

# **China's rise to the world stage: how China's manufacturing industry is adapting in the face of failure and the implications of change for multinational enterprises**

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# China's Rise to the World Stage: How China's Manufacturing Industry is Adapting in the Face of Failure and the Implications of change for multinational enterprises

Wyatt Matthews

## ABSTRACT

For decades, China has been the world's exporter of cheap goods, with a market that is dependent on the business of developed economies. The central idea of this paper argues that China's manufacturing industry has outgrown its comparative advantage in cheap manufacturing, as variable cost drivers increase with time. This has occurred through a rise in education, wage expectation, and environmental regulation, which are all correlated results of a growing industry and economy. The imposing pressure of these factors have created stress for multinational enterprises and the domestic Chinese economy alike. It is argued that the manufacturing industry must transition to an independent innovator of highly sophisticated and technologically advanced goods. 'Made in China 2025', a government lead initiative to develop the manufacturing industry, is likely the solution to such a needed transition. This initiative has proven, however, to stoke U.S.-China tensions and was a significant contributor to the trade war. Regardless of how capable China may be of achieving such a transition, the fate of its standard manufacturing practices, and the implications its failure could pose on multinational enterprises, are top of mind. Through analysing an assortment of primary and secondary works, with news articles to supplement, this paper seeks to provide a conversation regarding how the manufacturing industry has grown, and where it currently stands in the midst of an ambitious transition within the context of global competition and cost feasibility.

## INTRODUCTION

China has a rich and expansive history, but its relationship with globalization and the acceptance of foreign capital began only 40 years ago. China is often viewed with awe, as a nation whose economic growth and rise to the world stage is mystifying. Up until now, the country has enjoyed consistent and continued growth, largely in part to their world-leading manufacturing industry. In the past decade, it has become clear, however, that continued dependence on its current position in the manufacturing industry is no longer feasible. The nation's impressive economic growth is giving way to the increased costs associated with rising education rates, wage expectations, and environmental regulations. As these cost drivers increase, China's place in the cheap manufacturing sector is becoming less competitive against the global market. This paper will discuss how these factors have come to fruition, and further, how China's 'Made in China 2025' is a possible solution that will bring mainland manufacturing into a continuous, saleable, future. Additionally, this paper will discuss how China's manufacturing transition has played a lead role in the U.S.-China trade war and how such a conflict impacts the industry. Through evaluating geographic competitors and examining how this major rift impacts economic regions, firms, and brands, this paper

will arrive at an in-depth analysis of how China's manufacturing industry is adapting in the face of failure and the implications of change for multinational enterprises.

## THE HISTORY OF CHINA'S RISE AND THE BIRTH OF DOMESTIC MANUFACTURING

### **After the leap**

Mao Zedong, the first Chairperson of the People's Republic of China (PCBOC), was responsible for the economic policy famously coined by the Republic as the 'Great Leap Forward' (GLP) (Chan, 2001). The GLP's mission was to mobilize the Chinese proletariat in a rapid, 'all hands on deck' effort to transition China from an agrarian society to a socialist industrial state (Chan, 2001). This comprehensive development policy was to be rapid and accomplished without involvement from foreign markets. What resulted was shocking and traumatic to China's economy and people. An estimated 15 to 46 million people died in the peak of the disaster, between 1958 and 1961 (Chan, 2001). Until the late 1970s, under Mao's leadership, a private company was viewed as an enemy to the state and therefore prohibited (Lai, 2006). Mao's reign was the last true representation of textbook communism and sole-state self-reliance in China.

After the 1970s and Mao's fall, China began to open its doors to the rest of the world (Lai, 2006). The reasons for China's opening are extensive, but can be largely summarised by three elements: the value of trading domestic natural resources, interest in state performance on a global scale, and desire for foreign investment capital (Lai, 2006; Gittings, 2005). It was these factors which inspired the Republic Leader, Deng Xiaoping, to historically open China's doors to the global market in 1978, forever altering its future (Gittings, 2005). This was the beginning of China's journey to globalization and led to its eventual place on the world stage as seen today (Gittings, 2005). What resulted was private foreign businesses taking a significant stake in the market, along with state-owned enterprises (SOEs) and mixed ownership firms (Lai, 2006).

### **A timeline of the rise of manufacturing in China**

China opening to private enterprise and foreign direct investment (FDI) is the largest contributor to its place on the world stage today. In the span of just 20 years, between 1980 and 2000, China went from exporting \$18 million USD to \$240 billion USD respectively (Zhang K. H., 2006). This brought China from a world ranking of 26 to seventh in terms of top exporting nations (Zhang K. H., 2006). Today, in 2019, only nineteen years later, China is the world's largest exporter with a total of \$2.494 trillion USD, exceeding America by \$829 billion and Germany by \$937 billion (Workman, World's Top Export Countries, 2019).

In a report on China's manufacturing sector, Lianshui Li and Zhanyuan Du (2016) assert that in "...2010, the total output value of China's manufacturing sector was 60.96 trillion yuan, which was 11 times as much as that in 1995" (p. 4). It is further stated that transportation equipment, computers and other electronics, as well as metal smelting equipment, compose the manufacturing industry's largest outputs (Li & Du, 2016). By 2016, China had become the world's largest manufacturer (Li & Du, 2016).

On the topic of how increased wages are affecting China's economy, *Winners and losers from a commodities-for-manufactures trade boom*, performed in the Journal of Economics, states that "The OLS [linear regression] estimates...suggest that larger export demand shocks are associated with higher growth in wages over these ten years" (p. 59). This study later identifies that such a supply shock disproportionately impacts the manufacturing industry in China (Costa, Garred, & Pessoa, 2016). Labour

size is controlled in these calculations with an assumed age range between 18 and 60 years old, with 60 years old being the mandatory retirement age for men and 50 years old for women (TRADING ECONOMICS, 2019).

Despite China's consistent economic growth, manufacturing's contribution to China's total GDP between 2006 and 2018 has been consistently decreasing, as seen in Figure 1 (The World Bank, 2019). These contributions have gone from 32.45% to 29.41% respectively (The World Bank, 2019). It is highly likely that this 3.03% contribution drop is due to both exponential growth of other emerging industries, and the aforementioned export demand shock suffered due to the rising wage expectations (The World Bank, 2019; Costa, Garred, & Pessoa, 2016).

On an all-industry level, China's workforce employed by SOE's between the late 1970s and 2005 fell dramatically, by 54% (Brandt & Rawski, China's Great Economic Transformation, 2008). This brought state sector employees from a high of 78% in 1978, to a low of 24% in 2005 (Brandt & Rawski, China's Great Economic Transformation, 2008). Such a dramatic shift of labor dependence from state to private sectors shows how dependant labor is becoming on private enterprise. Further, this indicates that the growing portion of labour under private employment is now exposed to the risks associated with fluctuations in China's cost comparison to other countries and how private firms react to supply shock.

### Foreign multinational use of manufacturing in China

It is important to understand China's major relationship with foreign nations and economic unions to attain a better understanding of how China serves its global partners. In the context of China's relationship with the United States and the European Union, it is also pertinent to understand how the U.S.-China trade war impacts these relationships.

Figure 1: China's manufacturing industry as a percent contribution to GDP (2004-18)



(The World Bank, 2019)

Unsurprisingly, America is China's largest export partner, trading \$479 billion in 2018, or over 19% of China's total exports (Workman, China's Top Trading Partners, 2019). The existence of low production and cost efficiency in America has caused production to be exported to China (Hombert & Matray, 2018). It is difficult to measure China's true, consistent, export trade capacity with the United States in light of the

recent trade war. Since the beginning of the trade war in March 2018, tariffs of 15% and higher have been imposed bilaterally between the nations, with a specific focus on production exports of raw metal materials from China (Liu, 2018). The trade war was largely started as a measure by the United States to protect domestic jobs, as well as a reaction to 'Made in China 2025', which will be discussed later in this paper (Liu, 2018). What the future holds for U.S.-China export trade in a post-trade war climate can only be speculated. Scholar Alexander Lukin argues that there will likely be no significant changes in the near future (Lukin, 2019).

It is also critical to analyse the Chinese export trade relationship with the European Union (EU) firms, as they are a significant trade partner. Interestingly, as a result of the negative impact from the U.S.-China trade war, the EU has experienced accelerated export trade with China as it becomes more expensive to export to the United States (Mau, 2017). Over the past ten years, the EU's participation in importing manufactured goods from China has fluctuated, but has remained on an upward trend (TRADING ECONOMICS, 2019). As of September 2019, China's exports to the EU are just over \$36 million USD. EU firms that operate export and trade activities within China, however, have been adversely affected by this trade dispute, in contrast with the benefit EU firms have enjoyed in their respective domestic markets (DW, 2019).

Historic use of China's transitioning economy for cost-effective production is also popular in Japan. According to the Japanese External Trade Organization (JETRO), as of 2001, 54.4% of Japan's off-shore production activities, for both technology and labour-intensive production, are hosted in mainland China (Zhang K. H., 2006). Interestingly, before the 1990s, China only received 5% of Japanese off-shore, Asian, production activities. Kevin Zhang (2006), of the *Studies in the Growth Economies of Asia Series*, argues that this rapid increase is due to the "...flying-geese theory... [where Japan's] economic development at a high-level result in the migration of mature industries, especially those in which labor costs are critical for competitiveness, to less developed economies" (p. 118). This idea of developed nations using China as a low-cost option for manufacturing is common among multinational enterprises (MNE)s in market economies across the globe. The stressed importance around the cost for competitiveness is cause for concern as the cost of labour in China gradually increases.

## CHINA REIMAGINED

As China approaches its transition in the world economy, a plurality of factors disrupting its pre-transition activities and strengths can be observed. Namely, the nation's tremendous growth has seen the rise of average education and wage expectations. It is critical to discuss these trends in order to arrive at an understanding of what the possible implications are for the future of manufacturing in China. Additionally, it is equally impactful to evaluate 'Made in China 2025,' China's likely response to keep manufacturing competitive in the post-transition Chinese economy.

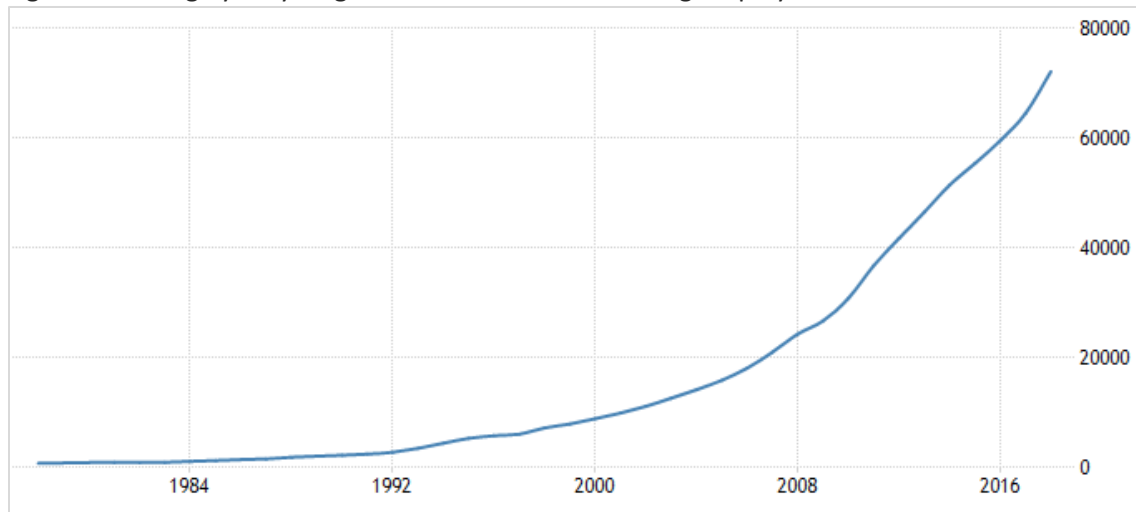
### **Growing education and wage expectations**

In a sample study performed in 'China's Great Economic Transformation,' Loren Brandt and Thomas Rawski preformed a test comparing the rate of those without a basic level of education among a group of sample populations. As of 2000, 51% of males in the 60-year-old range were without education (Brandt & Rawski, Education in the Reform Era, 2008). In the same year, males without formal education was at 18% for 20-year-old males and a staggeringly low 6% for 10-year-old males (Brandt & Rawski, Education in the Reform Era, 2008). Similar statistical results were observed in the female test populations. This

generational snapshot taken in 2000 paints a picture of the tremendous rise in the education of Chinese citizens who, in the coming decades, will comprise a significant majority of the domestic labour market. As of 2018, 7.5 billion students have graduated from Chinese post-secondary institutions – without respect to foreign graduates in China and Chinese graduates abroad (Han, 2019). Currently, the top five most-graduated majors are: medicine, economics, computer science, technology, and business administration (China Schooling, 2015).

It is natural to see wage expectation rise, incrementally, with the increased value of labour output as a result of higher education. The increased cost associated with this phenomenon has put tremendous strain on foreign business activities, distinctively so for the manufacturing sector (Zheng, Zhao, & Li, 2019). A news article from the International Business Times cites that for the last decade, wages have consistently increased by more than 10% each year (Zhang M., 2013). Figure 2 illustrates just how steeply average yearly wages have increased in the manufacturing industry between 1969 and 2019 (TRADING ECONOMICS, 2019). In 2015, Microsoft relocated production of their handsets as a direct result of this cost increase (Zheng, Zhao, & Li, 2019). Tengfei Zheng, Yao Zhao, and Jiarong Li (2018) cited that “world famous enterprises such as Panasonic, Sharp, TDK, Nike, Foxconn and Samsung have set up new factories in Southeast Asia and India” (p. 583). With more developing nations available for low-cost production, China is struggling to stay competitive, and its increased cost resulting from average wage is not helping. The rise of wage expectations is not just having a negative impact on the cheap labor market. Job-seekers are experiencing a unique struggle as well. In a proprietary study by Yang Po on earning expectations of post-graduation employment, it was found that many students are struggling to meet their wage expectations due to both educated labour competition, and lack of demand for such labour (Po, 2011). Po further asserts that many Chinese graduates have to take a material pay cut after graduation to find employment within their first six months of graduation (Po, 2011).

Figure 2: Average yearly wage increases of manufacturing employees from 1969 to 2019 in CNY/Year



(TRADING ECONOMICS, 2019)

### Birthed in necessity – Made in China 2025

An *under-developed whirlpool* is a state in which a transitioning economy struggles to establish its independent niche in the global market (Popkova & Sukhodolov, 2017). This hinderance is not achieved by a limit of resources, but instead by a limit of time (Popkova & Sukhodolov, 2017). As China was late in

opening to the world economy, it found its niche in serving developed economies with cheap forms of production and manufacturing (Popkova & Sukhodolov, 2017). This, however, is not a means to an end if China's goal is continued growth and market economy dominance. It is argued by Elena G. Popkova and Yakov A. Sukhodolov in a 2017, that the only way out of such a whirlpool is by "...creating the emergence of new circles of development that are based on new innovational cycles" (p. 18). China's manufacturing industry is taking large strides in the pursuit of developing these innovation cycles, as seen by the industry's 377.133 billion yuan investment in research and development, as well as the filing of over 100,000 patent applications in 2010 alone (Li & Du, 2016). 'Made in China 2025' and the biomedical and electric vehicle sectors in which it supports are the most likely innovation cycles to bring China out of its whirlpool and into an unhindered, scalable, future.

### **Made in China 2025**

Just 57 years after Mao Zedong's 'Great Leap Forward', China is introducing another ambitious economic policy, and they couldn't look more different from each other. China's solution to uncertainty in the manufacturing industry, with respect to future positioning and growth, is the 'Made in China 2025' (MIC) economic reform plan (Ling, 2018).

MIC was born out of the realization that serious infrastructure and investment would be required to transition the manufacturing industry past its dependence on serving the world's market economies with cheap, low-cost goods and labour (Ling, 2018). MIC was established in 2015 and aims to develop the Chinese manufacturing market past these low-cost commodities and industrial exports, to high-end, high-tech goods (Cyrill, 2018). This plan is in direct reaction to the growing income of the average Chinese consumer and aims to, in part, serve a wealthier consumer base, both domestically and abroad (Cyrill, 2018). MIC is not just consumer facing, however, and aims to develop high-tech production in the B2B space, taking advantage of enterprise growth locally and globally (Cyrill, 2018). Some of the industries named in the MIC plan include: medical devices, computing, electric vehicles, aerospace equipment, and oceanic navigation equipment (Cyrill, 2018).

It is argued that MIC was one of the main factors which stoked the tensions that allowed for the U.S.-China trade war to take place (Liu, 2018). This is largely due to the concept that America's comparative advantage as a leader in the manufacturing space is in highly specialized and capital-intensive products (Hayes, 2019). Previously, China and the United States were able to exist in a somewhat mutually beneficial relationship, with China providing cheap labour for American MNE exports, and America providing highly sophisticated technology and products to China (Hayes, 2019). Now, with MIC seeking to challenge the United States on its comparative advantages, relationships are beginning to degenerate (Liu, 2018; Hayes, 2019).

The successful implementation of MIC will transition China's manufacturing industry from being hindered by elements of rising education and income, to being dependant on them for its growth (Ling, 2018). This is especially true in the research and development phase of production activities. Ling Li (2018) argues that "research and innovation rely on human talent, therefore, human capital should be nurtured by sound education" (p. 71). This is critical for the survival of China's manufacturing industry, as many emerging high-tech divisions of manufacturing, such as biomedical and electric vehicles, require educated labour to exist. What remains largely unknown is the health and longevity of China's traditional low-cost manufacturing industry, which will exist in tandem, and independently from, this new wave of high-tech manufacturing (Ling, 2018).

## **Biomedical**

The biomedical industry, including biotechnology and biopharma, has seen significant growth recently (Xia, 2017). Vicky Xia (2017), author of the *Pharmaceutical Technology Europe*, reported that “in 2014, the [biopharma] market was approximately \$5.0 billion USD, projected to be the second largest biologics market globally by 2020” (p. 6). This growth has drawn foreign interest as medical giants such as Boehringer Ingelheim, GE, and Pfizer have placed manufacturing and biocentres in mainland China (Xia, 2017). In contrast to the standard manufacturing industry’s struggle with rising education, China’s biomedical firms are struggling to find enough adequately educated and trained individuals to fulfill their workforces (Xia, 2017). It is cited that this is due to a lack of nuanced and up-to-date biomedical domestic university programs (Xia, 2017).

## **Electric vehicle**

China is widely known to be a top polluter, with a significant portion of emissions coming from standard gas cars. In reaction to this, the Chinese Government has put in substantive investment and incentives for foreign and domestic enterprise to grow the electric vehicle (EV) market (Krumwiede & Liou, 2019). The extent of this initiative’s success may surprise those who don’t see China as a leader in environmental issues. Kip Krumwiede and Robert Liou (2019) from the Institute of Management Accountants report that “of the more than 2 million electric vehicles sold globally in 2018, 1.2 million were sold in China, which surpassed the U.S. in 2016 as the largest EV market in the world” (p. 44). The nation’s leading EV brand, BYD, has been having tremendous success, touting a six-fold increase in net income between 2014 and 2018 (Krumwiede & Liou, 2019). Few global players have entered China’s EV market, but those who have, such as Tesla, have also benefited from the industry’s tremendous growth (Makichuk, 2019; Krumwiede & Liou, 2019).

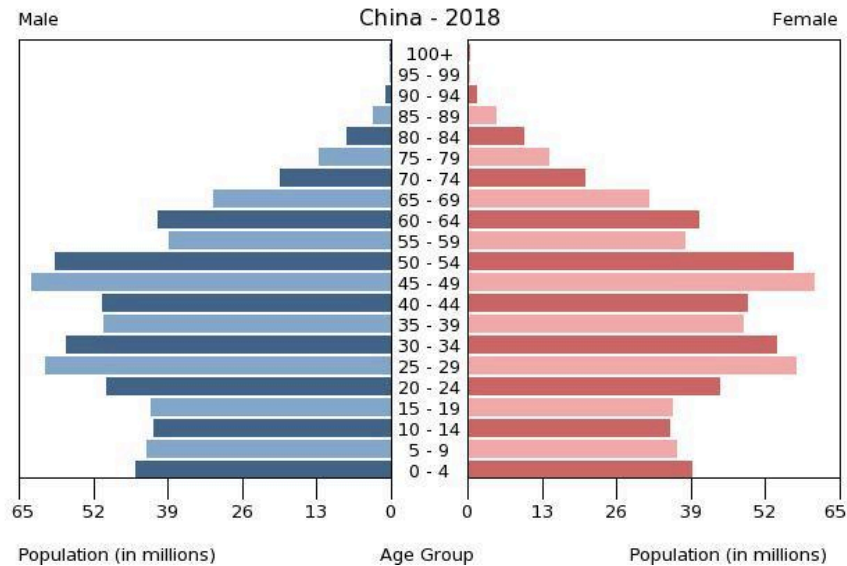
## **THE SQUEEZE ON MANUFACTURING**

There are several external factors creating pressure on China’s manufacturing export industry. The most significant of these factors are the shift in china’s workforce, China’s low-cost competitors, and the cost associated with rising environmental regulation.

### **The generational transition**

The impacts of China’s emerging workforce are accelerated by the speed of which its current workforce ages out. An article written by Deirdre Morris (2012) of CNBC Asia Pacific wrote, “a cheap and young labor force that gave China its reputation as the manufacturing capital of the world is fast eroding” (Morris, 2012). Given that the standard age of retirement for male and female workers in China is 60 and 50, respectively, the age pyramid in Figure 3 should illustrate the emerging concern in the Chinese labour market (TRADING ECONOMICS, 2019; China Age Structure , 2019). Deirdre Morris further supports this cause for concern by stating, “by 2050, more than a quarter of the population will be over 65” (Morris, 2012). With this generational transition fast approaching, MNE and China’s manufacturing economy alike must prepare for the changing climate of workers’ value and needs.

Figure 3: Age pyramid, displaying age range from zero to 100+ for males and females in millions



(China Age Structure , 2019)

### Environmental regulation on production

As of 2019, China is the largest emitter of carbon dioxide, with approximately 30% of the world’s share of pollution output (Acciona, 2019; Pollution By Country 2019, 2019). This, intuitively, is a direct result of China’s industrial boom and the rise of manufacturing, which shows no signs of easing. The rise of healthcare costs associated with pollution, as well as China’s global image as an emitter, has pushed the government to issue environmental policy and private sector regulation (Zheng, Zhao, & Li, 2019; Man, 2013).

China’s environmental regulation has not yet risen to first-rate standards, however, every incremental price increase on the cost of doing business pushes MNEs closer to relocating manufacturing activities to a cheaper market (Zhang Z., 2013). One such regulatory initiative in China’s capital is the Beijing Air Pollution Prevention and Control Ordinance (BAPPCO), which, as a result of stringent regulation, saw “more than 1200 enterprises...punished, [while] 598 enterprises were forced to increase pollution controls” (Zheng, Zhao, & Li, 2019, p. 583). Further, the result of such an increase in cost on low-margin firms is detrimental (Zheng, Zhao, & Li, 2019). As a direct result of BAPPCO, 390 MNEs withdrew from the market entirely (Zheng, Zhao, & Li, 2019).

### China’s competitors in the cheap manufacturing space

So far, this paper has discussed the rise of costs imposed by factors of education and wage expectation and environmental regulation. As these costs rise, MNEs will have to decide if relocating to a cheaper market is the best course of action. In this case, understanding the geographic competition China faces is imperative in evaluating the decisions in front of firms who are evaluating their future activities in China.

India shares a similar story to China as a country whose cheap production has helped its rise to a world power (Bosworth & Collins, 2008). These countries are developing in similar ways, but India, in terms of production, has not yet risen to the same level as China (Bosworth & Collins, 2008). From 1980 to 2004,

India's GDP doubled, whereas China's increased by seven times (Bosworth & Collins, 2008). This disparity is, in part, due to India's boarder constraints, lagging reform, and higher lending rates (Yusuf & Nabeshima, 2010). Despite these constraints, it is highly likely that India will benefit from the rising cost of manufacturing in China and the advent of the U.S.-China trade war (Zhang M., 2013). As of 2019, China's monthly minimum wage equates to roughly \$352 USD, whereas India's monthly minimum wage is roughly \$75 USD (TRADING ECONOMICS, 2019). This material difference of \$277 USD in monthly wages alone may be enough to encourage MNEs to relocate to India. Additionally, due in part to the U.S.-China trade war, as well as a partnership between India and the United States, around 200 American companies are considering leaving China and shifting manufacturing to India (The Economic Times, 2019).

The United States' comparative advantage is the production of high-cost, highly specialized product (Hayes, 2019). As such, the United States doesn't pose a threat to China as a cheaper alternative to manufacturing labour. Instead, in China's favour, the creation of MIC is putting the United States' comparative advantage in jeopardy, as China prioritize more capital-intensive and technologically advanced projects. This brings to light the main reason that the United States is rightfully perturbed by such a progression of manufacturing. In fact, as previously mentioned, this is one of the main motivators behind the U.S.-China trade war (Liu, 2018). China has its work cut out for it, but if the manufacturing industry successfully transitions into MIC, MNEs might consider China as a cheaper alternative for highly sophisticated products in the future (Yang, 2012).

Vietnam is an additional neighbouring low-cost competitor to China and has shown pronounced benefit amid the turbulence caused by the U.S.-China trade war (Reed, 2019). United States President Donald Trump has been pressing American MNEs operating in China to bring manufacturing back to the States (Reed, 2019). American MNEs are leaving China, but as J.R. Reed from CNBC advocates, they are more proportionately moving to Vietnam, among other South-East Asian countries (Reed, 2019). As a result, midway through 2019, Vietnam surpassed China's economic growth of 6.2% with a strong 6.7% (Reed, 2019). Reed further discusses that the political and financial factors pushing companies out of China outweigh the drop-in manufacturing infrastructure taken when relocating to Vietnam (Reed, 2019).

## IMPACT ON MULTINATIONALS AND GLOBAL TRADE PARTNERS

Having completed an in-depth discussion of the timeline of manufacturing in China, rising costs, and the emergence of industry-level transition, it is now important to look at cases of how these factors have impacted MNEs.

### **Cases of impact: regions, companies and brands**

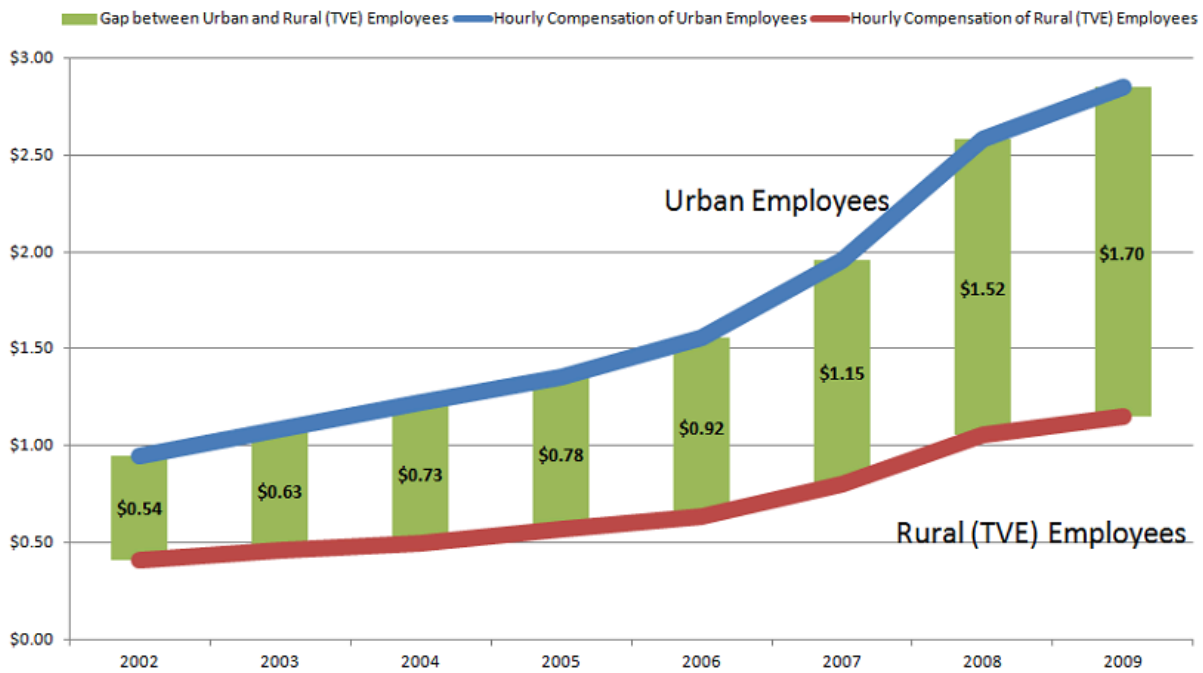
In leading manufacturing regions, such as the Pearl River Delta, Guangdong Province, the impact on the manufacturing industry is profound (Roberts, 2008). This quiet rice farming community, quickly turned manufacturing hotspot, has experienced an industry which crashed almost as fast as it begun (Roberts, 2008). The Delta was the perfect host for supporting manufacturing of lighting, shoes, toys, electronics and more due to low regulation and cheap labour (Roberts, 2008). After the beginning of 2008, newly imposed labour laws, increased price of commodities and the cancelation preferential exporter policies, quickly set the regional manufacturing industry to a sharp downturn, the impacts of which have been felt by both local and MNE producers (Roberts, 2008). In an article written by Bloomberg, the Federation of Hong Kong Industries (2008) states that "...10% of an estimated 60,000 to 70,000 Hong Kong-run factories in the Pearl River Delta will close this year" (Roberts, 2008). What may surprise some is that the Chinese

government has been less responsive to these failures as they prioritize higher value, technologically sophisticated product manufacturing in light of ‘Made in China 2025’ (Roberts, 2008).

Toy manufacturing giant, Hasbro, has been subject to particular and developing strain as a result of the rising cost of manufacturing in China (Birchall, 2008). In 2008, the company, who sources a majority of their production from China, was anticipating a roughly 15% increase in costs on their Chinese-based manufacturing facilities as a partial result of increased wages (Birchall, 2008). In the same year, Hasbro attempted to lower the costs of their Chinese manufacturing activities by moving their facilities from coastal regions to inland communities (Birchall, 2008). This strategy, as supported by Chief Financial Officer David Hargreave, was said to lower costs due to the less developed nature of these communities as well as take advantage of lower wage requirements, as seen in Figure 4. This strategy came with the added barrier of having to navigate the development of production facilities in regions with less infrastructure, but acted as a good step to maintain production in China (Birchall, 2008). The company’s CFO later indicated that even if other countries, such as Vietnam, could provide cheaper alternatives, the company is better off staying in China in order to forgo the cost of creating new production relationships and maintain their commitment to quality and safety standards (Birchall, 2008).

Just 11 years later, Hasbro’s reaction to rising costs has changed significantly. The company has stated that by 2020, the firm will reduce their Chinese activities from roughly 66% to 50% (BusinessWorld, 2019). The countries that will be receiving the highest portion of increased production in light of this shift are India and Vietnam (BusinessWorld, 2019). The reason for this reduction is largely attributed to Hasbro aiming to reduce their production share in China, in order to be less impacted by wage increases, and as a result of strain created from the looming U.S.-China trade war (BusinessWorld, 2019; Birchall, 2008).

Figure 4: Gap in hourly compensation between urban and rural manufacturing employees



Note: Data labels are rounded values, TVE refers to town and village enterprises.  
 Source: U.S. Bureau of Labor Statistics, International Labor Comparisons.

(Manufacturing in China, 2013)

Indiska is a curious example of a firm who is consciously sticking with China despite concerns of rising costs – in fact, they welcome them. Indiska is an Indian-inspired fashion, decoration, and furniture firm popular in the Nordic markets (Fang, Gunterberg, & Larsson, 2010). The principle reason Indiska is comfortable with rising prices is a part of a global move towards developing corporate social responsibilities (CSRs) (Fang, Gunterberg, & Larsson, 2010). To this extent, Indiska states that their corporate values are focused on “...humanism, presence, engagement, and close and long-term relations with suppliers” (Fang, Gunterberg, & Larsson, 2010). As a principle of Indiska’s CSR framework, they haven’t switched suppliers, even within China, for the purpose of attaining lower cost production (Fang, Gunterberg, & Larsson, 2010). Instead, Indiska sees that the value of China’s capacity for producing high quality knitting, glass, and porcelain, as well as the intangible value that comes from a healthy supplier relationship (Fang, Gunterberg, & Larsson, 2010). Additionally, utilizing the supplier relationships that Indiska has developed, they have influenced the positive development of Chinese manufacturing working conditions for the betterment of laborers and product quality (Fang, Gunterberg, & Larsson, 2010). It is hard to say that Indiska is taking a widely traveled path in the face of rising costs on the manufacturing industry. The case of Indiska does, however, offer a possible future for China’s traditional manufacturing industry through valuable supplier relationships and the popularization of CSR frameworks.

## FINDINGS AND THE FUTURE

Yang (2012), of the *Washington Post*, had this to say about manufacturing in China:

China’s reliance on cheap labor has powered the country’s economy to unprecedented heights. But China’s manufacturing sector is running into problems these days: squeezed from one end by places with even lower labor costs, such as Laos and Vietnam, and yet struggling to move to higher ground making more advanced products because of competition from developed nations such as Germany and the United States. (p. 6)

It is not the purpose of this report to compose a highly quantitative analysis that measures cost feasibility of MNEs conducting, or continuing to conduct, manufacturing activities in China. It is, however, the goal to educate such firms on the history of success of the manufacturing industry and how imposing cost factors threaten its sustainability without facing tremendous transformation, as well as to discuss China’s national competitors in the manufacturing space, and cases of how these regions, firms and brands have navigated quickly-shifting conditions. Considering all of the abovementioned information, it is appropriate to draw several conclusions.

In this report, it has been concluded that generational rates of education are rising, average year-by-year wages have consistently and exponentially increased, and costs associated with government-imposed environmental policies have made a significant impact on firms’ cost structures. With the exception of education, as it is an indirect influencer, these factors have directly contributed to China losing its place as a highly competitive and cheap manufacturer.

China recognizes this issue and has enacted ‘Made in China 2025’ to transition their economy from the manufacturing model that built China – cheap manufacturing goods – to what they believe will carry the nation on to success in the future – highly sophisticated, technologically advanced goods. This, as the major cause for the U.S.-China trade war, is where China will emerge into direct competition with the

United States. The post-transition 'Made in China 2025' landscape and how it may compete with the United States requires an independent paper of its own.

With this transition underway, firms operating under China's old manufacturing regime must now evaluate their future with mainland production. As discussed, in the face of rising costs, some firms have diversified their manufacturing, or completely relocated it, to locations like Vietnam and India. For brands like Indiska, staying in China to attain goods that manufacturers are known for, as well as prioritizing high-quality supplier relationships to improve working conditions is a part of a possible CSR path that more firms could follow in the future. Most evidently, however, stories of failed manufacturing regions, such as the Pearl River Delta and firms such as Hasbro, indicate the real threat these rising costs pose on continuing business in China.

## CONCLUSION

From the 'Great Leap Forward' to 'Made in China 2025', China's transformation in the past 70 years has been astounding – and big change is still on the horizon. The manufacturing industry, serving market economies across the globe, has played a lead role in bringing China to where it is today. China's impressive economic growth gave way to higher rates of education, specialized jobs, and workers' expectation of higher compensation for their labour. Additionally, factors such as public health, as well as China's global image, has encouraged the nation to take serious efforts towards strengthening environmental policy. As results of a rapidly growing economy, these cost imposing factors are being observed as a major contributor to China being displaced as the world's competitive manufacturer of cheap goods. China is transitioning between its old manufacturing model where it competes with countries like India and Vietnam on low costs, to its new manufacturing model of high value and a sophisticated product base where it has begun to compete with countries like the United States. As a result of cost pressure on the former, a variety of firms have left China entirely, while some seek geographic-diversification of their manufacturing strategy, and others feel there is value in continuing production in China. Additionally, the manufacturing transition has been a significant contributor to the U.S.-China trade war. Regardless of the reactions of the firms, it is clear that the implications of both cost and political factors during this economic transition are real and pressing for those multinational firms that are considering production in China, and for those who are already doing so.

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