

# From massification towards post-massification: Policy and governance of higher education in China

International Journal of Chinese Education  
September-December 2021, 1–14

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DOI: 10.1177/22125868211046032

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## Abstract

Chinese higher education institutions have experienced an unprecedented expansion and major reforms since the late 1990s. The revolutionary growth has not only established the largest higher education system in the world but has also transformed an elite system to a post-massified one over the last two decades. The expansion policy was largely an economically justified proposal that has emerged under certain conditions. However, reform has been criticised for not delivering the promised outcomes. The article examines the historical development of higher education expansion in China, investigating its rationales, practices and the extent to which the policy has become a paradox during massification. As China moves into the post-massification stage, the article forecasts emerging policy trends and highlights future challenges. It considers restructuring state-education relationship through mechanisms of funding, provision and regulation as options for governing the ever growing and massifying system more sustainably in the upcoming era.

## Keywords

higher education expansion, massification, post-massification, policy, governance

## Introduction

The last half of the twentieth century has seen a transition from ‘elite’ to a ‘mass’ system of higher education worldwide (Schofer & Meyer, 2005). China is no exception to this global trend. Faced with the challenge to adapt to the socialist market economy, Chinese authorities have launched a

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series of reforms in higher education. Since the late 1990s, the gross enrolment rate for Chinese higher education institutions has experienced an unprecedented growth, from 9.8 per cent in 1998 to 53.8 per cent in 2019 (UNESCO, 2020). The revolutionary expansion not only makes China's higher education system the largest in the world but also sustainably increases its university capacity and institution numbers. Higher education expansion has had a lasting and comprehensive social and economic impact on China. Commemorating the 20th anniversary of expansion, China transformed itself from an elite system to a universal one within 17 years (2002–2019). This transformation brought some drastic changes and unexpected challenges, leading to ongoing debates concerning the effectiveness and sustainability of the expansionist reform.

As higher education is becoming increasingly massified, diversified and differentiated throughout the reform process, the view of enlarged system will deliver economic prosperity, promote social equality and enhance life prospects become contested. This article is built on policy documents, existing literature and published data to explore the historical development of higher education expansion in China, focusing on policy formation and contradictions, as well as future developmental trajectory of Chinese higher education. Responding to emerging policy trends and challenges arising from the post-massified stage of expansion, the article revisits state-education relationship through examination of governing mechanisms of funding, provision and regulation and reiterates the importance of the state in resolving challenges and steering development in the post-massification era. To achieve this end, three research questions were developed: 1. Under what conditions has the massification policy been adopted? With what strategies? 2. What are the social and economic effects of this policy? 3. What are the challenges in post-massification era? And how to address them in governance?

The rest of the article is organised as follows. It begins by setting out conceptual framework. Following section details the policy context of higher education expansion, with a critical analysis of its multidimensional impact. The subsequent section focuses on the higher education post-massification, offering general policy trends and forecasting specific challenges for China. Finally, it highlights the role and capacity of the state in managing massifying and transitioning higher education system, with policy implications for a renewed governance arrangement discussed.

### *Conceptual considerations*

Social scientist with different disciplinary backgrounds generates competing and at times contradictory theoretical approaches to explain and analyse the growth in higher education enrolment rates over time (Archer, 1982). Consumption and human capital theories argue education ought to be regarded as goods that demand investment. The market value attached to education would reward skilled workers who seek education, which in turn facilitates knowledge acquisition and further expansion (Craig, 1981). Sociologists suggest that education expansion is a means of social control and stratification as it is a rationalised, strategic response to a highly hierarchical and structured industrial system in facilitating capital expansion, accumulation and reproduction (Bourdieu & Jean-Claude, 1977). Reproduction through education is a means for the elite to maintain existing hegemony and nurture docile and industrious working class in capitalist states. Schofer and Meyer (2005) claim that education expansion is for democratisation. This argument has been used for personal and social liberation as expansion has been justified for the purpose of equalising life and social chances for individuals and promoting human rights. Other influential theories include political integration, screening or signalling, functional, world system and conflict hypothesis (Craig, 1981; Olmos & Torres, 2009; Yang, 2018). Assuming education does not expand in an automatic way, these different assumptions provide diverse explanations concerning why expansion occurs. This article selectively prioritises economically related theories in the consideration of the contextual relevance.

The notion of nurturing human capital can be traced back to Adam Smith's *The Wealth of Nation* in 1776 (Harber, 2014). In the contemporary era, human capital refers to the attributes acquired by individuals through education, training and experience, with which to increase labour productivity and create economic value (Becker, 1993). Against the background of economic globalisation, countries are striving for nurturing talents so as to move towards the 'knowledge-based economy' (OECD, 1996, p. 7), China is no exception to this global trend. Human capital theory considers education as an important means of nurturing talents, a form of investment bringing economic and social benefits not only to individuals but also promoting industrial development, increasing workforce productivity, and supporting economic growth at a national level (Brock & Alexiadou, 2013). This has been used as a justification for governments worldwide to expand higher education systems. The measurement of human capital is often judged by the number of people who have completed higher education and obtained degrees rather than the numbers of years of formal education individuals have had prior to entering the labour market. The demand for talents in nation building and development becomes an indispensable factor in shaping education policymaking. China's adoption of human capital theory is aligned with the country's objective of modernisation. The then Chinese leader Deng (1992) believed that 'development is the hard truth' (p. 337 cited in Li, 2017). Education is viewed as the engine to empower China's national economic development. Advocates of human capital theory also assert that, other things being equal, expansion will narrow inequalities by reaching mass level of education, reducing salary gaps, equalising social mobility, leading to a more democratic society and producing more educated citizens who can make informed decisions (Hannum & Buchmann, 2003). The ongoing debate of education expansion and its effects on economic development, social equality as well as political democratisation is widely observed and documented (Wolf, 2002; Godo, 2002; Heckman, 2003).

From a macroeconomic perspective, the well-known economist John Maynard Keynes emphasises the use of public consumption to aggregate demand for economic output and the importance of using government policy as a fiscal intervention to achieve this, particularly during recessions. He suggests business and people tighten their belts and spend less money during recessions, yet lower spending only leads to falling in demand, resulting in a vicious cycle of unemployment and further economic deterioration. Instead, government should invest in public services such as education and infrastructure to boost demand by pushing money back to the economy, stimulate consumption and bring the economy out of stagnation (Bateman, 2006). Keynes' theory balances the economy from both the state and the private sectors and has influenced Chinese policy decision in the context of post-Asian financial crisis.

### *Policy context*

In 1998, the Ministry of Education announced an important policy titled 'Action plan for vitalising education for the 21st Century' (Ministry of Education, 1998). It guided Chinese tertiary education expansion at a dramatic speed to reach an enrolment rate of 15 per cent. Martin Trow (1973) divides higher education development into three stages, namely, elitism, followed by mass and universal. The crucial indicator in defining this classification is the gross enrolment rate for the percentage of the 18–22 years population enrolling in higher education. The cut-off points between each stage are below 15 per cent, 15 and 50 per cent and over 50 per cent, respectively. According to Trow's theory, the transformation from elite to mass higher education in China took less than 5 years' time since expansion policy was adopted; enrolment rate has broken 15 per cent in 2002 and moved rapidly into a 'universal system'. The expansion policy exemplifies the state intervention in higher education development, reflecting the national social and economic needs under particular conditions. A number of reasons have contributed to the formation of this policy.

Li Lanqing, the former vice premier in charge of education, stressed four reasons for expansion, namely, the need for more talented personnel to sustain and promote China's rapid economic advancement, the needs for meeting the consistently high public demand for higher education, alleviating employment pressure of graduates on labour market and stimulating domestic consumption to promote growth in related industries (Li, 2003). This could be viewed as the official rationales for the construction of expansion policy. Li's accounts indicate that China's decision to expand higher education was largely driven by domestic economic consideration; therefore, the policy itself was subject to strong economic reasonings (Yang, 2007). The policy also constitutes part of a wider economic stimulus package for the Asian financial crisis post-recovery after 1998 ((Postigoine, 2011). Against the economic hardship, higher education expansion was considered as a counter-strategy to the heavily suffered export-oriented economy as to trigger new economic growth (Zha, 2011). Tang Min, the chief economist of the Asian Development Bank Mission in China, believed that doubling higher education enrolment not only encouraged families to spend their savings on education as to stimulate domestic consumption during the post-crisis, but also promoted growth in service, construction and other related industries. It was estimated that higher education expansion would help China to increase 0.5 per cent of its GDP through consumption and investment (Yang, 2007).

Expansion was also believed to alleviate the employment tension. High school graduates would postpone entering labour market by enrolling into tertiary institutions, which was of interest for the state to manage the economic handicap in the given situation. In addition, two decades of rapid economic development have generated an emerging middle-class population who has both the wishes and the ability to invest in their children's education. The Confucian heritage places a high value on education in Chinese society, making education as one of the primary motives for family investment, especially for those families that have been affected by the one-child policy. The combination of factors led to a huge social demand for greater access to higher education, but the capacity of the sector was limited to entertain the increasing demand (Yao et al., 2010). Thus, expanding higher education was an effective way to meet both economic and societal needs. Tang's suggestion has attracted the central government's attention, including the then Premier Zhu Rongji. Policy makers soon adopted his proposal and put it into practice. A number of strategies for reforming the sector were thus carried out.

### *Policy strategies*

Expansion has helped to create a real sense of decentralisation that the Chinese government initiated since 1980s. Traditionally, tertiary institutions in China are solely funded by the state, yet the increasing demand and rapid growth of institutions have generated an enormous financial pressure for the central government. Therefore, major structural changes took place in financing provision. By increasing the power and autonomy of decision-making for individual institutions at provincial level, the central government transferred some funding responsibilities to local administrative bodies to overcome its limited financial capacity. Institutions' source of revenue thus has been diversified. Most formerly state-run institutions had to search their own means of survival. Many institutions not only receive funding from national, provincial and local governments but also formed partnerships with various entrepreneurs and became much active in catering local interests and needs. A cost-sharing system has also been gradually formed (Mok, 1999; Wang, 2001).

The change of funding structure developed a dichotomous pattern in which fiscal appropriation is equally important as tuition fees for institutions. The theory of individual and social return in participating higher education was used to justify quasi-marketisation. Tertiary education was free in China from 1950s to early 1990s. The government even subsidised students who are qualified

and assigned jobs for them upon graduation (Zha, 2009). Since the early 1990s, a selected number of universities allowed to introduce a moderate fee scheme. China's free fee policy was terminated in 1997 when all tertiary institutions began to charge tuition and accommodation fees, and the fee level has been increasing ever since (Liu, 2012). Commercialisation and funding reforms transformed tertiary education from a public good to a mixed good (Yao et al., 2010; Wang, 2011). The state strategically exercised legislative power to create mechanisms to motivate expansion and entitled autonomy in terms of management and governance such as student admission, property management and program development. This combination of responsibility and autonomy generates both incentives and pressures for institutions to be more accountable for the emerging market (Wang & Liu, 2014). Consequently, expansion policy was embraced by numerous institutions as the bigger the size of the school, the more income will be gathered (Wang, 2016).

Expansion has also triggered a rapid increase in the private sector, including both Minban (people run) and transnational higher education provision—alternatively known as Sino-foreign collaborative partnership in higher education (Mok, 2009). The government has deliberately encouraged private establishment to supplement the public sector for enlarging the provision and enhancing quality. Private institutions are often affiliated with public universities through collaborations; nevertheless, they receive little public funding from the government. Therefore, they are heavily relying on student fees as their revenue. Many are vocational-oriented institutions for which student intake is set at a lower academic level compared to public universities' standards. Their target student population are mainly disadvantaged students, but with higher tuition fees charged and lower teaching quality provided, widening the gap between privileged and underprivileged (Zha, 2011; Zhou, 2020). Although compared with the public sector, private institutions remain marginal, and it is a growing and important part of the Chinese higher education system. The privatisation is highly controversial for schooling as it is associated with elitism and social exclusion, hence has been questioned in relation to social justice (Walford, 2013). In China, private local provisions do not necessarily link to elitism, but transnational universities are associated with class and symbolic distinction, raising concerns about access, social justice, and equity in marketised and privatised higher education setting.

## Policy paradoxes

### *Economy*

Human capital theory supports the claim that investment in education will lead to economic development. Acknowledging economic growth cannot take place without an educated workforce, the exact nature of these two factors remains undetermined (Wan, 2006). Economic growth might be ascribed to rising level of education, but it could also be that a country experience fast economic growth first and then put its accumulated wealth into education investment to raise the level of enrolment rate. In China, scholars generally acknowledge the long-term benefits of higher education in nurturing talents, developing technologies and creating innovations that potentially boost economic development. However, there is no consensus agreed upon the short-term effects (Wang & Liu, 2011). Although the country has achieved a high speed of growth over the past decades, it is still not clear whether, and to what extent of this development is attributed to higher education expansion. It may be premature to suggest that enlarging higher education enrolment rate has contributed to China's economic success, because expansion is a long-term process, and it may well be that other factors such as cheap labour and strong exporting-industry that have sustained the high-speed Chinese economic growth.

On the other hand, expanding higher education is a costly enterprise. The government itself was not able to sponsor a mass system and the associated costs such as infrastructure construction. The

question is who would be the co-sponsor to share the expenditure? Clearly, the attempt was to attract savings from the public to co-invest and consequently stimulate consumption to revitalise the economy. Decentralisation and marketisation have shifted higher education from a public good to 'goods' or 'service' that needs to be 'consumed' or 'purchased'. The growing privateness suggests individuals and their families have taken up some funding responsibilities. Yet, education expenditure accounts for a large proportion of disposable family income, a noticeable portion of students were identified as being in the need of financial support (Wan, 2006). This simply means family investment in higher education could be a financial burden for many average earning Chinese households rather than a means in developing earning capacity. Paradoxically, little empirical data can demonstrate the actual effects expansion has on enhancing domestic consumption or economic development in general.

### *Equality*

Economic-oriented education reform in contemporary China insufficiently acknowledges equality, creating numerous problems challenging social justice (Hayhoe, 1995). When educational quality is not considered, expansion has generally improved equality by admitting more students from low-income families into higher education. However, when the factor of educational quality is taken into consideration, equality is largely compromised. Higher education expansion differentiates, diversifies and decentralises institutions and funding responsibility. Institutional financing is linked to sponsorship from local and provincial support. The prosperous eastern coastal regions are more capable of financialising institutions than inland provinces do (Liu, 2015). To put this into perspective, the three most developed provinces Guangdong, Jiangsu and Zhejiang occupied 25 per cent of national educational budget, whereas the three least developed provinces only received 1 per cent (Wang, 2008). Elite universities are concentrated in eastern areas and major municipalities such as Beijing and Shanghai, and students in these places enjoy a higher probability of attending prestigious tertiary institutions than those from the rest of China. The rapid expansion and the lack of funding comprised the quality of provision, institutions at the lower tier within the stratified system face shortage of teaching staff and are not equipped with desirable facilities. Most of all, qualifications obtained from low-ranking institutions are less valued in the job market.

The growing prominence of commercialisation through the implementation of fees becomes unreasonable and unaffordable to many. This challenges the affordability of disadvantaged social members. Considerable amounts of students from rural areas and disadvantaged urban backgrounds became hesitant towards getting a degree due to their financial constraints. Although expansion was meant to bring quality educational resources to the public, students with disadvantaged socio-economic backgrounds or from certain geographical regions concentrated in less prestigious institutions that are either academically weak or vocational in nature. In contrast, students from families with more cultural, economic and social capitals from metropolises are more likely to study at elite national universities (Yeung, 2013). Recent studies indicate expansion is only loosely connected with the improvement in educational opportunities, inequalities caused by family socio-economic status, regional differentiation and parental backgrounds were not ameliorated (Wu et al., 2020). In short, expansion might have equipped already advantaged groups to take further advantage, it certainly did not narrow the social gap and economic disparities, rather it possibly exaggerated the existing inequalities by rewarding a selected population whilst excluding others systematically through the social structural process and intergenerational transmission (Yue, 2015; Liu & Wan, 2019).



## Employment

On one hand, expansion postponed higher school graduates in entering the labour market, thus relaxed the employment pressure. On the other hand, the expansion has produced a huge number of universities graduates, which in turn generated anxieties and worries among themselves and their parents regarding employment prospects. In essence, there is a gap between potential job vacancy and graduates' expectations as the current economic structure is not able to absorb the oversupplied graduates (Wang & Liu, 2011). Mok (2016) notes massification has not led to more occupational opportunities or upward social movement, particularly since the changes in the global labour market after the 2008 global financial crisis. On the contrary, the intensification of 'positional competition' among college graduates fuels growing social inequality (p. 51). University graduates from ordinary institutions or majoring in 'soft-fields' such as arts, humanities and social sciences face extra difficulties in securing well-paid positions (Yang, 2018). This has led to a social phenomenon 'Ant Tribe'—large number of college graduates work in unskilled positions with low pay and settle for a poverty-level existence on the route to becoming the 'new urban poor' (He & Mai, 2015; Mok et al., 2016).

Others are more optimistic. Li et al. (2008) believe the unemployment crisis is of a temporary status. If the expansion rate can be effectively monitored and structural changes can be adopted to adjust the relationship between labour market and higher education, fruitful outcome will be expected. Wang et al. (2012) point out that graduate unemployment is not unique to China, developed countries such as the United States (US) has witnessed a similar pattern. The challenge should be taken as an opportunity to upgrade national economic structure, seeking international experience would help to achieve this. Re-evaluating tertiary education and making changes to accommodate the needs of the national economy are necessary. Nonetheless, before any effective structural reforms take place, the paradox of getting degrees and become unemployed continues to be a major challenge for a considerable proportion of college graduates.

## *Trends and challenges in post-massification era*

Despite the fact that higher education expansion has turning into a paradox, the policy trends towards post-massification seem irreversible. The Chinese state has reiterated its expansionist strategy in *The Outline* (2010), requiring the gross enrolment rate to reach 40 per cent by 2020. Commemorating the 20th anniversary of expansion in 2019, the actual figure passed 50 per cent, indicating China entered post-massification ahead of schedule. Being a latecomer, the transition from the threshold of mass higher education to universal access in China happened within 17 years (2002–2019). Comparatively, Japan spent 22 years (1963–1985) and the US approximately 30 years (1940–1971). Post-massification, also known as the universal access to higher education, is observed and well-documented in numerous contexts. Transitioning from massifying towards post-massified stage of expansion varies greatly across contexts, and the specific challenges are accordingly different. In the US, Gumpert et al. (1997, p.23) suggest while massification signalled the 'publicisation' of American higher education, the process of post-massification may indicate the 'privatisation' of the system. The process is characterised with increased public scrutiny, call for accountability, rising privateness, withdrawal of public support and continued feasibility of access for all (Huang, 2012). In the United Kingdom (UK), marketisation has been more drastic. Thatcherism triggered the rise of new public management, which redefined and shaped the value and function of public institutions. UK universities become increasingly dependent upon student fees as revenue since allocated public funding continue to fall and are highly competitive (Marginson, 2018). Japan faces a shrinking population as being an ageing society, raising the question of supply and demand for higher education in the long run that could eventually impact

on domestic market and national competitiveness (Reiko, 2001; Yonezawa, 2020). However, reflecting on the transitioning process from mass higher education to the next stage of expansion, Zemsky (1997) summaries some common post-massification syndromes:

1. Stronger public accountability will emerge because of budget retrenchment, and an increasing focus on social and economic rationalisation of university functions.
2. Higher education system will be increasingly privatised through the involvement of private sectors in expansion and the reliance on student fees to fund public-sector institutions.
3. Higher education institutions will be more self-responsible for their management and operation as deregulation proceeds.
4. Market forces will be a determining factor in the scale, scope and price of higher education.
5. As the number of institutions keeps growing, public agencies and public opinion will seek to secure the quality of higher education through new forms of accreditation.
6. Education outcome is more important for ensuring quality and for gauging institutional accountability.

Apart from experiencing increasing privatisation and marketisation, there are other issues faced by the Chinese higher education sector in relation to post-massification. The rate of population growth has been decreasing due to the policy of family planning since the early 1980s. Over the last four decades, the age cohort go to university demonstrates a consistent declining trend. The changing demographics suggest there will be less college students, reduction of working-age population and a gradual aggravation of ageing group (Bie & Yi, 2014), which can no longer be ignored in the policymaking of higher education development. With increasing enrolment rate and less college-age individuals, issues with respect to supply and demand for higher education will become inevitable in the post-massification era. Secondly, China's decision for expansion was largely driven by economic consideration, including human capital theory in driving national modernisation. Nevertheless, empirical evidence does not always support relevant assumptions, and the limitations of human capital have been revealed in recent literature (Marginson, 2019). In contexts where universal access is realised, scholars doubt whether over-educated workforce promotes equity, social mobility and economic development as the perceived reality was economic stagnation, social polarisation and rising inequality (Piketty, 2014; Stiglitz, 2013). Raftery and Hout (1993) propose 'maximally maintained inequality' theory to suggest that increased opportunities from expansion mainly benefit advantaged social groups, who possesses cultural, social and economic resources, thus are better positioned to make the most of enrolment expansion. Only when expansion is saturated for the upper-middle class, inequality between the advantaged and the rest will decrease. In contrast to what human capital theory suggests, expansion widens the disparity between different classes not only for the present but also for future generations (Yao et al., 2010). Thus, the economic rationales driving China's higher education reform are losing their legitimacy, and alternative paradigm is needed to reflect other aspects of concern in enabling more inclusive and sustainable development. Lastly, the argument of expanding enrolment deteriorates the quality of provision is likely to recur, massification without quality is of little value and benefit (Wan, 2011; Tight, 2019). 'Having a degree is not enough' is the new normal, and graduates must hold value-added credentials for claiming their competitive advantages in labour markets. The structural change in tertiary education caused degree inflations that not only accelerated consumerism but also shaped students' perceptions of themselves and the value of higher education (Li, 2012).



## *Towards post-massification governance*

Similar to Western welfare states, China has also moved into a policy direction where changes amount to a ‘hollowing out’ of the state (Jessop, 1993) with the loss of some activities either ‘upwards’ to supranational bodies or ‘downwards’ to sub-national and non-state bodies. Shifting from direct control to supervisory governance, the state restructured its relationship with education by introducing co-ordinating mechanisms such as the market and the community. As such, the state is no longer the sole provider and guarantor, rather it has become a regulator and service purchaser, yet it has never abandoned the essential power and authority over institutions in a de facto quasi-decentralisation system (Mok, 2002; Han & Xu, 2019; Wu & Li, 2019). In focusing on the post-massification governance, policy makers need to take account of this wider shifting governing paradigm and pay close attention to mechanisms which include funding, provision and regulation, for which they shape and ultimately determine reform outcomes (Dale, 1997).

### *Funding*

While the adoption of commercialisation and privatisation has assisted in improving administrative effectiveness and efficiency, funding is a challenge for many institutions due to decentralisation and diversification. Individuals also face economic barriers to access tertiary education. With the background of rising neo-liberal discourse and consumerism, the desire to build an equal, accessible and enlarged system seems ever difficult. A fundamental question concerned is how the continuously enlarged system to be funded? Undeniably, the state is still the largest sponsor, with varying degrees of contributions from provincial, municipal and local governments. It is clear that regional and local authorities have differing financial capacities in cost-sharing the system; thus, the government should consider investing more to support, especially institutions in less developed regions. This can be done through monetary redistribution, grants, loans, direct investment and subsidy. To help economically struggled population overcome financial hardships, there is a pressing need for state to step in to when market is failed to deliver efficiency and social justice. Practical solutions include, for example, increasing the capacity of comprehensive student loan plan initiated by the government. Supportive and institutionalised mechanisms are necessary to harness the unintended consequences of unequal expansion. Protecting public good should be a policy priority for post-massified higher education development and is of interest to every citizen, funding is a policy option for the state to monitor that reform direction.

### *Provision*

Central to provision is the question of whom education is provided for, what is provided and who is to be held responsible for problems of provision (Dale, 1997). Market forms of provision grant consumers the entitlement to choose products, buyers ought to have a say about what, where and how they would like service to be delivered. Yet for citizens, higher education is largely a state responsibility and should be provided for all members of a society on the same basis. So, only when the state is the main provider, the public-good of higher education can be maintained as a central feature even when mass system becomes differentiated and fragmented. Policy proposer Tang revealed that the initial policy intention was to enlarge the enrolment of top-ranking institutions instead of those sitting at lower tiers, yet somehow the outcome was quite the opposite, in part because prestigious universities do not rely on student fees as much as their non-prestigious counterparts do. This unregulated expansion of provision had an impact on the prospects of graduates’ employment; one of the recurring themes about unemployed graduates is that universities did not supply the society with what was needed. To address this, expansion should be carefully planned, regarding what subjects, which institutions and what levels of provision are

encouraged. Provision needs to be contextualised in relation to the wider societal needs and in line with national social and economic development. In the post-massification era, diversity in provision will also be a key. This means not only traditional tertiary education but also online, distance and vocational courses will emerge more rapidly. Strategic planning to accommodate different social groups, offering mixed combination of general education and work-related skills is essential.

### **Regulation**

The state reserves the ultimate ability and responsibility to determine policy in regulating reform directions. In deregulated and decentralised higher education environment, central–local relations can be complex as interests lie within the multi-layered structure do not always converge. How to balance tensions between central initiatives and local-driven enterprises deserves urgent scrutiny. The state may have to consider recentralising some power and autonomy to assume a more direct role in policymaking on certain subjects. Institutions with resources and capacity to enlarge should be given a priority. Why to expand, who benefit and who is held responsible are central to management. Establishing an accountability system and introducing performance-based mechanisms to ensure quality provision are also critical. It is more likely that graduates would have better prospects if they enroll in accredited programs that are quality inspected. To that end, the state is uniquely positioned to employ its administrative power and technological capability to build strong national database and information infrastructure to support informed decision-making and offer critical assessments of trends and issues. Reform focus is shifting from rapid expansion to promoting affordable, healthy growth of higher education with a homogeneous standard across the nation. The government needs to tackle the emerging challenges for nurturing needed talents in response to future demands.

### **Conclusion**

China's higher education expansion has transformed an elite system to a post-massified one within two decades, with economic reasonings dominated policymaking and reform process. It has greatly shifted the outlook of Chinese higher education. Although massification has brought some unintended consequences, millions of young people were able to attend tertiary education as a direct result. To some extent, it has also relaxed the pressure on employment during recessions. The reform has made Chinese higher education more cost-effective and efficient due to intense competition, thus enhances productivity of the system. Higher education holds a special path to professional, managerial and governmental positions; therefore, it significantly impacts on individual's life chances, social and intergenerational mobility, as well as societal advancement. Policy makers, managers and administrators need to tackle existing challenges and embrace new ideas for developing socially inclusive and sustainable system, as to fulfill human potential, and protect social justice. Facing a post-massified system, the article pays particular attention to state-education relationship in considering future governing arrangements. To bring about alterations in governing reforms that are compatible with shifting global dynamics and national agendas is vital for future progress in the upcoming post-massification era.

### **Declaration of conflicting interests**

The author(s) declared no potential conflicts of interest with respect to the research, authorship, and/or publication of this article.

## Funding

The author(s) received no financial support for the research, authorship, and/or publication of this article.

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