of Table 4) the development in Western Europe is quite moderate, with the proportion of workers mentioning job security increasing from 0.6 to 0.63. In all CEE sub-regions, however, the increase was remarkable. In Central Europe the proportion went up by 10 percentage points from 0.63 to 0.73. In the Baltic countries it went up by more than 20 percentage points, from 0.33 to 0.55, and in South-Eastern Europe from around 0.5 to around 0.8 (although the development from the 1990s in that

region can be tracked for only two countries, Bulgaria and Romania). Interestingly, while showing rises as compared with 1990, in 2000 all sub-regions record a decline from 1995, suggesting that in recent years the importance of job security has been somewhat reduced³.

To sum up, by 1990 in CEE countries the proportion of people mentioning job security as important was around the same as (Central Europe) or much lower than (Baltic and South-Eastern Europe) in Western European countries. By 2000, however, the proportion in CEE countries, at least in Central and South-Eastern European countries, exceeded that in Western Europe by 10 percentage points.

Table 4: Proportion of people mentioning job security as an important feature of a job

Survey question: Here are some more aspects of a job that people say are important. Please look at them and tell me which ones you personally think are important in a job?

Western Europe	1981–1984	1989–1993	1994–1999	1999–2004
Austria	—	0.66	—	0.75
Belgium	0.52	0.39	—	0.47
Denmark	0.51	0.52	—	0.50
Finland	—	0.53	0.67	0.68
France	0.47	0.35	-	0.46
Germany	0.73	0.73	0.67	0.79
Great Britain	0.61	0.57	—	0.65
Greece	—	—	—	0.65
Iceland	0.37	0.57	—	0.58
Ireland	0.55	0.61	—	0.69
Italy	0.58	0.61	—	0.76
Luxembourg	—	—	—	0.59
Netherlands	0.41	0.41	—	0.29
Northern Ireland	0.61	0.62	—	0.76
Norway	0.79	0.78	0.69	—
Portugal	—	0.73	—	0.64
Spain	0.64	0.64	0.63	0.75
Sweden	0.62	0.65	0.53	0.51
Switzerland	—	—	0.64	—
Weighted Mean	0.57	0.60	0.64	0.63

³ However, the high values in 1995 may also be due to the fact that in 1995 fewer response options were given among the job characteristics, which might cause more people to chose job security although its importance may have stayed constant. The text therefore focuses on the comparison between 1990 and 2000.

Table 4 (continued)

Central Europe	1981–1984	1989–1993	1994–1999	1999–2004
Czech Republic	—	0.59	0.76	0.52
Hungary	0.7	0.72	0.86	0.89
Poland	—	0.58	0.8	0.8
Slovakia	—	0.62	0.76	0.72
Slovenia	—	0.73	0.93	0.88
Weighted Mean	0.70	0.63	0.81	0.73
Baltic	1981–1984	1989–1993	1994–1999	1999–2004
Estonia	—	0.40	0.76	0.51
Latvia	—	0.22	0.76	0.38
Lithuania	—	0.38	0.87	0.75
Weighted Mean		0.33	0.79	0.55
South-Eastern Europe	1981–1984	1989–1993	1994–1999	1999–2004
Albania	—	—	0.85	0.81
Bosnia and Herzegovina	—	—	0.86	0.90
Bulgaria	—	0.57	0.80	0.81
Croatia	—	—	0.71	0.81
Macedonia	—	—	0.90	0.85
Moldova	—	—	0.83	0.86
Romania	—	0.43	0.92	0.87
Serbia and Montenegro	—	—	0.59	0.39
Weighted Mean		0.50	0.80	0.74

Notes: Table contains fraction of respondents mentioning “Good job security”.
(In 1995 four of the response options from 1990 were omitted. In the 2000 survey the 1990 response options plus 2 additional choices were listed.)

Source: EVS, all 4 waves.

The fact that it rose in practically all countries (except Denmark, Portugal, Sweden and the Netherlands) over the last decade may be a sign that the challenges of increased international competition have necessitated more job flexibility in all countries, making people more aware of job security as a desired feature of a job. The over-proportionate rise in Central and South-Eastern Europe at the same time is likely to mark the transition process. Job security was of little concern in these countries in socialist times. In the pre-transition era open unemployment did not exist in most of the former socialist countries and people who lost their jobs due to enterprise restructuring were usually immediately offered other jobs. When the transition process started and job reallocation took place and demanded increased job mobility, which in many cases was involuntary mobility, the importance of job security rose in the CEE countries because there was actually less job security.

That high importance of job security is related to low actual job security is supported by Figure 1 in the Appendix, which relates satisfaction with job security (proportions recorded in Table 1) to the importance of job security (proportions recorded in the last column of Table 4) for one point of time across countries. The relationship is negative. The Spearman rank correlation coefficient is 0.62 and significant at the 10%-level after the 'outliers' of Czech Republic, Lithuania and Croatia have been eliminated.

The Eurobarometer survey data delivers some evidence that helps to distinguish between the probability of losing one's job and the costs of losing one's job (see Chapter 2 for the discussion of these two components of job security). For each of the surveyed countries Table 5 reports the proportions of employees who tend to agree that (i) there is a risk they will lose their job, (ii) they are pretty sure they won't get fired, and (iii) they are pretty sure they could find the same kind of work at the same salary if they had to.

There are marked differences between CEE and WE countries. In WE countries a much lower proportion of employees report that they see a risk of losing their job, a much higher proportion report being pretty sure they will not be fired and a much higher proportion that they are pretty sure they could find the same kind of work at the same salary if they had to. Table 5 breaks the CEE countries down into Central European countries, Baltic countries and Southern European countries. When looking at the mean values in these groups of countries, the job security situation is worst in the group of Central European countries. However, Hungary and Slovenia seem to be outliers in this group of countries. The proportions of people reporting that they see a risk of job loss, that they are pretty sure they will not be fired and that they are pretty sure they could find a similar job in these two countries are much more similar to the levels of WE countries. This means that the other Central European countries fare even worse than is revealed by the Central European average. The Baltic countries seem to fare somewhat better, and the South East European countries somewhat better still. For this last group of countries only data for Romania and Bulgaria are available, and the fact that the average values are more favourable than in the other groups of CEE countries is entirely due to Romania.

The basic conclusion from Table 5 is that job security in CEE countries is lower not only because the risk of losing one's job is greater, but also because the consequences of losing it are more severe: finding a new job is more difficult.

Table 5: Probability of job loss and chances of finding a new job

Western Europe	lose job	won't be fired	find same	N
Austria	0.19	0.50	0.41	455
Belgium	0.26	0.55	0.45	416
Denmark	0.24	0.73	0.57	459
Finland	0.29	0.73	0.65	416
France	0.33	0.54	0.51	474
Germany East	0.51	0.31	0.24	360
Germany West	0.23	0.49	0.36	439
Great Britain	0.19	0.76	0.65	451
Greece	0.39	0.45	0.37	274
Ireland	0.15	0.62	0.56	376
Italy	0.23	0.55	0.32	311
Luxembourg	0.19	0.65	0.39	303
Netherlands	0.21	0.66	0.53	501
Northern Ireland	0.16	0.73	0.55	157
Portugal	0.29	0.33	0.39	330
Spain	0.28	0.54	0.53	366
Sweden	0.13	0.77	0.63	501
Weighted mean	0.24	0.59	0.49	
Central Europe	lose job	won't be fired	find same	N
Czech Republic	0.74	0.24	0.35	416
Hungary	0.38	0.32	0.5	353
Poland	0.65	0.14	0.19	241
Slovakia	0.67	0.25	0.36	361
Slovenia	0.26	0.56	0.46	341
Weighted mean	0.61	0.22	0.31	
Baltic	lose job	won't be fired	find same	N
Estonia	0.56	0.35	0.38	424
Latvia	0.44	0.44	0.42	438
Lithuania	0.59	0.28	0.37	391
Weighted mean	0.54	0.35	0.39	

South-Eastern Europe	lose job	won't be fired	find same	N
Bulgaria	0.47	0.46	0.33	284
Romania	0.36	0.33	0.44	283
Weighted mean	0.39	0.37	0.41	

Notes: Percentage of employed people who tend to agree that...
lose job ... there is a risk they will lose their job.
won't be fired ... they are sure they won't get fired.
find same ... they are sure they could find the same kind of work at the same salary if they had to.

Source: *Standard Eurobarometer and Candidate Country Eurobarometer 2003.*

Chapter 6

Why Is Subjective Job Security Low in CEE Countries?

The preceding chapter has presented descriptive evidence showing that perceived job security is considerably lower in CEE countries and that in these countries the importance attached to job security is higher. Furthermore, it was shown that in CEE countries a higher proportion of the workforce than in WE countries reports a risk of losing their job as well as difficulties in finding a new job. This chapter investigates the reasons for these differences between WE and CEE countries. The analysis first considers bivariate correlations (Chapter 6.1) before turning to a multivariate analysis. The multivariate analysis conducts separate regressions of the satisfaction with job security for CEE and WE countries and decomposes the differential between the two groups by means of an Oaxaca-Blinder decomposition (Chapter 6.2). Chapter 6.3 compares the results from the two analyses with each other and with the literature.

6.1 Bivariate Analysis

Table 6 shows the unemployment and participation rates as well as data on labour market institutions for CEE and WE countries. Lower subjective job security seems to coincide with lower objective labour market performance in CEE countries: in Table 6 it can be seen that in CEE countries participation rates are lower and unemployment rates are higher, on average. At the same time, spending on labour market policies as a percentage of GDP is much lower in CEE countries. Spending on active and passive labour market policies in CEE countries amounts on average to only between one-half and one-third of that in WE countries. Payroll taxes, defined as the sum of employer and employee contributions as a percentage of the wage rate, are markedly higher in CEE countries. The OECD employment protection legislation index is slightly lower in CEE countries, indicating a slightly more moderate overall EPL legislation. Fixed-term contracts seem to be less prevalent in CEE countries than in WE countries.

In the following, bivariate cross-country relationships of these labour market indicators and institutions with measures of job security are presented. The relationships are presented graphically in cross-country scatter graphs in Appendix 1. The graphs relate the unemployment rate and labour market institutions to different measures of job security.

Figure 2 to Figure 4 in Appendix 1 relate the unemployment rate to mean job security as well as to the proportion of workers reporting a risk of losing their job and the proportion reporting ease in finding a new job if they had to. The national unemployment rate turns out to be highly significantly related to mean reported job security (Figure 2). The higher

the unemployment rate, the lower the job security. Unemployment is bad for job security in two ways. Figure 3 shows that the risk of job loss is significantly higher in countries with high unemployment, and Figure 4 shows that the ease of finding a new job is significantly lower. These relationships present evidence that subjective job insecurity is strongly influenced by objective measures such as the unemployment rate.

Table 6: Labour market institutions in CEE and WE countries (2003)

Country	Participation rate ^a	Unemployment rate ^b	Spending on labour market policy ^c			Payroll taxes ^d	EPL index ^e	Fixed-term contracts ^f
			Active	Passive	Total			
Bulgaria	62.0	13.7	0.67	0.30	0.97	42.7	2.0	6.5
Croatia	64.0	14.3	0.06	0.49	0.55	37.2	2.7	11.3
Czech Republic	70.1	7.8	0.17	0.27	0.44	32.2	1.8	9.2
Estonia	63.2	10.0	0.08	0.22	0.3	35.0	2.3	2.5
Hungary	60.6	5.9	0.51	0.37	0.88	33.4	1.6	7.5
Latvia	69.0	10.5	0.14	0.50	0.64	28.6	—	11.1
Lithuania	69.0	12.4	0.16	0.12	0.28	46.0	2.8	7.2
Poland	54.8	19.6	0.11	1.14	1.25	37.0	2.1	19.4
Romania	63.2	6.8	0.03	0.85	0.88	—	—	2.0
Slovakia	60.2	17.6	0.47	0.49	0.96	34.1	1.8	4.9
Slovenia	59.0	6.7	0.44	0.56	1.00	38.0	2.6	13.7
CEE mean	63.2	11.4	0.26	0.48	0.74	36.4	2.1	8.7
Austria	71.6	4.3	0.46	1.37	1.83	34.1	2.2	6.9
Belgium	64.3	8.2	1.01	2.51	3.52	27.6	2.5	8.4
Denmark	79.4	5.4	1.53	2.68	4.21	10.9	1.8	9.3
Finland	66.4	9.0	0.75	2.10	2.84	19.6	2.1	16.3
France	55.3	9.5	0.82	1.74	2.56	34.3	2.9	12.7
Germany	56.7	9.0	0.95	2.28	3.23	31.1	2.5	12.2
Great Britain	76.6	4.9	0.16	0.34	0.51	15.3	1.1	6.1
Greece	63.8	9.7	0.11	0.41	0.52	34.3	2.9	11.2
Iceland	85.6	3.4	—	—	—	4.2	—	—
Ireland	60.0	4.7	0.61	0.91	1.52	13.2	1.3	5.2
Italy	61.6	8.4	0.66	0.62	1.28	27.1	2.4	9.9
Luxembourg	65.3	3.7	—	0.64	—	23.0	—	3.2

Netherlands	75.8	3.7	0.95	1.80	2.74	35.1	2.3	14.5
Norway	72.6	4.5	0.67	0.88	1.55	16.0	2.6	—
Portugal	62.0	6.3	0.54	1.28	1.82	27.0	3.5	20.6
Spain	56.0	11.1	0.56	1.46	2.02	25.3	3.1	31.8
Sweden	78.7	5.6	1.04	1.22	2.26	24.0	2.6	15.1
Switzerland	67.3	4.2	—	—	—	19.0	1.6	—
WE mean	67.7	6.4	0.70	1.4	2.20	23.4	2.3	12.2

Notes: a) Source: ILO Laborsta and Cazes/Nesporova 2007
b) Source: UNECE
c) As a percentage of GDP. Source: Eurostat and Cazes/Nesporova 2007
d) As a percentage of the wage rate. Source: OECD Taxing Wages 2003–2004
e) Source: *OECD Employment Outlook* 2004 and Tonin 2005
f) As a percentage of total employment. Source: European Commission 2005

Figure 5 to Figure 7 investigate the association of spending on active and passive labour market policies with job security. One might expect both policies to have a positive impact on job security because both are likely to ease the consequences of a job loss. Active labour market policies increase the chances of reemployment, passive labour market policies provide income support during the period of joblessness. There is a positive, albeit not statistically significant, relationship between job security and spending on active labour market policies (Figure 5) and a positive and significant (at the 10-% level) relationship between spending on active labour market policies and the proportion of the workforce who report ease of finding a new job (Figure 6). This is consistent with active labour market policies having a positive effect on job security. The association of spending on passive labour market policies and mean job security is positive, too, but it is not statistically significant (Figure 7).

Figure 8 shows that the share of fixed term contracts is negatively but only weakly significantly (at the 16%-level) related to mean reported job security. This suggests that legislation on short-term and fixed-term contracts can have an effect on subjective job security.

There is practically no relationship apparent between the EPL index and mean job security (Figure 9). This may be due to the two opposing effects of EPL on job security. While it may secure people who are employed against losing their job, it may make it more difficult for unemployed individuals to find a new job. In other words, EPL can be expected to decrease the probability of a job loss but to increase the cost of a job loss. The overall effect on job security is *a priori* not clear, but if no overall effect is found, it might be that the two separate effects cancel out. Our data make it possible to investigate the two effects separately. The first effect is not visible in the cross-country data: Figure 10 shows virtually no association of the EPL index with the proportion of the work force reporting a risk of losing their job. The second effect is slightly visible: Figure 11 shows a negative, albeit statistically not significant, relationship between the EPL index and the proportion of the work force reporting ease of finding a new job.

Figure 12 to Figure 14 show statistically significant effects of the level of payroll taxes on job security⁴. Payroll taxes are associated with lower mean job security, higher reported risks of job loss and lower reported ease of finding a new job. The figures also show that CEE countries are at the upper end of the level of payroll taxes, and thus a high tax burden on labour might be part of the explanation for a reduced labour market performance as compared with WE countries.

To sum up, the evidence gathered from simple cross-country correlations of labour market institutions and subjective job security is consistent with the hypothesis that active labour market policies increase the ease of finding a new job, that the incidence of fixed term contracts decreases subjective job security, and that higher payroll taxes decrease job security by increasing the risk of losing one's job and by decreasing the chances of finding a new job. The bivariate cross-country analysis could not substantiate statistically significant effects of spending on passive labour market policies and of the EPL index on job security. However, the sign of the influences suggests that passive labour market policies may have potential to increase job security, while there appears to be a risk that EPL can have a negative impact by reducing the chances for the unemployed of being hired in a new job.

6.2 Multivariate Analysis: Decomposing the Differential

The multivariate analysis of the individual satisfaction with job security is based on separate regressions for CEE and WE countries, followed by an Oaxaca-Blinder decomposition of the difference in job security between the two groups of countries. Table 7 and Table 8 report the results. In each of the tables three different model specifications are presented. All specifications include the basic individual socio-economic regressors described above. The models differ in that each model includes a different national level variable. Models 1–3 are presented in Table 7 and include the unemployment rate, the share of fixed-term contracts in total employment and the share of spending on labour market policies in GDP respectively. Table 8 presents models 4–6, which include expenditure on active labour market policies, expenditure on passive labour market policies and a strictness index of employment protection legislation respectively. The reason why not all national level regressors are included jointly in one model lies in data restrictions. The sample where all regressors are jointly available contains only 3 CEE countries. Including more than two country-level regressors would therefore cause perfect collinearity in the sample of CEE countries.

The first two columns of the tables present $\hat{\beta}^W$ and $\hat{\beta}^C$, the regression coefficients from separate regressions for WE and CEE countries. The third column of the tables presents $(\bar{x}^W - \bar{x}^C) \hat{\beta}^C$, the first part of the decomposition, which indicates for each explanatory variable how the differential in satisfaction with job security would change if CEE countries were endowed with the same mean value of the explanatory variable as WE countries while maintaining the regression coefficients from the CEE regression. The column sum indicates the total for all explanatory variables.

⁴ Payroll taxes are here defined as employer and employee contributions as a percentage of the gross wage. It would be desirable to include also income taxes and consumption taxes in order to compute the tax wedge between labour costs and real consumption wages, but for reasons of data availability this analysis remains confined to payroll taxes.

In a similar manner, the last column shows $\bar{x}^w'(\hat{\beta}^w - \hat{\beta}^c)$, the change in the differential in job security if the endowments of explanatory variables in the WE countries were valued by the coefficients of the CEE regressions instead of those from the WE regression.

In model 1 of Table 7 the total differential in job security is 1.711. The column sums of the last two columns state that 0.648 of the total differential can be explained by different endowments of the two groups of countries with explanatory variables and that the remaining difference of 1.063 can be explained by different effects of the explanatory variables on job security in the two groups of countries.

A comparison of the regression coefficients in the first two columns of Table 7 between the three models suggests that the effects of the socio-economic regressors are similar across all three specifications. However, they differ between CEE and WE countries. According to the results women are more satisfied with their job security in CEE countries but not in WE countries. Age has no statistically significant influence in both samples. Being a union member increases satisfaction with job security in WE countries, but not in CEE countries. Higher educational attainment increases satisfaction with job security. This effect is much stronger in CEE countries than in WE countries.

The effects of the national level variables also differ between CEE and WE countries. The effect of the unemployment rate on the satisfaction with job security is greater in CEE countries than in WE countries. But the effect is only significant in WE countries (Model 1 in Table 7). According to the results in the second model, the incidence of fixed-term employment *increases* satisfaction with job security in CEE countries. In WE countries the effect is insignificant. The use of fixed-term contracts implies uncertainty about the continuation of employment relationships and might therefore have been expected to reduce job security. However, it may also increase the chances of finding employment because employers may be more willing to create fixed-term jobs than permanent jobs⁵.

Finally, spending on labour market policies increases satisfaction with job security in both groups of countries, but the effect is again much stronger in CEE countries.

⁵ However, when using different data on fixed-term employment, derived from the Standard and Candidate Countries Eurobarometer surveys, the results were different. Then, fixed-term employment increased job security only in WE countries but decreased it in CEE countries. The results with respect to fixed-term employment do not seem to be robust over different data sources.

Table 7: Regressions in separate samples and Oaxaca-Blinder Decomposition – Models 1–3

	Model 1			
	$\hat{\beta}^W$	$\hat{\beta}^C$	$(\bar{x}^W - \bar{x}^C)\hat{\beta}^C$	$\bar{x}^W(\hat{\beta}^W - \hat{\beta}^C)$
Sex (female)	-0.031 (0.12)	0.155*** (0.02)	0.0005 (0.003)	-0.2788 (0.18)
Age	0.014 (0.01)	-0.009 (0.01)	-0.0074 (0.02)	0.9257 (0.63)
Union member	0.533** (0.18)	0.342 (0.44)	0.094 (0.08)	0.034 (0.09)
Education	0.199** (0.06)	0.847*** (0.06)	-0.039 (0.03)	-1.321*** (0.19)
Unemployment rate	-0.138*** (0.03)	-0.228 (0.14)	0.600** (0.30)	0.890 (1.38)
Constant	7.424*** (0.20)	6.611** (1.46)		0.812 (1.47)
Total			0.648** (0.30)	1.063** (0.45)
N	3,395	2,365	Total difference:	1.711
	Model 2			
	$\hat{\beta}^W$	$\hat{\beta}^C$	$(\bar{x}^W - \bar{x}^C)\hat{\beta}^C$	$\bar{x}^W(\hat{\beta}^W - \hat{\beta}^C)$
Sex (female)	-0.041 (0.13)	0.113* (0.04)	0.0007 (0.004)	-0.231 (0.20)
Age	0.018 (0.01)	0.005 (0.01)	-0.007 (0.02)	0.534 (0.62)
Union member	0.748*** (0.15)	-0.039 (0.25)	0.076 (0.10)	0.141** (0.07)
Education	0.149* (0.07)	0.591*** (0.10)	-0.029 (0.03)	-0.903*** (0.25)
Share fixed-term	-0.011 (0.09)	0.369** (0.09)	0.024 (0.24)	-3.860*** (1.36)
Constant	6.594*** (0.44)	0.734 (0.80)		5.861*** (0.91)
Total			0.064 (0.26)	1.542** (0.65)
N	2,803	2,365	Total difference:	1.606

Model 3				
	$\hat{\beta}^W$	$\hat{\beta}^C$	$(\bar{x}^W - \bar{x}^C)\hat{\beta}^C$	$\bar{x}^W(\hat{\beta}^W - \hat{\beta}^C)$
Sex (female)	-0.038 (0.12)	0.13** (0.03)	0.0006 (0.00)	-0.2523 (0.19)
Age	0.018 (0.01)	0.003 (0.01)	-0.0072 (0.03)	0.5939 (0.62)
Union member	0.346** (0.09)	0.001 (0.27)	0.035 (0.05)	0.062 (0.06)
Education	0.156* (0.07)	0.6** (0.13)	-0.031 (0.03)	-0.905*** (0.30)
Spending LMP	0.283*** (0.04)	3.215** (0.88)	0.382** (0.19)	-1.612** (0.64)
Constant	6.053*** (0.45)	2.712** (0.55)		3.340*** (0.71)
Total			0.380* (0.22)	1.226** (0.56)
N	2,803	2,365	Total difference:	1.606

Notes: Standard errors reported in parentheses. Stars indicate significance at the 1%-level (***), 5%-level (**) and 10%-level (*).

The positive and significant value of 0.6 on the unemployment rate in column 3 in model 1 means that the differential in satisfaction with job security of 1.71 would be reduced by 0.6 if CEE countries had as moderate unemployment rates as WE countries. In the second model, which includes the share of fixed-term contracts, the components of the decomposition in column three are not significant.

In the third model, the decomposition concerning spending on labour market policies is significant, implying that the differential of satisfaction with job security, which is 1.61 in this model, would be reduced by 0.38 if CEE countries spent shares of their GDP on labour market policies similar to those of WE countries.

Turning to the last column, the negative value of the decomposition associated with educational attainment in model 1 indicates that the satisfaction differential would actually be 1.32 points higher if the effect of education on the satisfaction with job security were as high in WE countries as in CEE countries. The same conclusion, only slightly smaller in magnitude, can be drawn from models 2 and 3. Model 2 also indicates that the differential were higher by almost 4 points if the effect of fixed-term employment on the satisfaction would be similarly positive in WE countries as it is in CEE countries. Model 3 suggests that the differential would be higher if the effect of spending on labour market policies were as strong in WE countries as in CEE countries.

Table 8 reports the estimation results of models 4-6, where the key national-level variables are now expenditure on active labour market policies, expenditure on passive labour market policies and a strictness index of employment protection legislation respectively.

The first two models of Table 8 show that when expenditure on labour market policies is split up into the two components of active and passive labour market policies, both components continue to have a significant positive effect on satisfaction with job security in both groups of countries (columns 1 and 2). In particular, the endowment of passive labour market policy seems to play a role in explaining the differential, as can be seen from column 3 of Table 8, where the only significant decomposition effect is that of expenditure on passive labour market policies. Were CEE countries endowed with the same amounts of passive labour market policies as WE countries, then the differential of satisfaction with job security of 1.61 would shrink by 0.406. Differences with endowments in EPL do not seem to explain any of the differential, the associated decomposition effect being small in magnitude and statistically insignificant.

The last column of Table 8 shows that the much stronger beneficial effects of education and of expenditure on both types labour market policies in CEE countries actually contribute to keeping the differential in satisfaction with job security small. Were the effects of those variables in WE countries equally strong as in CEE countries, the differential would be even larger. Even though the effects of EPL on job security are not significantly different from zero in both groups of countries, the negative coefficient in the CEE regression is actually significantly different from the positive coefficient in the regression of WE countries. The model therefore predicts that if instead of a positive effect of EPL on job security the WE countries had a negative effect comparable to that of the CEE countries, then the differential could be more than compensated. The differential would actually turn in favour of the CEE countries.

Table 8: Regressions in separate samples and Oaxaca-Blinder Decomposition – Models 4–6

	Model 4			
	$\hat{\beta}^W$	$\hat{\beta}^C$	$(\bar{x}^W - \bar{x}^C)\hat{\beta}^C$	$\bar{x}^W(\hat{\beta}^W - \hat{\beta}^C)$
Sex (female)	-0.031 (0.11)	0.149*** (0.02)	0.0005 (0.004)	-0.2710 (0.17)
Age	0.018 (0.01)	-0.003 (0.02)	-0.0071 (0.02)	0.8218 (0.67)
Union member	0.512** (0.13)	0.275 (0.52)	0.052 (0.07)	0.042 (0.10)
Education	0.146* (0.06)	0.62** (0.19)	-0.029 (0.03)	-0.966** (0.42)
Spending ALMP	0.504* (0.22)	4.329* (1.46)	0.251 (0.17)	-0.781* (0.42)
Constant	6.208*** (0.45)	3.716*** (0.28)		2.492*** (0.53)
Total			0.268 (0.21)	1.338** (0.56)
N	2,803	2,365	Total difference:	1.606

Model 5				
	$\hat{\beta}^W$	$\hat{\beta}^C$	$(\bar{x}^W - \bar{x}^C)\hat{\beta}^C$	$\bar{x}^W'(\hat{\beta}^W - \hat{\beta}^C)$
Sex (female)	-0.045 (0.13)	0.1* (0.04)	0.00075 (0.000)	-0.2176 (0.20)
Age	0.019 (0.01)	0.004 (0.01)	-0.0073 (0.03)	0.5602 (0.62)
Union member	0.291** (0.08)	0.003 (0.27)	0.030 (0.04)	0.052 (0.05)
Education	0.164* (0.07)	0.565*** (0.08)	-0.032 (0.03)	-0.819*** (0.22)
Spending PLMP	0.477*** (0.07)	4.781* (1.58)	0.406* (0.21)	-1.487** (0.68)
Constant	6.025*** (0.42)	2.904*** (0.47)		3.120*** (0.63)
Total			0.397 (0.24)	1.209** (0.55)
N	2,803	2,365	Total difference:	1.606
Model 6				
	$\hat{\beta}^W$	$\hat{\beta}^C$	$(\bar{x}^W - \bar{x}^C)\hat{\beta}^C$	$\bar{x}^W'(\hat{\beta}^W - \hat{\beta}^C)$
Sex (female)	-0.034 (0.13)	0.136*** (0.01)	0.0007 (0.00)	-0.2553 (0.20)
Age	0.018 (0.01)	-0.009 (0.02)	-0.0178 (0.03)	1.0813 (0.83)
Union member	0.747*** (0.15)	0.289 (0.61)	0.104 (0.10)	0.065 (0.09)
Education	0.146* (0.06)	0.911** (0.15)	-0.029 (0.03)	-1.560*** (0.37)
EPL	0.053 (0.32)	-1.454 (0.71)	-0.020 (0.19)	3.455* (1.89)
Constant	6.407*** (0.32)	7.289* (1.84)		-0.882 (1.87)
Total			0.038 (0.20)	1.904*** (0.60)
N	2,803	1,855	Total difference:	1.942

Notes: Standard errors reported in parentheses. Stars indicate significance at the 1%-level (***), 5%-level (**) and 10%-level (*).

6.3 Bringing the Results Together

The study has measured the association of institutions with perceived job insecurity through bivariate correlations (Chapter 6.1) and in a multivariate analysis for different samples for WE and CEE countries (Chapter 6.2). The last two columns of Table 9 summarise the effects of institutions on job insecurity found in these two analyses. The remaining columns report the effects measured in the studies that have been discussed in Chapter 3 above.

The results from Chapters 6.1 and 6.2 are quite similar to each other and consistent with the literature: the objective labour market situation as measured by the unemployment rate has a significant effect on perceived job insecurity. This is in line with the results of Böckerman 2004. Furthermore, active labour market policies reduce job insecurity. This is consistent with results of other studies that find that active labour market policies can reduce unemployment (Nickell 1997, Cazes and Nesporova 2003).

The finding that passive labour market policies seem to decrease job insecurity is in line with the literature on perceived job insecurity (Böckerman 2004, OECD 1997 and Clark/Postel-Vinay 2005). Although Nickell (1997) finds that a generous unemployment benefit system can increase unemployment, the results of the studies that measure the effect on subjective job security suggest that, because of the income protection provided by passive labour market policies, these policies reduce perceived job insecurity.

The effect of employment protection legislation on objective and subjective measures of job insecurity is usually mixed and often not significant. In this respect, the results from Chapters 6.1 and 6.2 of this study are in line with the literature.

The studies of Nickell (1997) and Cazes and Nesporova (2003) find that high payroll taxes can increase unemployment. The result of Chapter 6.1 of the present study confirms that this effect is also reflected in subjective measures of job insecurity.

According to the bivariate estimates of Chapter 6.1, the incidence of fixed-term contracts seems to increase perceived job insecurity, while according to the multivariate estimation in Chapter 6.2 it seems to decrease job insecurity (at least for CEE countries). This may imply that opposite effects operate at the same time and that, depending on the research design, one or the other becomes visible or both cancel out. In a sense this is consistent with OECD 1997 in finding no association between the incidence of fixed-term contracts and job insecurity.

Table 9: Effects of institutions on job security

Study	Nickell 1997	Cazes/Nesporova 2003	Böckerman 2004	OECD 1997	Clark/Postel-Vinay 2005	Cornelissen 2007 (this study)	
						Chapter 6.1	Chapter 6.2
Outcome variable	Unemployment	Unemployment	Perceived job insecurity	Perceived job insecurity	Perceived job insecurity	Perceived job insecurity	Perceived job insecurity
Bi- vs- multivariate	Multivariate	Multivariate	Bivariate	Mixed	Multivariate	Bivariate	Multivariate
Unobserved heterogeneity	Country random effects	—	—	—	Individual random effects	—	—
Unemployment rate	n.a.	n.a.	+	n.a.	n.a.	+	+
Active labour market policies	—	—	n.a.	n.a.	n.a.	—	—
Passive labour market policies or unempl. benefit generosity	+	n.a.	—	—	—	0-	—
Employment protection	0	0	+	0-	+	0+	0+ (CEE)
Payroll taxes	+	+	n.a.	n.a.	n.a.	+	n.a.
Collective bargaining	+(uncoordinated) -(coordinated)	—	n.a.	—	n.a.	n.a.	n.a.
Fixed-term contracts	n.a.	n.a.	n.a.	0	n.a.	+	-(CEE)

Notes: +/— positive/negative significant influence.
 0+/0— insignificant influence with positive/negative sign
 n.a. influence not analyzed in given study.

Chapter 7

Conclusion

The analysis has shown that there is a differential between CEE and WE countries with respect to job security along several dimensions: Workers in CEE countries consistently report lower values of perceived job security, as well as higher importance of job security. In addition, workers in CEE countries find job security not only absolutely more important but also more important relative to other job characteristics: when ranking job security and other job characteristics according to the importance attached to them, job security ranks second after pay in many CEE countries, while in WE countries it ranks only third after “an interesting job”.

The subsequent analysis has looked into the reasons for the gap in perceived job security.

Cross-country correlations of labour market institutions and subjective job security have been found to be consistent with the hypothesis that active labour market policies increase the ease of finding a new job, that the incidence of fixed term contracts decreases subjective job security, and that higher payroll taxes decrease job security by increasing the risk of losing one's job and by decreasing the chances of finding a new job. The bivariate cross-country analysis could not substantiate statistical significant effects of spending on passive labour market policies and of the EPL index on job security. However, the sign of the influences suggests that passive labour market policies may have potential to increase job security, while there appears to be a risk that EPL can have a negative impact by reducing the unemployed's chances of being hired in a new job.

A multivariate analysis has been conducted by decomposing the differential between CEE and WE countries into a part that is due to differences in endowments with relevant characteristics and a part due to differences in the effects of these characteristics on perceived job security. The decomposition has shown that in the framework of the present model about one-third of the satisfaction differential can be explained by the high unemployment rate in CEE countries. A quarter of the differential can be explained by lower expenditure on labour market policies relative to GDP, with the analysis revealing that differences in passive labour market policy expenditure seem more significant than those in active labour market policy expenditure. It has also shown that negative effects of EPL strictness on satisfaction with job security are more pronounced in CEE countries than in WE countries, which also contributes to the differential. The positive effects of education and expenditure on labour market policies appear stronger in CEE countries, and this has prevented the differential from being even wider. This suggests that the returns to increases in educational attainments of the work force as well as to spending on labour market policies are higher in CEE countries than in WE countries.

Looking ahead to future research it seems desirable to examine the connection between job security and institutions using more comprehensive data sets that provide a broader set of regressors to be used as control or instrumental variables and which cover a longer time-span so that panel data models which hold unobserved heterogeneity constant can be applied.

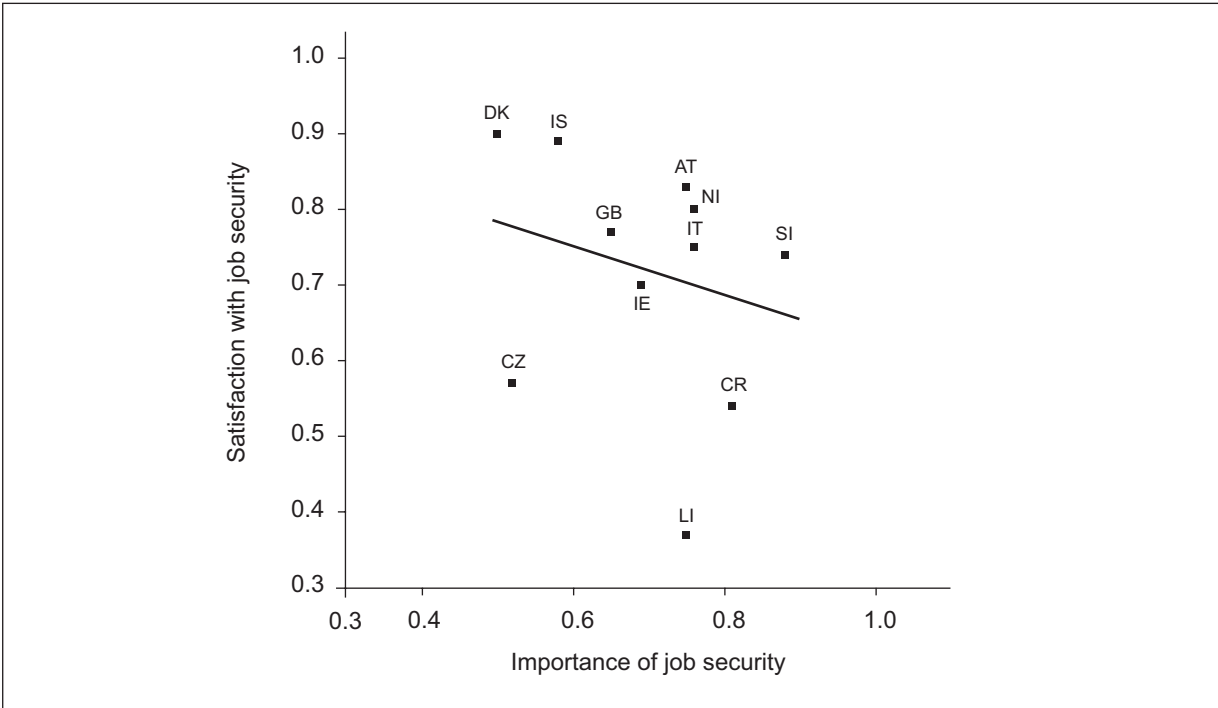
References

- Agell, J. 1999. "On the Benefits from Rigid Labour Markets: Norms, Market Failures, and Social Insurance", in *The Economic Journal*, Vol. 109, No. 453, pp. 143–164.
- Auer, P.; Cazes, S. (eds.). 2003. *Employment stability in an age of flexibility: Evidence from industrialized countries* (Geneva, ILO).
- Bartley, M. 2005. "Job insecurity and its effect on health", in: *Journal of Epidemiology and Community Health*, Vol. 59, No. 9, pp. 718–719.
- Benito, A. 2004. "Does job insecurity affect household consumption?", in: *Oxford Economic Papers*, Vol. 58, No. 1, pp. 157–181.
- Böckerman, P. 2004. "Perception of Job Instability in Europe", in: *Social Indicators Research*, Vol. 67, No. 3, pp. 283–314.
- Burgess, S.; Knetter, M.; Michelacci, C. 2000. "Employment and Output Adjustment in the OECD: A Disaggregate Analysis of the Role of Job Security Provisions", in: *Economica*, Vol. 37, No. 3, pp. 419–435.
- Campbell, D.; Carruth A.; Dickerson A.; Green F. 2001. "Job Insecurity and Wage Outcomes in Britain", *Studies in Economics from the Department of Economics No. 109*, University of Kent.
- Cazes, S.; Nesporova A. 2003. *Labour markets in transition* (Geneva, ILO).
- Cazes, S.; Nesporova, A. (eds). 2007. *Flexicurity: A relevant approach in Central and Eastern Europe* (Geneva, ILO).
- Clark, A.E.; Postel-Vinay F. 2005. "Job Security and Job Protection", *CEPR Discussion Paper No 4927* (CEPR, London).
- Clark, A.E. 2005. "Your Money or Your Life: Changing Job Quality in OECD Countries", *IZA DP 1610* (IZA, Bonn).
- European Commission 2005. "Employment in Europe 2005, Recent Trends and Prospects", (European Commission, Brussels).
- Fairlie 2006. "An Extension of the Blinder-Oaxaca Decomposition Technique to Logit and Probit Models", *IZA Discussion Paper No. 1917* (IZA, Bonn).
- Frey, B.; Stutzer S. 2001. *Happiness and Economics: How the Economy and Institutions Affect Human Well-Being* (Princeton University Press, Princeton).
- Greene, W. 2003. *Econometric Analysis* (Prentice Hall, New Jersey).

- Green, F.; Dickerson, A.; Carruth, A.; Campbell, D. 2001. "An Analysis of Subjective Views of Job Insecurity", *Studies in Economics* 0108, Department of Economics, University of Kent.
- Hübler, O.; Hübler, D. 2006. "Is There a Trade-off Between Job Security and Wages in Germany and the UK?", *IZA Discussion Paper No. 2241* (IZA, Bonn).
- Klandermans, B.; Van Vuuren, T. 1999. "Job Insecurity: Introduction", in: *European Journal of Work and Organizational Psychology*, Vol. 8, pp. 145–153.
- Nickell, S. 1997. "Unemployment and Labour Market Rigidities: Europe versus North America", in: *Journal of Economic Perspectives*, Vol. 11, No. 3, pp. 55–74.
- OECD 1997: *OECD Employment Outlook 1997* (OECD, Paris).
- OECD 2004a: *OECD Employment Outlook 2004* (OECD, Paris).
- OECD 2004b: *Taxing Wages 2003–2004* (OECD, Paris).
- Pearce, J. 1998. "Job insecurity is Important but NOT for the reasons you might think", in: Cooper C.; Rousseau D.M., *Trends in Organizational Behaviour 5* (John Wiley, New York).
- Siebert, H. 1997. "Labour Market Rigidities: At the Root of Unemployment in Europe", in: *Journal of Economic Perspectives*, Vol. 11, No. 3, pp. 37–54.
- Tonin, M. 2005. "Updated Employment Protection Legislation Indicators for Central and Eastern European Countries", Working Paper, Institute for International Economic Studies, Stockholm University.
- Warr, P. 1999. "Well-being and the workplace", in : Kahnemann D.; Diener E.; Schwarz N. (eds.). *Well-being: the foundations of hedonic psychology* (Russell Sage Foundation, New York).
- Yousef, D.A. 1998. "Satisfaction with job security as a predictor of organizational commitment and job performance in a multicultural environment", in: *International Journal of Manpower*, Vol. 19, No. 3, pp. 184–194.

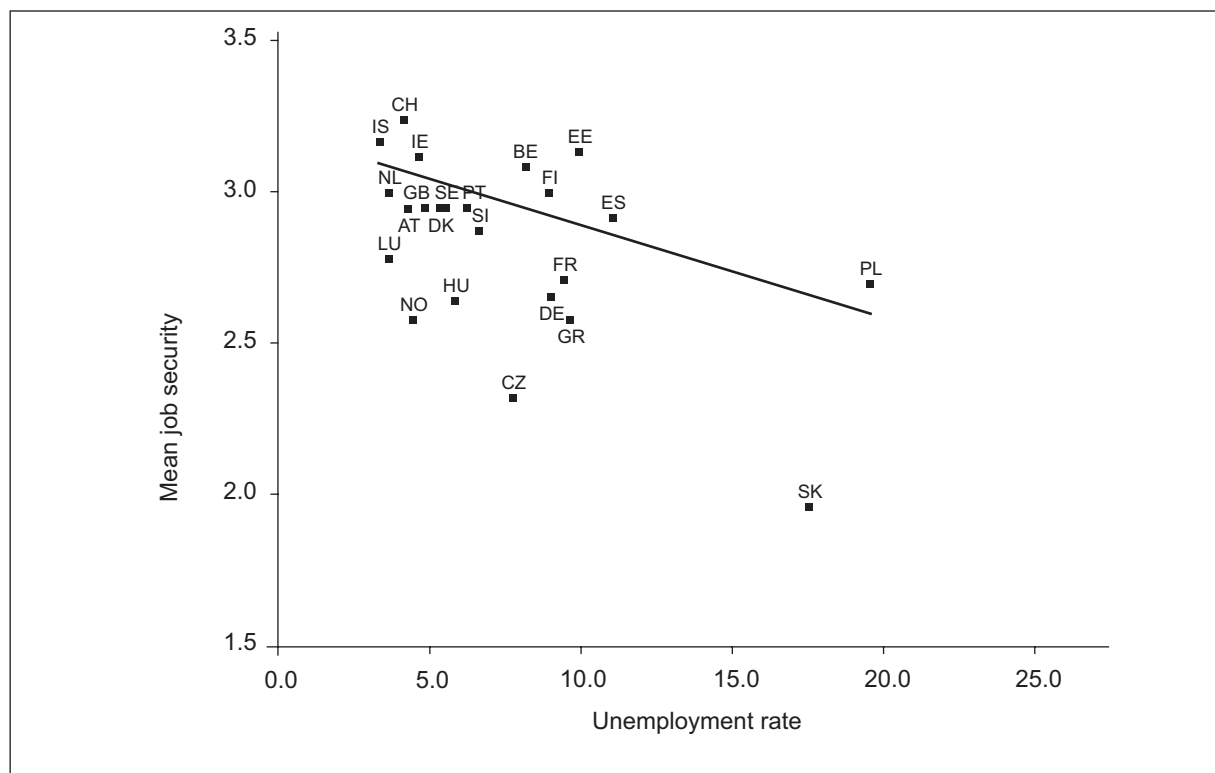
Appendix: Scatter Graphs

Figure 1: Cross-country relationship between importance of job security and satisfaction with job security



	AT	CZ	CR	DK	GB	IE	IS	IT	LI	NI	SI
X	0.75	0.52	0.81	0.50	0.65	0.69	0.58	0.76	0.75	0.76	0.88
Y	0.83	0.57	0.54	0.90	0.77	0.70	0.89	0.75	0.37	0.80	0.74

Figure 2: Mean job security and unemployment rate

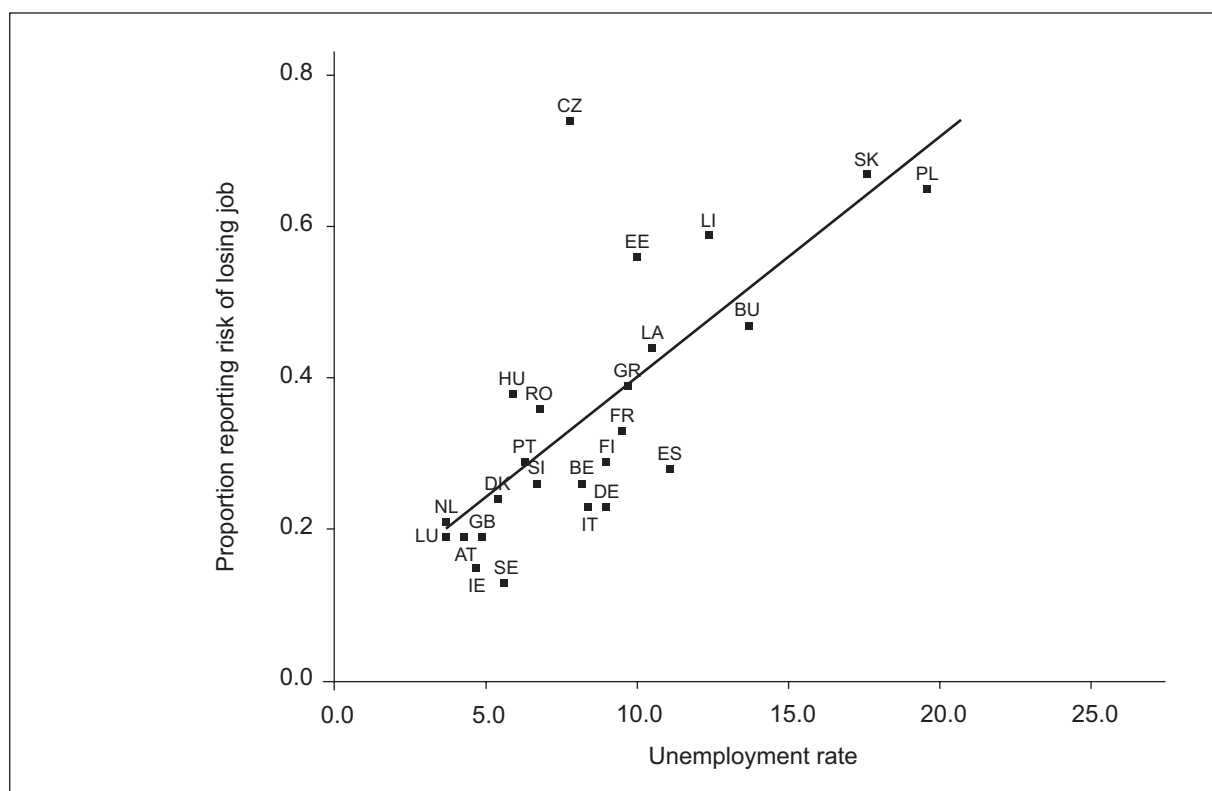


	AT	BE	CH	CZ	DE	DK	EE	ES	FI	FR	GB	GR	HU	IE	IS	LU	NL	NO	PL	PT	SE	SI	SK
X	4.3	8.2	4.2	7.8	9.0	5.4	10.0	11.1	9.0	9.5	4.9	9.7	5.9	4.7	3.4	3.7	3.7	4.5	19.6	6.3	5.6	6.7	17.6
Y	2.92	3.09	3.23	2.31	2.63	2.93	3.13	2.91	3.04	2.71	2.94	2.59	2.64	3.12	3.18	2.79	3.00	2.58	2.70	2.93	2.93	2.88	1.97

Note: N = 23, Spearman rank correlation coefficient -0.57 , P-Val.: 0.005

Source: Mean job security see Table 2; unemployment rate see Table 6.

Figure 3: Risk of job loss and unemployment rate

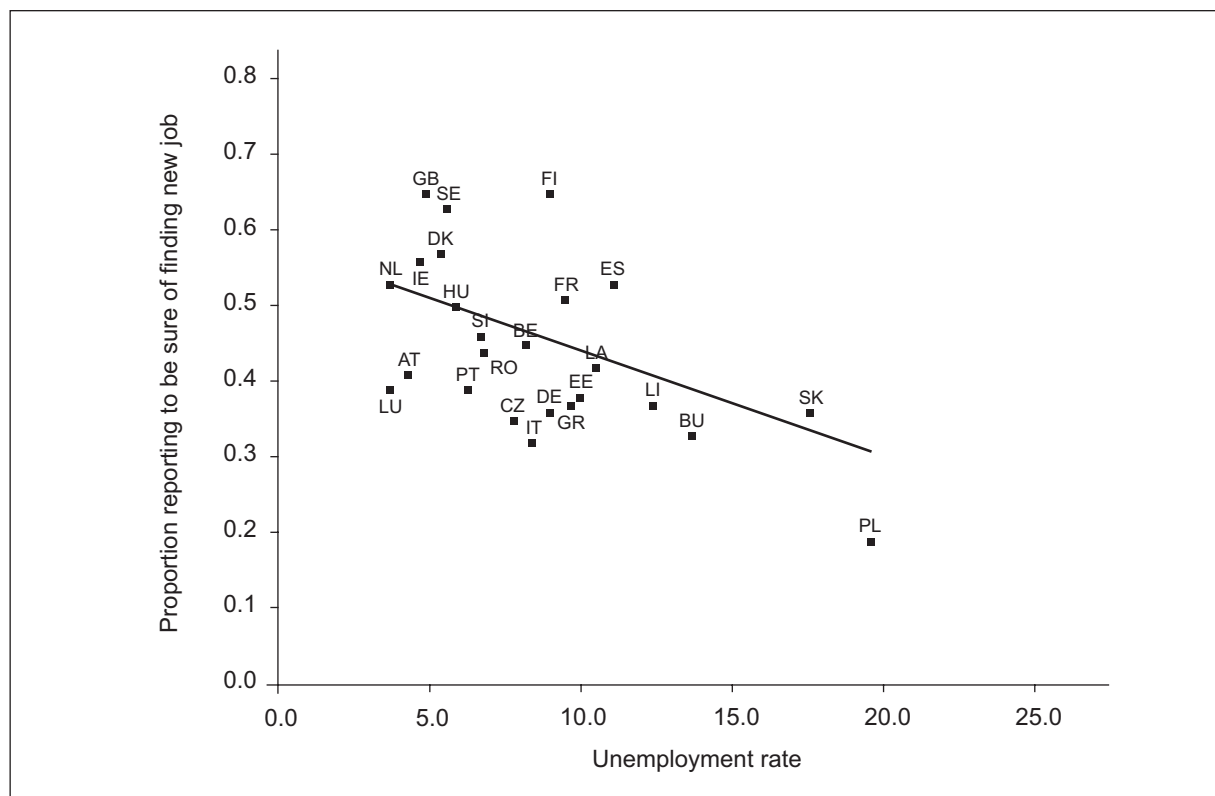


	AT	BE	BU	CZ	DK	DE	EE	ES	FI	FR	GB	GR	HU	IE	IT	LA	LI	LU	NL	SE	PL	SI	SK	PT	RO
X	4.3	8.2	13.7	7.8	5.4	9.0	10.0	11.1	9.0	9.5	4.9	9.7	5.9	4.7	8.4	10.5	12.4	3.7	3.7	5.6	19.6	6.7	17.6	6.3	6.8
Y	0.19	0.26	0.47	0.74	0.24	0.23	0.56	0.28	0.29	0.33	0.19	0.39	0.38	0.15	0.23	0.44	0.59	0.19	0.21	0.13	0.65	0.26	0.67	0.29	0.36

Note: N = 25, Spearman rank correlation coefficient 0.77, P-Val.: 0.001

Source: Proportion reporting job loss see Table 5; unemployment rate see Table 6.

Figure 4: Ease of finding new job and unemployment rate

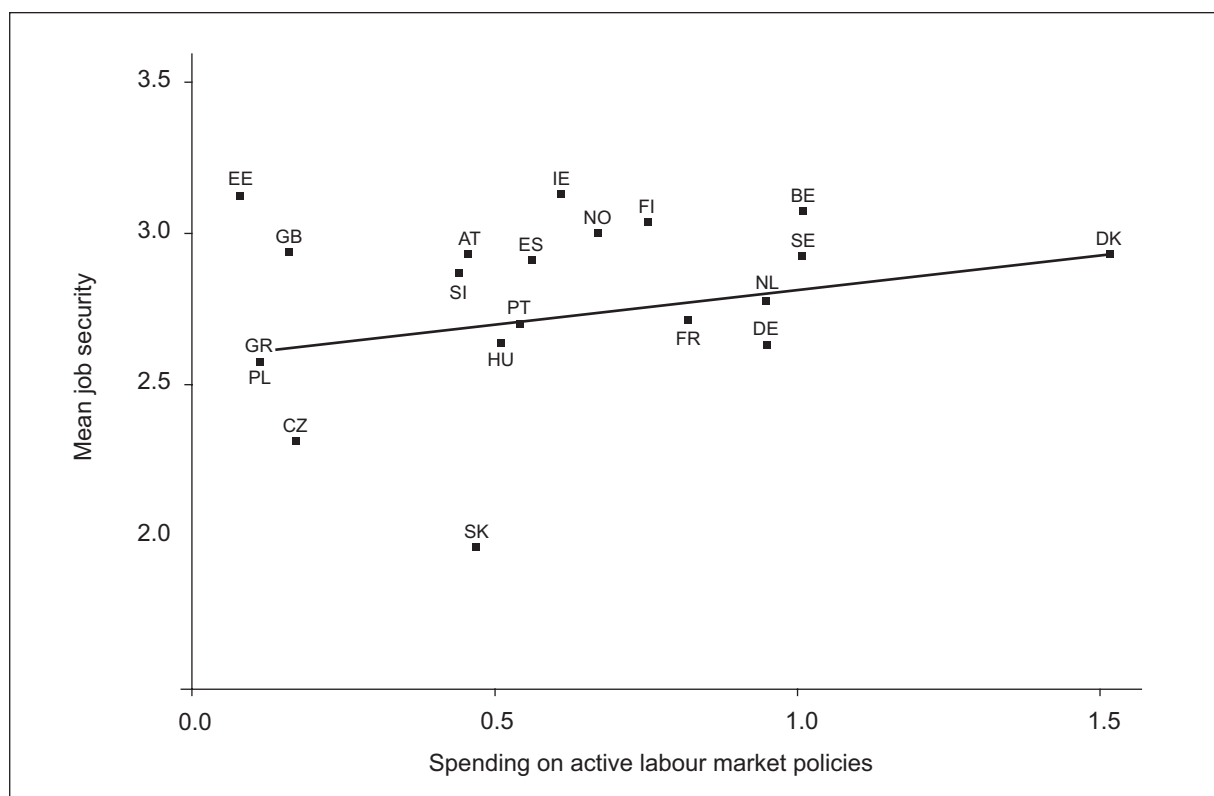


	AT	BE	BU	CZ	DE	DK	EE	ES	FI	FR	GB	GR	HU	IE	IT	LA	LI	LU	NL	SE	SI	SK	PL	PT	RO
X	4.3	8.2	13.7	7.8	9.0	5.4	10.0	11.1	9.0	9.5	4.9	9.7	5.9	4.7	8.4	10.5	12.4	3.7	3.7	5.6	6.7	17.6	19.6	6.3	6.8
Y	0.41	0.45	0.33	0.35	0.36	0.57	0.38	0.53	0.65	0.51	0.65	0.37	0.50	0.56	0.32	0.42	0.37	0.39	0.53	0.63	0.46	0.36	0.19	0.39	0.44

Note: N = 25, Spearman rank correlation coefficient -0.53 , P-Val.: 0.006

Source: Proportion reporting difficulty in finding a job see Table 5; unemployment rate see Table 6.

Figure 5: Mean job security and spending on active labour market policies

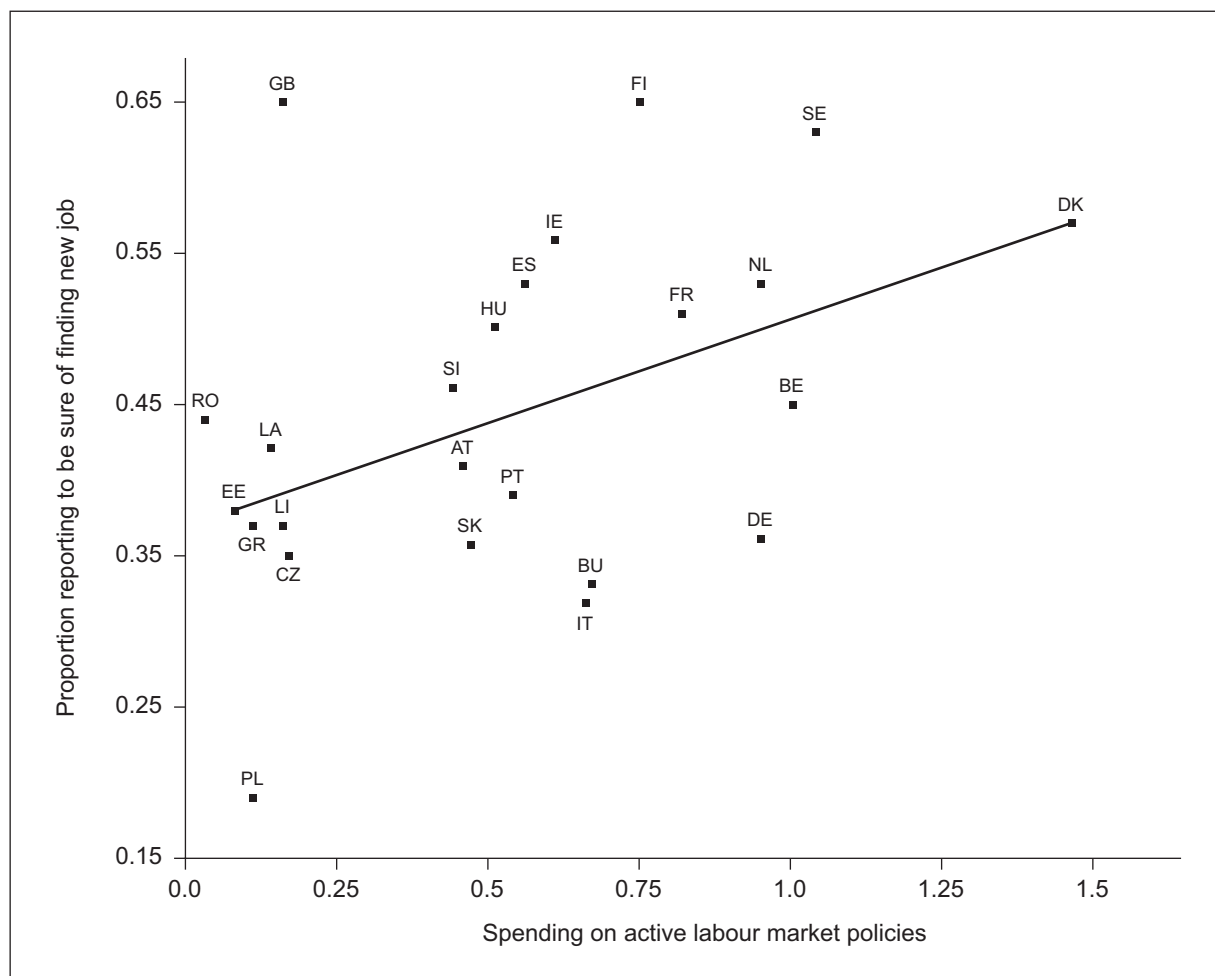


	AT	BE	CZ	DE	DK	EE	ES	FI	FR	GB	GR	HU	IE	NL	NO	PL	PT	SE	SI	SK
X	0.46	1.01	0.17	0.95	1.53	0.08	0.56	0.75	0.82	0.16	0.11	0.51	0.61	0.95	0.67	0.11	0.54	1.04	0.44	0.47
Y	2.92	3.09	2.31	2.63	2.93	3.13	2.91	3.04	2.71	2.94	2.59	2.64	3.12	2.79	3.00	2.58	2.70	2.93	2.88	1.97

Note: N = 20, Spearman rank correlation coefficient 0.26, P-Val.: 0.26

Source: Mean job security see Table 2; spending on ALMP see Table 6.

Figure 6: Ease of finding a new job and active labour market policies

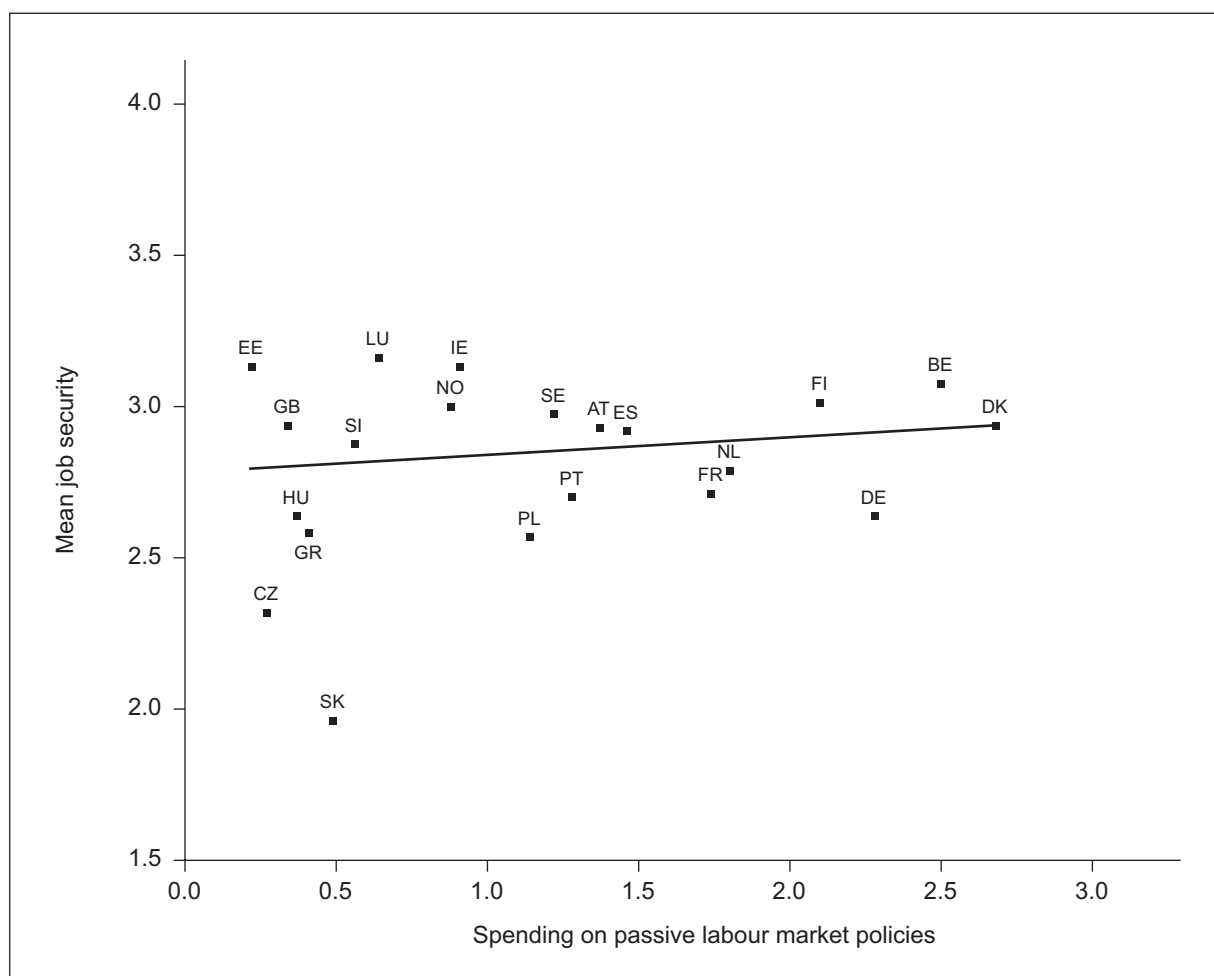


	AT	BE	BU	CZ	DE	DK	EE	ES	FI	FR	GB	GR	HU	IE	IT	LA	LI	NL	PL	PT	RO	SE	SI	SK
X	0.46	1.01	0.67	0.17	0.95	1.53	0.08	0.56	0.75	0.82	0.16	0.11	0.51	0.61	0.66	0.14	0.16	0.95	0.11	0.54	0.03	1.04	0.44	0.47
Y	0.41	0.45	0.33	0.35	0.36	0.57	0.38	0.53	0.65	0.51	0.65	0.37	0.50	0.56	0.32	0.42	0.37	0.53	0.19	0.39	0.44	0.63	0.46	0.36

Note: N = 24, Spearman rank correlation coefficient 0.37, P-Val.: 0.072

Source: Proportion reporting difficulty of finding new job see Table 5; spending on ALMP see Table 6.

Figure 7: Mean job security and spending on passive labour market policies

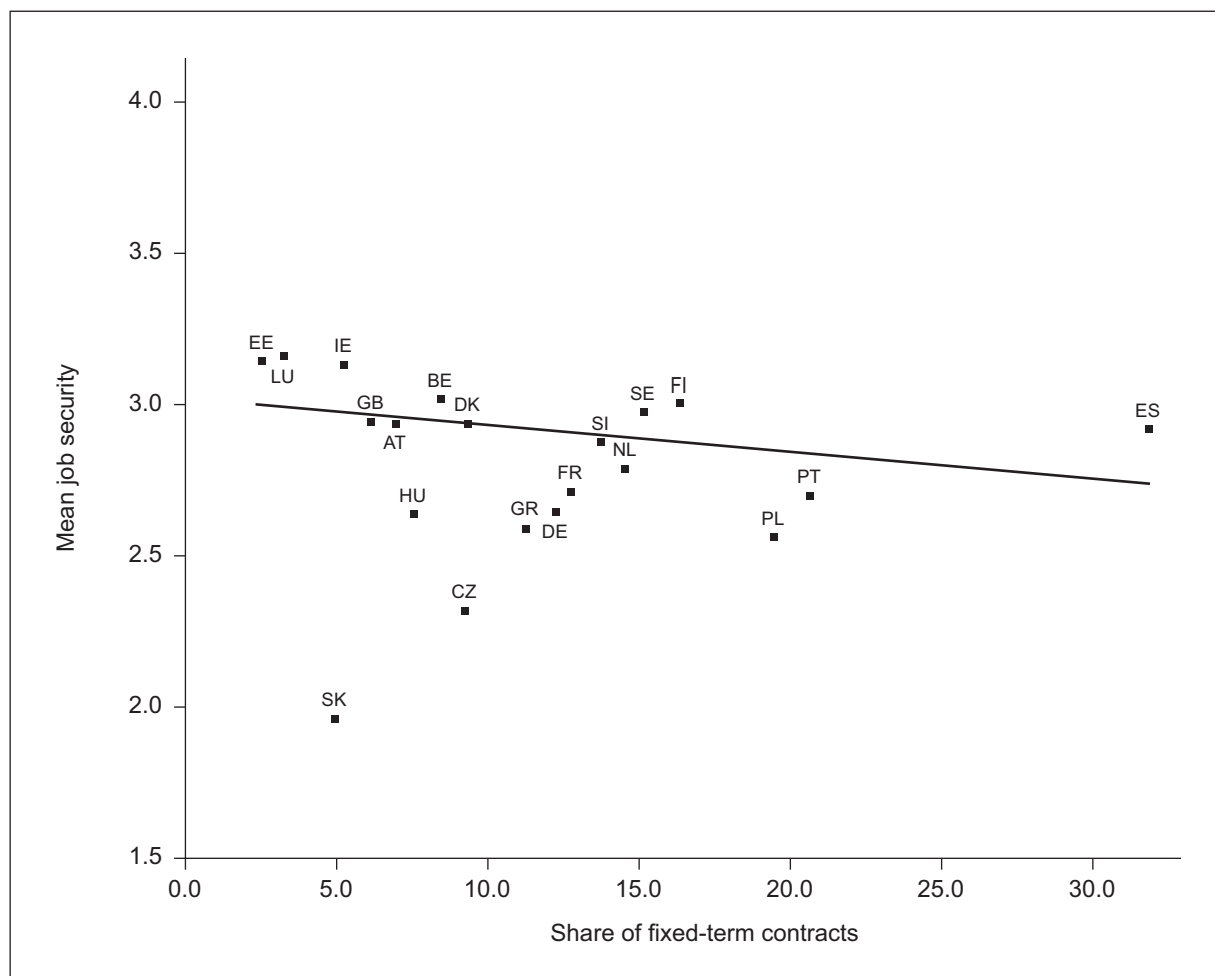


	AT	BE	CZ	DE	DK	EE	ES	FI	FR	GB	GR	HU	IE	LU	NL	NO	PL	PT	SE	SI	SK
X	1.37	2.51	0.27	2.28	2.68	0.22	1.46	2.10	1.74	0.34	0.41	0.37	0.91	0.64	1.80	0.88	1.14	1.28	1.22	0.56	0.49
Y	2.92	3.09	2.31	2.63	2.93	3.13	2.91	3.04	2.71	2.94	2.59	2.64	3.12	3.18	2.79	3.00	2.58	2.70	2.93	2.88	1.97

Note: N = 21, Spearman rank correlation coefficient 0.13, P-Val.: 0.58

Source: Mean job security see Table 2; spending on PLMP see Table 6.

Figure 8: Mean job security and fixed-term contracts

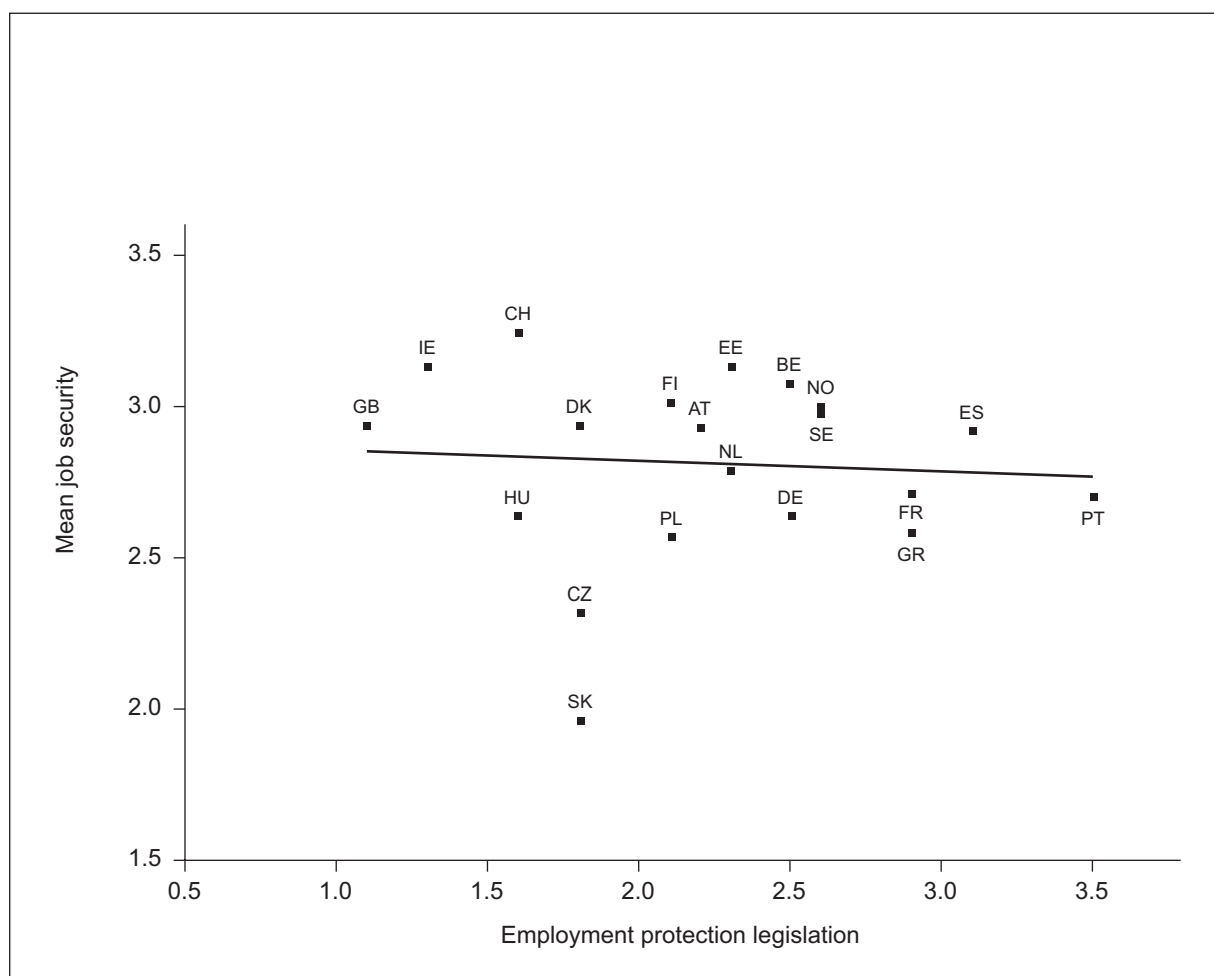


	AT	BE	CZ	DE	DK	EE	ES	FI	FR	GB	GR	HU	IE	LU	NL	PL	PT	SE	SI	SK
X	6.9	8.4	9.2	12.2	9.3	2.5	31.8	16.3	12.7	6.1	11.2	7.5	5.2	3.2	14.5	19.4	20.6	15.1	13.7	4.9
Y	2.92	3.09	2.31	2.63	2.93	3.13	2.91	3.04	2.71	2.94	2.59	2.64	3.12	3.18	2.79	2.58	2.70	2.93	2.88	1.97

Note: N = 20, Spearman rank correlation coefficient -0.32 , P-Val.: 0.16

Source: Mean job security see Table 2; incidence of fixed-term contracts see Table 6.

Figure 9: Mean job security and employment protection legislation

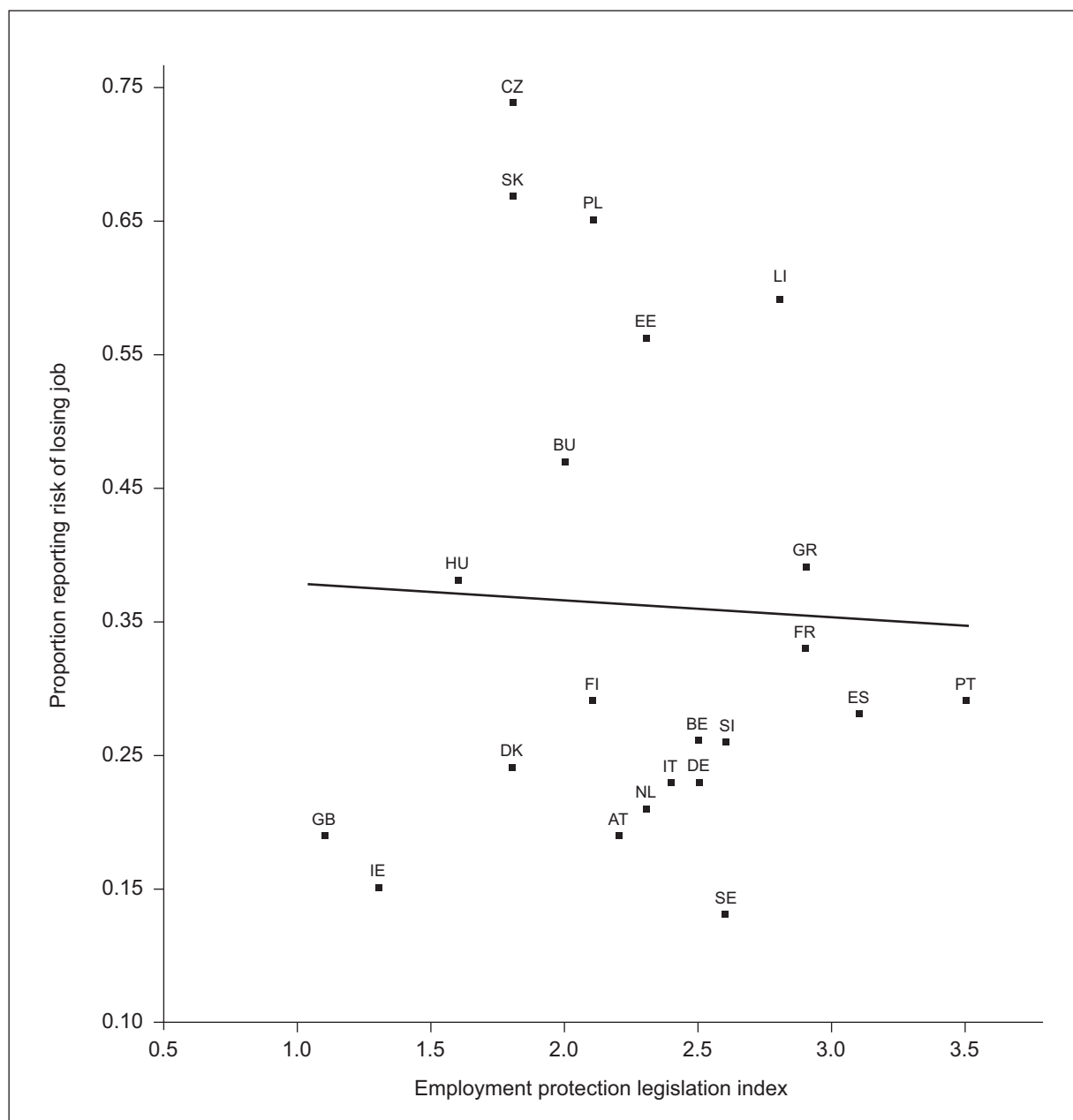


	AT	BE	CH	CZ	DE	DK	EE	ES	FI	FR	GB	GR	HU	IE	NL	NO	PL	PT	SE	SK
X	2.2	2.5	1.6	1.8	2.5	1.8	2.3	3.1	2.1	2.9	1.1	2.9	1.6	1.3	2.3	2.6	2.1	3.5	2.6	1.8
Y	2.92	3.09	3.23	2.31	2.63	2.93	3.13	2.91	3.04	2.71	2.94	2.59	2.64	3.12	2.79	3.00	2.58	2.70	2.93	1.97

Note: N = 20, Spearman rank correlation coefficient -0.18 , P-Val.: 0.45

Source: Mean job security see Table 2; EPL index see Table 6.

Figure 10: Risk of job loss and EPL

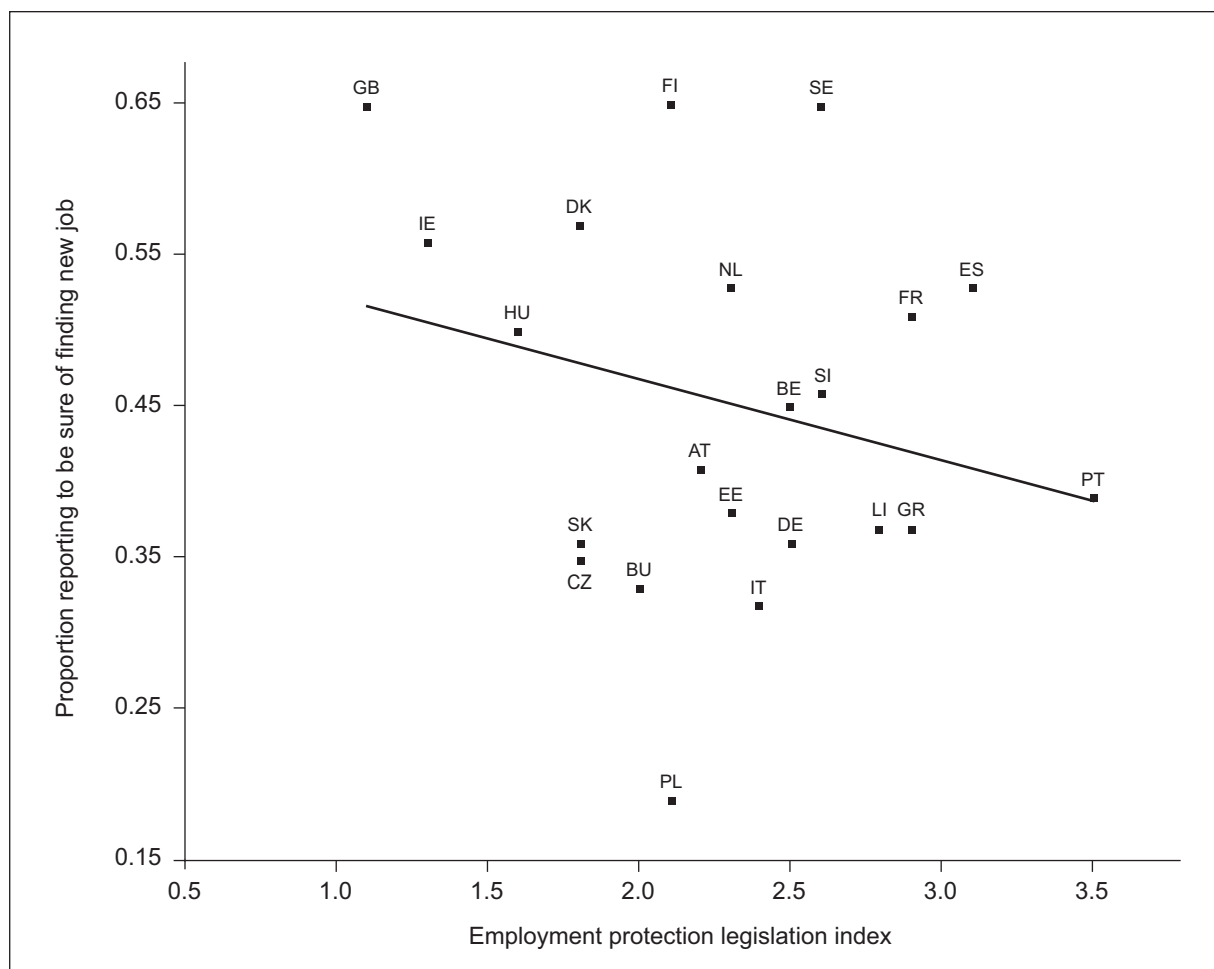


	AT	BE	BU	CZ	DE	DK	EE	ES	FI	FR	GB	GR	HU	IE	IT	LI	NL	PL	PT	SE	SI	SK
X	2.2	2.5	2.0	1.8	2.5	1.8	2.3	3.1	2.1	2.9	1.1	2.9	1.6	1.3	2.4	2.8	2.3	2.1	3.5	2.6	2.6	1.8
Y	0.19	0.26	0.47	0.74	0.23	0.24	0.56	0.28	0.29	0.33	0.19	0.39	0.38	0.15	0.23	0.59	0.21	0.65	0.29	0.13	0.26	0.67

Note: N = 22, Spearman rank correlation coefficient 0.035, P-Val.: 0.88

Source: Proportion reporting job loss see Table 5; EPL index see Table 6.

Figure 11: Ease of finding new job and EPL index

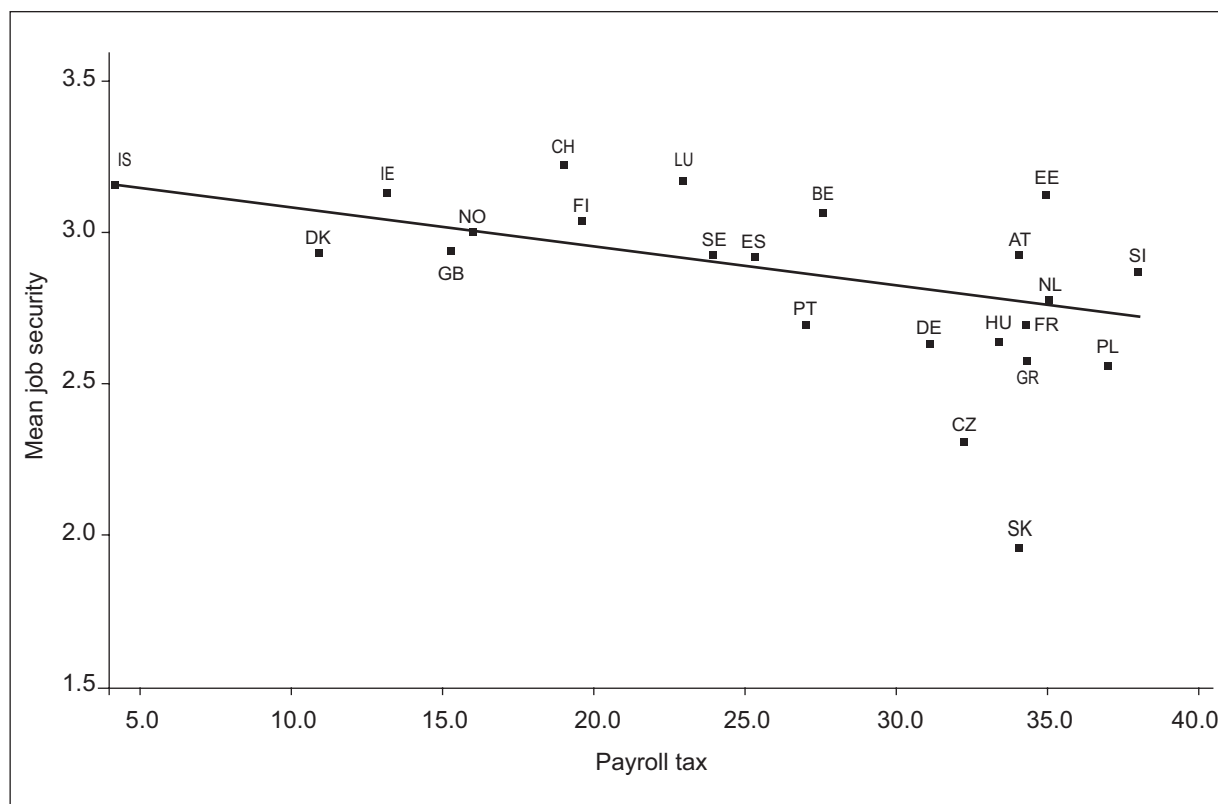


	AT	BE	BU	CZ	DE	DK	EE	ES	FI	FR	GB	GR	HU	IE	IT	LI	NL	PL	PT	SE	SI	SK
X	2.2	2.5	2.0	1.8	2.5	1.8	2.3	3.1	2.1	2.9	1.1	2.9	1.6	1.3	2.4	2.8	2.3	2.1	3.5	2.6	2.6	1.8
Y	0.41	0.45	0.33	0.35	0.36	0.57	0.38	0.53	0.65	0.51	0.65	0.37	0.50	0.56	0.32	0.37	0.53	0.19	0.39	0.63	0.46	0.36

Note: N = 25, Spearman rank correlation coefficient -0.12, P-Val.: 0.60

Source: Proportion reporting difficulty in finding new job see Table 5; EPL index see Table 6.

Figure 12: Mean job security and payroll taxes

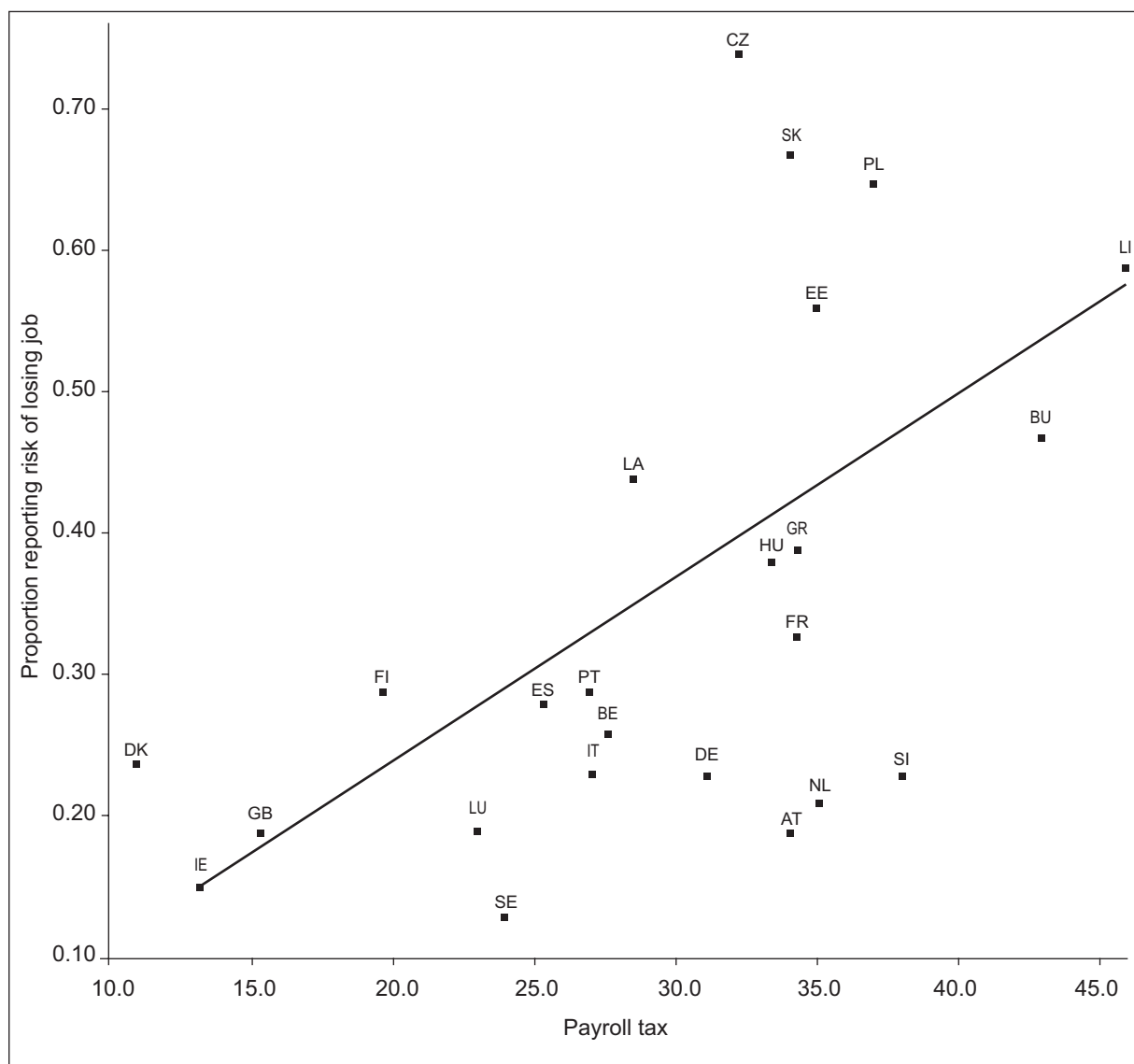


	AT	BE	CH	CZ	DE	DK	EE	ES	FI	FR	GB	GR	HU	IE	IS	LU	NL	NO	PL	PT	SE	SI	SK
X	34.1	27.6	19.00	32.2	31.1	10.9	35.0	25.3	19.6	34.3	15.3	34.3	33.4	13.2	4.2	23.0	35.1	16.0	37.0	27.0	24.0	38.0	34.1
Y	2.92	3.09	3.23	2.31	2.63	2.93	3.13	2.91	3.04	2.71	2.94	2.59	2.64	3.12	3.18	3.18	2.79	3.00	2.58	2.70	2.93	2.88	1.97

Note: N = 23, Spearman rank correlation coefficient -0.61, P-Val.: 0.002

Source: Mean job security see Table 2; payroll taxes see Table 6.

Figure 13: Risk of job loss and payroll taxes

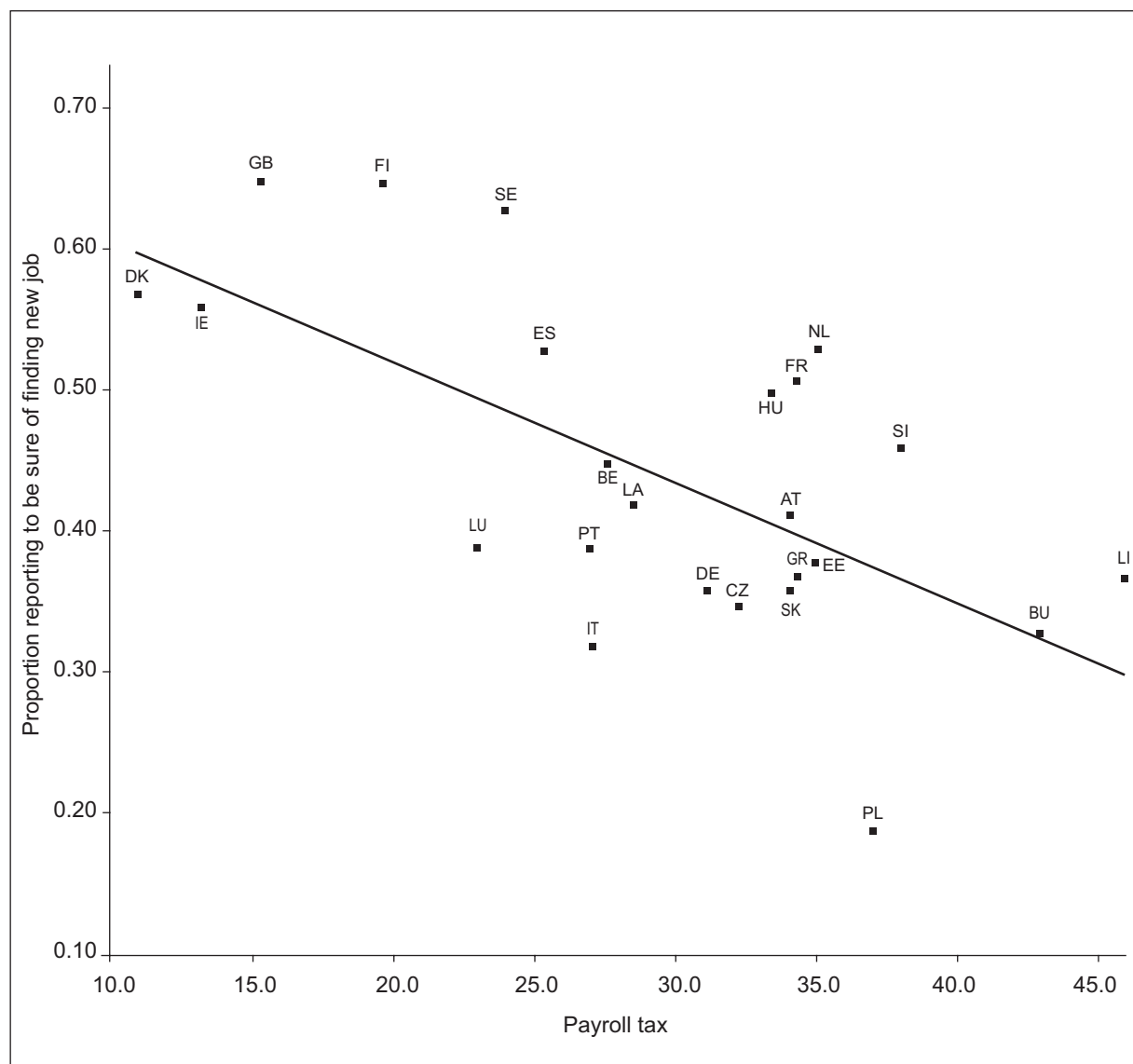


	AT	BE	BU	CZ	DE	DK	EE	ES	FI	FR	GB	GR	HU	IE	IT	LA	LI	LU	NL	PL	PT	SE	SI	SK
X	34.1	27.6	42.7	32.2	31.1	10.9	35.0	25.3	19.6	34.3	15.3	34.3	33.4	13.2	27.1	28.6	46.0	23.0	35.1	37.0	27.0	24.0	38.0	34.1
Y	0.19	0.26	0.47	0.74	0.23	0.24	0.56	0.28	0.29	0.33	0.19	0.39	0.38	0.15	0.23	0.44	0.59	0.19	0.21	0.65	0.29	0.13	0.23	0.67

Note: N = 24, Spearman rank correlation coefficient 0.57, P-Val.: 0.004

Source: Proportion reporting job loss see Table 5; payroll taxes see Table 6.

Figure 14: Ease of finding new job and payroll tax



	AT	BE	BU	CZ	DE	DK	EE	ES	FI	FR	GB	GR	HU	IE	IT	LA	LI	LU	NL	PL	PT	SE	SI	SK
X	34.1	27.6	42.7	32.2	31.1	10.9	35.0	25.3	19.6	34.3	15.3	34.3	33.4	13.2	27.1	28.6	46.0	23.0	35.1	37.0	27.0	24.0	38.0	34.1
Y	0.41	0.45	0.33	0.35	0.36	0.57	0.38	0.53	0.65	0.51	0.65	0.37	0.50	0.56	0.32	0.42	0.37	0.39	0.53	0.19	0.39	0.63	0.46	0.36

Note: N = 24, Spearman rank correlation coefficient -0.56 , P-Val.: 0.005
 Source: Proportion reporting difficulty of finding job see Table 5; payroll taxes see Table 6.

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