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Law and policy of platform economy in China

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A R T I C L E   I N F O

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A B S T R A C T

China is experiencing a phenomenal expansion of platform economy fuelled by the advancement of information and communication technologies. It has become a global frontrunner in many sectors, including commerce, finance, and entertainment. A comprehensive law and policy narrative, however, is largely absent from English academic literature. This paper seeks to fill this gap by analysing the dynamic relationship of industrial development, policy engagement and regulation construction in one of the prime sectors of platform economy: Electronic Commerce (E-commerce). China’s E-commerce market rose to global dominance shortly after its origination in the mid-1990s. This paper holds that such an expeditious ascendancy is nourished by carefully designed public policies. To implement these policies, also to redress information asymmetries and other pertinent market failures, a tailored regulatory paradigm has been instigated. This regulatory paradigm manifests a new mode of polycentric, participatory, and collaborative governance that strives to balance interest disparities between various stakeholders. The dynamic relationship exemplified in China’s E-commerce market would provide a valuable indication for administering other sectors of platform economy not only in China but also across other jurisdictions that openly embrace commercial innovations in the context of information technological transformation.

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1. Introduction

Platform economy has gained momentum as the core organizational form of informational transformation in China.1 Cen-

tred on data-driven online platforms, many fronts of China’s platform economy manifest themselves in the global arena the most vibrant business activities, including commercial transaction, financial intermediation, ride sharing and enter-

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1 Despite the absence of a universally accepted definition, platform economy may denote various phenomena of economic interactions. It carries a wide range of names, often interchangeably, which include digital economy, collaborative economy, sharing economy, gig economy and so on. It refers to a new business model that catalytically relies on online platform network and algorithmic data processing as supported by information and communication technologies to organize and structure economic and social activities. For a general discussion, see e.g., European Commission, Online platforms and the digital single market: opportunities and challenges for Europe (COM(2016) 288 final 2016); Nestor M. Davidson, Michèle Finck and John J. Infranca (Eds), The Cambridge Handbook of the Law of the Sharing Economy (Cambridge University Press 2018); Julie E. Cohen, ‘Law for the Platform Economy’ (2017) 51 UC Davis Law Review 133; Orly Lobel, ‘The Law of the Platform’ (2016) 101 Minnesota Law Review 87

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tainment. Behemoth digital platforms such as the Alibaba Group, JD.com and ByteDance have constantly ignited the global capital market with their annual revenue, user traffic, and market valuation.

Above all, the Electronic commerce (E-commerce) of the nation has entrenched itself as the largest national market in the world since it ascended to such a hegemony in 2013 after enjoying a decade-long double-digit growth. In 2019 alone, China recorded USD 1.935 trillion revenue from E-commerce, which represents 54.7% of the global market, a share nearly twice that of the next five largest markets combined.7

The vibrant E-commerce market stimulates investment in innovation, offers significant employment opportunities, reduces transaction costs, increases access to global markets, promotes inclusive and sustainable development. However, it has also posed regulatory conundrums regarding a number of interweaved policy issues, including consumer protection, intellectual property protection, data privacy security, tax collection, dispute resolution, trade and competition policies, among others. Policy makers have spent considerable resources promoting particularised legal instruments to enhance positive externalities and to mitigate negative externalities split out from the E-commerce market.10

For example, the UN Commission on International Law Trade (UNCITRAL) in 1996 released the Model Law on Electronic Commerce (Model Law on E-commerce).11 In tandem with other UNCITRAL promulgated rules,12 these international laws provide the invaluable framework within which national law can develop for consumer and commercial protection in the E-commerce environment. For example, multiple ASEAN countries to date have enacted domestic legislation based on the UNCITRAL Model Law on E-commerce.13

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2 See in general, Mckinsey Global Institute, China’s Digital Economy: A Leading Global Force, August 2017; Also Huqin Jiang and Heng Wang, ‘China’s Regulatory Approach to the Sharing Economy: A Perspective on Ride-Hailing’ (2020) 2020 Journal of Law, Technology & Policy 85; Chuanman You, ‘Recent Development of Fintech Regulation in China: A Focus on the New Regulatory Regime for the P2P Lending (Loan-Based Crowdfunding) Market’ (2018) 13 Capital Markets Law Journal 85; Lin Lin, ‘Managing the Risks of Equity Crowdfunding: Lessons from China’ (2017) 17 Journal of Corporate Law Studies 327

3 In September 2014, Alibaba was listed on the New York Stock Exchange, raising a whopping USD 25 billion. For a long time, Alibaba’s IPO was the largest in the world’s financial history until December 2019 when Saudi Aramco raised USD 25.6 billion. Lizzy Gurud, ‘Saudi Aramco and Alibaba made for a great 2019 in IPO market despite Uber, Lyft busts’ (CNBC, 29 December 2019) https://www.cnbc.com/2019/12/29/saudi-aramco-alibaba-among-biggest-ipoos-of-2019.html accessed on 1 February 2020

4 JD.com’s recent secondary listing in Hong Kong marks the biggest IPO of 2020 so far. Yujing Liu, ‘JD.com debuts with 3.5 per cent gain in Hong Kong’s biggest initial public offering of 2020 as joyous investors embrace e-commerce’ (The South China Morning Post, 18 June 2020) <https://www.scmp.com/business/markets/article/3089511/jdcom-rises-hong-kongs-biggest-listing-year-its-dog-mascot-banging> accessed on 1 July 2020

5 Propelled partly by TikTok, ByteDance’s valuation has risen at least a third to more than US$100 billion in recent private share transactions. It is now deemed as the most valuable “unicorn” company in the world. Bloomberg, ‘TikTok-owner ByteDance said to surpass US$100 billion in private market value’ (The South China Morning Post, 20 May 2020) <https://www.scmp.com/tech/startups/article/3085293/tiktok-owner-bytedance-said-surpass-us100-billion-private-market> accessed on 1 July 2020

6 For the development of E-commerce in China, See following Section 2

7 The next five largest ecommerce markets are the US, the UK, Japan, South Korea, Germany (Appendix 5).

8 Heejin Kim, ‘Globalization and Regulatory Change: The Interplay of Laws and Technologies in E-commerce in Southeast Asia’ (2019) 35 Computer Law & Security Review 1; Orly Lobel, ‘Coase and the Platform Economy’ in Nestor M. Davidson, Michéle Finck and John J. Financa (eds), The Cambridge Handbook of the Law of the Sharing Economy (Cambridge University Press 2018) In 1999, the second edition of the Global Action Plan for Electronic Commerce issued by the International Chamber of Commerce (ICC) highlighted the benefits of embracing E-commerce development by countries in all stages of development, which include: increasing internal organisational and management efficiency; increasing transaction efficiency and reducing transaction costs for both suppliers and buyers; extending market reach of suppliers and increasing choice for both suppliers and consumers; and providing accurate information to improve service delivery such as in health provision or the provision of information to consumers. A Global Action Plan for Electronic Commerce, Prepared by Business with Recommendations for Governments, ICC, 2nd edition, October 1999. Available at: http://www.iccwbo.org/policy/ebitb/id2422/index.html

9 Alan Davidson, The Law of Electronic Commerce (Cambridge University Press 2009) Page 339; See also OECD, Economic and Social Impacts of E-commerce: Preliminary Findings and Research Agenda (OECD Digital Economy Papers, No 40, 1 January 1999); UN Intergovernmental Model of Experts on E-commerce and the Digital Economy, Report of the Intergovernmental Group of Experts on E-commerce and the Digital Economy on its Second Session (TD/B/EDE/2/4), 18-20 April 2018

10 Faye Fangwei Wang, Law of Electronic Commercial Transactions: Contemporary issues in the EU, US and China (2 edn, Routledge 2014) Page 297–298

11 General Assembly Resolution 51/162 of 16 December 1996 amended in 1998. Available at http://www.uncitral.org/pdf/english/texts/electcom/05-89450_Ebook.pdf. The Model Law was intended to provide national legislatures with a template of internationally acceptable rules that would remove legal obstacles and create a more secure legal environment for electronic commerce. It provides standards to assess the legal value of electronic messages and legal rules for electronic commerce in specific areas such as carriage of goods. Since its inception, it has gained significant international acceptance and has been the basis for electronic commerce legislation in more than 100 jurisdictions. See http://www.uncitral.org See also: Alan Davidson, The Law of Electronic Commerce (Cambridge University Press 2009) Pages 25–27, 332

12 E.g., Model Law on Electronic Signatures 2001, Convention on the Use of Electronic Communications in International Contracts 2005.

13 For example, Malaysia has copied the provisions of the MLEC almost verbatim. Malaysia, Electronic Commerce Act 2006. Meanwhile, domestic legislation implementing part of the Model Law 1996 has been enacted in other jurisdictions such as Australia, France, Hong Kong, Singapore and so on. Heejin Kim, ‘Globalization and Regulatory Change: The Interplay of Laws and Technologies in E-commerce in Southeast Asia’ (2019) 35 Computer Law & Security Review 1; Eliza Mik, ‘Legal and Regulatory Challenges to Facilitating E-Commerce in the ASEAN’ (1 December 2017) Available at SSRN: https://ssrn.com/abstract=3100578 or http://dx.doi.org/102139/ssrn3100578
In the EU, comprehensive rules in directives and regulations have been established for Member States. As early as 1997, the EU released its first E-commerce policy statement: A European Initiative in Electronic Commerce. This policy statement was later implemented by, inter alia, the Directive on Electronic Signatures (1999/93/EC) and the Directive on Electronic Commerce (2000/31/EC). The most recent legislative development in the EU is the promulgation of the EU Regulation on Platform-to-Business Relations (P2B Regulation (EU) 2019/1150), which purports to create a fair, transparent and predictable business environment for smaller businesses and traders on online platforms.

For a long time, Chinese policymakers have chosen to adopt subject-specific regulatory instruments to keep up with the international practice. On the one hand, existing laws such as the Contract Law and the Consumer Protection Law have been updated to accommodate the E-commerce market development. On the other hand, dedicated regulatory instruments such as the Electronic Signature Law 2005 (E-signature Law) have been enacted to clarify the legal effects of electronic transaction documents including electronic bills and electronic inspection. Meanwhile, various industrial standards have been adopted in setting codes of conduct with respect to logistics management, product quality, and so on.

This patchwork regulatory map has been replaced recently by a new comprehensive legislative instrument, titled E-Commerce Law of the People’s Republic of China, which came into effect on 1 January 2019. A comprehensive law and policy narrative on this industrial and regulatory development, however, is largely absent from English academic literature. Up to now, most studies focused primarily on the interaction between the Information Communication Technology (ICT) innovation and the E-commerce industry growth. This paper seeks to fill this lacuna by explicating the dynamic relationship between industrial development, policy engagement and regulation construction in China’s E-commerce market. It provides a basis for understanding the purpose and significance of the public policy and accompanying regulatory paradigm. It surveys a set of analytical tools with which further research can be equipped to apprehend the trajectory of continual industrial development in the E-commerce market.

This paper opines that the expeditious ascendancy of China’s E-commerce market to its global hegemony is nourished by carefully designed public policies. To implement these nourishing policies, also to redress information asymmetries and other pertinacious market failures, a tailored regulatory paradigm has been instigated by China’s policy makers. The new regulatory paradigm manifests a polycentric, participatory, and collaborative governance model that strives to balance interest disparities between various stakeholders. The dynamic relationship exemplified in China’s E-commerce market would provide a valuable indication for administering other sectors of platform economy, not only in China but also across other jurisdictions that openly embrace commercial innovations in the context of information technological transformation.

The remainder of this article is organized as follows. Part 2 probes into the catalytic force propelling the phenomenal growth of China’s E-commerce market: the nourishing industrial policy. Part 3 summarizes the featured regulatory objectives which addresses three intertwined relationships among principal participants in the E-commerce ecosystem: state, platforms, and platform users. Part 4 explicates three

14 For an updated review of the regulatory system of E-commerce in the EU: Arno R. Loder and Andrew D. Murray, EU Regulation of E-Commerce: A Commentary (Edward Elgar 2017)
15 The Regulation will have effect from 12 July 2020.Regulation (EU) 2019/1150 of the European Parliament and of the Council of 20 June 2019 on promoting fairness and transparency for business users of online intermediation services (Text with EEA relevance), PE/56/2019/REV/1, O J L 186
16 Further discussion on China regulatory approach is under following Sections 3 and 4. See also Faye Fangfei Wang, Law of Electronic Commercial Transactions: Contemporary issues in the EU, US and China (2 edn, Routledge 2014) Pages 297 - 298
17 For example, Articles 26&33 were integrated to the revised Contract Law 1999 to recognize the legal effects of electronic contracts and to facilitate the formation of such contracts. The revised Contract Law 1999 updated and consolidated three pre-existing contractual regulations: the 1982 Foreign-related Economic Contract Law, the 1985 Economic Contract Law, and the 1987 Technology Contract Law. It is worth to note that the revised Contract Law 1999 has been incorporated into the Civil Code as its Part IV. The Civil Code was recently promulgated on 28th May 2020 and will take effect from 1 January 2021.
18 The Consumer Protection Law, promulgated in 1993, was subsequently amended in 2009 and 2013. The revision in 2013 features enhanced consumer protection in the context of E-commerce transaction. For example, the new article 24 imposes Joint and several liability on online platforms for on-platforms operators’ infringement, if the online platforms: (1) cannot provide the real names, addresses, and valid contact information for the alleged infringer; or (2) does not take action to block the infringing activities that are known or should have been known to the platform provider.
19 The terms of the Electronic Signatures Law of China are substantially the same as those of the UNCITRAL Model Law on Electronic Signatures. Kevin Luo, ‘E-Commerce Laws and Practices in China’ (2016) 33 Arizona Journal of International & Comparative Law 219
20 For example, the Guidelines for the Standardization of Online Retailing 2017. See further discussion on “standards”under Section 4.2 below.
21 Previously adopted on 31 August 2018 by China’s legislature, the Standing Committee of the National People’s Congress. In Chinese 《中华人民共和国电子商务法》 (Zhonghua Renmin Gonghexu Dianzhi Shangwu Fa). Full text is available at: https://www.izvoznookno.si/Dokument/E-commerce%20Law%20of%20the%20People%20Republic%20of%20China.pdf
22 E.g., Faye Fangfei Wang, Law of Electronic Commercial Transactions: Contemporary issues in the EU, US and China (2 edn, Routledge 2014); Kevin Luo, ‘E-Commerce Laws and Practices in China’ (2016) 33 Arizona Journal of International & Comparative Law 219; Jane K. Winn and Yuping Song, ‘Can China Promote Electronic Commerce Through Law Reform? Some Preliminary Case Study Evidence’ (2 January 2007) Available at SSRN: https://ssrn.com/abstract=901849 or http://dx.doi.org/10.2139/ssrn.901849
23 Needless to say, it is beyond the length of this paper to provide a complete coverage on every thread of substantive rules of the new Law so as to be able to give legal advice about compliance.
instrumental components of the new regulatory model set to promote the sustainable growth of E-commerce market: platform-based co-regulatory framework, market-oriented industrial standards, and technology-enabled dispute resolutions. The tentative conclusion is that this newly elevated regulatory framework will help to reduce the regulatory uncertainty, asymmetrical information costs, and transactional costs associated with the E-commerce market. In turn, it will facilitate the sustainable development of inclusive platform economy innovation as driven by the ICT advancement.

2. Nourishing industry policies

Industrial policy is a wide-ranging concept. In essence, industrial policy is a systemic approach directed by government to promote the transformation of economic structure by coordinating innovation, commerce and growth. Its origination can be traced at least to the late 18th century, when Alexander Hamilton, the first US Treasury Secretary, published the 1791 Report on the Subject of Manufactures. Hamilton’s Report contained a number of “industrial policy” proposals, with the purpose of developing the new US republic, and in particular, US manufacturing. Such proposals subsequently influenced, inter alia, the “American School” of capitalist economics (circa 1860s–1970s), which advocated a national system to promote US economic independence and (national) self-sufficiency.

The birth of E-commerce is also fostered by public industrial policy in the US. The foundation of E-commerce innovation, i.e., the Internet and other major ICT infrastructure, is largely laid by government-run programs or government-funded research. The role of public policy in fostering E-commerce development is further demonstrated in the supportive institutional framework. In 1997, for example, the then US President Bill Clinton announced the “Framework for Global Electronic Commerce” in the form of “Administration’s Policy Document”. The Framework set forth the federal government’s strategy for “fostering increased business and consumer confidence in the use of electronic networks for commerce.” It listed five principles to guide government support for the evolution of E-commerce and made recommendations about nine key areas where international efforts are needed to cooperate and to shape the marketplace.

China’s government from the outset has also attached great importance to E-commerce in transforming its economic structure. The following section explores the role of China’s industrial policy and its implementing instruments in three phases. Each phase featured major policy development and milestone industrial achievements. It is demonstrated that E-commerce market, as both a product and manifestation of ICT innovation, has been shaped by and contributed to the technical and institutional infrastructure construction oriented by a variety of industrial policies.

Chinese E-commerce commenced its initial phase of development in April 1995, signified with the first E-commerce platform “China Yellow Pages” going online. The arrival of “China Yellow Pages” and the commencement of the E-commerce market were largely due to the governmental industrial policy to construct four major Internet projects. The interconnection of these computer networks formed the technical infrastructure of the Chinese Internet. Since then, the

24 For a list of definitions of industrial policy from past to present, see the Table 2, Karl Aiginger and Dani Rodrik, ‘Rebirth of Industrial Policy and an Agenda for the Twenty-First Century’ (2020) 70 Journal of Industry, Competition and Trade 1
25 David Bailey, Keith Cowling and Philip Tomlinson (Eds), New Perspectives on Industrial Policy for a Modern Britain (Oxford University Press 2015) Page 4
26 Full text at: https://founders.archives.gov/documents/Hamilton/01-10-02-0001-0007
27 See further discussion in Douglas A. Irwin, ‘The Aftermath of Hamilton’s “Report on Manufactures”’ (2004) 64 The Journal of Economic History 800
28 David Bailey, Keith Cowling and Philip Tomlinson (eds), New Perspectives on Industrial Policy for a Modern Britain (Oxford University Press 2015) Page 2 – 3
29 Including the Internet’s forerunner (ARPAnet), the World Wide Web (CERN), and the browser (government centre at the University of Illinois). OECD, Economic and Social Impact of E-commerce: Preliminary Findings and Research Agenda (OECD Digital Economy Papers, No 40, 1 January 1999) Page 23
30 For a general discussion on how a variety of industrial policies have been deployed at the both federal and state levels in the US, see, e.g., Fred L. Block and Matthew R. Keller (eds), State of Innovation: The U.S. Government’s Role in Technology Development (1 edn, Routledge 2015)
31 The White House, Executive Summary, A Framework for Global Electronic Commerce: https://clintonwhitehouse4.archives.gov/WH/New/Commerce/summary.html
32 Ira C. Magaziner, Ann Grier Cutter and Len A. Costa, ‘The Framework for Global Electronic Commerce: A Policy Perspective’ (1998) 51 Journal of International Affairs 527
33 According to difference criteria, the development of China’s E-commerce can be divided into different phases. Based on the development of the main E-commerce platforms in China, it was divided into five phases: germination, acceleration, maturation, outbreaking, and transformation. The PRC Ministry of Commerce, China E-commerce Report (China Business Publishing House 2015) From the perspective of industry economic theory cycle, four phases: germination, expansion, eruption and integration. Yuxin Mao and Liang Zhao, Big Data Age - Business Ethics Frontier Issues (Northeastern University Press 2016) A recent report commissioned by the United Nations Industrial Development Organization suggests four stages: the initial stage, the accelerated development stage, the standardization stage and the Globalization Stage. Hongfei Yue, ‘National Report on E-Commerce Development in China’ (2017) Inclusive and Sustainable Industrial Development Working Paper Series WP 17
34 It was launched by Jack Ma who later also founded the Alibaba group. Its business was positioned as a trade matching service for export-oriented Chinese enterprises. It established a new trade bridge for domestic and foreign enterprises.
35 These included the construction of China’s public computer Internet (CHINANET), China Education and Research Computer Network (CERNET), China Science and Technology Network (CSTNET) and China’s public Golden Bridge Internet (CHINAGBN).
ICT network started taking the shape as the infrastructural foundation for China’s E-commerce market.

Following the technical infrastructural construction is the institutional infrastructure. Swiftly in February 1996, the central government set up the China International Electronic Commerce Centre (CIECC) as a state-level all-round service organization to promote “international cooperation and foreign exchanges of state-level electronic commerce”. Later in June 2000, the China Electronic Commerce Association (CECA) was established as a semi industrial self-regulatory body. This marked the official recognition of E-commerce as a specific industry.

With the nourishing industrial policy constructing both the technical and institutional foundation, E-commerce emerged as a nascent trading channel for a large number of business enterprises and individual consumers. The prime examples include the establishment of Alibaba in 1999 by Jack Ma as a global wholesale marketplace and the launch of JD Multimedia, the precursor to JD.COM, by Richard Liu in the same year. Both firms have evolved into multibillion conglomerates dominating E-commerce market in China. Other milestone market developments include the expansion of eBay and Amazon into China, in 2002 and 2004 respectively.

In this foundation phase, however, the E-commerce market faced constraints from insufficient social, technological, and institutional support. Firstly, social awareness and public confidence in the nascent online transaction business model was yet to be established; secondly, the ICT network featured a low level of Internet proliferation, which contributed only a small base of Internet users; thirdly, the policy construction was at its early stage to cultivate a supplementary environment for the expansion of the E-commerce market. The insufficient infrastructural readiness was addressed during the subsequent maturation stage, which a golden era for China’s E-commerce market commenced, leading to a decade-long double-digit growth rate. (Appendix 1)

The maturation stage of China’s E-commerce market spanned from 2005 to 2013, during which it became the largest in the global E-commerce landscape. This period featured a series of policy initiatives purporting to promote business awareness, infrastructures construction, and institutional environment. The first policy initiative is the Several Opinions on Accelerating the Development of E-commerce (Opinions 2005) promulgated by the State Council in January 2005. The Opinions 2005 identified E-commerce market as the essential part of the information society construction for the national economy transformation. It strive to improve the institutional environment for E-commerce growth by putting forward several policy proposals, which included provision of E-commerce related regulation, third party payment system, logistics and other supplementary systems.

Such policy proposals were quickly implemented. For example, the first national E-commerce specific legislation, E-Signature Law, came into effect in April 2005. The E-Signature Law provided legal grounds to standardize acts of electronic signature, to validate the legal effect of electronic signature, and to safeguard the interests of the parties concerned in E-commerce transactions. Meanwhile, the Electronic Payment Guidelines was issued in October 2005 to promote the development of electronic payments, to guard against payment risks, and to ensure the security of banks and their customers’ funds. These regulatory instruments provided institutional support for E-commerce market in China. They contributed to establishing trust and confidence in the nascent online marketplace.

China’s E-commerce market is further boosted by the continuing ICT infrastructure construction, which leads to the extraordinary Internet proliferation and the explosive growth of online consumer base. At the end of October 1997, China had merely 620,000 Internet users. By the end of 2002, the number of Internet users reached 59.1 million. In June 2008, China recorded a historic number of 298 million Internet users, which surpassed the US and became the country with the largest e-population. With such institutional and technical improvement, China’s E-commerce market was booming. By the end of 2013, China surpassed the US to become the largest E-commerce market in the world. (Appendix 3) E-commerce does not recognise borders. 2014 probably marks one of the most historic years for the globalization of China’s E-commerce platform economy. In April 2014, the number of mobile internet users has grown from null in 2005 to 500 million in 2013. (Appendix 2)

Also the implementation of tax and other incentive financing schemes, the full text of the Opinions 2015 is available at: http://www.gov.cn/zwgk/2005-08/15/content_21925.htm

The terms of the Electronic Signatures Law of China are substantially the same as those of the UNCTITRAL Model Law on Electronic Signatures. Kevin Luo, ‘E-Commerce Laws and Practices in China’ (2016) 33 Arizona Journal of International & Comparative Law 219

Electronic signature was defined as the data in electronic form contained in and attached to a data message to be used for identifying the identity of the signatory and for showing that the signatory recognizes what is in the message. Article 2, the E-Signature Act 2005. http://www.npc.gov.cn/englishnpc/Law/2007-12/05/content_1381960.htm

Mckinsey Global Institute, China’s Digital Economy: A Leading Global Force, August 2017

While the number of mobile internet users has grown from null in 2005 to 500 million in 2013. (Appendix 2) Also Junyong Xiang and Linbo Jing, ‘Electronic Commerce in China: Current Status, Development Strategies, and New Trends’ (2014) 3 China Finance and Economic Review 71

Hao Jianbin (郝建彬), ‘History of China’s E-commerce Development [中国电子商务发展史]‘ (All Business Review (阿里商业评论), 6 July 2015) <http://www.aliresearch.com/Blog/Article/detail/id/20528.html> accessed on 15 January 2020

Alan Davidson, The Law of Electronic Commerce (Cambridge University Press 2009) Page 4 - 5

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36 General Introduction, http://ciecc.ec.com.cn/en/about/about.shtml
37 Hongfei Yue, ‘National Report on E-Commerce Development in China’ (2017) Inclusive and Sustainable Industrial Development Working Paper Series WP 17
38 In March 2002, eBay entered into China’s E-Commerce market by acquiring a 33% stake of Each.net for USD 30 million. The Each.net was previously established in August 1999 as an online trading platform in Shanghai. Amazon entered into Chinese market by an analogous strategy. In August 2004, it acquired another Chinese E-Commerce industry leaders, Joyo.net, for USD 75 million.
39 Hongfei Yue, ‘National Report on E-Commerce Development in China’ (2017) Inclusive and Sustainable Industrial Development Working Paper Series WP 17
40 Also the implementation of tax and other incentive financing schemes, the full text of the Opinions 2015 is available at: http://www.gov.cn/zwgk/2005-08/15/content_21925.htm
41 The terms of the Electronic Signatures Law of China are substantially the same as those of the UNCTITRAL Model Law on Electronic Signatures. Kevin Luo, ‘E-Commerce Laws and Practices in China’ (2016) 33 Arizona Journal of International & Comparative Law 219
42 Electronic signature was defined as the data in electronic form contained in and attached to a data message to be used for identifying the identity of the signatory and for showing that the signatory recognizes what is in the message. Article 2, the E-Signature Act 2005. http://www.npc.gov.cn/englishnpc/Law/2007-12/05/content_1381960.htm
43 Mckinsey Global Institute, China’s Digital Economy: A Leading Global Force, August 2017
44 While the number of mobile internet users has grown from null in 2005 to 500 million in 2013. (Appendix 2) Also Junyong Xiang and Linbo Jing, ‘Electronic Commerce in China: Current Status, Development Strategies, and New Trends’ (2014) 3 China Finance and Economic Review 71
45 Hao Jianbin (郝建彬), ‘History of China’s E-commerce Development [中国电子商务发展史]‘ (All Business Review (阿里商业评论), 6 July 2015) <http://www.aliresearch.com/Blog/Article/detail/id/20528.html> accessed on 15 January 2020
46 Alan Davidson, The Law of Electronic Commerce (Cambridge University Press 2009) Page 4 - 5
3. Featuring regulatory objectives

Optimally, regulation, in redressing pertinacious market failures, should impose the least possible burdens on the technological and commercial innovation. For a long period of time,

Jumei.com shares were floated on the New York Stock Exchange. In May, JD.com went public on NASDAQ and became the largest E-commerce platform in China only second to Alibaba. In September, Alibaba was listed on the New York Stock Exchange, raising USD 25 billion. Alibaba’s IPO was the largest in the world’s financial history until December 2019 when Saudi Aramco raised USD 25.6 billion. As of 13 May 2019, 53 E-commerce companies have gone public with their shares floated in Stock Exchanges in New York, Hong Kong, or Shanghai. (Appendix 4) 48 Such a globalization of China’s E-commerce platforms led by giant companies signals the third stage of E-commerce development in China. The stage of globalization is further boosted by the industrial policy campaign for the cross-border E-commerce. Among others, the State Council in June 2015 issued the Guidance on the Promotion of Cross-border E-commerce Healthy and Rapid Development. 49 It specified measures to tackle cross-border E-commerce related issues, to improve the logistics of importing and exporting through E-commerce means, and to improve cross-border E-commerce payment and settlement process. 50 These measures are also codified into the new E-commerce law. 51

To sum up, industrial policy has been utilized as the catalyst to advance platform economy in China. The phenomenal success of the E-commerce market demonstrates how to combine state planning with market forces, with the implementation of industrial policies ranging from the construction of technological infrastructure and complementary institutions, to the promotion of market productivity and global expansion agenda. From this perspective, the Chinese government appears to have successfully utilized holistic and long-term industrial policies to foster a platform economy transformation. With the continuing growth at a double-digit rate, China’s position as the frontrunner in the global E-commerce market is to be further entrenched. (Appendix 5) 52 China’s regulatory responses have featured light-touch characteristics with respect to E-commerce market. 53 Market players were given a free hand to advance entrepreneurship to commercialize inventive services and to experiment nascent business models. 54 For example, it took 11 years following Alibaba’s introduction of Alipay for China’s policymakers to eventually set a cap on the value of the transfers. It took another 5 years after Alipay introduced barcode-based payment solutions that Chinese regulators produced an official standard on management requirements. 55

Few subject-specific international laws were transposed by Chinese policymakers to keep up with international practices. 56 For example, the E-signature Law, China’s first regulation dedicated to governing E-commerce issues, was based on the UNCITRAL Model Law. 57 The government also updated the existing laws such as Contract Law, Advertising Law and Consumer Protection Law to respond to the platform economy innovation. 58 In addition, various E-commerce related standards have been adopted in setting industrial norms with respect to logistics management, product quality, and so on. 59

While having proved its worth for supporting online marketplace function, such a light-touch and fragmented regulatory approach falls in two aspects. On the one hand, they date back to a time when E-commerce was in its infancy. The drafters of regulatory instruments possessed a limited understanding of the technologies involved. Many specific rules prove better suited to email, telex or static PDF files than to the latest generation of information and communication technologies such as interactive websites, social networks or live streaming. 60 On the other hand, they focus primarily on the transactional aspects of E-commerce and the underlying infrastructure services such as digital signatures and third-party payments. While having contributed to establishing trust and confidence in the online marketplace, these regulatory ap-

47 Lizzy Gurdus, ‘Saudi Aramco and Alibaba made for a great 2019 in IPO market despite Uber, Lyft busts’ (CNBC, 29 December 2019) <https://www.cnbc.com/2019/12/29/saudi-aramco-alibaba-among-biggest-ipo-of-2019.html> accessed on 1 February 2020
48 E-commerce Research Centre (WWW.100EC.CN), China’s E-commerce Public Listed Company Data Report 2018 (《2018年度中国电商上市公司数据报告》), 13 May 2019
49 Full text at: http://www.gov.cn/zhengce/content/2015-06/20/content_9955.htm
50 See also Caitlin Schultz, ‘Guiding Opinions to Promote Healthy and Rapid Development of Cross-Border E-Commerce’ (Law Business Research, 26 June 2015) <https://www.lexology.com/library/detail.aspx?g=b5264803-b393-4399-b042-7eafded82ec> accessed on 1 February 2020
51 See below Section 3.1.
52 McKinsey Global Institute, China’s Digital Economy: A Leading Global Force, August 2017)
53 Ibid
54 Yu Hong and Jian Xu, “Toward Fragmented Platform Governance in China: Through the Lens of Alibaba and the Legal-Judicial System” (2019) 13 International Journal of Communication 4642
55 McKinsey Global Institute, China’s Digital Economy: A Leading Global Force, August 2017)
56 Faye Fangfei Wang, Law of Electronic Commercial Transactions: Contemporary issues in the EU, US and China (2 edn, Routledge 2016) Page 297 - 298
57 It, inter alia, encourages the use of strong authentication technology by providing that, if electronic documents are authenticated using what the law deems to be a highly reliable technology, then that authentication will be treated as the equivalent of a traditional signature without any of the uncertainty that surrounds the admissibility of electronic evidence generally under PRC law. Jane K. Winn and Yuping Song, ‘Can China Promote Electronic Commerce Through Law Reform? Some Preliminary Case Study Evidence’ (2 January 2007) Available at SSRN: https://ssrncom/abstract=901849 or http://dx.doi.org/102139/ssrn901849
58 Hongfei Yue, ‘National Report on E-Commerce Development in China’ (2017) Inclusive and Sustainable Industrial Development Working Paper Series WP 17
59 For example, the Guidelines for the Standardization of Online Retailing 2017. See further discussion under Section 4.2 below.
60 McKinsey Global Institute, China’s Digital Economy: A Leading Global Force, August 2017)
proaches are inadequate to address pernicious issues such as the abusive processing of consumer personal data.\textsuperscript{61}

It is therefore essential to rejuvenate the piecemeal regulatory approaches to a coherent, comprehensive, and innovative regulatory paradigm. The new E-commerce Law serves such a regulatory paradigm shift. It regulates a full range of E-commerce activities referred to as business undertakings of selling commodities or providing such services via ICT networks by E-commerce business operators.\textsuperscript{62} E-commerce business operators thereby are defined into three categories\textsuperscript{63};

| Category | Definitions | Examples |
|----------|-------------|----------|
| E-commerce platform operators | Any legal persons or unincorporated organizations that provide virtual places for digital business, transaction matching, information release, and other services to facilitate parties in an E-commerce transaction | T-mall.com, or JD.com. |
| On-platform business operators | Third party merchants that sell goods or provides services to consumers via E-commerce platforms | Apple Store, or Huawei Store |
| Other operators | Other operators doing E-commerce business via their own websites or via other online channels, such as social media applications | Weibo, Tiktok, or WeChat |

In detail, the new E-commerce Law specifies the qualifications and responsibilities of E-commerce business operators, formation and performance of online contractual agreements, settlement of E-commerce derived disputes, promotion of E-commerce-based platform economy, and legal liabilities for breaching the new Law.\textsuperscript{64} In essence, the new Law purports to administer the intertwined relationship between three constituents of the E-commerce ecosystem: the state, the consumers, and the business operators. The gist is to strike a balance between consumer protection and commercial innovation for a sustainable growth of E-commerce platform economy. The following sections distill the featuring regulatory objectives striving for such a balance: 1) provision of supplementary systems, 2) protection of consumer rights, and 3) prioritization of fair competition.

3.1. Providing public goods

A vibrant E-commerce market is critically dependent on the robust support of supplementary systems to platform economy, like infrastructural technologies and complementary institutions.\textsuperscript{65} These supplementary systems share features of public goods, namely, non-rivalrous consumption and non-excludability. They tend to be undersupplied by private profit-maximizing entities.\textsuperscript{66} To correct this market failure in the provision of public goods, public policies are imperative to either mandate the government to directly produce public goods such as internet infrastructures and transportation network, or allow the government to indirectly subsidize the private provision of public goods such as logistics systems.\textsuperscript{67} The exponential growth of China’s E-commerce market proves that carefully designed industrial policies are essential in concerted public and private provision of public goods to stimulate technological advancement, commercial innovation, and economic transformation.\textsuperscript{68}

The new E-commerce Law codifies such a public policy choice to pledge government support for the provision of supplementary systems of public good nature. It dedicates a whole Chapter V to facilitate the creation of a broad range of systems to further boost E-commerce market. It calls for governments of all levels to incorporate the promotion of E-commerce market into their economic and social development plans, to formulate implementation rules to enhance commercial innovation, to encourage cross-border E-commerce transactions, to integrate E-commerce development with other sectors of platform economy.\textsuperscript{69}

Among others, an efficient network of logistics services is one foundational supplementary system to sustain long-distance E-commerce transactions. The supply of logistics services, however, is highly dependent on the governmental support with its public good nature. Its under-supply tendency by private entities is further exacerbated in the rural areas where accompanying systems including transportation network, warehouse facilities, internet access and human capital are in deficits compared to urban areas. With the government’s agenda to promote the proliferation of E-commerce market to alleviate poverty and to advance transformation in the rural areas, it becomes imperative for the state to pledge further direct investments or indirect subsidies.\textsuperscript{70}

The Law mandates governments of all levels to attach importance to the construction of an efficient distribution network including intelligent trans-regional and cross-industry logistical platforms, express distributing stations, and many others. For example, local governments are required to reserve lands for logistical warehousing in town planning, to plan for land supply and utilization, to divert social capital to invest

\textsuperscript{61} See further discussion on the processing of personal data under Section 3.2 below

\textsuperscript{62} Articles 2 & 9, the E-Commerce Law

\textsuperscript{63} Article 9, the E-commerce Law

\textsuperscript{64} Respectively, Chapters II, III, IV, V & VI of the E-commerce Law

\textsuperscript{65} Hongfei Yue, ‘National Report on E-Commerce Development in China’ (2017) Inclusive and Sustainable Industrial Development Working Paper Series WP 17

\textsuperscript{66} For a general discussion on public goods, see, e.g., Robert Cooter and Ullen Thomas, Law and Economics (6 edn, Addison-Wesley 2012) Pages 40-41, 102-105; Wilfried Ver Eecke, ‘Public Goods: An Ideal Concept’ (1999) 28 Journal of Socio-Economics 425; Tyler Cowen (ed), Public Goods and Market Failures: a critical examination (Transaction Publishers 1992)

\textsuperscript{67} See also Karl Aiginger and Dani Rodrik, ‘Rebirth of Industrial Policy and an Agenda for the Twenty-First Century’ (2020) 70 Journal of Industry, Competition and Trade 1

\textsuperscript{68} Section 2 above

\textsuperscript{69} Articles 64, 67, 71 – 73, the E-commerce Law

\textsuperscript{70} E-commerce is recognized as one of the ten “Precisive Poverty Alleviation Agendas”: http://www.gov.cn/xinwen/2015-01/23/content_2809383.htm
in the construction of storage facilities. One dire challenge to grapple with in such governmental support of public good provision is the long-term fiscal sustainability.

A possible solution to this challenge emerges from public and private collaboration. The government led by the Ministry of Finance and the Ministry of Commerce, for example, launched the Rural E-Commerce Demonstration Program in 2014. According to this program, governmental subsidies were provided to lower the delivery costs in collaboration with China Post and commercial logistics companies. Meanwhile, the Rural Taobao Program was initiated in 2014 between local governments and Alibaba Group to render rural areas greater access to a broader variety of Taobao-based e-commerce services. The Program features collaborative initiatives to improve, inter alia, logistical connections for villages through “two-stage delivery” shipping packages from county centres to villages. As of 2018, according to the Alibaba Group, the Rural Taobao network was delivering 60 percent of the goods on the same day (from county to village) in more than 30,000 villages covered, a significant improvement over the previous average delivery time of two days.

In addition to foundational supplementary systems such as the logistics services, the new Law also actively advocates the incorporation of unconventional supplementary system, in particular, the social credit system to foster a business environment of integrity. The law requires governments to support creation of legally established credit evaluation institutions to carry out E-commerce credit evaluation services. E-commerce platform operators shall establish and improve credit evaluating systems, publicize credit rating rules, and provide consumers with a channel through which they can evaluate the commodities sold or services provided on the platform. If an E-commerce operator commits any illegal act as prohibited by the law, the illegal activity shall be recorded in the perpetrator’s credit file per the provisions of relevant laws and administrative regulations.

Such a proactive governmental support for the provision of supplementary systems as public goods differs from the approach adopted in other jurisdictions. The European Union, for example, has also a long history of political endorsement for the development of E-commerce sector. As early as 1997, the European Commission issued “A European Initiative on Electronic Commerce”. The Initiative purported to provide a coherent EU policy framework to encourage the vigorous growth of electronic commerce in Europe, and to “make Europe the heartland of electronic commerce.” Such a vision, however, seems not to have materialized. The hurdles can be largely attributed to lack of supplementary systems, in particular, efficient distribution channels within a trans-European market. It was not until 22 May 2018 that a EU regulation on cross-border parcel delivery services came into effect, with the primary aim of reducing cross-border transaction costs and enhancing single market efficiency. Yet the effectiveness of implementing regulation remains unclear for the present discussion.

3.2. Protecting consumer privacy

Protecting personal data from misappropriation in the E-commerce market has become one critical aspect of consumer right protection. On the one hand, ICT networks render it easier to access, aggregate, distribute, and utilize a greater amount of personal data than ever before. On the other hand, E-commerce market abounds in what is best described as “barter transactions” involving the exchange of personal data for the right to access online resources. “Personal data is the new oil of the internet and the new currency of the digital world.” Many E-commerce businesses are built predominantly around the collection and commercial utilization of personal information generated by users’ online consumption.

80 Arno R. Lodder and Andrew D. Murray, ‘Chapter 1, The European Union and E-Commerce’ in Arno R. Lodder and Andrew D. Murray (eds), EU Regulation of E-Commerce: A Commentary (Edward Elgar 2017)
81 Executive Summary, A European Initiative on Electronic Commerce, COM(97) 157 final, Brussels, 16.04.1997. Page 4
82 Arno R. Lodder and Andrew D. Murray, ‘Chapter 1, The European Union and E-Commerce’ in Arno R. Lodder and Andrew D. Murray (eds), EU Regulation of E-Commerce: A Commentary (Edward Elgar 2017)
83 Other contributing barriers may include the recognition heuristic, linguistic barriers. Ibid
84 Regulation (EU) 2016/679 of the European Parliament and of the Council of 18 April 2016 on cross-border parcel delivery services (Text with EEA relevance.) Of L 112, 2.5.2018, p. 19–28
85 Previous safeguards of data privacy were largely owing to the cost and inconvenience of retrieving and commercializing personal information stored in deteriorateable tangible forms.OECD, Economic and Social Impact of E-commerce: Preliminary Findings and Research Agenda (OECD Digital Economy Papers, No 40, 1 January 1999) Page 145
86 Bert-Jaap Koop, ‘Law, Technology and Shifting Power Relations’ (2010) 25 Berkeley Technology Law Journal 974
87 Benjamin Faber, Yizhen Gu and Lirong Liu, ‘Connecting the Countryside via E-Commerce: Evidence from China’ (March 2018, Revised April 2020) NBER Working Paper No 24584
88 Hongfei Yue, ‘National Report on E-Commerce Development in China’ (2017) Inclusive and Sustainable Industrial Development Working Paper Series WP 17
89 The World Bank and Alibaba Group, E-commerce Development: Experience from China, 2019
90 Ibid
91 The Rural Taobao Program has expanded rapidly, from 212 villages in 12 counties in 2014 to more than 30,000 villages in 1,000 counties in 2018, spreading from the coast to inland. Victor Couture, Benjamin Faber, Yizhen Gu and Lirong Liu, ‘Connecting the Countryside via E-Commerce: Evidence from China’ (March 2018, Revised April 2020) NBER Working Paper No 24584
92 Articles 3 & 70, the E-commerce Law
93 For a general discussion on China’s credit system, see: Daithi Mac Sthigh and Mathias Siems, ‘The Chinese Social Credit System: A Model for Other Countries?’ (2019) 82 The Modern Law Review 1024
94 Article 70, the E-commerce Law
95 Ibid, Article 39
96 Ibid, Article 86
activities. The so-called "personalization", aka "algorithmic price discrimination", epitomises this pernicious issue, where the consumer's personal information is utilized to discover their preferences and to determine the maximum price they can be charged.

The E-commerce Law requests that businesses operators ensure lawful, transparent, and fair processing of consumer personal information. It addresses the algorithmic price discrimination based on profiling of personal data. E-commerce business operators may recommend selected goods or service to a consumer based on their internet browsing history, purchasing records, personal interests, and other behavioural characteristics, but they must provide opt-out mechanism for the latter to access non-specifically personalized services or products. More importantly, information distinguishing personalized options and non-personalised options must be conspicuously displayed.

The E-commerce Law, however, lacks detailed implementation rules with respect to the conditions, scopes, methods of personal data processing. It is vaguely stated that E-commerce operators must abide by existing Chinese laws and regulations to ensure lawful, transparent and fair processing of consumer personal information. As of this date, however, China does not have a systematic and comprehensive legal framework with respect to personal data processing. The existing regime features a patchwork of inadequate rules that scatter around various regulatory instruments. For example, the Cybersecurity Law 2017 prescribed that Network Operators shall strictly maintain the confidentiality of user information they collect, and establish user information protection systems. In collecting and utilizing personal information, Network operators shall follow relevant laws and regulations to: (1) obtain users’ consent prior to processing the latter’s personal information; (2) specify and disclose the scope, methods and purposes of the data processing. Relevant laws and regulations to implement such provisions are yet to established.

For the future legislative development, the EU General Data Protection Regulation 2016/679 (GDPR) may serve as a valuable reference. On the one hand, the GDPR endorses consent as the fundamental concept in the European legal framework on data protection. It requires an enhanced act of consent by a clear affirmative action or a statement to establish a freely given, specific, informed and unambiguous indication of agreement to the processing of personal information. On the other hand, the GDPR imposes tedious disclosure requirements on the business operators, who must inform consumers about, inter alia, the purposes of the intended personal data processing. Such purposes must be “specified”, “explicit” and “legitimate”. Personal data shall not be processed in a manner that is “incompatible” with those purposes.

To assess the (in)compatibility, Article 6(4) of GDPR stipulates five factors for the business operators to take into account. In brief, GDPR imposes actionable data protection mechanisms on entities providing an information society service.

Indeed, some elements of GDPR have already found their way into one recently revised national industrial standard: Information Security Technology – Personal Information Security Specification (GB/T 35,273—2020, PIS Specification). Pursuant to the PIS Specification, consent by personal in-

88 Richard Warner and Robert H. Sloan, 'Behavioral Advertising: From One-Sided Chicken to Informational Norms' (2012) 15 Vanderbilt Entertainment and Technology Law Journal 49See also: Eliza Mík, 'Legal and Regulatory Challenges to Facilitating E-Commerce in the ASEAN' (1 December 2017) Available at SSRN: https://ssrn.com/abstract=3100578 or http://dx.doi.org/102139/ssrn3100578
89 Oren Bar-Gill, 'Algorithmic Price Discrimination: When Demand is a Function of Both Preferences and (Mis)perceptions' (2019) 86 UNIVERSITY OF CHICAGO LAW REVIEW 217 OECD, Personalised Pricing in the Digital Era: Background Note by the Secretariat, 28 November 2018) Tal Z. Zaray, ‘Mine Your Own Business: Making the Case for the Implications of the Mining of Personal Information in the Forum of Public Opinion’ (2003) 5 Yale Journal of Law and Technology 1
90 Article 5, the E-commerce Law
91 Ibid, Article 18
92 Ibid, Article 77
93 Ibid, Article 5&23
94 For example, provisions under the General Principles of Civil Law 2017 (Articles 110&111), the Tort Law 2010 (Article 2), and Consumer Protection Law 2014 (Articles 298&30) have been applied to interpret data protection rights as a right of reputation or right of privacy.
95 “Network operators” refer to network owners, network managers, and network service providers. Article 76.3, Cyber Security Law 2017
96 Article 40, Cyber Security Law 2017
97 Ibid, Article 41
98 The GDPR consists of a set of provisions including Consent, Right to Object to Profiling, Data Portability, Right to be Forgotten/Erasure, One Stop Shop for Privacy Compliance, Data Protection Officers, Data Breach Notification, and Punishments. OJ L 119, 04.05.2016, https://eugdpr.orgSee also Roslyn Layton, ‘How the GDPR Compares to Best Practices for Privacy, Accountability and Trust’ (5 March 2017) Available at SSRN: https://ssrn.com/abstract=2944358 or http://dx.doi.org/102139/ssrn2944358
99 For a historical and theoretical account, Eleni Kosta, Consent in European Data Protection Law (Martinus Nijhoff Publishers 2013)
100 GDPR, Article 4 (11): definition of "consent"; Article 7: Conditions for consent
101 Ibid, Article 5: Principles relating to processing of personal data
102 They are: the link between the purposes; the context in which the data have been collected (especially the relationship between the data subject and the controller); the nature of the personal data; the potential consequences of further processing for the data subject; and the existence of appropriate safeguards. See further discussion: Tijmen H.A. Wisman, ‘Chapter 12, Privacy, Data Protection and E-commerce’ in Arno R. Lodder and Andrew D. Murray (eds), EU Regulation of E-Commerce: A Commentary (Edward Elgar 2017)
103 Issued jointly by the State Administration for Market Regulation (SAMR) and Standardization Administration of China (SAC) on 6th March 2020. It will take effect on October 1, 2020. The Specification 2020 is a revision to a prior version issued on 29 December 2017 and came into effect as of 3 May 2018 (GB/T 35273-2017). Further discussion on the features and functions of industrial standards is under the following Section 4.2.
formation subjects is one fundamental precondition for personal information processing. While processing sensitive personal information, an “explicit consent” will be required via a statement in paper format or digital format; or through an affirmative action on the personal information subject’s own initiative. The PIS Specification also obliges information controllers to “truthfully”, “accurately”, and “completely” disclose an extensive list of information, which includes the identity of the controller, purposes and means of the intended personal data processing.

The PIS Specification represents an instrumental progress towards a systematic regime for personal data protection in China. It largely resembles the GDPR to the fundamental principles governing personal data processing. However, the PIS Specification differs from the GDPR in several noticeable variations. The first difference is on the conditions of consent. The GDPR regards “freely given” as one of the general preconditions for processing all types of personal data. The GDPR takes an objective approach in assessing whether consent is freely given or not. Under the PIS Specification, however, “freely given” consent is required only for the processing of “sensitive personal information”. There is also no guidance on how to assess whether consent is freely given or not. Such a lax requirement on the conditions of consent is further exacerbated by the wide spectrum of exceptional scenarios. Indeed, the exception in respect of public safety, public health or major public interests has been widely cited to enable the collection of personal health and other information since the outbreak of COVID-19.

Secondly, the GDPR by its nature is a binding legislative act applicable in its entirety across the European Union. Infringements of the requirement of consent are subject to judicial remedy, administrative fines or criminal penalties. In contrast, the PIS Specification does not have the binding force of statutory instrument. It is by nature an industrial standard setting out best practice guidelines for business operators to adopt voluntarily. In the event of non-compliance, regulators would have to resort to other binding rules scattered across Cyber Security Law, Consumer Protection Law and other statutory instruments.

The third difference relates to the deterrence effects of these requirements. Under the GDPR, infringements of conditions for consent, for instance, are subject to administrative fines up to EUR 20 million; or in the case of an undertaking, up to 4% of the total worldwide annual turnover of the preceding financial year, whichever is higher. In contrast, under China’s Cyber Security Law, administrative fines of such infringements are capped at a paltry RMB 1 million (about EUR 125,000); or ten times the amount of unlawful gains. In April 2018, Alipay, the payment service operated by Alibaba Group Holdings’ Ant Financial Services unit, was found guilty on three accounts: (1) insufficient disclosure, (2) misleading representation, (3) inappropriate data processing. The total administrative fine imposed by the regulator was just RMB 180,000, which amounted to less than 0.000174% of Alipay’s 2018 annual turnover.

Suffice to say that the deterrence effect under current Chinese rules is far from adequate. Such a situation might change soon. The national congress has enlisted the Personal Information Protection Law on its 2020 legislative agenda. According to the draft bill, the administrative fines will be categorically elevated: infringements would be subject to fines between 1% to 5% of the total domestic annual turnover of the preceding financial year. It remains to see the final enactment of such a law.

104 Article 4.3 & 5.4, the PIS Specification
105 Personal sensitive information refers to those once leaked, illegally provided, or abused, can threaten personal and property security, and/or easily cause personal reputational damage, physical and mental health damage, or lead to discriminatory treatment. Ibid, Article 3.2 & Annex B. The scope of personal sensitive information in the PIS Specification resembles the personal data of a child and the special categories of personal data under articles 8-9 of the GDPR.
106 Otherwise, an implied consent through passive inaction, e.g., not exiting an information collection zone even after being informed of such a collection process, would suffice. Article 3.6, the PIS Specification
107 Ibid, Article 4.5 & 5.5
108 Unless exempted statutorily by e.g., Article 6.1(b)-(f), the GDPR and the PIS Specification both required consent for all types of personal data. However, the PIS Specification takes a step further and specify the disclosure to be made in the form of “privacy policy”. Annex D of the PIS Specification provide an elaborated template for the data controller to meet her onerous disclosure obligation.
109 Compared to the prior 2017 version, a new scenario has been added to broaden the public interest exemption to allow the collection and processing of personal information in compliance with the performance of a controller’s statutory obligations. Article 5.4, the PIS Specification
110 Barbara Li and Bohua Yao, ‘Data Protection Report: Personal Data Protection in the Time of Coronavirus (Covid-19)’ (Norton Rose Fulbright Blog Network, 25 February 2020) <https://www.dataprotectionreport.com/2020/02/personal-data-protection-in-the-time-of-coronavirus-covid-19/> accessed on 4 June 2020
111 The GDPR has the territorial jurisdiction as long as one of these elements is met, the activities taking places within EU, the subjects are within EU, or the controllers are within EU. Article 1-3, the GDPR
112 Ibid, Articles 77-84
113 Further discussion on the features and functions of industrial standards in China is engaged in the following Section 4.2
114 E.g., Cryptography Law 2010, Decision of the NPC Standing Committee on Strengthening Network Information Protection 2012, Measures for the Determination of the Collection and Use of Personal Information by Apps in Violation of Laws and Regulations 2019.
115 Article 83.5, the GDPR
116 Article 64, the Cyber Security Law 2017
117 Yu Xiaoming, ‘Alipay fined $28,551 by central bank’ (China Daily, 9 April 2018) <https://www.chinadaily.com.cn/a/201804/09/W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W020180409W0
3.3. Promoting fair competition

Fair competition is essential for the sustainable growth of E-commerce market. China’s E-commerce market, however, has been rampant by the encroachment of Intellectual property (IP) rights and other anti-competitive behaviours. Both the largest and the third largest E-commerce platforms, taobao.com and Pinduoduo.com, have been placed on the Notorious Markets List by the Office of the US Trade Representative (USTR).122

The new E-commerce Law demonstrates greater efforts by Chinese policy makers to tackle the endemic infringement of IP rights to promote fair competition. It stipulates that as a general principle, all E-commerce business operators are obliged to “respect and protect intellectual property rights”.123 Article 41 enunciates that E-commerce platform operators must establish IP protection rules and publish them on their respective platforms. These rules must not reduce the statutory level of IP protection or set unreasonable obstacles for the exercise of IP rights by their rightful owners. Platform operators shall include information such as detailed obligations of the platforms, clear procedures of filing complaints, mechanisms for dispute resolution and legal liabilities for rule breach. The platform operators must also establish automatic information systems to receive, transmit, and process notifications from IP right owners.124

Moreover, the E-commerce Law establishes the “report and response” mechanism to ensure the protection of IP rights. If an IP rights owner perceives that their IP rights have been infringed, they may notify the platform operator and request the latter take preventive protection measures, such as screening, deleting, blocking, disabling the webpages link and other related on-platform information, terminating on-platform transactions or services related to the alleged infringement.125

If E-commerce platform operators fail to promptly take the necessary preventive measures after becoming aware of the infringement or upon receiving an infringing notice, they are jointly and severally liable for additional damages along with the perpetrators.126 Such a joint and several liability had previously been imposed by other statutory instruments and enforced in judicial actions. For example, the Supreme Court in 2017 endorsed a ruling issued by the Intermediate Court of Jinhua City, Zhejiang Province.127 The Intermediate Court found that Tmall.com, a subsidiary of Alibaba Group, had received a patent infringement notice, but failed to take necessary measures to expeditiously address the alleged infringement. Applying Article 36 of the Tort Law 2010, the Court held Tmall.com liable, jointly, and severally, for the enlargement of damages.128

The “report and response” mechanism, however, is a double-edged sword. It may be misused, erroneously or maliciously, to stifle fair competition.129 Article 42 of the E-commerce Law hence requires that any person claiming an infringement of their IP rights must submit bona fide notification to E-commerce platforms with prima facie evidence on the constitution of infringement, including proof of identity, proof of rights and the fact of the alleged infringement. Where a person made a notification of infringement in error or in malice, such a person shall be liable for the damages inflicted upon other business operators as a result of the false notification.130 Meanwhile, when the allegedly infringing party raises an objection or defense against the preventive measures, Article 43 returns the final decision to the administrative or judicial authorities. Complainants are required to seek public enforcement within 15 days upon receiving the denial statement. E-commerce platform operators do not conduct substantive examination of the infringement notice by the complainants, nor of the denial statement by the respondents.

This rule on the abuse of the report and response mechanism has recently found its way into judicial enforcement. In the case of Wang v. Jiang & Taobao.com,131 Mr Wang and Mr Jiang were both on-platform business operators running their own apparel stores on the E-commerce platform, taobao.com. Mr Jiang submitted a notification of infringement with forged credential documents to taobao.com, claiming a misappropriation of his trademark by Mr Wang. Upon receipt of the infringement notification, taobao.com promptly took preventive protection measures, including disabling the webpages link to the disputed items, reducing the allowances for the trading volume of Mr Wang’s online store. Consequently, the monthly turnover of Mr Wang’s store was slashed by half. In the judgment delivered on 24 January 2019, the Internet Court in

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122 The List highlights 33 online markets and 25 physical markets allegedly failing to curb the sale of counterfeit products. It is worthy to note that: “The List does not make findings of legal violations. Nor does it reflect the U.S. Government’s analysis of the general IP protection and enforcement climate in the countries connected with the listed markets.” Office of the US Trade Representative, 2018 Out-of-Cycle Review of Notorious Markets, April 25, 2019 See also Chris Prentice and David Lawder, ‘U.S. adds another China e-commerce site to ‘notorious’ IP blacklist’ (Reuters, 25 April 2019) <https://www.reuters.com/article/us-usa-trade-notorious/u-s-adds-another-chinese-e-commerce-site-to-notorious-ip-blacklist-idUSKCN1S112Y> accessed on 1 July 2019
123 Article 5, the E-commerce Law See also Weijun Huang and Xiaoqiu Li, ‘The E-commerce Law of the People’s Republic of China: E-commerce platform operators liability for third-party patent infringement’ (2019) 35 Computer Law & Security Review 1
124 Article 42, the E-commerce Law
125 Ibid
126 Ibid, Articles 42-45

127 Weihai Jia Yi Kao Household Electronics Appliances Co., Ltd v Zhejiang Tmall Network Co., Ltd, Guiding case No. 83, Supreme Court of China, 2017
128 See also China Guiding Cases Project, ‘Guiding Case No. 83: Weihai Jia yi Kao Household Appliance Co., Ltd. v. Yongkang Jinhui Industry & Trading Co., Ltd. and Zhejiang Tmall.com Network Co., Ltd., A Dispute over Infringement of an Invention Patent’ (Stanford Law School, 14 September 2018) <https://cgc.law.stanford.edu/guiding-cases/guiding-case-83/> accessed on 1 February 2020
129 See also Rosa Julia- Barceló and Kamil J. Koelman, ‘Intermediary Liability in the E-Commerce Directive: So Far So Good, But It’s Not Good Enough’ (2000) 16 Computer Law & Security Review 231
130 Article 43 & 45, the E-commerce Law
131 Wang v. Jiang & Taobao [2018] Zhe 8601 Civil No. 868 (浙8601民初868号)
Hangzhou applied the Article 42 of the E-commerce Law to find that the malicious notification by Mr. Jiang constituted an unfair competition activity. Mr. Jiang was held liable for a total damage of RMB 2.1 million. In comparison, Articles 12–15 of the EU E-Commerce Directive 2000 clarify the liability standards involving transmission and storage of information by an information society service provider. They prescribe that Member States shall not impose liability on providers of online hosting service where such providers do not have actual knowledge of the illegality or, when they do, they act expeditiously to remove or block access to the material cooperating with administrative and judicial authorities. The procedure for the service provider to be informed and to remove or block access to the material, as found in Chinese law, is not provided in the Directive. Neither does the Directive provide specific provisions dealing with malicious or erroneous infringement notices that lead to an unjustified removal of online information. The absence of “notice and response” procedure on the EU level results in a great variety of procedures as established by domestic law of member states. Such regulatory heterogeneity jeopardizes regulatory harmonization at the EU level to create a level playing field in the digital single market, which stifles the development of the trans-European E-commerce market.

All in all, the regulatory regime established by the E-commerce Law is a great effort to promote fair competition in China’s E-commerce market. This regulation was not only to accommodate pressures from other countries but also to serve innovation oriented economic transformation in China. Most recently, the new Foreign Investment Law approved earlier in 2019 includes provisions that explicitly ban forced technology transfer. Further progress can be expected with the proposed revision of the patent law which is currently pending in the legislature. These revisions would further increase statutory penalties for patent infringement and put requirements on defendants in IP cases that would allow for better determination of damages in infringement cases.

For further discussion on the function of the Internet Court in Hangzhou, see Section 4.3 below. In conjunction with Article 2 of the Anti-Unfair Competition Law 2017, and Article 15 of the Tort Law 2010, Wang v. Jiang & Taobao [2018] Zhe 8601 Civil No. 868 (浙8601民初868号)

Article 14, the 2000 E-Commerce Directive

Analogous mechanism can be found also in the US Digital Millennium Copyright Act (DMCA) of 1998, which establishes, inter alia, a “notice and take-down and put-back procedure”. Section 512 (c) - (g), The US Digital Millennium Copyright Act (DMCA) of 1998 See also Rosa Juliá-Barceló and Kamiel J. Koelman, ‘Intermediary Liability in the E-Commerce Directive: So Far So Good, But It’s Not Good Enough’ (2000) 16 Computer Law & Security Review 231

Alexandre de Streel, Miriam Buiten and Martin Peitz, Liability of Online Hosting Platforms: Should Exceptionalism End?, September 2018

Jan Nordemann, 'Liability of Online Service Providers for Copyrighted Content – Regulatory Action Needed?' (2018) In-Depth Analysis for the IMCO Committee of the European Parliament

Bert Hofman, Qian Jiwei and Erik Baark, 'Innovation and China’s Global Emergence' (14 August 2019) EAI Commentary No 3

4. A new mode of governance

In 1997, the World Bank noted, “Far-reaching developments in the global economy have us revisiting basic questions about government: what its role should be, what it can and cannot do, and how best to do it.” One answer to these questions is often referred to as the “New Governance”. In contrast to the conventional command-and-control regulation backed by hierarchical state legislation, a New Governance features polycentric regulation with characteristics including greater reliance on non-state institutions, greater flexibility and sensitivity to context, less hierarchical in nature and less committed to uniform outcomes. This new mode of governance demonstrates an increasing awareness of collaboration involving a multi levels of public and private institutions.

It beckons a shift of governance paradigms from hierarchical governments to networked organizations, from mandatory rules to negotiated norms, from centralized dispute resolution to diverse alternative mechanisms.

The new E-commerce Law appears to reflect such a paradigm shift for the administration of China’s E-commerce market. The burgeoning E-commerce and its underlying ICT innovation promise a decentralized market that merits a new regulatory paradigm for sustainable social and economic development. The New Governance model innovates the three instrumental components of a regulation paradigm: regulators, rulebooks, and their enforcement. The following sections proceed to explicating these components in their innovative representation under the new E-commerce Law: platform-based co-regulatory framework; market-oriented industrial standards; technologies-enabled dispute resolutions.

4.1 Platforms based co-regulatory framework

In the conventional brick-and-mortar market, the primary solution to market failures is direct intervention by a government agency. Within the platform economy context, however, the existence of third-party platforms that mediate commercial transactions fundamentally alters what the market is ca-

The World Bank, World Development Report 1997: The State in a Changing World, 1997

De Búrca Grainne and Joanne Scott, 'Introduction: New Governance, Law and Constitutionalism' in Grainne De Búrca and Joanne Scott (eds), Law and the New Governance in the EU and US (Hart 2006)

Julia Black, 'Constructing and Contesting Legitimacy and Accountability in Polycentric Regulatory Regimes' (2008) 2 Regulation & Governance 137 Julia Black, 'Regulatory Conversations' (2002) 29 Journal of Law and Society 163

Jane K. Winn, 'Electronic Commerce Law: Direct Regulation, Co-Regulation and Self-Regulation' (September 2010) Cahiers du CRID, Available at SSRN: https://ssrn.com/abstract=1634832

Lester Salamon, 'The New Governance and the Tools of Public Action: An Introduction' in Lester Salamon (ed), The Tools of Government: A Guide to the New Governance (Oxford University Press 2002)

UNCTAD, Information Economy Report 2015: Unlocking the Potential of E-commerce for Developing Countries, 2015 OECD, 'Consumer Protection in E-commerce: OECD Recommendation' (2016) OECD Publishing, http://dx.doi.org/101787/9789264255258-en
pable of providing on its own. In providing online trading arenas, not only do E-commerce platforms serve as matchmakers between different groups of platform users, they also play sophisticated governance roles in construing codes of conducts essential for the functioning of online markets. Drawing on platforms’ advantageous capacities of technology utilization and direct access to user information, public regulators are increasingly relying on E-commerce platforms’ essential role as a co-regulatory intermediary.

The new E-commerce Law endorses such a platform-based co-regulatory framework as an effective governance mechanism for China’s E-commerce market. Article 7 stipulates that the State shall establish a collaborative administration system in line with the characteristics of E-commerce transactions involving government authorities, E-commerce platform operators, and other relevant market participants. The new Law specifies a series of responsibilities on E-commerce platforms to enable the functioning of platforms-based co-regulatory framework.

The first and foremost responsibility of the E-commerce platforms is to enhance transparency-oriented information management. Information is one of the key factors for effective co-regulation. Effective information management constitutes the first step for efficient market governance. On the one hand, provision of identification information by E-commerce platform users deters themselves from infringing legal rights of others; on the other hand, storage of such information renders timely proof of evidence, potentially of critical importance, for public or private enforcement when a dispute arises.

Pursuantly, all E-commerce business operators are required to complete mandatory business registration as the so-called Relevant Market Entities, unless exempted otherwise. Platform operators are obliged to make good entry points, verify and register the real identity information of the Relevant Market Entities that enter the platform to carry out E-commerce activities. Platform operators are also required to submit to the relevant government authorities aggregated information including the market entity registration for tax collection purpose and other purposes as required by law and regulation. An E-commerce platform failing to perform such report duties will face a penalty ranging from RMB 20,000 to RMB 100,000.

The new Law also mandates platform operators to retain E-commerce transactional data. E-commerce platform operators must record and retain the information of commodities, services and transactions and ensure the integrity, confidentiality, and availability of such information. Such information shall be retained for at least three years from the day of completion of the transaction. Platform operators are obliged to enact technological measures to ensure the platform cybersecurity and protect information safety. They must establish a contingency plan against potential data breaches, take prompt remedial action in case of information leakage, and report to the relevant department expeditiously.

The data security obligation would project positive impacts on the E-commerce ecosystem. Online platforms hitherto have largely escaped penalty sanctions for user data breach. For example, JD.com reported in 2016 a leak of 12 gigabyte package of user data, which was subsequently traded on the black market; the Shanghai-based Ctrip group, one of the leading online travel agencies in the world, was hit in 2014 by a leak of consumer data including ID card and credit card. Neither company received regulatory sanctions. In comparison, British Airways was recently sanctioned by the UK Information Commissioner’s Office with a record fine of GBP 183 m for passenger data breach.

146 Mark Fenwick, Joseph A. McCahery and Erik P. M. Vermeulen, ‘The End of ‘Corporate’ Governance: Hello ‘Platform’ Governance’ (2019) 20 European Business Organization Law Review 171 Raymond H. Brescia, ‘Regulating the Sharing Economy: New and Old Insights into an Oversight Regime for the Peer-to-Peer Economy’ (2016) 95 Nebraska Law Review 87
147 Molly Coherent and Arun Sundararaja, ‘Self-Regulation and Innovation in the Peer-to-Peer Sharing Economy’ (2017) 82 University of Chicago Law Review Online 116
148 Christoph Busch, ‘Self-Regulation and Regulatory Intermediation in the Platform Economy’ in Marta Cantero Gamito and Hans-Wolfgang Micklitz (eds), The Role of the EU in Transnational Legal Ordering: Standards, Contracts and Codes (Edward Elgar 2020)
149 Yu Hong and Jian Xu, ‘Toward Fragmented Platform Governance in China: Through the Lens of Alibaba and the Legal-Judicial System’ (2019) 13 International Journal of Communication 4642
150 Mark Fenwick, Joseph A. McCahery and Erik P. M. Vermeulen, ‘The End of ‘Corporate’ Governance: Hello ‘Platform’ Governance’ (2019) 20 European Business Organization Law Review 171; Heejin Kim, ‘Globalization and Regulatory Change: The Interplay of Laws and Technologies in E-commerce in Southeast Asia’ (2019) 35 Computer Law & Security Review 1
151 Weijun Huang and Xiaojiu Li, ‘The E-commerce Law of the People’s Republic of China: E-commerce platform operators liability for third-party patent infringement’ (2019) 35 Computer Law & Security Review 1
152 Registration may be exempted if the business operators are individual natural persons, who: 1) sell agricultural and side-line products or household handicraft products produced by themselves, or 2) use their own skills to engage in public convenience services or occasional and low-value transactions for which no license is required by the law. Article 10, the E-commerce Law
153 Ibid, Article 28
154 Ibid, Article 76
155 Ibid, Article 31
156 Ibid, Article 30
157 Chen Mengfan and April Ma, ‘Hacked JD.com Customer Data Being Traded, Reports Say’ (The Caixin, 12 December 2016) <https://www.caixinglobal.com/2016-12-12/hacked-jdcom-customer-data-being-traded-reports-say-101026149.html> accessed on 1 September 2019
158 Listed on NASDAQ since 2003, Ctrip.com occupies 60% of China’s online travel industry and is the world’s second-largest online travel agent after Priceline Group in terms of gross merchandise value. As of February 2019, Ctrip owns Scotland-based Skyscanner, American-based Tours4Fun, Indian-based MakeMyTrip. Eamon Barrett, ‘Why Ctrip, China’s Largest Online Travel Agent, Will Be Celebrating Chinese New Year’ (The Fortune, 1 February 2019) <https://fortune.com/2019/02/01/why-ctrip-chinas-largest-online-travel-agent-will-be-celebrating-chinese-new-year/> accessed on 1 September 2019
159 Zhang Ye, ‘Ctrip Hit by Security Loophole’ (The Global Times, 24 March 2014) <http://www.globaltimes.cn/content/850298.shtml> accessed on 1 September 2019
160 Rory Cellan-Jones, ‘British Airways Faces Record £183 m Fine for Data Breach’ (The BBC, 8 July 2019) <https://www.bbc.com/news/business-48905907> accessed on 16 September 2019
Conflict of interests is another pernicious issue for effective co-regulation. Platform economy features a two-sided market. While providing intermediation services for on-platform sellers and consumers, E-commerce platforms engage in direct competition against other platform operators for a higher market share. Their interests are not always perfectly aligned while functioning both as market intermediaries and market participants. The new E-commerce Law attaches importance to operational neutrality in order to contain the conflict of interests of E-commerce platforms. A series of mechanisms are established to prevent platform operators from taking advantage of their structural and dominant market position to set unfair on-platform service agreements and trading rules.

Articles 32 to 36 of the E-commerce Law, for example, enunciate in detail what a platform must abide by in the formulation of service agreements and trading rules. Platform operators must publicly solicit comments on proposed service agreements and trading rules at least seven days in advance. Once enacted, these rules and agreements, or links to such information, must be displayed in a conspicuous position on the platforms. Platforms are prohibited from employing unfair rules to intervene in the business autonomy of on-platform operators. In particular, this prohibition outlaws the “exclusive dealing” practice, which forces on-platform business operators to either deal with one platform exclusively or withdraw from that platform completely.

This “exclusive dealing” practice has recently found its way into a Supreme Court’s verdict regarding a high-profile lawsuit between China’s second largest E-commerce platform, JD.com, and the country’s largest E-commerce platform, Alibaba group. The defendant, Alibaba group, is accused of engaging “exclusive dealing” practice since 2013, which has prohibited E-commerce business operators trading on Alibaba controlled platforms from cross-listing on other competing platforms including the plaintiff, JD.com. A hefty damage of RMB 1 billion and expenditures of RMB 1 million are sought. Allegedly, such a practice by the Alibaba group constituted an abuse of dominant market position and breached the fair competition rule as prescribed by the E-commerce Law.

The Supreme Court’s verdict, however, is concerned on the procedural matter. It merely affirms the jurisdiction of Beijing Municipal High Court as the trial court. The trial on substantial issues of such a landmark case is yet to commence. It will be interesting to see the trial court’s choice of applicable regulation. Unfair anti-competition activities such as the “exclusive dealing” could be subject to regulatory purview of the E-commerce Law, the Anti-Unfair Competition Law or the Anti-monopoly Law. The respective sanction under each applicable law, however, contrasts to each other astonishingly. The administrative fine pursuant to the E-commerce law is capped at RMB 2 million; the cap under the Anti-Unfair Competition Law has risen to RMB 3 million; the fine under the Anti-monopoly Law could be as substantial as 10% of the turnover from the previous year on parties abusing its market dominant position. Such discrepant sanctions under different legislations would likely cause enforcement inconsistencies.

The comparatively moderate sanction imposed by the new E-commerce Law could compromise its deterrence effect, especially in dealing with multi trillion-dollar behemoths such as the Alibaba group. In a similar “exclusive dealing” case, a number of restrictive clauses were found in Google’s contractual agreements with third-party websites, which prevented the latter from placing their search adverts on Google’s rival websites. The sanction by the European Commission on Google was a substantial EUR 1.49 billion. In short, the choice of applicable law and the substantive judgment of the ongoing lawsuit between JD.com and Alibaba group will have far-reaching impact on the business conducts of industrial behemoths, the effectiveness of co-regulatory framework, and the sustainable development of E-commerce market.

4.2. Market oriented industrial standards

Industrial standard setting dates back to the 19th century in the US when the emergence of a national economy integrated by railroads and telegraph required the definition of national technical standards to guide industry and commerce. Recent years have witnessed a proliferation of a wide variety of standards in national and international commercial transactions. Governments across the globe have endeavoured to facilitate an international wide, market driven, industry led and consensus-based environment for standard setting and

161 Jean-Charles Rochet and Jean Tirole, ‘Platform Competition in Two-Sided Markets ’ (2003) 1 Journal of the European Economic Association 990

162 Molly Coherent and Arun Sundararajja, ‘Self-Regulation and Innovation in the Peer-to-Peer Sharing Economy’ (2017) 82 University of Chicago Law Review Online 116 See also Tim Wu, The Curse of Bigness: Antitrust in the New Gilded Age (Columbia Global Reports 2018); Lina M. Khan, ‘Amazon’s Antitrust Paradox’ (2016) 126 Yale Law Journal 710

163 Ibid, Article 33

164 Ibid, Article 35

165 Supreme Court Verdict, [2019] No. 130 (Civil), as published on 9 October 2019. (2019) 最高人民法院 130

166 Ibid, para [5]

167 Also, the Anti-monopoly Law 2008 and the Anti-Unfair Competition Law 2018. Ibid, para [5]

168 Articles 2, 12 & 24, the Anti-Unfair Competition Law

169 Articles 17-19 & 47, the Anti-monopoly Law

170 The minimum fine is set at RMB 5,000, Article 82, the E-commerce Law

171 The minimum fine is set at RMB 10,000, Article 24, the Anti-Unfair Competition Law

172 Between 1% and 10%, Article 47, the Anti-monopoly Law

173 See further: European Commission, ‘Antitrust: Competition Fines Google €1.49 Billion for Abusive Practices in Online Advertising (Press release)’ <https://europa.eu/rapid/press-release_IP-19-1770_en.htm> accessed on 1 January 2020

174 Jane Kaufman Winn and Benjamin Wright, Law of Electronic Commerce (4 edn, Wolters Kluwer 2019-1 SUPPLEMENT) Section 1.04 [4]

175 Morten Kallestrup, ‘Stakeholder Participation in European Standardization: A Mapping and an Assessment of Three Categories of Regulation’ (2017) 44 Legal Issues of Economic Integration 381; CEBR, The Economic Contribution of Standards to the UK Economy, June 2015}
implementing.\textsuperscript{176} Policy makers in the EU, for example, have regarded standards (codes of conduct), established by professional entities in close cooperation with the European Commission, as “the best means of determining the rules on professional ethics applicable to commercial communication.”\textsuperscript{177} In the EU alone, the total number of standards has risen from approximately 4000 to approximately 25,000 during the last two decades.\textsuperscript{178}

For the governance of platform economy, especially the E-commerce market, strong incentives exist for both policymakers and market participants to promote market oriented industrial standards.\textsuperscript{179} Firstly, the dynamic nature and nascent phase of the E-commerce market have heightened the risks associated with premature or disproportionate regulation by the state.\textsuperscript{180} Secondly, market oriented industrial standards reduce the information asymmetry problem by incorporating the better-informed market players into the reflexive standard making process.\textsuperscript{181} Thirdly, market oriented industrial standards increase the regulatory flexibility by adapting sector-specific experiments of innovative solutions to variegated business scenarios.\textsuperscript{182}

China’s policymakers have endeavored to promote governance of the E-commerce market by viable industrial standards. Policy documents such as the Standardization Law,\textsuperscript{183} the State Council’s Opinions on Vigorously Developing E-Commerce to Accelerate the New Front of the Economy Growth,\textsuperscript{184} and the Guidelines for the Standardization of Online Retailing,\textsuperscript{185} provide legislative background, overall requirements and guidelines for the formulation of E-commerce related standards. They have endorsed standards as an integral element of economic policy to promote the readiness of ICT networks infrastructures, the growth of domestic E-commerce and the global competitiveness of China’s E-commerce market.

Early in the infant stage of E-commerce market, for example, the then Ministry of Science and Technology formed a strategic alliance with RosettaNet to create an advanced electronic commerce portal for Chinese businesses to engage with foreign trading partners.\textsuperscript{186} The result was the publication of a national standard titled: the 2003 E-commerce based on XML (Extensible Markup Language) (GB/T 19,256–2003). Another example is the recent revision of the Information Security Technology – Personal Information Security Specification (GB/T 35,273—2020, the PIC Specification), the earlier version of which was released in 2017. The PIC Specification is a voluntary code of conducts setting out best practices concerning protection of personal information.\textsuperscript{187} As of December 2018, China’s national E-commerce related standards totalled 172.\textsuperscript{188}

The new E-commerce Law entrenches such policy vision and prescribes that the State shall “strengthen the system of E-commerce standards.”\textsuperscript{189} It requests governmental authorities and professional associations to work in tandem to develop industrial standards to guide E-commerce business operations.\textsuperscript{190} These industrial standards are to manage the interface between law and technical norms that preserve the effectiveness of legal institutions while harnessing the power of technological innovation for the public interest.

Significant efforts have been devoted to developing credit information related standards. At national level, the results feature the 2018 Specification on Credit Information Sharing among E-Commerce Enterprises (SB/T 11,216–2018). Effective as of 1 April 2019, this Specification stipulates the principles, contents, scopes, subjects, and protocols for sharing credit information across different platforms and third-party credit service.\textsuperscript{191} Local governments such as Shenzhen Municipal Government have issued the 2018 Credit Evaluation Criteria for E-Commerce Enterprises (SZDB/Z 344–2018). This Standard specifies the requirement, process, and methods to evaluate credit information of E-commerce enterprises within Shenzhen’s jurisdiction.\textsuperscript{192}

Moreover, China’s standardization bodies are increasingly active in engaging with international counterparts to develop standards that meet cross-border E-commerce market needs. Among others, the Standardization Administration of China, has participated in international standardization activities by

\textsuperscript{176} E.g., A strategic vision for European standards: Moving forward to enhance and accelerate the sustainable growth of the European economy by 2020. Brussels: European Commission. COM/2011/0311 final.See in general, e.g., Panagiotis Delimitis, The Law, Economics and Politics of International Standardisation (Cambridge University Press 2015); Henk J. de Vries, Standardization: A Business Approach to the Role of National Standardization Organizations (Springer 1999).

\textsuperscript{177} Whereas (32), the E-commerce Directive 2000See also Morton Kallestrup, ‘The New Governance of ICT Standards in Europe’ in Alois A. Paulin, Leonidas G. Anthopoulos and Christopher G. Reddick (eds), Beyond Bureaucracy (Springer International Publishing 2017).

\textsuperscript{178} Ibid

\textsuperscript{179} International Chamber of Commerce, A Global Action Plan for Electronic Commerce (2nd Edition), (1999).

\textsuperscript{180} Jane K. Winn, ‘US and EU Regulatory Competition and Authentication Standards in Electronic Commerce’ (22 May 2006) Available at SSRN: https://ssrn.com/abstract=901324 or http://dx.doi.org/102139/ssrn901324

\textsuperscript{181} Heejin Kim, ‘Globalization and Regulatory Change: The Interplay of Laws and Technologies in E-commerce in Southeast Asia’ (2019) 35 Computer Law & Security Review 1

\textsuperscript{182} See also Michèle Finck, ‘Digital Co-regulation: Designing a Supranational Legal Framework for the Platform Economy’ (2018) 43 European Law Review 47

\textsuperscript{183} Adopted in 1988, recently revised in 2017 by the National People’s Congress.

\textsuperscript{184} Guofa (2015), No. 24

\textsuperscript{185} Issued in 2017 conjointly by the Ministry of Commerce and the Standardization Administration of China

\textsuperscript{186} RosettaNet is a standard developing organization that has produced a comprehensive set of XML standards for electronic commerce. Thor Olavsrud, ‘RosettaNet, PRC to Open China Affiliate’ 17 September 2003 <http://www.internetnews.com/dev-news/article.php/3078661> accessed on 1 January 2020

\textsuperscript{187} Further discussion under the prior Section 3.2.

\textsuperscript{188} Among them, there are 60 general-purpose basic standards, 88 operational service standards, and 24 supervisory management standards, accounting for 35%, 51%, and 14%, respectively.National Public Service Platform for Standards Information: http://www. std.gov.cn/gb

\textsuperscript{189} Article 66, the E-commerce Law

\textsuperscript{190} Ibid, Article 8

\textsuperscript{191} Full text available in Chinese at: http://std.samr.gov.cn/hb/ search/stdHBDetailed?id=8B1827F2477FBE19ED5397BEDA0AB44A

\textsuperscript{192} Full text available in Chinese at: https://www.gtrust.org.cn/News/56.html
the ISO, the International Electrotechnical Commission (IEC), the Pan American Standards Commission (COPANT), and the Pacific Regional Standards Congress (PASC). One of the products is the ISO/TC 321: Transaction Assurance in E-commerce. Co-sponsored by China and France, this Standard governs the field of “transaction assurance and upstream/downstream directly related processes in E-commerce”.\(^{193}\)

In short, industrial standards are evidently perceived as one effective mechanism for coordinating private sector economic activities with national industrial policies. The widespread adoption of market-oriented standards for the platform ecosystem reflects a combination of a techno-legal coregulation model. Under such a model, neither industrial standards nor legislative instruments are sufficient on their own to meet the needs of sustainable market development. Instead, they complement each other in facilitating the dynamic innovation in the platform economy.\(^{194}\)

Standardization processes, however, are “politico-like” processes through which stakeholders with divergent interests battle for recognition from authoritative standardization bodies in order to obtain market power.\(^{195}\) There is a risk that certain preeminent private actors may overwhelm the formulation and implementation of industrial standards to the detriment of other stakeholders. Challenges exist to avoid regulatory capture and to improve stakeholder participation.\(^{196}\) Therefore, standardization shall be transparency-oriented process opening to the access of all societal stakeholders; standardization shall be consensus-based process reflecting and reconciling interests of all societal stakeholders. Policy intervention should be directed at increasing fairness, transparency, and accountability in line with market practice in the standard setting and implementing with regulatory overheads.\(^{197}\)

### 4.3. Technology enabled dispute resolutions

Advancement of information communication technologies has transformed conventional commercial transactions; it has also enabled dispute resolutions to adapt to the nascent technological and commercial environment.\(^{198}\) Technology-enabled dispute resolutions are particularly conducive to the E-commerce ecosystem. Compared to the conventional brick-and-mortar market, transactional disputes derived from the E-commerce market feature a larger number of cases involving smaller amount claims and wider geographical dispersion. In the first half of 2019, 56.83% of E-commerce disputes in China involves claims less than RMB 1000; another 24.33% involves claims ranging from RMB 1000–5000; and merely 11.51% involved claims greater than RMB 5000.\(^{199}\)

Since 2013, a broad spectrum of policies has been initiated to harness the power of technological advancement such as Big-data, cloud computing and artificial intelligence. These initiatives purport to enhance the efficiency and transparency of dispute resolutions, especially the judicial adjudication.\(^{200}\) Database websites such as China Judicial Process Information Online, China Judgment Online, and China Trial Live Broadcast were constructed by the central government to advance the digitalization and accessibility of judicial information. Mechanisms such as online filing systems were created to provide full-coverage pre-trial processing services.\(^{201}\) Above all, the milestone of the ICT-enabled judiciary development is the launch of Internet Courts.

On 26 June 2017, the Planning for Establishing the Hangzhou Internet Court was adopted by the Central Commission of Comprehensively Deepening Reform. Subsequently, the first Internet Court was launched on 18 August 2017 in the City of Hangzhou. As the headquarter for Alibaba group and many other E-commerce related companies, Hangzhou is dubbed the “capital of Chinese E-commerce”. Its conventional courts have experienced an explosive increase in the number of E-commerce related cases, leaping from 600 cases in 2013 to more than 10,000 in 2016.\(^{202}\)

Compared to the conventional courts, the pioneering Hangzhou Internet Court has contributed a more cost-effective and expeditious avenue to improve judicial efficiency to redress the typically low-value consumer grievances that arise from e-commerce transactions. For example, as of 17 August 2018, one year into its operation, Hangzhou Internet

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\(^{193}\) ISO/TC 321, Transaction Assurance in E-commerce: [https://www.iso.org/committee/7145156.html](https://www.iso.org/committee/7145156.html)

\(^{194}\) Jane K. Winn, US and EU Regulatory Competition and Authentication Standards in Electronic Commerce’ (22 May 2006) Available at SSRN: [https://ssrn.com/abstract=901324](https://ssrn.com/abstract=901324)

\(^{195}\) Morten Kallestrup, ‘The New Governance of ICT Standards in Europe’ in Alois A. Paulin, Leonidas G. Anthopoulos and Christopher G. Reddick (eds), Beyond Bureaucracy (Springer International Publishing 2017)

\(^{196}\) An earlier draft of the New E-commerce Law proposed a new evidential rule favouring online customers by putting the burden of proof on E-commerce platforms because the latter possessed relevant digital evidence. Such a rule was dropped upon the lobby by the Internet companies. Jinting Deng and Pinxin Liu, ‘Consultative Authoritarianism: The Drafting of China’s Internet Security Law and E-Commerce Law’ (2017) 26 Journal of Contemporary China 679

\(^{197}\) See also annex II Requirements for the Identification of ICT Technical Specifications, Regulation (EU) No 1025/2012 of the European Parliament and of the Council of 25 October 2012 on European standardisation, OJ L 316, 14.11.2012, p. 12–33

\(^{198}\) Jane Kaufman Winn and Benjamin Wright, Law of Electronic Commerce (4 edn, Wolters Kluwer 2019-1 SUPPLEMENT) Section 1.05. See also Douglas W. Arner, János Barberis and Ross P. Buckley, ‘FinTech, RegTech and the Reconceptualization of Financial Regulation’ (2017) 37 Northwestern Journal of International Law & Business 371

\(^{199}\) The remaining 7.34% is unaccounted. See further at: [www.100ec.cn, China E-commerce User Experience and Complaint Monitoring Report (2019)](http://www.100ec.cn/) (1) 中国电子商务用户体验与投诉监测报告, 17 July 2019)

\(^{200}\) Other dispute resolution mechanisms include online arbitration and online mediation. For example, Supreme People’s Court in October 2016 launched a unified online mediation platform covering mediation processes from acceptance, classification, resolution, to feedback. Supreme People’s Court of China, Report: Chinese Courts and Internet Judiciary, 27 November 2019)

\(^{201}\) ibid

\(^{202}\) Sara Xia, ‘China Establishes Its First Cyber-Court in Hangzhou: Thank You Alibaba’ (China Law Blog, 16 August 2017) <https://www.chinalawblog.com/2017/08/china-establishes-its-first-cyber-court-in-hangzhou-thank-you-alibaba.html> accessed on 16 August 2019
Court had accepted 12,074 cases, out of which 10,391 cases had been concluded. The average duration of a case hearing was 28 min and the average processing period from the filing of a case to the delivery of judgment was 38 days, 65% and 25% shorter than conventional offline courts, respectively. 203

Based on the experience of Hangzhou Internet Court, the Supreme People’s Court issued the Provisions on Several Issues Concerning the Trial of Cases by Internet Courts on 3 September 2018. 204 Two additional Internet Courts were accordingly established in Beijing and Guangzhou. These Internet Courts have the first-instance jurisdiction over eleven categories of disputes derived from commercial transaction via ICT networks, such as disputes arising from online infringements upon the copyrights or neighbouring rights of the works published or disseminated through the Internet. 205

Compared to the conventional offline courts, these Internet Courts conduct the entire trial process with the aid of the ICT including the Internet, online streaming, facial recognition, etc. Procedures including the filing of cases, service of documents, exchange of evidence, hearing of cases, and pronouncement of judgments are conducted via the specially designed multifunctional integrated online lawsuit platform. 206 As such, judicial efficiency have been improved noticeably. On average, it took 45 min to conduct an online hearing and 38 days to conclude a case, each of which represent two third and one half of the time via conventional offline adjudication. 207

With their expedient services, these ICT-enabled Internet Courts have strengthened legal certainty and regulatory predictability for the thriving E-commerce ecosystem. In relation to the IP right protection, for example, Beijing Internet Court ruled in Music Copyright Society v. Douyu that a webcast platform shall bear the corresponding tort liability when its On-platform streamer plays a music without the writer’s authorization. 208 In Xu Yong v. Zhima Credit, Hangzhou Internet Court ruled that using personal credit records for commercial purposes without consent by the data subjects or legislative exemptions violated the privacy rights of data subjects. 209

Moreover, these Internet Courts are continuously adopting innovative information technologies into their trial practice. This is epitomized by the effort to incorporate blockchain technology to facilitate its online trial operation. A blockchain is essentially a chronological database of transactions recorded by a network of computers. 210 It functions as a distributed, shared, encrypted repository of information. It features an irreversible, non-tampering, easy traceable pattern of data storage and exchange. 211 Information technologies such as ensure the security of the uplink data, reduce the costs of verifying electronic evidence and promote the efficiency of online adjudication, especially in view of the abundance of online transactions. 212

In the case of Huatai v. Daotong, the Hangzhou Internet Court, for the first time in China, examined and admitted the use of electronic data as evidence preserved by blockchain technology. 213 In September 2018, the Supreme People’s Court officially recognized blockchain evidence as one form of digital evidence. 214 In December 2018, the Beijing Internet Court launched the so-called Scale Chain, “Tianning Lian” in Chinese, to deposit, validate, transmit and process evidential materials in the format of blockchains. With 17 nodes, the Scale Chain is connected to 25 internet platforms to retrieve digital footprints. 215 As of 26 April 2019, it is reported that 40 cases have been swiftly concluded upon the discovery of compelling evidence retrieved from the Scale Chain. 216

In brief, the expansion from one Internet Court to three indicates the success of the ICT-enabled adjudication as a new type of resolution redressing online transactional disputes. ICT-enabled Internet Courts, with the assistance of blockchain technologies, could provide a valuable model to improve regulatory efficiency and to rectify market order. It reflects a new governance approach with a dynamic interaction between the State, the market, and technology. 217 For the rest of the world, it remains to be seen what could foster the adoption of such

203 Meng Yu and Guodong Du, ‘China Establishes Three Internet Courts to Try Internet-Related Cases Online’ (The China Justice Observer, 16 December 2018) <https://www.chinajusticeobserver.com/insights/china-establishes-three-internet-courts-to-try-internet-related-cases-online.html> accessed on 1 December 2019
204 Full text in Chinese: http://www.court.gov.cn/zixun-xiangqing-116981.html
205 Article 2, the Provisions of the Supreme People’s Court on Several Issues Concerning the Trial of Cases by Internet Courts
206 Ibid, Article 1
207 Supreme People’s Court of China, Report: Chinese Courts and Internet Judiciary, 27 November 2019
208 Music Copyright Society of China v. Wuhan Douyu Network Technology Co. Ltd [2018] Beijing 0491 Civil No. 935 ((2018)京0491民初935号)
209 Xu Yong v. Zhima Credit [2018] Zhejiang 0192 Civil No. 302 ((2018)浙0192民初302号)
210 Satoshi Nakamoto, ‘Bitcoin: A Peer-to-Peer Electronic Cash System’ (www.bitcoin.org, 2009) <https://bitcoin.org/bitcoin.pdf> accessed on 1 March 2020
211 Aaron Wright and Primavera De Filippi, ‘Decentralized Blockchain Technology and the Rise of Lex Cryptographia’ (25 July 2017) Available at SSRN: https://ssrn.com/abstract=2580664 or http://dx.doi.org/102139/ssrn2580664
212 Supreme People’s Court of China, Report: Chinese Courts and Internet Judiciary, 27 November 2019
213 Huatai v. Daotong [2018] Zhejiang 0192 Civil No. 81 ((2018)浙0192民初81号)
214 Article 11, Provisions of the Supreme People’s Court on Several Issues Concerning the Trial of Cases by Internet Courts See also Sylvia Polydor, ‘Blockchain Evidence in Court Proceedings in China – A Comparative Study of Admissible Evidence in the Digital Age ’ (2020) 3 Stanford Journal of Blockchain Law & Policy 96
215 Beijing Internet Court, Whitepaper on Rule of Law of Cyberspace Governance, 29 April 2019
216 Ana Alexandre, ‘Chinese Internet Court Employs AI and Blockchain to Render Judgement’ (Yahoo Finance, 26 April 2019) <https://finance.yahoo.com/news/chinese-internet-court-employs-ai-211500215.html> accessed on 26 July 2019 See also: Marie Huillet, ‘China’s Supreme Court Rules That Blockchain Can Legally Authenticate Evidence’ (CoinTelegraph.com, 07 September 2018) <https://coindesk.com/news/chinas-supreme-court-rules-that-blockchain-can-legally-authenticate-evidence> accessed on 01 September 2019
217 Christopher T. Marsden, Internet Co-regulation: European Law, Regulatory Governance and Legitimacy in Cyberspace (Cambridge University Press 2011) Page 46
a new approach. Existing regulatory regimes would need to be adapted to implement rules that provide legal validity and public trust in pertinent technological innovation.

A criticism that may be levied against such ICT-enabled dispute resolutions is the close tie between the Internet Courts and their supporting private market entities. The Hangzhou Internet Court’s online lawsuit platform, for example, is technically supported by the Alibaba Group. Meanwhile, Alibaba and its subsidiaries are related to many E-commerce disputes. Unsurprisingly, there are public doubts regarding the conflict of interests and the impartiality of the operation of the Hangzhou Internet Court. This suspected compromise of judiciary neutrality, however, could be redressed by an enhanced level of transparency and the potential regulatory competition from other two Internet Courts. It is worth undertaking further research on this topic.

5. Conclusion

To conclude, this paper distils how the newly enacted E-commerce Law strives to establish a fair, predictable, and trusted business environment for the online marketplace. It demonstrates a milestone development of China’s law and policy in harnessing information technological advancement to promote sustainable social and economic transformation. As the basic law governing the E-commerce market, this Law manifests the dynamic relationship between industrial development, policy engagement and regulation construction underlying the prime sector of platform economy.

This paper establishes that the phenomenal growth of China’s E-commerce market has been nourished by carefully designed public policies orienting on the construction of supportive technological and institutional infrastructures. To implement these policies and to redress market failures, the E-commerce Law has instigated tailored regulatory objectives to continue the provisions of supplementary systems of public good nature; to enhance the protection of consumer rights pertinent to personal data privacy; and to promote fair competition in the market.

The new Law has also brought about a new participatory and collaborative governance model to administer platform economy. This new governance model features platform-based co-regulatory framework; market oriented industrial standards and technology enabled dispute resolutions. It represents a polycentric future-proof paradigm facilitating technological, industrial, and regulatory interaction in a sustainable manner. In this sense, China’s new E-commerce law could provide a useful indication of what regulation can be expected in other sectors of platform economy in China; and what regulation can be expected in other jurisdictions that openly embrace commercial innovations as driven by the technological advancement.

Declaration of Competing Interest

The authors declare that they have no known competing financial interests or personal relationships that could have appeared to influence the work reported in this paper.

The authors declare the following financial interests/personal relationships which may be considered as potential competing interests.

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Appendix 1: Growth of E-commerce Market in China

![Graph showing growth of e-commerce market in China from 2004 to 2018.]

Source: National Bureau of Statistics of China, Annual Reports of E-commerce in China (2013 - 2018)

Appendix 2: Number of Internet Users and Mobile Internet Users (million) (2005 - 2013)

![Graph showing number of internet users and mobile internet subscriptions in China from 2005 to 2013.]

Source: The China Internet Network Information Center (CNNIC)
Appendix 3: Growth or E-commerce Market in China, US, UK, and Japan (USD Billion)

Source: Ali Research

Appendix 4: No. of IPOs of E-Commerce Companies (2000 - 2019)

Note: Data for the year of 2019 is covered up to 5 May 2019

Source: www.100ec.cn
Appendix 5: Retail E-commerce Sales, Worldwide Share of Total, %

| Country    | 2018         | 2019          | % change |
|------------|--------------|---------------|----------|
| China*     | $1,520.10    | $1,934.78     | 27.3%    |
| US         | $514.84      | $586.92       | 14.0%    |
| UK         | $127.98      | $141.93       | 10.9%    |
| Japan      | $110.96      | $115.40       | 4.0%     |
| South Korea| $87.60       | $103.48       | 18.1%    |
| Germany    | $75.93       | $81.85        | 7.8%     |
| France     | $62.27       | $69.43        | 11.5%    |
| Canada     | $41.12       | $49.80        | 21.1%    |
| India      | $34.91       | $46.05        | 31.9%    |
| Russia     | $22.68       | $26.92        | 18.7%    |

Note: Includes products or services ordered using the internet via any device, regardless of the method of payment or fulfillment; excludes travel and event tickets, payments such as bill pay, taxes or money transfers, food services and drinking place sales, gambling and other vice good sales; *excludes Hong Kong

Source: eMarketer, May 2019

Appendix 6: Value of E-commerce Related Disputes (1 January 2019 – 1 July 2019)

Source: www.100EC.com

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221 Andrew Lipsman, ‘Global Ecommerce 2019: Ecommerce Continues Strong Gains Amid Global Economic Uncertainty’ (www.eMarketer.com, 27 June 2019) <https://www.emarketer.com/content/global-ecommerce-2019> accessed on 1 January 2020