The first industrial revolution was the mechanization of the manufacturing and processing industry. The second revolution was the introduction of assembly line and electricity, which catered to mass production. The third industrial revolution was using automation. What is the fourth industrial revolution? Well, it is the coming of connectivity between machines that aims to operate efficiently with less human error, with the introduction of smart systems like Internet of Things (IoT) and Artificial Intelligence (AI), Industry 4.0 is in line with Goal #9 of the Sustainable Development Goals, which is to build resilient infrastructure, promote inclusive and sustainable industrialization and foster innovation. It is also in line with Goal #12, which ensures sustainable consumption and production patterns. Almost every country is preparing for the revolution, including Malaysia. However, like many great things, the road to achieving it is definitely challenging.

Challenges Malaysia faces in terms of Industry 4.0 include lack of awareness towards the need for Industry 4.0, which is due to a lack of centralized and easily accessible information. Funding is also a big hurdle to tackle as Industry 4.0 business requires higher costs, and funds are scarce for some business owners. Due to lack of funding and awareness, Malaysia also has a significant gap towards development of skills and infrastructure. When skills and infrastructure, especially in the digital and smart industry aspect, are outdated and limited, it becomes harder for Malaysia to strive for Industry 4.0. Another significant challenge would also be the lack of governance and ecosystem support. Currently, there is no proper mechanism that is aimed to guide Malaysia towards Industry 4.0. This is where the government is going to take charge.

To tackle said challenges, the government has introduced the National Policy on Industry 4.0, also known as Industry4WRD. This policy has 4 specific goals to achieve by 2025: to increase productivity by 30% in the manufacturing sector; to elevate the contribution of the manufacturing sector, from RM254 billion to RM392 billion; to improve our innovation capabilities, and be a part of the top 30 nations; and lastly to increase the number of highly skilled workers from 18% to 35%.

Industry4WRD has 3 objectives in realizing the Industry 4.0 dream: attracting stakeholders; creating the right ecosystem; and transforming Malaysia’s industry capabilities. How does the policy achieve these goals and objectives? The Government has formulated the F.I.R.S.T action plan: an action plan...
that includes funding (F); enabling ecosystem and efficient digital infrastructure (I); regulatory
framework and industry adoption (R); upskilling existing and producing future talent (S); and access to
smart technologies and standards (T). Each aspect has its own set of strategies that involves multiple
stakeholders like ministries and regulatory bodies including MCMC and Bank Negara working together
towards the development of Industry 4.0 and to encourage SMEs in Malaysia to be part of Industry
4.0.

The Malaysian government has high aspirations for the local industry and its adoption of Industry 4.0
in their everyday operations. The relevant stakeholders must rise up to the call of the government and
collaborate to create an ecosystem that fully adopts Industry 4.0 as well as propagates its advantages
for the country to fully embrace the wave of the future together.

The Ministry of International Trade and Industry (MITI) is driving the Industry4WRD initiative to
transform the manufacturing industry in Malaysia towards Industry 4.0 adoption. To find out how you