

Responsible business conduct in Japan auto parts supply chains

Global decent work challenges in the sector

The automotive industry is composed of the motor vehicle assemblers and manufacturers of components and parts. Given that a single car has more than 30,000 parts, auto parts manufacturing is the largest subsector of the automotive industry. In 2017, global employment in the sector was estimated at nearly 14 million workers (ILO 2020). However, female participation in the automotive workforce is historically low due to: (i) lack of qualification; (ii) gender discrimination and sexual harassment; (iii) lack of work/life balance; and (iv) lack of flexible schedules. Migrant workers constitute an important share of the workforce of the industry in many countries (ILO 2020).

The automotive industry is dominated by a few large lead firms, who exert control over upstream actors (ILO 2020). The supply chains of auto parts tend to be organized regionally or nationally (Duke CGGC 2016). The bulky, heavy, and model-specific parts-production is usually concentrated close to final assembly plants to assure timely delivery and minimize inventory, transportation, and storage costs. The lighter and generic parts are produced at distant low-cost production locations to take advantage of scale economies.

The auto parts market consists of: (i) original equipment manufacturers (OEM) market – supply of parts for the production of new vehicles; (ii) replacement equipment manufacturers (REM) market – supply of parts to replace original parts as they become worn or damaged; and (iii) aftermarket – supply of replacement parts that

are not made by OEM. Competition has increased in each of these markets and that a key driver has been cost reduction, which, in turn, contributed to deteriorating working conditions, increased labour flexibility, and constant or declining wages.

Once established, automotive clusters tend to be long-lived given the high investment. However, while automotive companies provide a significant number of jobs, an ILO study showed that the adoption of lean manufacturing methods increased the use of temporary workers, outsourcing, and contract labour (ILO 2020). The use of temporary workers is prevalent among second-, third- and fourth-tier suppliers, for which capital intensity is low. Process optimization (e.g., robotics, increased digitalization, new materials, etc.) and product innovation (e.g., electronic vehicles) can create new opportunities for enterprises and workers, particularly high-skilled workers. However, these technological advances can also potentially cause significant job losses. Findings of a 2016 study conducted by the ILO indicated that automation and robotics will have the largest impact on the more than 800,000 workers in the industry, particularly on low-skilled workers. This signifies the importance of upskilling and reskilling. Access to training among workers, however, is dependent on the type of employment contract, with temporary workers having the least access.

With the rapid expansion of the electric car, there has been an increase in the so-called conflict minerals (tin, tantalum, tungsten, and gold) in the automotive industry. Their supply chains have a high risk of human rights violations, decent work deficits, and unethical behaviour.

Although the automotive industry has a relatively strong occupational safety and health system, the industry remains hazardous. In the United States, for example, the incident rate is higher than reported by other hazardous sectors such as mining or basic chemical manufacturing (ILO

2020). The sector's high accident rate is because workers are exposed to many risk factors, including ergonomic conditions; being hit by or trapped between objects, slips, trips and falls; exposure to noise, vibrations, fire and other hazardous conditions; and hazardous substances (ILO 2020). The lean manufacturing system, which originated from the Japanese automobile industry, improves ergonomic outcomes provided it is implemented correctly and with sufficient social safeguards. An important aspect of the Japanese lean production system is the superior cooperation between labour and management, which stems from the existence of formal and informal institutions for consensus building, inculcation of shared expectations, and promotion of safety culture (Fairris and Tohyama 2002).

The industry also has a high unionization rate especially in developed economies. In many of the developing countries, trade unions need to be further capacitated and/or legal frameworks do not encourage unionisation.

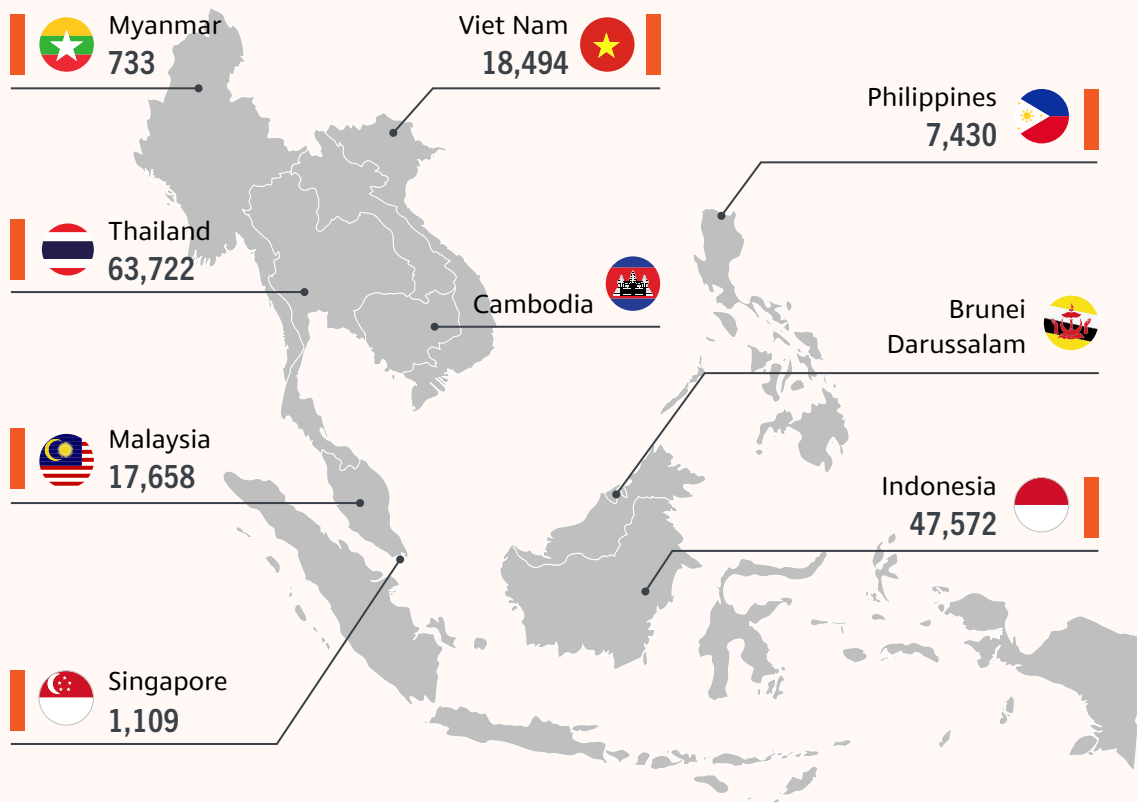
The movement restrictions in 2020 to curb the spread of COVID-19 was acutely felt by automotive manufacturers, who build vehicles on a just in time basis and depend upon a timely and uninterrupted supply of materials and components. Factory closures, supply chain disruption and diminishing demand in the automotive industry have taken their toll on the automotive workforce. Many employees took pay cuts and accepted shortened work schedules to avert industry-wide bankruptcy, while even more faced layoffs (Eichenberg 2021). Many of the Tier 1 companies negotiated collective agreements with their trade unions that provided compensation for quarantined workers and paid wages during the initial rounds of factory closure. As the industry responds and recalibrates to the impact of COVID-19 restrictions, it must focus on resilience, sustainability, and protecting workers.

Japan: generating decent work in this sector through responsible business practices

Decent work at a glance: Supply chain of Japanese automakers/auto part companies

Employment promotion

Number of direct employees in production bases of Japanese automakers/auto part companies in ASEAN countries, 2019



Direct employment: JAMA member companies

Direct employment: JAPIA members in ASEAN region: 516,250

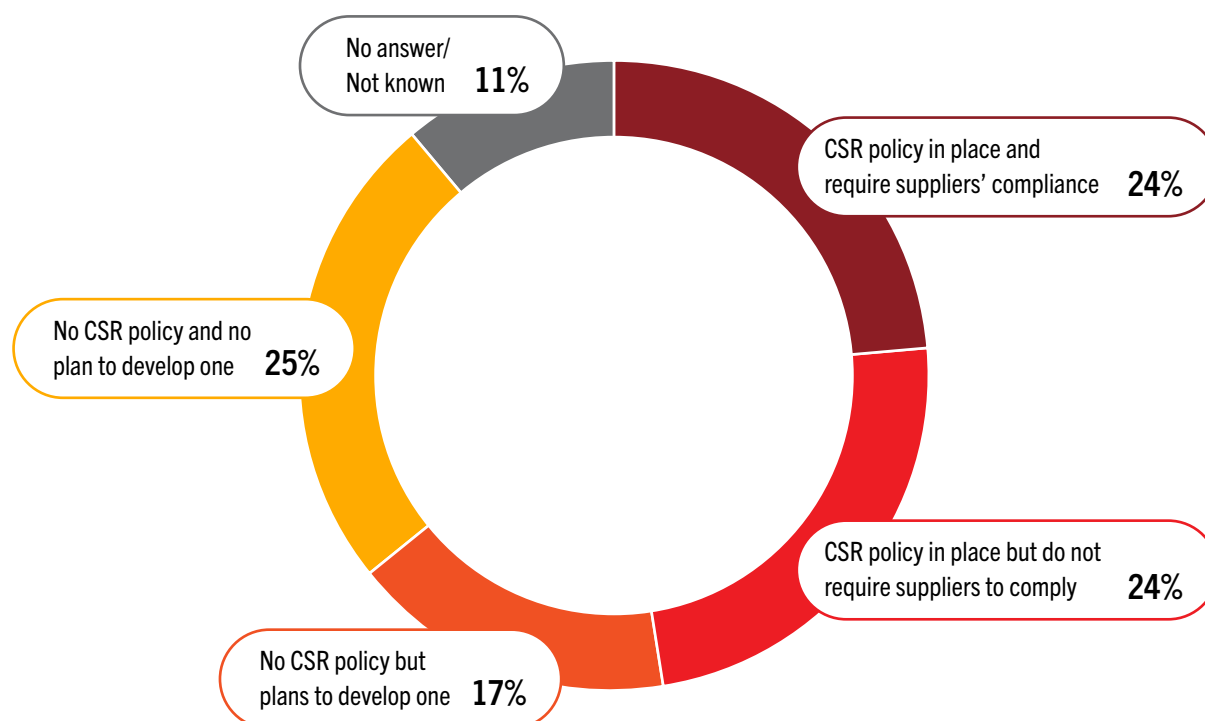
Japan is one of world's largest producer of automobiles, with 78 factories in 22 prefectures. In 2020, the automotive sector and related industries employed 5.49 million people (JAMA 2021). Of these, 670,000 people were employed in the auto parts and accessories manufacturing. The raw materials and equipment supply segments employed 467,000 people.

With economic globalization, the operations and corporate alliances of Japanese automotive manufacturers stretch across all continents, as does their market reach. To rapidly adapt to the needs of individual and regional markets, the Japanese companies establish domestic production operations, either as wholly owned subsidiaries or as joint ventures. Parallel to this, the Japanese multinational enterprises (MNEs) forge extensive alliances with overseas manufacturers.

Training	
Mitsubishi 2018 Thailand	Opening of Education Academy June 2018 saw the opening of the Pathum Thani Education Academy supporting sales and service education and training. Mitsubishi is especially dedicated to delivering the best possible customer service, and the Academy contributes significantly to the realization of that goal. The Academy currently serves 100-150 people each day, including service advisors, technicians, parts representatives, sales consultants, customer relations officers, and Mitsubishi Motors Thailand staff.
Mazda 1998–2019 Thailand	Support for internship programmes Built in partnership with local universities, the Auto Alliance Thailand (AAT) Internship Programme provides students with opportunities to gain knowledge and experience through on-the-job training. The programme, highly supportive of Ministry of Education initiatives intended to cultivate skilled workers, contributes to the development to Thailand's economy.
Daihatsu 2018 Malaysia	Expanding of educational facilities In May 2018, Perodua, a Daihatsu Joint-venture company, expanded its “Dojo” center, integrating existing plant educational facilities with human resource development. It also added new facilities, including the Karakuri Dojo, open to group companies and supplier staff. Perodua is proud to continue to work to enhance human resource development within the Malaysian automotive industry

Source: JAMA

Japanese production bases in ASEAN countries: promotion of responsible supply chain



Source: 2018 IDE-JETRO Survey

Japanese automakers overseas production bases: Number of plants by items produced, 2020

Territory/Country	Number of Plants				
	Motor vehicles and parts	Motorcycles and parts	Motor vehicles and motorcycles, including parts	Parts only	Total
Oceania				1	1
Middle East	2				2
Africa	19	3			22
Europe	22	2		6	30
North America	19	1		12	32
Latin America	20	11		7	38
Asia	108	46	4	62	220

Source: (JAMA 2021)

As of 2020, Japanese automakers had 345 plants worldwide broken down as follows: (i) motor vehicles including parts – 190; (ii) motorcycles including parts – 63; (iii) motor vehicles and motorcycles including parts – 4; and (iv) parts only – 88 (JAMA 2021). Asia is host to 64% of the plants of the Japanese MNEs. Among the countries in Asia, China had the highest number of Japanese production plants, followed by Indonesia and Thailand.

The operations of the Japanese automakers contribute to strengthening the economies of host countries through employment creation, local parts purchasing, and export revenue. The Japanese MNEs also bring in production, environment, and safety-related technologies. Based on publicly available data, a total of 156,718 people were directly employed at facilities owned by members of the Japan Automobile Manufacturers Association in ASEAN countries in 2019 (JAMA 2020). Members of the Japan Auto Parts Industries Association (JAPIA) reported a total of 1,475,000 employees in their overseas facilities in 2019, with 35% in the ASEAN region (JAPIA 2020).

Japan's National Action Plan on Business and Human Rights (NAP) was established in October 2020. The NAP is a policy strategy founded on, and seeking to implement the UN Guiding Principles on Business and Human Rights, as well as the proclamations from the Leaders' Declaration G7 Summit 2015 in Schloss Elmau, and the G20 Leaders' Declaration of 2017 in Hamburg. These documents emphasize the necessity of respecting human rights throughout the operation of business. Japan's NAP aims at ensuring policy coherence among the policies of relevant government ministries, promoting socially responsible business conduct, and reducing adverse impact on human rights. Responsible business conduct (RBC)/corporate social responsibility (CSR) has become an increasingly important construct for corporate strategies, notably in the Japanese automotive industry. The Japanese automaker companies play an important role in strengthening Asia's regional effort to bring human rights, labour and social environment concerns into business practices of the automotive industry in Asia.

Good socially responsible labour practices

Examples of how CSR policies of Japanese MNEs are implemented and cascaded across their Thai subsidiaries and suppliers

THAI NOK:

The company employs Thai people in management positions, and localises the operation as much as possible. Eighty percent of its general managers are Thai. These managers are extensively trained, and accordingly have a good understanding of the NOK corporate philosophy, as well as its CSR policy. The policy is adapted to local context, and sensitization activities such as participatory setting of targets are conducted. The policy is disseminated in a variety of ways, such as the use of self-help videos, dramatic enactments, and songs to ensure that employees hear and understand the messages.

The Thai management and workers were encouraged to proactively implement CSR policies with occupational safety and health as the starting point and cornerstone. Through social dialogues, other components of the CSR policy were incrementally implemented.

SIAM DENSO MANUFACTURING AND DENSO THAILAND:

The company helped suppliers to improve their working conditions through the Quality, Cost and Delivery (QCD) program, parallel to building trustful relationships. It also established a system for sharing critical information based on an agreement with the top management of the supplier, as well as a reward system for their suppliers.

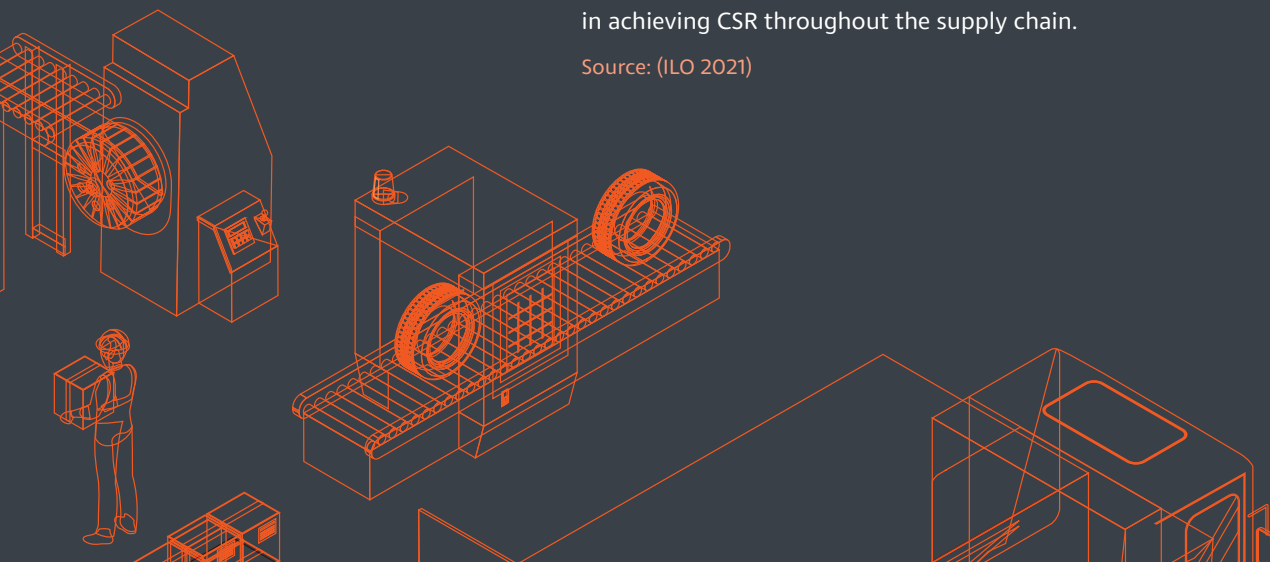
Trustful and transparent relationships encouraged suppliers to work on occupational health and safety as required by the CSR guidelines at the head office. Through a bottom-up approach from the workplace, the local supplier detected problems relating to human rights and labour, as well as safety and quality at an early stage. This allowed for suppliers to operate the business while working towards improvement, and operate paying attention to the rights of workers.

SIAM NGK SPARK PLUG:

The CSR policies of the company help create a “clean” corporation, and thus promote good social impact to the Thai local community and sustainability of the company. Key concepts of this company’s policy are thus contributing to the local community, and horizontal implementation of CSR procurement guidelines.

In all the companies covered by the study conducted by ILO and IDE-JETRO in 2019 to assess how Japanese companies cascade their CSR policy to their Thai subsidiaries, employees and trade unions were the most critical stakeholders in achieving CSR throughout the supply chain.

Source: (ILO 2021)



While there are exemplary CSR initiatives, the following key findings from the 2018 survey¹ of 814 Japanese automotive companies worldwide conducted by the Institute of Developing Economies of Japan External Trade Organization (IDE-JETRO) indicate that effectively embedding commitment to responsible supply chains is still a work in progress for many of the companies:

- About 60.4% of the respondents had a CSR policy, with the highest percentage among locators in Western Europe, followed by South Africa. The ASEAN region had the lowest percentage of respondents (55.7%) with a CSR policy.
- Only 28.5% of respondents require suppliers to have policies on labour, occupational safety and health (OSH), and environment. Similarly, less than 30% of the respondents required suppliers to comply with their CSR policies, with the lowest percentage from the ASEAN region and Southwest Asia.

- While less than a third of the respondents required compliance from suppliers, about 53.3% indicated that they followed customers' policies on labour, OSH, and the environment. The ASEAN region had the highest percentage of respondents (56.9%) who said that they adhere to buyers' CSR policies.
- Only 9.6% of the respondents recognised the ILO MNE Declaration while 16.1% recognised UN Guiding Principle on Business and Human Rights. Japanese companies, particularly those in the ASEAN region, presented more cognizance about local labour laws than international instruments.

The 2019 ILO and IDE-JETRO study and multi-stakeholder dialogues organized by the programme identified the following opportunities and challenges in the promotion of responsible supply chains among Japanese MNEs and their Thai subsidiaries:

Opportunities and challenges in promoting responsible supply chains

Opportunity	Challenges
■ OSH can be a good entry point for the promotion of CSR in factories of Thai subsidiaries. The processes established to promote OSH and the trust between employees and management facilitate the incremental expansion of CSR initiatives. ■ The trust and close communication between subsidiaries of Japanese vehicle parts companies and suppliers cultivated through the promotion of QCD can lay the groundwork for CSR initiatives. ■ Constructive dialogue between management and employees can facilitate the development of trust, which is important in instilling workers' commitment to CSR policies. ■ Trade unions can help steer and shape CSR initiatives at the workplace. ■ Adaptation of CSR policies of Japanese MNEs to local context can help develop a stronger sense of ownership, which will alleviate any potential perceptions of outwardly-imposed requirements. ■ There is strong harmony between existing practices in Japanese supply chains and key elements of the ILO MNE Declaration. For example, industrial relations built on mutual respect, along supply chains. Tripartism is also well rooted in Japan. ■ Companies are taking proactive steps to address the risks related to the COVID-19 crisis in a way that mitigates adverse impacts on workers and supply chains.	■ Headquarter offices of Japanese MNEs have limited information on decent work challenges in workplaces of subsidiaries. ■ Value chain governance in the realm of socially responsible labour practices appears to be weak in many of the Japanese automotive supply chains. While the OEMs know their direct first-tier suppliers very well, the "tier n" suppliers in most cases are generally rather unknown, especially in the case of sub-suppliers from multiple tiers of the supply chain. ■ Limited knowledge on tools and processes to effectively cascade socially responsible labour practices across all functions in the supply chain. ■ High costs involved in assessing and monitoring suppliers. Suppliers may also be serving various buyers and sectors. ■ Weak appreciation of benefits of socially responsible labour practices and CSR in general, particularly among lower tier suppliers. ■ Limited awareness and understanding of International Labour Standards and instruments. ■ Discrepancies between international regulation and laws on RBC/CSR and the limited capacity of governments of host countries to ensure compliance.

1 https://www.ide.go.jp/library/Japanese/Research/Project/2018/pdf/2018110007_06.pdf

The way forward

The ILO MNE Declaration

Corporate social responsibility (CSR) as defined by the International Labour Organization (ILO) is “a way in which enterprises give consideration to the impact of their operations on society and affirm their principles and values both in their own internal methods and processes and their interaction with other actors.” The main guiding instrument regarding the labour dimension of CSR or responsible business conduct (RBC) is the ILO Tripartite Declaration of Principles Concerning Multinational Enterprises and Social Policy (MNE Declaration), which was adopted in 1997 and most recently updated in 2017. The MNE Declaration sets out principles in the fields of general policies, employment, training, conditions of work and life and industrial relations which governments, employers ‘and workers ‘organizations and multinational and national enterprises are recommended to observe on a voluntary basis.



How a company relates with its workers, suppliers, host communities, and the marketplace can greatly contribute to the sustainability of its business success. For companies to stay productive, competitive, and relevant in the face of rapid globalization, they have to become environmentally viable and socially responsible. Labour related CSR entails companies taking responsibility for their impacts on decent work throughout their operations and with their business partners and identifying ways to enhance their positive contribution to decent work in dialogue with their workers, suppliers, host communities, and buyers. Responsible businesses create social value by addressing needs and challenges of their stakeholders while simultaneously creating their own economic value.

The RSCA programme organized various events to encourage policy discussions, as well as exchanges of experiences and good practices on promoting CSR and RBC in the supply chains of Japanese companies. Events such as multi-stakeholder dialogues and webinars included high level participants and representatives from the following: (i) Government: Ministry of Foreign Affairs, Ministry of Health, Labour and Welfare, Ministry of the Environment, Ministry of Economy, Trade and Industry; (ii) European Commission; (iii) Japan Auto Parts Industries Association (JAPIA); (iv)

Japan Business Council in Europe; (v) Academe/ research organization: Sophia University, Waseda University and Asia Pacific Institute of Research, Kansai University; (vi) CSO Network in Japan' (vii) IDE-JETRO; and (viii) experts on CSR and RBC. These discussions identified key policy recommendations, which aim to create a cascade of socially responsible labour practices that flow throughout the Japanese automotive supply chains in Asia, with a view of 'building back better' by advancing decent work in the COVID-19 recovery of the sector. These policy recommendations are outlined below:

Policy recommendations	Stakeholder
a) MNEs, in collaboration with civil society organizations (CSOs), should Strengthen the capacity of suppliers across all tiers to conduct supply chain mapping, enhance visibility and traceability of their supply chains to facilitate the identification and assessment of human rights risks and decent work deficits.	■ MNEs ■ CSOs
b) ILO and other international development partners, in partnership with government, MNEs, and CSOs, should build the capacity of suppliers across all tiers to implement socially responsible practices in supply chain management. This can include the following interventions: ■ Development of a due diligence system, processes, and tools that can be shared across suppliers and companies to ease the burden of compliance and facilitate sharing of emerging good practices. Parallel to this, build capacity of enterprises to integrate due diligence findings into procurement and other business decisions. An important element of the due diligence process should be the evaluation feedback to suppliers to promote harmonized understanding of the expectations of the company, and provide suppliers the directions for improvement, and motivate suppliers to improve performance. ■ Developing and/or strengthening platforms (e.g., roundtable discussions, web portals, social dialogues, etc.) to facilitate information sharing and discussions, where companies, trade unions, providers, and governments can acquire CSR/RBC knowledge such as the fundamental concepts and guidelines, practical implementation measures, outcome measurement, etc. These information sharing and discussion platforms can also provide opportunities to collectively address systemic risks present in supply chains spanning Asia. Social events and creative media may also be good ways to sensitize suppliers across all tiers on RBC/CRS, building trustful relationships, and creating a shared sense of commitment to socially responsible supply chains. Bringing together supply chain actors and stakeholders, including government and trade unions, can help facilitate the development of consensus-based norms aligned with International Labour Standards, and reduce tension caused by differing understanding and interpretations of standards. (cont. on next page)	■ ILO ■ Other international development partners ■ Government ■ CSOs ■ MNEs ■ Trade unions

Policy recommendations	Stakeholder
■ Providing training and technical assistance to suppliers and trade unions to enable them to actively participate in upgrading CSR/RBC implementation at their workplaces. It is important to identify relevant issues that market actors readily connect with (e.g., OSH, conditions of work, freedom of association, etc.) as entry points for establishing dialogue on CSR upgrading, and to catalyse action. By linking the benefits of socially responsible labour practices to priority issues and developing an understanding of the impacts each actor could have on the whole supply chain, actors across the different tiers and functions of the supply chain can be encouraged and motivated to work together ■ Developing the capacity of providers (civil organizations, academe, private providers, financial services providers) to provide services necessary for companies to upgrade CSR/RBC implementation.	
c) Governments and industry associations should design and implement schemes that identify and reward companies implementing socially responsible labour practices. Parallel to this is the need for harmonized and transparent assessment and reporting instruments and standards, which will reduce the reporting burden on enterprises, as well as facilitate the building of a solid business case for CSR. This may require the support of ILO, other international development partners, and CSOs specialized in labour and human rights.	■ Government ■ MNEs ■ ILO ■ Other international development partners ■ CSOs

For more information:

MNE Declaration web portal – www.ilo.org/mnedeclaration

ILO-OECD-OHCHR responsible Supply Chains in Asia: Thailand - https://www.ilo.org/asia/projects/WCMS_678345/lang--en/index.htm

Labour Standards in Global Supply Chains: An ILO training module for SMEs and other enterprises
https://www.ilo.org/wcmsp5/groups/public/---asia/---ro-bangkok/documents/instructionalmaterial/wcms_725761.pdf

ILO Helpdesk for Business on international labour standards (www.ilo.org/business)
How to align corporate policies and practices with International ILS and build good industrial relations

Tripartite Declaration of Principles concerning Multinational Enterprises and Social Policy
https://www.ilo.org/wcmsp5/groups/public/---ed_emp/---emp_ent/--multi/documents/publication/wcms_094386.pdf
https://www.ilo.org/wcmsp5/groups/public/---asia/---ro-bangkok/documents/publication/wcms_684935.pdf

Responsible Business: Key Messages from International Instruments
https://www.ilo.org/wcmsp5/groups/public/---asia/---ro-bangkok/documents/publication/wcms_724747.pdf

Labour Issues in CSR: Examples from the ILO Helpdesk for Business Q & A
https://www.ilo.org/wcmsp5/groups/public/---asia/---ro-bangkok/documents/instructionalmaterial/wcms_740229.pdf

ILO company-union dialogue facilitation
https://www.ilo.org/empent/areas/mne-declaration/WCMS_572115/lang--en/index.htm

Measurement for the employment and labour-related impacts of the Multinational Enterprises (MNEs)
https://www.ilo.org/wcmsp5/groups/public/---ed_emp/---emp_ent/--multi/documents/publication/wcms_620788.pdf

The ILO MNE Declaration: What's in it for Workers?
https://www.ilo.org/wcmsp5/groups/public/---ed_dialogue/---actrav/documents/publication/wcms_627351.pdf

Engaging multinational enterprises on more and better jobs
http://www.oit.org/wcmsp5/groups/public/---ed_emp/---emp_ent/--multi/documents/publication/wcms_175477.pdf

Responsible business -- labour standards in global supply chains
<https://www.itcilo.org/courses/responsible-business-meeting-labour-standards-global-supply-chains> - rolled out together with the ILO SCORE programme, targeting SMEs in global supply chains (enhance manager-workers workplace cooperation)

The future of work in the automotive industry : The need to invest in people's capabilities and decent and sustainable work
https://www.ilo.org/wcmsp5/groups/public/---ed_dialogue/---sector/documents/meetingdocument/wcms_741659.pdf

ASEAN in transformation Automotive and auto parts: Shifting gears
https://www.ilo.org/wcmsp5/groups/public/---ed_dialogue/---act_emp/documents/publication/wcms_579557.pdf

COVID-19 and the automotive industry
https://www.ilo.org/wcmsp5/groups/public/---ed_dialogue/---sector/documents/briefingnote/wcms_741343.pdf

Technical meeting on the future of work in the automotive industry
https://www.ilo.org/wcmsp5/groups/public/---ed_dialogue/---sector/documents/meetingdocument/wcms_821994.pdf

Responsible Supply Chains in Asia (RSCA) Programme in Japan

www.ilo.org/rsca

The “Responsible Supply Chains in Asia” (RSCA) programme (RAS/16/13/EUR) is a programme developed by the European Union together with the International Labour Organization (ILO) and the Organisation for Economic Co-operation and Development (OECD). The programme promotes corporate social responsibility (CSR) / responsible business conduct (RBC) with regard to the environment, decent work and the respect of human rights.

This initiative is a part of the EU’s long-standing commitment to promote human rights, decent work and sustainable development, a pledge underpinned by the EU Treaties and reinforced in the European Commission’s trade policy strategy of 2015 “Trade for All”. It falls in particular under the Commission’s commitment to identify opportunities for responsible supply chain partnerships and the EU’s strategic approach to responsible business conduct, which is based on internationally agreed principles and guidelines. It will also contribute to the EU strategic approach to CSR/RBC as put forward in the Commission 2011 Communication “A renewed EU strategy 2011-14 for Corporate Social Responsibility.”

The four-year programme (2018-2021), carried out in collaboration with Japan, China, Myanmar, Philippines, Thailand and Vietnam, has two broad objectives to:

- a) Promote smart, sustainable and inclusive growth by ensuring that investors and businesses have a better understanding of corporate social responsibility;
- b) Create policy environments conducive to promoting responsible business conduct and increased opportunities for dialogue.

The programme in Japan is making an impact in a number of areas, including through:

Engaging with industry bodies, including Keidanren and the Japan Electronics and Information Technology Industries Association (JEITA), to survey awareness and implementation of responsible business practices in the business supply chains.

Presenting the programme’s aims and tools to key Japanese Union bodies and cooperatives, including workshops with the Japanese Trade Union Confederation (RENGO), and the Japanese Consumers’ Cooperative Union (JCCU) as well as industry groups and research institutions.

Partnering with leading institutions for joint collaboration in Japan as well as in countries with Japanese MNEs, including with IDE –JETRO for research and outreach as well as the translation of key materials and guidance on responsible business practices into Japanese.

Working with Universities in order to influence the professional development of future leaders on responsible business practices.

Holding dialogues with groups such as the Global Compact Network Japan and the CSO Network Japan to include the perspective of business and civil society in policy formulation and training curricula.

References

- Chantapong, Saovane, and Chadatan, Osatis. 2020. *Reversing a Crisis In The Thai Automotive Industry Through Upskilling The Labour Force*. Bank of Thailand.
- Duke CGGC. 2016. *The Philippines in the Automotive Global Value Chain*. Duke University Center on Globalization, Governance & Competitiveness.
- Eichenberg, Paul. 2021. *One Year Later: COVID's Long-lasting Impact on the Auto Industry*. 18 March. Accessed October 25, 2021. <https://www.qad.com/blog/2021/03/one-year-later-covids-long-lasting-impact-on-the-auto-industry>.
- Fairris, David, and Hironori Tohyama. 2002. "Productive Efficiency and the Lean Production System in Japan and the United States."
- ILO. 2021. *Summary Report: JETRO Institute of Developing Economies – International Labour Organization Joint Webinar Advancing Responsible Labour Practices and Sustainability in Global Supply Chains-Learning from Japanese Vehicle Parts Companies in Thailand*. International Labour Organization.
- ILO. 2021. *The future of work in the automotive industry: The need to invest in people's capabilities and decent and sustainable work*. International Labour Organization.
- ILO. 2020. *The future of work in the automotive industry: The need to invest in people's capabilities and decent and sustainable work*. International Labour Organization.
- JAMA. 2020. *Japanese Automakers in ASEAN 2019-2020*. Japan Automobile Manufacturers Association, Inc.
- JAMA. 2021. *The Motor Industry of Japan 2021*. Japan Automobile Manufacturers Association, Inc.
- JAPIA. 2020. *Research on Overseas Operations by Member Companies (FY2019)*. Japan Auto Parts Industries Association.
- Kulkolkarn, Kiriya. 2019. *Impact of Transition to Electrical Vehicles on Workers in Auto-parts Manufacturing*. Friedrich-Ebert-Stiftung.
- Rastogi, Vasundhara. 2018. *Thailand's Automotive Industry: Opportunities and Incentives*. 20 May. Accessed November 30, 2021. <https://www.aseanbriefing.com/news/thailands-automotive-industry-opportunities-incentives/>.
- Weerasombut, T. 2017. *Problems and Solutions for Labor Management in Thai Automobile Suppliers*. Journal of HRintelligence.
- Yamada, Miwa, and Naomi Inoue. 2019. *Responsible Supply Chains in Vehicle Parts Industry: Case Studies and Challenges*. International Labour Organization and IDE-JETRO.
- Yongpisanphob, Wanna. 2020. *Industry Outlook 2020-2022: Auto Parts Industry*. 10 September. Accessed October 25, 2021. <https://www.krungsri.com/en/research/industry/industry-outlook/Hi-tech-Industries/Auto-Parts/IO/Industry-Outlook-Auto-Parts>.
- Zhang, Ganyi. 2021. *Thailand: An Emerging Regional Manufacturing Hub for electric vehicles*. 15 March. Accessed December 1, 2021. <https://market-insights.upply.com/en/thailand-an-emerging-regional-manufacturing-hub-for-electric-vehicles>.