

William Yat Wai Lo

University Rankings

Implications for Higher Education in
Taiwan



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For my parents

Preface

University rankings have become an increasingly important research topic in higher education studies. The prevalence of university rankings has intensified discussions about performance and competition in the higher education sector, including that of Taiwan. Rankings and the many related phenomena, like increased competition among institutions and systems, the pursuits of research excellence as well as the call for internationalisation and building world-class university, have come into the centre of discussion. This book adopts a qualitative case study approach to provide a systemic delineation and interpretation of the implications of university rankings for Taiwan's higher education. It reviews the literature on different theories concerning the global transformation of higher education, and gives basic information on higher education in Taiwan. Based on the literature reviewed, a four-dimensional framework is developed for the analysis of the ranking phenomenon in the island-state. The four dimensions are seen as making up two clusters in which the two ecological dimensions (Dimensions 1 and 2) are on one side; the two geographical dimensions (Dimensions 3 and 4) are on the other. The ecological dimensions suggest that the ranking phenomenon has caused significant influences on higher education policy, university governance and individual behaviours. Dimension 1 therefore seeks to examine how the emergence of university rankings has influenced Taiwan's higher education based on the accounts of practices and values provided by academics. Dimension 2 provides a theoretical description of how and why university rankings may be a powerful driving force transforming institutional and individual behaviours and perceptions. The geographical dimensions relate the ranking phenomenon to the international issues of higher education. Dimension 3 is concerned with the relevance of university rankings to the changing global landscape of higher education and sees university rankings as an institution that projects power in global higher education. Dimension 4 provides an in-depth exploration of the international arena of university rankings in the light of postcolonial discourse and argues that the implications of rankings can possibly bring both positive and negative consequences for the global higher education in terms of quality and diversity. These four dimensions show how the ranking phenomenon can be read and explained through theoretical lenses from ecological and geographical perspectives. In regard to ecological perspective, the empirical evidences suggest that the influence of univer-

sity rankings varies throughout the academic hierarchy in Taiwan. The theoretical analysis then illustrates the relationship between the ranking phenomenon and the power structure in academic hierarchy. As for geographical perspective, while the empirical analysis has been focused on the case of Taiwan, the theoretical analysis offers important insights to understand the changing global landscape of higher education and its implications for higher education in East Asia.

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Notes on Usage

Throughout the text, I use the following short forms for place names for ease of expression. I recognise that, in constitutional terms, Hong Kong, Macao and Taiwan are all parts of China.

Hong Kong Special Administrative Region of the People's Republic of China	Hong Kong
Macao Special Administrative Region of the People's Republic of China	Macao
People's Republic of China	Mainland China/China
Republic of China	Taiwan

Throughout the text, I give all monetary amounts in New Taiwan dollars (NT\$). NT\$ 100 is roughly equal to US\$ 3.3.

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List of Abbreviations

ACD	Asia Cooperation Dialogue
APEC	Asia-Pacific Economic Cooperation
Apex	Accelerated Programme for Excellence (Malaysia)
ARWU	Academic Ranking of World Universities
ASEAN	Association of Southeast Asian Nations
ASEAN+3	Association of Southeast Asian Nations Plus Three
ASEM	Asia-Europe Meeting
BK21	Brain Korea 21 (South Korea)
CNT	College Navigator in Taiwan (Taiwan)
COE21	Centre of Excellence in the 21st Century (Japan)
CSIC	Consejo Superior de Investigaciones Científicas
CSSCI	Chinese Social Sciences Citation Index (China)
DPP	Democratic Progressive Party (Taiwan)
EGM	Emerging Global Model
ESI	Essential Science Indicators
EU	European Union
GATS	General Agreement on Trade in Services
HEEACT	Higher Education Evaluation and Accreditation Council of Taiwan
HEI	Higher education institution
IREG	International Ranking Expert Group
KMT	Kuomintang (Taiwan)
MOE	Ministry of Education (Taiwan)
NCCU	National Cheng Kung University (Taiwan)
NCKU	National Chengchi University (Taiwan)
NPM	New Public Management
NSC	National Science Council (Taiwan)
NTU	National Taiwan University
OECD	Organisation for Economic Cooperation and Development
PRC	People's Republic of China
PRSPWU	Performance Ranking of Scientific Papers for World Universities
QS	Quacquarelli Symonds

QSWUR	QS World University Rankings
R&D	Research and development
RAE	Research Assessment Exercise (United Kingdom)
ROC	Republic of China
SCI	Science Citation Index
SSCI	Social Science Citation Index
THE-QSWUR	Times Higher Education–QS World University Rankings
THEWUR	Times Higher Education’s World University Rankings
TNC	Transnational corporation
TSSCI	Taiwan Social Science Citation Index
UGC	University Grants Committee (Hong Kong)
UST	University System of Taiwan
WTO	World Trade Organisation
WWII	Second World War

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Chapter 1

Introduction

In recent years, university rankings have become an important research topic in higher education studies. University rankings are a relatively new phenomenon in East Asia. Yet they are actually nothing new in higher education, and have been important in the US for years. However, since global university rankings have appeared, we have seen that the ranking phenomenon has spread over the rest of the world. Since then, we have witnessed that climbing on league tables has become far more important than before, even though there are criticisms that the methodologies of many ranking exercises bias the results and that the heightened competition brought by university ranking has had side effects on higher education.

Several major developments in higher education help us to understand the increasing prevalence of university rankings. First, higher education has undergone a tide of commodification that has transformed the resource allocation mechanisms and the governance regime in higher education. Second, the transnationalisation of higher education and the associated cross-border activities, especially provision, have modified the nature of higher education services from national responsibility for education to international exchange and trade. Furthermore, these developments have substantially altered the logic and imperative of decision at policy, institutional and individual levels. In this context, we recognise the impact of university rankings on the decision-making of students, especially that of international students, in their choice of universities. Meanwhile, university rankings have caused different degrees of impact on strategies of higher education institutions (HEIs) and behaviours and decisions of stakeholders in the field and governments' education policy (Bastedo and Bowman 2010, 2011; Bowman and Bastedo 2009, 2011; Hazelkorn 2007a, b, 2008, 2009; HEFCE 2008). All these are because there is a global reputation race in higher education and university rankings are seen as the progenitor of this reputation race with geopolitical implication in today's globalised world (Hazelkorn 2011; Murphy et al. 2010).

This interpretation of university rankings helps to explain recent higher education reform in East Asia. Indeed, we have witnessed that many governments in the region take the ranking exercises very seriously and thus their influences are expanding rapidly in both policy making and institutional agenda (Mok 2007, 2010). For many East Asian countries, higher rank in the global university rankings not

only means making a difference in credentials of HEIs, but also serves their national goal of building world-class universities. Therefore, in China, Hong Kong, Japan and South Korea, governments attempt to implement special initiatives for selected universities. These excellence schemes (such as China's 211 and 985 projects, Hong Kong's Areas of Excellence Scheme, Japan's Global 30 programme and South Korea's Brain Korea 21 programme) aimed to improve the research capacity of selected institutions or research units, thereby facilitating them to achieve world-class status. Although not all of these policy initiatives have better performance in position taking in global university rankings as their specific targets, it is evident that moving up the existing league tables is an efficient way to show their achievements.

As in the rest of the region, the influence of university rankings on higher education policy and HEIs' agendas are likely to be profound in Taiwan. In fact, higher education in Taiwan has accomplished the process of massification in the late 1990s. Since then, the focus of higher education reforms and transformations has shifted from quantitative expansion to qualitative consolidation. In this context, the idea of pursuing world-class excellence has entered the policy discourse of higher education in Taiwan. This changing discourse of higher education policy has resulted in a series of academic excellence programmes that aim to improve universities' infrastructure and invigorate research by strategically funding a number of selected research projects in the late 1990s and early 2000s. Later, in 2004, the Taiwanese government further specified its policy goal by aiming to develop at least one university as one of the world's top 100 universities and at least 15 key departments or cross-university research centres as the top in Asia by 2009 (MOE 2010a). Meanwhile, a series of funding programmes have been launched to promote teaching excellence and institutional collaboration (Lo 2009; MOE 2010b). It is believed that these special funding schemes have formulated a role differentiation policy that has re-stratified the higher education sector in Taiwan, in which research-led and teaching-led universities serve distinct missions (see Chap. 2 for detail). These changes in Taiwan's higher education system explicate how the ideas of competition and comparison, emphasised in the globalised policy discourses, are institutionalised via national policy and governance mechanisms. More importantly, the effects of the reputation race are likely to generate all sorts of unintended consequences and contrary effects on higher education policy and institutional agenda in Taiwan that are only vaguely perceived at the present time.

1.1 The “Global League” in Higher Education

For national policy makers and leaders of individual HEIs, the rising quest for world-class excellence and the increasingly prevalent international university rankings are taken as essential elements of the process of globalisation and internationalisation within the higher education field (Marginson and van der Wende 2007a). This reputation race represents higher education entering “an era of open global competition between nations and between individual HEIs as global actors in their own right”, in which “international comparisons are constantly made”

(Marginson and van der Wende 2007b, p. 307), despite the fact that there is an unequal distribution of educational resources in the world. This international competition can be further illustrated in two ways so as to specify the current global transformation in higher education. First, there is a recognition that top universities in the global era are necessary to transcend the boundaries of nations, and that they have to be involved in the global academic community to validate their international stature (Mohrman et al. 2008). In this sense, if universities wish to pursue excellence in the global age and compete for an internationally recognised status, they seemingly have no alternative but abandon the locally-focused approach. Second, given the prevalence of global university rankings and their metrics for assessment, stepping up specific criteria used in the influential global league tables (e.g., the Academic Ranking of World Universities (ARWU), *Times Higher Education’s* World University Rankings (THEWUR) and QS World University Rankings (QSWUR)) becomes a smart way to win in the reputation race on a global scale (Altbach 2007; Marginson and van der Wende 2007b).

The emergence of international competition has drawn academic attention to a possibly positional “arms race” in higher education, meaning that the financial costs of building and sustaining “world class” excellence can be socially wasteful (Frank 2004; Winston 2001). For example, more effort on research and international recruitment are the logical response to the global university rankings because they are the measured outputs in the major global university rankings (Marginson and van der Wende 2007a). However, it is obvious that not all HEIs need to be research-intensive and globally active. In addition, given the importance of research in contributing to the international ranking exercises such as the ARWU, the research mission has become the top priority of many HEIs. But, this may have negative impact on the quality of teaching (Leisyte et al. 2009; Lewis 2006). Active participation in the global academic network, which greatly contributes to international reputation marketing, has also sharpened the conflict between the global vision and the local dimension on which individual HEIs operate. This is because “involvement in world science means, in general, adherence to established research paradigms and themes” and consequently it seems impractical to “build an infrastructure that permits research on local or regional themes if a university wishes to join the ‘big leagues’” (Altbach 2007, p. 16). In fact, we have witnessed that these strategies of pursuing excellence have been adopted by higher education systems through the creation of a differentiated academic system and concentration of funding (Altbach 2007; Deem et al. 2008). There is also an argument that universities are facing the difficulties of uncertain roles and purposes because of such a globalised and complex environment, in which universities are struggling between the processes of differentiation and de-differentiation generated by the diversified influences of national policies and academic norms and values (Deem et al. 2007; van Vught 2008). All of these instances have demonstrated that there is an awareness of tension between university rankings and institutional and governmental policies and concerns.

The tension involved in how to position a university in a globalised and marketised system with its own characteristics has generated many controversies in non-English speaking countries. Universities in these countries have strong incentives to concentrate their efforts onto producing academic articles in international

English journals, owing to the added weight in research domains that publishing in these journals adds when the university's performance is measured. Nevertheless, in many circumstances, staying away from using indigenous languages may mean losing connections and interactions with the local communities. Many Asian states have also been criticised for ignoring their local context when they review their education systems and launch reforms along Western models and experience. These reforms and policy changes are criticised as “policy copying” instead of policy learning which consequently creates a new “dependency culture” (Deem et al. 2008).

In Taiwan, academics, mainly from arts, humanities and social sciences, have strongly criticised the current evaluation mechanism that overemphasises the importance of publications in international English journals, especially those listed in the Science Citation Index (SCI) and the Social Science Citation Index (SSCI)¹, but ignores the contributions of local publications written in Chinese. As reported by Chou et al. (2013):

English-language publications have become more important than their Chinese-language counterparts; mainstream international issues, instead of local–regional context issues, are highlighted; publishing in a foreign English-language journal has become a more prestigious accomplishment than that in a local–regional journal; and scholarly books, translated books, and textbooks are devalued and downgraded compared with journal articles. These consequences suggest that the language used (i.e., English) has become more important than the quality of the scholarly paper and that journal articles are more valued than any other form of publication (Chou et al. 2013, p. 27).

They further remarked that the current evaluation has undermined the morale in academia. This has led to a petition presented by a group of academics demanding a revision of the existing evaluation approaches and a correction of the SCI/SSCI craze (Huang 2011; Yu 2011). In addition, recent studies also call for building an “Asia-centered” evaluation mechanism for the disciplines of humanities and social sciences (for example, see Chen and Lo 2007; Chou 2012; Chou et al. 2013; Lo, *in press*), which can be seen as a critical response to the homogenising effects which have emerged in these globalised contexts (Guo and Chen 2011).

In sum, these various tensions and related debates make this study conceptually and empirically important, since the higher education sectors in East Asia have yet to find or consolidate their own way in the global age. Taiwan is the case this book particularly concentrates on.

1.2 The Significance of University Rankings

This book aims to examine how Taiwan's higher education system has been influenced by the ranking phenomenon. As said, there is a growing obsession with university rankings around the world. However, given the fact that the influence

¹ SCI and SSCI are citation indices produced by the Institute for Scientific Information (ISI) of Thomson Reuters. These databases show citation counts of scholarly literature and are considered key measures of recognition and importance in the academic field.

of university rankings has only become prevalent in many other parts of the world since the emergence of global rankings in the mid 2000s, it is a relatively new phenomenon outside the US (Kehm and Stensaker 2009). Therefore, to fill this gap, this book presents some empirical findings on the impact of university rankings on higher education in East Asia in general and Taiwan in particular. Meanwhile, I also recognise that, compounded with the factor of globalisation, global university rankings have become an intriguing phenomenon by which the higher education landscape has been (re-)shaped (Hazelkorn 2011). I thus consider global rankings as a factor affecting national strategies in higher education and transforming the global landscape of higher education in the context of globalisation and neoliberalisation. Furthermore, recent work also seeks to read and explain the ranking phenomenon theoretically, as university rankings are seen as a normative force that projects hegemonic and homogenising functions. In light of this, this book attempts to provide a conceptual clarification of the growing obsession with rankings and to achieve a better theoretical understanding of the basis of their popularity and their implications for higher education through applying theories from different disciplines. To sum up, with a particular focus on Taiwan, this book aims to address the significance of university rankings in contemporary higher education by asking three questions:

1. What are the effects of university rankings on Taiwan's higher education system?
2. How does the emergence of university rankings influence Taiwan's position in the global higher education landscape?
3. How can these phenomena be theoretically framed?

1.3 Theoretical Orientation and Framework

In this book, I draw on a number of theoretical perspectives to provide conceptual standpoints for its theoretical approach and framework. Among the many relevant theories, I pay particular attention to the concepts of convergence and homogenisation, because international competition has created a new institutional environment in which higher education systems are developing toward unified and differentiated structure. The emergence and prevalence of ranking systems then is seen as an important element strengthening the competitive pressure and process as well as intensifying systemic and institutional transformation (Altbach and Balán 2007; Kehm and Stensaker 2009).

The ideas of convergence and homogenisation, in a broad sense, are based in the concept of time-space compression proposed in globalisation theory (Giddens 1990). It suggests that the use of information technology and intensified personnel exchange enable international circulation of research results and worldwide contributions to the same publication venues. As a result, a standardisation of science and scholarship, in the aspects of hardware (including scientific equipment, laboratories and infrastructures) and software (including definitions, methodologies, paradigms and themes of research) has transpired (Altbach 2007; Sidhu 2006). Given

the eagerness to participate in the international academic network, the status of world-class excellence which projects an imagination of the highest standard in the global academic community has been something irresistibly attractive to academic circles in different places, even though we still have not reached a concrete answer to the basic question about what “world-class university” means, particularly within a local context.

In regard to the study of higher education, the process of convergence and homogenisation mainly refers to a global phenomenon, in which diversity within a system and between systems has been undermined owing to the rise of the audit society and opened global higher education market (Kehm and Stensaker 2009; Marginson and van der Wende 2007a; Sidhu 2006). Given the expansion of higher education in many countries in terms of the number of students and HEIs, there has been an increased demand for information resources to facilitate the purchase of higher education by student-consumers. In turn, both a university’s customers and managers seek a widely accepted standard because it means efficiency, calculability, predictability and control, thereby providing guarantee of quality (Ritzer 2002). This is a key factor leading to the development of an auditing culture in higher education that is visualised through the spread of quality assurance schemes and accountability mechanisms.

Globalisation and the rise of an auditing culture have developed an environment in which university rankings can be seen as a mechanism of facilitating international competition and upholding accountability. It functions as a “fashion arena” that aggregates institutional performance to create the identity and position of HEIs in a hierarchical setting (Coates 2007; Stensaker and Kehm 2009). For some HEIs, the reputation and prestige brought by the exclusivity in these hierarchical classification systems are important, in terms of marketing to and fulfilling the needs of some students (Kirp 2003; Longden and Yorke 2009) and achieving world-class university status (Deem et al., 2009). These discussions not only provide a theoretical basis on which the behaviours of HEIs and higher education stakeholders have been changed, but also illustrate the relevance of the first and second research questions. Responding to these two questions with the support of empirical data helps to exemplify how Taiwan’s higher education system has been framed by the ranking phenomenon.

The objective of the third research question is to explain through conceptualisation how the ranking phenomenon can be understood as a form of power in higher education. The conceptual explanation of the ranking phenomenon can be described at three levels: macro (national and international), meso (organisational) and micro (individual) levels. At the meso (organisational) and micro (individual) levels, recent studies point out that university rankings can be seen as a source of normative power in higher education. For instance, Sauder and Espeland (2009) note that Foucault’s (1977, 1980) insights about disciplinary power sufficiently explain the changing organisational behaviours of HEIs and individual responses of faculty under the influences of university rankings. They consider university rankings as a type of disciplinary practice that is “capillary”, “continuous” and “diffuse”, and therefore argue that the environmental pressure generated by rankings

is less “decouple-able” (Sauder and Espeland 2009, pp. 65–69). This explains the constraints on decoupling from the homogenising functions of the ranking phenomenon. Also importantly, this analytical approach leads us to rethink the competition and reputation race initiated by performance-driven culture and hierarchical classification in higher education. Relatedly, in light of Bourdieu’s (1984, 1988, 1993) arguments about “game playing”, Deem et al. (2009) point out that competition for and accumulation of academic capital as well as prestige and status are endemic to academic circles, and university rankings provide a way of specifying the field on which the game is played. These recent studies remind us that more attention should be paid to the connection between university rankings and power when exploring how external pressures generated by ranking exercises are internalised by HEIs and academics.

Regarding the macro (national and international) level, world systems theory and post-colonial analysis of higher education are particularly relevant to illustrate the ranking phenomenon in the global context. While the “centre-periphery” framework initiated in the world system thesis highlights the unequal pattern of the global higher education landscape (Altbach 1998; Altbach and Kelly 1984), the argument against neo-colonialism in higher education explains how the expansion and development of higher education in developing countries are not capable of changing the inequality in knowledge construction between the developed and developing parts of the world (Tikly 2001, 2004). On these theoretical bases, university rankings are seen as a mechanism reconfirming the dominance and hegemonies of Western paradigms in higher education (Deem et al. 2008; Ishikawa 2009; UNESCO 2010). Indeed, recent studies have raised our concern about the roles and functions of rankings in the process of reshaping the global landscape of higher education. For instance, Marginson (2009) proposes an antinomy of the knowledge economy, in which university rankings facilitate the patterns of openness and closedness in the global higher education space simultaneously. Based on this, Lo (2011, p. 209) further argues that university rankings can be conceptualised as the mechanism of agenda setting in global higher education, thereby explaining “how global hegemonies are manifested in higher education agendas”.

Given this widened theoretical background, I intend to provide a more systemic delineation and analysis of the ranking phenomenon and its impact on higher education policy, university governance, and life of academics. I will achieve this by analytically combining a neo-institutionalist interpretation with a debate between structuralism and post-structuralism. Such an interpretation illustrates the technological and conceptual dimensions of university rankings. Meanwhile, I will also generalise the three analytical levels (macro, meso and micro) into two (namely, ecological and geographical) perspectives. Elements of these theoretical perspectives will be synthesised to develop a four-dimensional framework (see Chap. 3) for analysing the ranking phenomenon in Taiwan. The first dimension aims to look into how university rankings have influenced higher education in Taiwan based on empirical findings from five Taiwanese public universities. The second dimension examines how Taiwan can use rankings to promote its interests in global higher education. The third and fourth dimensions focus on

the relationship between university rankings and power in higher education. They show how the ranking phenomenon can be read and explained through theoretical lenses from ecological and geographical perspectives. In regard to the ecological perspective, empirical evidence suggests that the influence of university rankings varies throughout the academic hierarchy in Taiwan. Theoretical analysis then illustrates the relationship between the ranking phenomenon and the power structure in the academic hierarchy. In terms of the geographical perspective, while the empirical analysis is based on data from Taiwan, the theoretical analysis offers important insights from a more general perspective for the readers to understand the changing global landscape of higher education and its implications for higher education in East Asia.

1.4 Methodology

The research in this book is presented using a qualitative case study approach. A multiple-case study was conducted. The selection of research sites is based on the differentiated, tiered higher education system in Taiwan, in which universities are classified into several categories (see Chap. 2 for detail). One or two universities from each tier of the system were selected, for a total of five universities. The characteristics of the selected universities are described below.

University A is regarded as one of the elite universities located in northern Taiwan and has a long history. Students who are accepted to this university are expected to live up to a high academic standard. The university is a comprehensive university offering numerous programmes in a diverse range of disciplines, including arts, social sciences, sciences, medicine, engineering and management. It is one of the twelve research-intensive universities in Taiwan funded by the Programme for Aiming for Top University (also known as the “five-year-fifty-billion” programme), a special grant scheme with the aim of enabling the selected universities to achieve the status of the world’s top research universities. To achieve the goal set by the Ministry of Education (MOE), University A not only identifies itself as one of the flagship universities in the territory, but in the near future it also aims to become a top university in the world, with several academic areas that are internationally well known.

Located in the central southern part of Taiwan, University B was founded as a comprehensive university consisting of colleges in various disciplines (arts, social sciences, sciences, management, engineering, management and education), with the goal of enhancing the quality of higher education in the region. Although University B does not attract the elite population that the prestigious universities such as University A do, the university identifies itself as a research-oriented university and has set an ambitious target to become a globally recognized university. However, it was not selected to be funded by the “five-year-fifty-billion” programme. Instead, University B gained funding from the Programme for Promoting Teaching Excellence in Universities, which aims to improve the overall teaching quality of its funded institutions.

University C is located in the same town as University B. The university was formed by merging two tertiary institutions (one institute of teacher training and one institute of technology) about a decade ago. After the merger, University C became a comprehensive university offering programmes in different disciplines at both undergraduate and postgraduate levels. While it has secured its leading position at the local level, its vision is to be nationally recognized and even internationally recognized in the long run. University C is regarded as a teaching-oriented university, and receives funding from the “teaching excellence programme”. At the same time, it is funded by the Programme for Nurturing Talented in Key Areas, which aims to sponsor universities to enhance their teaching quality in specific disciplines.

University D and University E have similar backgrounds. Both of them are located in southern Taiwan, and were institutes of teacher training before becoming universities in the early 2000s. Currently, both universities are comprehensive universities consisting of several colleges in different disciplines. Nevertheless, owing to their strong affinity for teacher training, education studies is a particularly strong subject at the universities. Both universities are regarded as teaching-oriented institutions. Located in a larger town and having a wider variety of colleges and programmes, University D intends to compete with universities at the upper levels of the system, such as University C, via strengthening its research capacity. University E, however, is keen to remain in its position of serving the local community as a teaching-oriented university. Both Universities D and E obtain funding from the “nurturing talented in key areas programme”.

I believe that this mix of universities provides a glimpse into the life of higher education in Taiwan. University A was selected because of its prestigious status in Taiwan and its mission of becoming a world-class university. Universities B and C represent mid-level HEIs that are not included in the group of the elite universities, but have the ambition to compete with their counterparts at the upper levels. Universities D and E are included in order to identify the effects of university rankings on HEIs that primarily aim to serve the local community and are considered to be less competitive globally. This selection of research sites did not include every type of HEI in the island-state, but the institutions did vary in terms of academic prestige, size, research- vs. teaching-oriented position, and locally vs. globally focused status.

The data for this book were collected from intensive fieldwork conducted in Taiwan. A total of 32 semi-structured interviews, lasting between 35 and 75 min, were conducted to gain an in-depth understanding of the participants’ perceptions and experience of rankings and related issues. The interviews are designed to be semi-structured and are guided by a series of questions (see Appendix I for the interview protocol). To offer space for the interviewees to express their insights and experiences freely, sticking only to the set questions during the conversation was not required. To provide a comprehensive account of experience, the participants include one to five academic managers (i.e. deans and associate deans of faculty, heads of department, directors and deputy directors of research institute) and two to four faculty members from each sampled institution (Table 1.1). In addition to the 30 respondents from the five sampled universities, a section chief from the Depart-

Table 1.1 Interviews by type of respondent's affiliation

University	Type of institution	No. of interviews	No. of academic managers	No. of faculty members
A	First tier	8	5	3
B	Second tier	9	5	4
C	Second tier	4	1	3
D	Third tier	4	2	2
E	Third tier	5	2	3

ment of Higher Education of the Ministry of Education (MOE) and a researcher from the Higher Education Evaluation and Accreditation Council of Taiwan (HEE-ACT) were interviewed.²

The data were sorted for themes rather than precisely predefined variables. The sorting scheme derived from broad themes (e.g. the effects of funding concentration, the culture of competition and attitudes toward teaching and research) of the corresponding dimensions (i.e. Dimension 1–4). The focus of the analysis is to understand the meaning, context and variations in how salient themes are expressed or ignored in order to identify general trends that appeared relevant to the effects of global university rankings.

The limits of qualitative research are acknowledged here, in terms of having a controlled trial and a representative sample. It is possible that the respondents conform to a particular disposition or temperament. Indeed, faculty views about the impact of rankings are possibly biased by their negative attitudes towards evaluation. It is also realised that the findings of this study are not generalisable. Indeed, non-generalisability is seen as a limit of qualitative research, in terms of having a controlled trial and a representative sample in social research. Indeed, while the fieldwork took place in several cities in Taiwan, this cohort did not represent a representative sample from the Taiwanese higher education sector. However, the range of respondents' affiliations represents certain degrees of separation that account for a diverse set of views and opinions in the stratified system.

1.5 Overview of the Book

This book consists of eight chapters. After a brief introduction in Chap. 1, Chap. 2 reviews Taiwan's social, economic and political development with a particular focus on its impact on higher education. This review provides an informative context for the following analysis of the four dimensions of university rankings in relation to Taiwan's higher education policies and reforms. It particularly sketches the quest for building world-class universities and the many related governance responses since the 1990s.

² At the time of this writing, the researcher also served as an associate professor in a university in Taiwan that was not one of the five sampled universities.

Chapter 3 introduces key theories underpinning the changing environment in which university rankings have emerged. These theories focus on the global trends toward cross border activities in higher education, the effects of neoliberalism on higher education, the emergence of heterarchical governance in higher education, the relationship between stakeholders in higher education and the global landscape of higher education. This is followed by a literature review on definitions and characteristics of university rankings. In particular, this part introduces the attributes of major global ranking systems. In light of these theoretical elements, this chapter outlines a four-dimensional analytical framework in which university rankings are viewed as technologies or concepts from an ecological or a geographical perspective. Based on these four dimensions, I attempt to examine the ranking phenomenon in Taiwan's higher education system, beginning with presumptions that consider rankings as a technology, then turning to the theoretical lens that conceptualises rankings with a focus on power relations in higher education.

The heart of the book comes in Chaps. 4–7. In these four chapters, I review a plethora of evidence related to the ranking phenomenon and its implications for Taiwan's higher education system. The data presented in the preceding chapters situates my research questions in the context of both ecology and geography of higher education. An ecological perspective for the analysis of university rankings suggests that while rankings have had an effect on government policies as well as organisational and individual behaviours in the Taiwanese higher education sector, the extent of these ranking effects on policies and behaviours are somewhat determined by the academic hierarchy, which is a prestige structure. The ecological perspective contains two dimensions. Dimension 1, technological/ecological (Chap. 4), illustrates the technological dimension of university rankings from an ecological perspective. It seeks to examine how the emergence of university rankings has influenced Taiwan's higher education system. It mainly focuses on how the prevalence of rankings is related to the changing behaviours of stakeholders in the Taiwanese higher education sector. Dimension 2, conceptual/ecological (Chap. 5), then provides a theoretical description of how and why university rankings may be a powerful driving force transforming institutional and individual behaviours and perceptions.

The geographical perspective for analysis is also made of two dimensions. It exemplifies how university rankings are related to national competitiveness and higher education development in the world of globalisation. Dimension 3, technological/geographical (Chap. 6), considers university rankings as an institution projecting power in global higher education. This dimension therefore is concerned with the relevance of university rankings to the changing global landscape of higher education. By looking at Taiwan's place and role in the global higher education landscape, it explores the functions of university rankings as an indicator of higher education quality and research capacity in an international setting. Dimension 4, conceptual/geographical (Chap. 7), analyses the meaning of university rankings in the light of postcolonial discourse. It argues that the implications of rankings can possibly bring both positive and negative consequences for global higher education in terms of quality and diversity.

In general, this book aims to provide a complete picture of interpretations of university rankings, and the response to the ranking phenomenon in Taiwan's higher education sector. More importantly, it aims to explain the power relationships within and between higher education systems that the ranking phenomenon projects.

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Chapter 2

Taiwan's Higher Education System in Context

The chapters that follow engage in analysis of the four dimensions of the ranking phenomenon in relation to higher education policy and reform in Taiwan. This chapter therefore aims to provide some necessary context for those chapters. The society of Taiwan underwent rapid changes during the 1980s and 1990s. These changes have significantly transformed the social context in which the higher education reform was launched. This chapter contextualises higher education reform through delineating and analysing the social transformation in Taiwan over the last few decades, particularly in the 1990s, when the Taiwanese society experienced a process of situating Taiwanese identities. This social context shows how Taiwan views itself and finds a position in the international community. This is especially important in terms of examining the geographic dimension of the impact of the ranking phenomenon on Taiwan's higher education system.

Given the strong connection between the widespread push toward world-class status for universities and the prevalence of global university rankings, in the later sections of the chapter the particular content of higher education policies and reforms is revealed so as to sketch the quest for world-class excellence in higher education and the related government responses since the 1990s in Taiwan.

2.1 Social Transformation in Taiwan

Table 2.1 shows the basic geographical, demographic and economic data for today's Taiwan. Although the island-state is quite small by international standards, the economic data indicate that it should be seen as a wealthy, developed society. However, Taiwan actually took several decades to transform itself from an agricultural economy under authoritarian rule to an economy with a large service and high-tech industrial sector under democracy.

Taiwan had been a Japanese colony for 50 years (1895–1945). It was geared to serving the economic needs of the imperial power until the surrender of Japanese forces at the end of the Second World War (WWII) in 1945. After WWII, the island was returned to the Republic of China (ROC) under the rule of the Kuomintang

Table 2.1 Basic geographical, demographic and economic data for Taiwan, 2013. (Source: CIA (2013); DGBAS (2013))

Geographical	
Area (square km)	35,980
Agricultural land (%)	25
<i>Demographic</i>	
Population (million)	23.3
Age structure: 0–14 (%)	14.3
Age structure: 15–64 (%)	74.1
Age structure: 65+ (%)	11.6
Population growth (%)	0.27
Literacy rate (%)	96.1
Indigenous population (%)	2
<i>Economic</i>	
GDP (NT\$ 100 million, PPP)	143,849
GDP per capita (NT\$, PPP)	616,215
Agricultural sector in economy (%)	2
Industrial sector in economy (%)	29.8
Service sector in economy (%)	68.2

(KMT). In 1949, after the Communist victory in the civil war in mainland China, the KMT fled to the island, to which it moved its seat and quickly established control. From that time, the island was under a single-party, authoritarian rule until the democratisation in the 1990s.

While establishing rigid control over political freedoms, the KMT saw economic development as the route to legitimisation of its authority. Indeed, Taiwan has enjoyed uninterrupted economic growth since the mid-1970s and created an economic miracle, which is founded on various smooth intersectoral structural transformations (Thorbecke and Wan 2007). In the early phase of Taiwan's development, agriculture played an important role by providing an agricultural surplus to finance incipient industrialisation. In the 1950s, given the initial conditions prevailed (i.e. after land reform), the state needed to generate a reliable and continuous flow of net resources from agriculture into the rest of the economy. Thus, a strategy of import substitution was adopted during this period. In the 1960s, the economy of Taiwan was gradually transformed to focus on developing a labour-intensive manufacturing industry. These early industries played a crucial role in absorbing labour released from agricultural production. This smoothly functioning labour market made Taiwan immune from the phenomenon of massive rural-to-urban migration resulting in large-scale under- and unemployment and squatters' settlement around the large metropolitan area, which many developing countries have experienced. In the 1970s, the state refined its strategy to move in favour of machine-tools industries. While the government helped establish successful subcontracting networks, those domestic relatively small firms made their products competitive in the international market through cost control, punctuality of delivery, and readiness to adapt to the vagaries of the market. This helped Taiwan's economy turn to export-oriented successfully (Thorbecke and Wan 2007, pp. 62–67).

From the 1980s, Taiwan started to move to service and technology industries. This round of transformation was initiated by the restructuring of global production

systems, in which foreign direct investment is highly mobile and non-knowledge inputs (e.g. cheap labour) have lost the country-specific characteristics that they once possessed. Developing knowledge-based industries hence became a key to the future economic success of the island-state (Chen 2004). In this transition to a knowledge-based economy, Taiwan was tremendously successful in developing high-tech industries. For instance, the Ministry of Economic Affairs sponsored the establishment of several public and semi-public think tanks to serve as the research arms of the planning agencies on research and development (R&D) issues during the 1980s. The NSC also made substantial investments to advance basic research, while it was entrusted to develop and manage a number of industrial and science parks that aimed to provide easy access to the R&D facilities of public-funded research organisations and national laboratories, the brainpower of major universities, and finance from the state-owned development bank and semi-venture capital for investors (Chu 2007). As a result of these efforts, Taiwan has currently become one of the leading manufacturers in the global semiconductor industry and Taiwanese companies have established close partnerships with brand leaders in the USA, Japan and Europe (Chung et al. 2004). In sum, during the past half-century, Taiwan was in the transition to a market-oriented, high-tech economy. Yet, in the transition, the government played an active role in guiding the development of the economy through interventions in different sectors and levels (Smith 2000; Thorbecke and Wan 2007).

Despite economic success, Taiwan has suffered from a lack of consensus on national identity at home and a lack of recognition in the international community. Internationally, Taiwan does not have diplomatic ties with most nations of the world. Though for many years the ROC claimed itself to be the legitimate government of China,¹ the People's Republic of China (PRC) considers the island to be a province and would not maintain diplomatic relations with countries that have official ties to Taiwan. Therefore, most countries have chosen to establish diplomatic relations with the PRC rather than with Taiwan. As of November 2009, only 23 countries have diplomatic relations with Taiwan (MOFA 2009). In addition, Taiwan has no right to play an independent role in world affairs. Since the PRC was admitted to the United Nations and most related organisations in 1971 and the USA switched diplomatic recognition to the PRC in 1979, Taiwan was forced to withdraw from many international organisations, although it was able to join the Asia-Pacific Economic Cooperation (APEC) dialogue as an "economy" and the World Trade Organisation (WTO) as a "customs territory" with name "Chinese Taipei" (Parker 2005).

As for the struggle for national identity, the issue is linked to the sub-ethnic and provincial tensions between mainlanders (*waishengren*) and native Taiwanese (*benshengren*). The former refers to people who either moved to Taiwan themselves or whose parents moved to Taiwan with the KMT between 1945 and early 1950s. The latter are those who or whose ancestors migrated to Taiwan before 1945 (Law 2003; Tsang 2007). Native Taiwanese are the dominant group of Taiwanese people,

¹ Before democratisation in the late 1980s, the authoritarian and uninterrupted KMT rule was based on a constitution and political system that was devised before 1949 and the claim that the ROC government was the government of the whole of China (Tsang 2007).

comprising 84% of the total population and regarding themselves as very different from mainlanders.² This ethnic and provincial difference has led to the rise of Taiwanese nationalism, which views Taiwan as a historically and culturally distinct community and considers the KMT authority as one of the external, invading forces.³ This causes conflict with pan-Chinese nationalism that describes Taiwan as an affiliated part of pre-1949 China whose “territory is temporarily reduced to Taiwan but is expected to resume its original territory after the recovery of the Chinese mainland from the Communist Party of China” (Law 2003, p. 85; also see Schubert 2004). These domestic and international circumstances together with the history of foreign invasions have made Taiwan to be a “part country” facing credible internal and external threats, in which Taiwanese live with uncertainty about their future (Wade 1995, p. 129).

To resist both external and internal pressures, the political elites in Taiwan opted for the direction of democratisation in the late 1980s (Tsang 2007, pp. 177–182). Since then, the KMT stopped suppressing opposition forces (*dangwai*) in society. This resulted in the establishment of the Democratic Progressive Party (DPP) in 1986. The revocation of martial law in 1987 was another important sign of democratisation. Under martial law, the ideologies of people and many aspects of public life (e.g. the mass media and immigration) were subject to tight controls. The revocation led to a more relaxed political atmosphere, in which the DPP grew to be a legitimate opposition party and a significant political force that the general public accepted to be an effective check on or even a viable potential alternative to the political domination of the KMT. In the 1990s, the island-state gradually made the transition to a democratic, multi-party political system. In 1989, direct elections were introduced for the first time for local councils and the Legislative Yuan (the legislative branch), and also for executive posts at various levels (including county magistrates and city mayors). Direct elections for the Taiwan provincial governor and the mayors of two municipalities, Taipei and Kaohsiung, were introduced in 1994, and for the President in 1996. In 2000, the KMT's ruling position was replaced by the DPP, who remained in power until the KMT regained the presidency in 2008. In this sense, the process of political democratisation has been successfully completed in Taiwan, even though it has often been linked to the infiltration of gangsters and corruption in the electoral process (Tsang 2007, pp. 188–189).

It is noteworthy that the democratisation process is not only driven by socio-political factors including the growth of a civil society and of an undercurrent of dissent led by political elites (Tsang 2007), but also by socio-economic conditions, such as “successful economic development; the demand of entrepreneurs, business people and professionals for more autonomy; the rise of the middle class; the increased literacy and education levels of people; exposure to democratic values through trading and interaction with the outside world, particularly Western countries; and a Western-trained bureaucratic elite” (Law 2002, p. 64).

² Both mainlanders and native Taiwanese are Han Chinese. Mainlanders account for 14% of the total population, with the remainder consisting of nine major indigenous peoples.

³ Taiwan was conquered by the Portuguese, the Spanish, imperial China and Japan in the past 400 years.

Nevertheless, the tension between the two main sub-ethnic groups has not decreased, despite the success of democratisation. In contrast, it is often reignited, particularly in political elections. To build up a new national identity, the KMT authority under the leadership of President Lee Teng-hui abandoned the pan-Chinese nationalism insisted on by President Chiang Kai-shek and President Chiang Ching-kuo and advocated the notion of “new Taiwanese”, “implying a fresh, and shared ‘national’ identity for those living in Taiwan who are willing to strive and sacrifice for the ROC regardless of when they or their ancestors arrived, and their provincial heritage or native tongue” (Law 2002, p. 66). Popular acceptance of the idea represents the emergence of a “new Taiwanese consciousness”. This brought the policy of self-limitation, under which the Taiwanese government gave up its constitutional legitimacy (*fatong*) over the whole of China. This implied the recognition of the legitimacy of the Communist rule in the Chinese mainland. Meanwhile, it started to promote Taiwan and the PRC as “two political entities” with “special state-to-state relations” in the international community (Schubert 2004). Such a policy was continued and reinforced under the leadership of President Chen Shui-bian of the DPP (see Chu 2004; Kao 2004 for detail).

This notion of “new Taiwanese” has also brought about the policy of “de-sinification” or “Taiwanisation” at the domestic level. For example, the Government of Taiwan Province was abolished in 1999 to remove the notion of Taiwan as a province of China and to reinforce the notion of Taiwan as a state. Another example of the efforts for de-sinification is the emphasis on Taiwan as a collectivity in, by and for itself through education. As a consequence, homeland studies and homeland languages were introduced to replace the sino-centric curriculum that emphasised knowledge about China. The idea of Taiwan as the ultimate home mastered by Taiwanese people is also promoted in education (Law 2002). All these primarily aim to cultivate a sense of “Taiwanese subjectivity” (*Taiwan zhutixing*), as anti-Chinese nationalists believe that Taiwanese perspectives were peripheralised in the past (Lynch 2004; Schubert 2004). At the same time, signs of affiliation with the Chinese Mainland are removed or reduced (Law 2002).

Summing up, in the post-1949 era, the Taiwan-centric notion that serves as a self-conscious project of collective identity construction and nation-building has come together with economic success to Taiwan, although politically the island has not declared independence and still holds ties with the Chinese mainland. Within this context of social transformation, the following section turns to describe the general picture of higher education in Taiwan.

2.2 A General Picture of Higher Education in Taiwan

2.2.1 History and Basic Orientation

The modern education system in Taiwan was founded during the period of the Japanese occupation. The Japanese colonial government imposed Western-style education systems with a main objective of assimilating the island and integrating

it into Japan. The education system was started with the establishment of an elementary education sector that aimed to equip the masses with basic knowledge and modern skills and to educate people in political obedience. The higher education system in Taiwan commenced with four institutions (one university and three colleges) during the late 1920s (Tsai and Shavit 2007). At that time, the system had only one university, Taihoku Imperial University, which was established in 1928 by the Japanese colonial regime, largely owing to Japan's ambition of expanding in south China and the South Pacific. Taiwan was considered to be a suitable place to conduct the research and to train the manpower that the Japanese colonisers needed (Wu et al. 1989, pp. 257–263). In fact, the Taiwanese who aspired to higher education were carefully channelled into the professions that the Japanese colonial government wanted to promote among the population. Despite the fact that the education system was founded with strong political and economic intentions, when the Japanese left Taiwan in 1945, Taiwan was one of the most literate populations in Asia (Woo 1991).

During the early period of the KMT rule in Taiwan, the number of institutions slightly increased to one university and four colleges. This was because the immediate educational goal of the KMT government at that time was to clear Japanese influence and to establish the national identity of China. Therefore, in 1945, Taihoku Imperial University was renamed National Taiwan University, and many institutions were renamed and reorganised (Wu et al. 1989, pp. 263–264; Zhang 2003). In the 1960s, in response to the global trend of higher education expansion, there was the first round of higher education growth in the island-state (Schofer and Meyer 2005; Wang 2003). During this period, the number of HEIs in Taiwan increased from 27 in 1960 to 91 in 1969. The number of students also grew rapidly from 34,623 in 1960 to 182,221 in 1969. However, the newly established institutions in this round of higher education expansion were mainly junior colleges (*zhuanke xuexiao*). Their number increased from 12 to 69 in a decade. This was because the expansion primarily aimed at providing more skilled technicians for economic development. Meanwhile, the private sector replaced the public sector, forming the majority of junior colleges through this round of expansion. Accordingly, the percentage of private junior colleges rose from 36.2% in 1960 to 73.1% in 1969 (Wang 2003, pp. 262–263). From the 1970s to the mid 1980s, the expansion of the higher education system slowed down. The private sector was also not allowed to establish any new institutions during this time. As a consequence, the number of HEIs only increased from 92 in 1970 to 105 in 1985. However, the growth rate of the number of students was low but steady during this period. The number of tertiary students increased from 201,178 in 1970 to 416,158 in 1985 (Wang 2003, pp. 263–265).

2.2.2 Regulation

Despite the fact that the private junior colleges had become the majority, the state still played a dominant role in running universities and colleges (*duli xueyuan*) before the mid-1980s because higher education was seen as an important way to

impose ideological control over the people. In fact, the KMT government adopted a highly centralised model to govern the higher education sector. At the top of the pyramid chart, the Executive Yuan (cabinet) had the responsibility to administer the social, economic, military, judicial, educational and policy-planning needs of Taiwan. The Ministry of Education (MOE) was the executive department that deals directly with universities and colleges under the Executive Yuan (Smith 1977).

Before the implementation of the policy of educational decentralisation in the late 1980s, education policy-making power was retained in the hands of the government, with the dominant role played by the MOE. The Ministry strictly controlled almost all aspects of the curriculum and administration. It had final say on numerous matters, including hiring, promotion and dismissal of faculty, admission and graduation of students, design of curricula, size of departments, and so on. As an ideological control, all academic publications were assessed and screened by the National Institute for Compilation and Translation of the MOE. Students had to take compulsory political ideology courses, such as the thought of Dr. Sun Yat-sen, in order to shape students' values and behaviours into those expected by the KMT and its leaders (Lo and Weng 2005; Smith 1977; Zhang 2003). Rigid control over the higher education sector has been released since the democratisation and the following educational decentralisation. This has brought significant effects on university governance in Taiwan. This point will be further elaborated later in this chapter.

Another important agency in higher education administration in Taiwan is the National Science Council (NSC). The Council was established in 1959, serving as the highest government agency responsible for promoting the development of science and technology under the Executive Yuan. One major function of the NSC, which appreciably influences the higher education sector, is its role of funding academic research projects. The Council is responsible for granting research funds to HEIs and research institutions to conduct research. According to the NSC's website, "proposed research projects must pass through two stringent rounds of review; if approved, projects can receive financing from the Council for research personnel, equipment, books and information, consumable materials and overseas travel expenses" (NSC 2010). There are seven types of research grant that provide financial support for academic research, industry and university cooperation and application of R&D results. It is noteworthy that the NSC is the agency financing the Programme for Aiming for Top University. This is a programme that draws a lot of attention from the academic community in Taiwan and will be discussed later in this chapter and in Chap. 5.

2.2.3 Funding

The government is an important funding source in Taiwan's higher education system, although the government is no longer the sole funder for education with the rise of private provision. Generally speaking, the government fund consists of two components: the recurrent component that provides financial support for the daily operation of HEIs, and the programme-based component that sponsors

Table 2.2 Higher education funding allocation in Taiwan, 2008–2010 (Unit: %). (Source: MOE (2011, p. 22))

	Recurrent component			Programme-based component			Fund raised by public HEIs
	Recurrent fund to public HEIs	Subsidies to private HEIs	General cost	Top University Programme	Teaching Excellence Programme	Other ^a	
2008	35	14	2	4	2	/	43
2009	32	13	2	3	3	12	35
2010	35	13	2	5	2	5	38

^a Other refers to the Programme for Infrastructure Expansion and Economic Revitalization that is an intermediate response to the 2008 financial crisis. It is a special grant that aims to provide university graduates of 2006 and 2007 with job opportunities

specific areas of higher education on a project-by-project basis. Table 2.2 shows the allocation of funding from 2008 to 2010. The programme-based component (referring to the fund for the Programme for Aiming for Top University and the Programme for Encouraging Teaching Excellence in Universities only) makes up a significant proportion of the resources, which indicates an increasing degree of competition for funding in recent years. More importantly, as will be examined below, public universities have been granted more financial autonomy through reforming the funding system. As a consequence, as shown in the table, 35–40% of public university income in the last three years income has come from fund-raising activities. In fact, universities have been searching for non-government sources of income, such as tuition fees, income from partnerships with the business sector and social donation. For instance, universities have been permitted to decide the level of tuition fees themselves since 1999. However, there has been public criticism that the financial reforms have increased the financial burden of university costs on students and their parents.

2.2.4 Provision

In Taiwan, as previously noted, the private sector played a significant role in the increase of education provision in junior colleges during the 1960s. Beginning in the mid-1980s, the Taiwanese government began another round of expansion for higher education. In 2000, the number of HEIs increased to 150 and the number of students reached 1,008,241. Importantly, many of the newly established institutions were universities and colleges during this period. In fact, the number of universities and colleges increased from 28 in 1986 to 127 in 2000, while there was a drop in the number of junior colleges (from 77 to 23) during the same period of time (MOE, various years). It is important to note that there was a growth in the number of both public and private universities in this round of expansion. Since 1999, the number of private universities has exceeded that of public universities.

The rationale for the rapid increase of universities and colleges is that after political democratization, the Taiwanese government can no longer merely consider

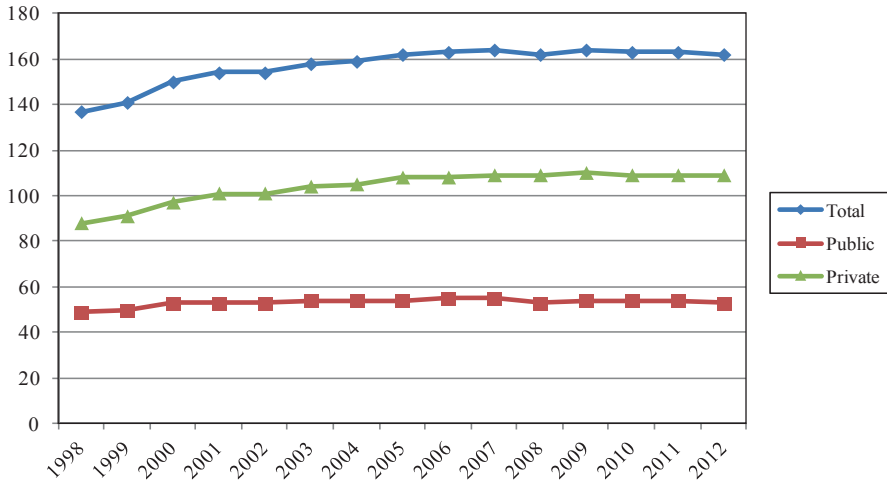


Fig. 2.1 The number of higher education institutions in Taiwan, 1998–2012. (Source: MOE (various years))

manpower development, but needs to take public voice into account when it is planning its higher education policy. In response to demands in the society, providing more university places became an important strategy for developing the higher education system (Wang 2003). However, in addition to the local political factors, Taiwan's awareness of the global economic trend and the associated transition to a knowledge-based economy should not be neglected in explaining the expansion of higher education in the 1990s (Lo and Weng 2005). Indeed, as analysed by Schofer and Meyer (2005), economic development produces the global discourses of pro-educational culture and the scientisation of society that have become important factors affecting the Taiwanese government's decisions on higher education expansion. As a result, Taiwan has accomplished the massification of higher education through the second round of higher education expansion in the 1990s (Trow 1974; Wang 2003). In 1998, there were 173 HEIs (39 universities, 45 colleges and 53 junior colleges), enrolling 915,921 students at various levels of tertiary education. In 2010, there were 163 HEIs (112 universities, 36 colleges, 15 junior colleges) enrolling 1,343,603 students at various levels of tertiary education. 67% (109 institutions) of the institutions are private ones (MOE, various years).

After Taiwan successfully achieved the transition from elite to mass higher education, the major concern over higher education has shifted from quantitative expansion to qualitative consolidation since the late 1990s. In fact, as illustrated in Figs. 2.1 and 2.2, higher education expansion has slowed down since 2000 and the number of HEIs has slightly decreased in recent years. Some universities and colleges even have difficulty recruiting students owing to the rapid decline of the birth rate and increasing competition between institutions. Furthermore, Taiwan's entry into the WTO in 2002 and the increasing mobility of students and higher education

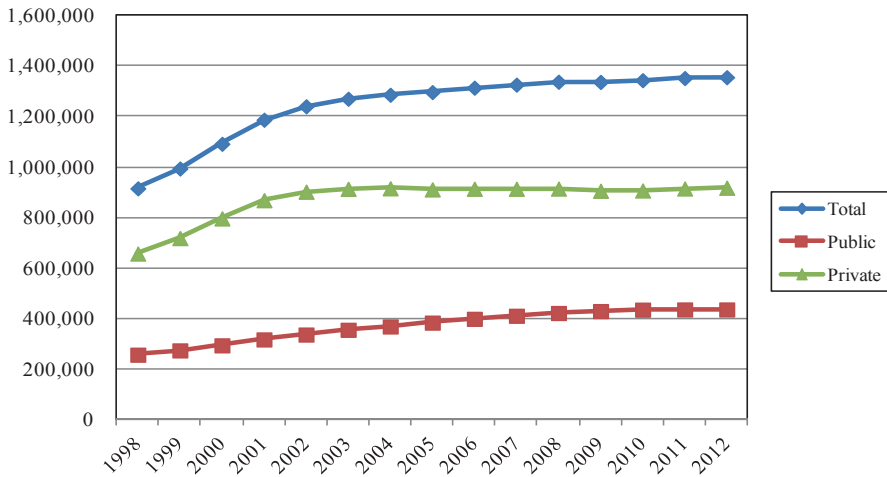


Fig. 2.2 The number of tertiary students in Taiwan, 1998–2012. (Source: MOE (various years))

providers have also contributed to the increased competition that HEIs in Taiwan are now facing (Chen and Lo 2007). As a result, the Taiwanese government has launched a series of reforms and policies that aim to promote excellence in higher education in the last two decades.

2.3 Reforms and Transitions Since the 1990s

The quest for building world-class universities has become a trend of higher education development in several East Asian countries where the massification of higher education has been accomplished. This formulated a “world-class” movement that represents an enforcement of catch-up strategies in higher education within the context of transition toward a post-industrial, knowledge-based economy. In fact, as captioned in Chap. 1, China, Japan, South Korea and Malaysia have clearly stated their goal of building world-class universities in their territories, whilst Hong Kong and Singapore have taken the pursuit of world-class excellence in higher education as a slogan for their policy of developing themselves to be regional education hubs (Mok 2008). This world-class movement is closely related to the rapid growth of influence of university rankings in East Asia because the league tables provide a clear and simple goal for both governments and individual HEIs (Deem et al. 2008). Taiwan is not immune from this trend and started its pursuit of world-class excellence after its accomplishment of the massification of higher education. In this regard, the following sections will delineate the policy initiatives and attempts made by the Taiwanese government under the general theme of enhancing higher education quality since the 1990s.

2.3.1 *The Return of Autonomy and Decentralised Governance*

As discussed earlier, the revocation of martial law in 1987 provided a more relaxed political atmosphere in which the civil society had further developed and the call for relaxation of control over academia and democratisation on campus had grown (Law 2003; Weng 2003). Besides, a deregulated and decentralised governance model is considered to be in line with the global trends of destatisation and managerialism (Lo 2010). In this context, the idea of deregulation (*songbang*) was introduced to redefine the relationship between government and academics. In the mid 1990s, the Taiwanese government promulgated its education reform documents, with which decentralisation policies were adopted to devolve powers in various aspects so as to enhance the operational capacity of institutional self-governance for pursuing academic excellence (Education Reform Council of Executive Yuan 1996; MOE 2001).

The decentralisation and empowerment reforms can be divided into institutional and individual levels. At the institutional level, the government can grant more financial autonomy to public universities through adjusting origins of resources (i.e. public moneys and private moneys) allocated to HEIs (Brown 1994). Before 1994, the government was the major funding source for all public universities and imposed tight budget control over them. To grant fiscal autonomy to individual HEIs, the government replaced the Public Budget System with the new University Fund System. Under the new system, 80% of the public HEIs' income is granted by the MOE, while 20% is from other sources, including tuition fees, collaboration with the private sector, launching continuing education and donation. While the MOE would not cover any deficit, the public HEIs are allowed to retain the surplus as their contingency funds. This policy intends to give the universities incentives and flexibility to diversify their sources of income by actively seeking grants and donations from the private sector. In addition, the government has also changed its funding policy towards private HEIs. To encourage competition between public and private universities on the same ground, in 1999 the government made a 20–25% cut in its budget for public universities. With this budget cut, the government has been able to partially fund private universities in the forms of reward, subsidy and financial assistance. Since 1999, 20% of the revenue of private universities has been granted by the MOE (MOE 2001).

Moreover, institutional autonomy was enhanced in personnel management. In the past, the appointment of university presidents was decided by the state. The revision of the University Law in 2002 then broke the state's monopoly over the recruitment of university heads. The revised University Law incorporates the participation of academics into the selection process of university presidents and also allowed faculty members to shortlist a few president candidates for the MOE's final choice and appointment (Law 2003; MOE 2007b). To prevent controversies, the selection process has been further amended and simplified. Presidents of public universities are appointed by a selection committee which consists of members from university senates, external parties and officials of the MOE (Article 8). The University Law

also states that half of the members of university senates should be faculty members (Article 15). In addition, the restrictions on nationality have been removed. Universities are allowed to appoint overseas scholars to be presidents as well as other key positions of the universities (see Articles 8 and 13). Such a legal amendment has enabled universities to recruit academic leaders through world-wide searches. Although the amendment to the selection process of university president is criticized as having weakened democracy on campus and has led to a shift from professional control to administrative control (Hsiao 2005), the promulgation of the University Law has stood for the upholding of professionalism through participatory management in higher education.

Furthermore, faculty members are granted rights to screen and select their fellow faculty members. Accordingly, an evaluation committee has been formed in every university to deal with the promotion and selection of academic staff, and the membership of the committee is decided by the senate in each university (MOE 2007b). The establishment of teacher evaluation committees has led to the transfer of personnel authority from university management to faculty members. Their active involvement in university management transforms the faculty member's role into that of a facilitator and coordinator in a reinvention of the organizational culture of universities, thereby providing a "checks and balances" function in university governance.

At the individual level, the promulgation of the Teachers' Law in 1995 is considered an important initiative in enhancing the professional autonomy of university faculty. It is important because the legislation grants legal status to the teaching profession and prescribes the rights and duties of teaching professionals. Article 16 of the Law states that teaching professionals enjoy professional autonomy and have the right to be involved in school administration. More importantly, individual autonomy of teaching professionals has been institutionalized. Article 27 of the Law allows teaching professionals to organize their associations at institutional, local and systemic levels to protect their rights and professional autonomy. Meanwhile, the Law states that educational institutions are not allowed to set any terms and conditions to limit the participation of teaching staff in their associations, or to dismiss them because of their involvement in an association's positions and activities (MOE 2006, Article 28). The National Teachers' Association was then established in 1999, while numerous local and school teachers' associations had already been established at county and institutional levels. The establishment of the teachers' association marks the opening of direct dialogue between teachers and the government. Accordingly, the teachers' associations function as teachers' representatives in negotiations with government departments regarding terms and conditions of teacher appointments. The associations also give advice on various educational issues and send representatives to participate in many relevant statutory bodies. As a consequence, teachers have become one of the major stakeholders and important participants in education policy-making.

Tien (2008) foresees that incorporation of public universities is the next step of decentralisation in Taiwan's higher education system. Under the current system, public universities are under the supervision of the MOE and heavily depend on the

government's subsidies. Moreover, public universities still have relatively limited autonomy in personnel management given that most laws and regulations governing civil servants also apply to the staff members of public universities in Taiwan. Within this context, the idea of incorporation was initiated by the MOE in 2001. According to the government's plan, the legal status of public universities would be transformed into an administrative legal entity. By the incorporation, the government expected that public universities would become more autonomous, mainly in financing and personnel. For instance, the terms of service of university staff would be delinked from those of the civil servants. Regarding financing, though the government budget remains the major funding source for public universities, the MOE would no longer monitor the finances of individual institutions. Instead, a non-statutory advisory body, the Higher Education Review Committee, would be formed to function as a funding committee to allocate funding to public universities (MOE 2001). This policy was welcomed by the presidents of top public universities, as they could gain more power under the proposed system but face little pressure in terms of funding, since the reputation of their universities guarantees sustainable funding sources from donations and research grants. However, there are concerns about the financial difficulties that some universities may face after incorporation. Also, incorporation may further politicise university governance, as the new mechanism for selecting university presidents can involve more parties outside the university. As a result, the Legislative Yuan used its veto to block the proposal for the incorporation of public universities in 2003 and 2005; however, the government has alternatively used extra funding as an incentive to encourage some public universities to be incorporated voluntarily (Tien 2008).

2.3.2 Promoting Institutional Integration and Inter-institutional Collaboration

In addition to decentralising authority to individual HEIs, the Taiwanese government has also attempted to enhance the quality of higher education through promoting institutional integration between HEIs (MOE 2001). Thus, in 2002 the MOE launched the Programme for University Integration and Inter-institutional Cooperation, an additional funding scheme. Later, in 2004, it was renamed the Programme for Promoting Integration between Research Universities and was budgeted at a total amount of NT\$ 787 million. The programme aimed at offering additional grants for universities to integrate their research resources, including manpower, facilities and techniques, on both an intra- and inter-institutional basis. For internal integration, universities are encouraged to group their top researchers into research units/teams on a specific research area in formulation of intercollegiate and interdisciplinary teaching and research engagements. The MOE attempted to promote institutional integration through implementing mergers between HEIs at the beginning of the reform. However, mergers met strong opposition from faculty members of the universities selected. For instance, the proposed merger between National

Taiwan University and National Taipei Normal Institute was abandoned because of the opposition from the faculty members of both the institutions. In fact, only a few cases of mergers were successfully implemented since the government launched the policy initiative (Chen and Lo 2007).

Despite the failure of universities to adopt the idea of mergers, the government was rather more successful in promoting institutional integration and deep collaboration by establishing an inter-institutional collaboration system. Since 2002, the MOE has promoted the establishment of university alliances to strengthen institutional cooperation in both research and teaching. There are three existing university alliances, namely, the University System of Taiwan, the University System of Taipei and the Taiwan Comprehensive University System. They are formed to forge resource sharing between member institutions. For example, the University System of Taiwan (UST), whose members include National Central University, National Chiao Tung University, National Tsing Hua University, and National Yang Ming University, have developed a wide range of collaborations among the member institutions. Four research centres were established under the system to conduct joint institutional research projects in four areas: biomedical science, nanoscience, information system and electronics, and energy and environmental science. A joint admission system and credit transfer arrangements were developed to facilitate cooperation in teaching between the members institutions. Furthermore, the UST has allowed the member institutions to share their library resources, academic manpower and computing facilities through building joint institutional networks (UST 2009).

Taiwan Comprehensive University System (TCUS),⁴ a newly established university system, is another example of institutional integration. It was initially established by three universities (National Cheng Kung University, National Sun Yat-Sen University and National Chung Hsing University) in central and southern Taiwan in 2008. National Chung Cheng University joined the alliance in 2010. These four universities formally established the “Taiwan T4 alliance” in 2012 and appointed Paul Chu Ching-Wu, Professor Emeritus of Physics of the University of Houston and the former President of the Hong Kong University of Science and Technology, to be the President-general of the university system. Reportedly, the MOE will provide a financial subsidy of NT\$ 30 million to the TCUS every year. The setting up of the T4 alliance is designed to enhance cooperation between these four universities and to reduce the disparity between universities in the north and south of Taiwan (TCUS 2011).

Apart from university alliances, the Taiwanese government also encourages HEIs to establish regional teaching resource centres for resource sharing and inter-institutional collaboration in teaching. These regional teaching resource centres are funded by the Programme for Regional Teaching Resource Centre (labelled as 5 in Fig. 2.3 below). Different from the alliances that have been formed by HEIs with considerable research capacity, regional teaching resource centres have been formed by institutions from different layers in the tiered higher education system (see Fig. 2.3). A university from the higher tier would play the role of “core” institution to help its partner institutions, which usually are from the lower tiers,

⁴ It is also known as Comprehensive University System of Taiwan (CUST).

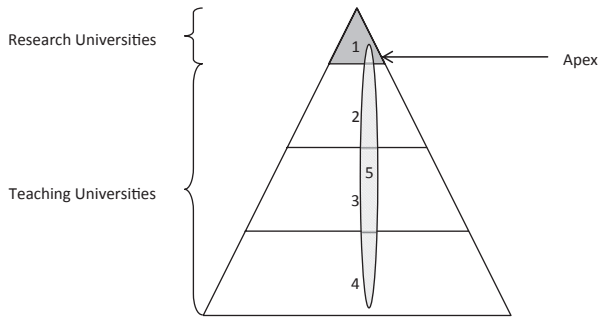


Fig. 2.3 The differentiated academic system in Taiwan. 1. Research-oriented institutions funded by the Programme for Aiming for Top University; 2. Teaching-oriented institutions funded by the Programme for Promoting Teaching Excellence in Universities; 3. Teaching-oriented institutions funded by the Programme for Nurturing Talented in Key Areas; 4. Teaching-oriented institutions without any special funding; 5. The Programme for Regional Teaching Resource Centre. (Source: Lo (2009, p. 741))

enhance their quality of teaching through improving their curriculum, setting up an inter-institutional teaching evaluation mechanism, providing training to their teaching staff and developing inter-institutional courses of general education for students from member institutions (MOE 2013c). For instance, National Cheng Kung University, one of the top research-oriented universities in Taiwan, plays the role of core institution in the Yulin Chiayi and Tainan Regional Teaching Resource Centre that functions as a network to integrate and share teaching resources among Cheng Kung and 12 other institutions in southern Taiwan (Yulin Chiayi and Tainan Regional Teaching Resource Centre 2009). Currently, there were six regional teaching resource centres consisting of 69 HEIs across the island.⁵

2.3.3 *The Rise of Performance-Evaluation Nexus*

After accomplishing the massification of higher education, the Taiwanese government started to change its governance philosophy from “government control” to “government supervision” through developing a quality-assurance mechanism and

⁵ They are (1) Northern Taiwan Teaching and Learning Resource Centre, consisting of Soochow University as the core institution and 16 partner institutions; (2) Second Northern Taiwan Teaching Resource Centre (N2), consisting of National Taiwan University as the core institution and 12 partner institutions; (3) Taoyuan, Hsinchu and Miaoli Teaching Resource Centre, consisting of National Central University as the core institution and 11 partner institutions; (4) Central Taiwan Teaching and Learning Resource Centre, consisting of Feng Chia University as the core institution and 12 partner institutions; (5) Yunlin, Chiayi and Tainan Teaching Resource Centre, consisting of National Cheng Kung University as the core institution and 12 partner institutions; (6) Kaohsiung and Pingtung (KKP) Resource Centre for Teaching and Learning, consisting of National Sun Yat-Sen University as the core institution and 6 partner institutions.

Table 2.3 Results of the evaluations conducted by HEEACT, 2006–2010^a. (Source: HEEACT (2010))

	No. of institutions evaluated	No. of departments evaluated	No. of programmes evaluated	Results Passed	Watch list	Failed
1st round (2006) ^b	17	362 (100%)	/	279 (77.1%)	71 (19.6%)	11 (3.0%)
2nd round (2007) ^b	10	242 (100%)	/	159 (65.7%)	55 (22.7%)	27 (11.2%)
3rd round (2007) ^c	9	264	458 (100%)	386 (84.3%)	65 (14.2%)	7 (1.5%)
4th round (2008) ^c	9	231	418 (100%)	376 (90.0%)	42 (10.0%)	0 (0%)
5th round (2008) ^c	8	258	455 (100%)	425 (93.4%)	30 (6.6%)	0 (0%)
6th round (2009) ^c	11	220	378 (100%)	336 (88.9%)	42 (11.1%)	0 (0%)
7th round (2009) ^c	9	242	511 (100%)	484 (94.7%)	27 (5.3%)	0 (0%)
8th round (2010) ^c	6	50	78 (100%)	/ ^d	/ ^d	/ ^d

^a Four rounds of re-evaluation were conducted during the period

^b This round of evaluation is department-based

^c This round of evaluation is programme-based

^d The results of this round of evaluation were not publicly announced because the institutions being evaluated were military academies

promoting performance-driven culture (Chen and Lo 2007; van Vught 1998). In the early 1990s, the MOE commissioned professional agencies, including the Chinese Society of Mechanical Engineering, Chinese Management Association, Chinese Institute of Electrical Engineering and so on, to conduct an evaluation of the programmes offered by universities. During this period, evaluations were conducted on an institutional basis. HEIs were encouraged to develop their own features. However, the limited resources of these professional bodies restricted their capabilities of coping with the evaluation. Hence, the revision of the *University Law* in 1994 authorised the MOE to take charge of evaluation of HEIs. The MOE then set up the Council of Academic Review and Evaluation to conduct the evaluation. It also entrusted academic organisations or professional evaluators to carry out regular evaluation and to publish the evaluation results.

In 2005, the HEEACT, which was funded by the MOE and 153 universities, was established. It is a statutory body that serves as an independent agency conducting higher education evaluation and accreditation. From 2006 onwards, the HEEACT was commissioned to conduct regular nation-wide evaluations on a five-year basis. In the first cycle of evaluation (2006–2010), the performance of 79 universities and over 2,000 departments and research centres was assessed (see Table 2.3 for the results). Currently, the HEEACT is undertaking the second cycle of evaluation (2011–2015). Five aspects that focus on the quality of teaching are covered in the assessments. Firstly, individual programmes are assessed to see whether or not their

goals and objectives are clearly defined, and whether or not these goals and objectives have their own characteristics and a self-improvement mechanism. Secondly, the design of the curriculum and the teaching methods are assessed based on their relevance to the teaching objectives. The third consideration is students' opportunities to join extra-curricular and overseas activities. Fourthly, professional standards and research performance are taken into account with reference to the number of research postgraduates, the number of faculty members with a doctoral degree and the ratio of teachers to students, etc. Lastly, the performance of graduates would be considered in the evaluation. Their competencies and feedback from employers and other stakeholders are used as indicators. A pass in this evaluation exercise is vital for survival. If a department fails to pass the evaluation for two consecutive years, the MOE will request the university terminate its enrolment and operation (HEEACT 2012).

Furthermore, in 2011, the HEEACT began to conduct an institution-based evaluation. In general institutional evaluation aims to clarify the goals and missions of individual institutions, to identify strengths and weaknesses and to provide suggestions for improvement. To achieve these objectives, five domains, namely institutional self-positioning, institutional governance and management, teaching and learning resources, accountability and social responsibility, and continuous improvement and quality-assurance system are included in the institutional evaluation (HEEACT 2011a).

However, there is concern about how institutional autonomy is upheld in the newly established quality-assurance system. In fact, some universities have been granted the status of self-accreditation since the early 2000s. The revision of the University Law in 2005 further extended the scope of self-evaluation to teaching, research, service, counselling, administration and student participation. Universities are also authorised to formulate their own regulations on evaluation. Nevertheless, the University Evaluation Regulation promulgated in 2007 prescribes that universities are under obligation to be evaluated by the MOE and its agency (i.e. the HEEACT). According to the Regulation, the scope of external evaluation includes a wide range of university affairs, such as research, teaching, curriculum, student affairs, personnel, accounting and so on (Article 4), while the importance of self-evaluation is reiterated (Article 5). Importantly, the results of the evaluations will be used as a consideration in the MOE's plan for the development, funding and tuition fee level of the universities (MOE 2007a). To achieve a balance between accountability and autonomy, the existing evaluation mechanism combines the practices of self-evaluation and external quality assurance. While the institutions are required to organise self-evaluation exercises according to the guidelines, the HEEACT would conduct field visits as the presence of external quality assurance dispensation.

In addition to the emergence of the evaluation system, the establishment of the Taiwan Social Science Citation Index (TSSCI) is considered to be a milestone of building a research-oriented performance culture in Taiwan's higher education system. Indeed, research is viewed as a key measure to reach world-class status because world-class universities are necessarily research-oriented and -intensive (Altbach 2004). Therefore, to promote research culture and atmosphere in the do-

mestic academic fields, heavy weight has been placed on research output in measuring university performance in Taiwan. Citation indices, such as SCI and SSCI from the USA, were assumed to be strong indicators reflecting the research performance of a faculty member. However, using the citation indices based in foreign countries met strong opposition from the local academic community, especially from the fields of social sciences. This was because all major citation indices were developed upon journals in English. Yet, owing to language restriction and cultural bias, many academics in Taiwan had difficulty publishing their research in these publication outlets and question whether or not these journals are suitable outlets for local studies (Kuan et al. 2006).

In response to the unanimous opposition from the field, the NSC, the key funding agency which provides major grants and support to academic research and other scientific projects under the Executive Yuan, launched TSSCI in 2000. TSSCI is a citation system adapted from SSCI. It includes nine disciplines (namely, anthropology, sociology, education, psychology, legal studies, political science, management, economics, and area studies and geography) incorporating 82 journals based in Taiwan. Similar to SSCI, impact factors of individual journals would be calculated and reported in the journal citation report to illustrate the citation rate and impact of the journals (Social Sciences Research Centre of National Science Council 2009). Despite the controversy about the coverage of the index and the relevance of the citation rate to academic quality, TSSCI has become a key indicator widely used by HEIs to assess the research performance of their faculty members working in social sciences in Taiwan (Chen 2008; Kuan et al. 2006).

2.3.4 Role Differentiation and Funding Concentration

To further improve the research capacity of universities in Taiwan, the MOE launched special grant schemes aiming to assist selected universities in improving their research capacity and boosting their research profile so as to reach world-class status. As early as 1998, the MOE and the NSC jointly launched the Programme for Promoting Academic Excellence of Universities (Academic Excellence Programme), primarily aiming at improving universities' infrastructure and invigorating research (MOE 2000). Similar to many other places, the Taiwanese government adopted strategic concentration of research funding as a strategy. Therefore, this programme supports four research fields: humanities and social sciences, life sciences, natural sciences, and engineering and applied sciences, each of which has a focus of investigation (MOE 2000). In the first round of the Academic Excellence Programme, a total amount of NT\$ 4.3 billion was allocated to fund 19 projects—three of which were offered conditionally. The second round of the programme was launched in 2002 and was implemented from 2002 to 2006. There were 148 research project applications in this round and twelve projects were granted for a total amount of NT\$ 2.1 billion.

After reviewing the various rounds of implementation, the government considers the Academic Excellence Programme successful in allowing effective integration

of resources to foster cooperation and exchange between outstanding institutions and talented researchers and in boosting research capacity (NSC 2005). In addition, the Taiwanese government clearly showed its intention of developing world-class universities in the territory. The Executive Yuan's objectives set in 2004 aimed to have at least one local university ranked among the top 100 universities within the next decade, and to have at least 15 key departments or cross-university research centres become the top in Asia within the next five years (Lu 2003). In this context, the MOE in 2005 launched the Programme for Aiming for Top University (Top University Programme), which primarily aims to achieve the goal of developing a world-class university.⁶ To achieve this goal, an amount of NT\$ 50 billion has been budgeted for this five-year programme. Twelve research universities were selected to be funded.⁷ They were required to complete a five-stage process ranging over the funding period to maximise their grant.

This programme has indicated the Taiwanese government's commitment to developing a world-class university. However, it has also received criticism for dedicating a large amount of its funding to selectively fund only a few institutions, with the majority excluded. More importantly, the Top University Programme has formulated a differentiated academic system in which these 12 research-oriented universities have become the apex of the higher education system (labelled as 1 in Fig. 2.3).

Although the MOE has allocated a large amount of the budget to promote academic excellence, there was criticism of the funding concentration, in that a small number of HEIs acquired most of the government funding, and that too much weight was placed on the research capacity of HEIs but their teaching quality was ignored. In response to these criticisms, the MOE launched the Programme for Encouraging Teaching Excellence in Universities (Teaching Excellence Programme) in 2005. The Teaching Excellence Programme aims to provide extra funding to selected universities to improve their teaching quality through establishing teaching resource centres, developing assessment of teaching, improving student-teacher ratio and reducing faculty members' teaching load. It commenced with a budget of NT\$ 1.2 billion allocated to 13 universities. The amount of funding and the number of funded institutions increased gradually. In 2012, NT\$ 1.5 billion was granted to 31 universities (see Table 2.4). These teaching-oriented universities are locally prestigious and multi-purposed but not research oriented. They form the second tier of the differentiated academic system in Taiwan (labelled as 2 in Fig. 2.3).

The third layer (labelled as 3 in Fig. 2.3) of the tiered system includes the institutions funded by the Programme for Nurturing Talented in Key Areas. The Programme began in 2006 as an institution-based programme funding 27 institutions

⁶ The program was originally named the Program for Aiming for First-class University and Top Research Centre. It was also known as the "five-year-fifty-billion" program.

⁷ They are: (1) National Cheng Kung University, (2) National Taiwan University, (3) National Tsing Hua University, (4) National Chiao Tung University, (5) National Central University, (6) National Sun Yat-sen University, (7) National Chung Hsing University, (8) National Yang Ming University, (9) National Taiwan University of Science and Technology, (10) National Chengchi University, (11) Chang Gung University and (12) Yuan Ze University.

Table 2.4 Budget for the Programme for Encouraging Teaching Excellence in Universities. (Source: MOE (2013a))

	2005	2006	2007	2008	2009–10	2011	2012	2013
Number of funded institutions	13	28	30	30	31	31	31	33
Budget (Unit: NT\$ billion)	12.3	18.5	17.3	18.7	22.3	15.4	15.5	15.8

to enhance their teaching quality in specific disciplines. In the following two years (2007–2008), it became a project-based programme subsidising a total of 100 projects in 58 institutions with a budget of NT\$ 708 million. Some of the funded institutions are not comprehensive universities, while about half of them are private institutions (MOE 2013b). The bottom of the system refers to the institutions that are not funded by any special funding scheme (labelled as 4 in Fig. 2.3). They are the majority of the system.

These special grant schemes were developed upon the principle of funding concentration that formulates a differentiated academic system in which HEIs are assigned varied roles and receive wide-ranging amounts of funding. This is because “research universities are inevitably expensive to operate and require more funds than other academic institutions” (Altbach 2007, p. 5). Indeed, some countries, such as Germany where such a differentiated system does not exist, find it difficult to support and sustain research universities. Therefore, based on this idea of role differentiation, only a few universities (those located in 1) are identified as research-oriented and the majority (those located in 2–4) are identified as teaching-oriented in Taiwan's tiered higher education system.

2.3.5 Launching Performance Ranking of Scientific Papers for World Universities

In addition to conducting university evaluation, the HEEACT was also assigned a mission to develop a performance indicator for ranking universities across the world. It therefore launched the annual Performance Ranking of Scientific Papers for World Universities (PRSPWU) in 2007 to reflect universities' performance in terms of their research output. The PRSPWU selects the top 700 HEIs listed in the Essential Science Indicators (ESI) and sorts out the top 500 by counting their published journal articles. Different from the THE-QSWUR, which focuses on universities' reputations, and the ARWU, which includes the number of Nobel Prize Winners affiliated with an institution, the PRSPWU employs only data drawn from SCI and SSCI to evaluate universities' research performance. Eight indicators, categorised into three criteria, namely research productivity, research impact and research excellence, are used in measuring the research performance of universities. Research productivity refers to the number of articles published in SCI and SSCI in

Table 2.5 The construction of the Performance Ranking of Scientific Papers for World Universities (2011). (Source: HEEACT (2011b))

Criteria	Indicators	Weight %
Research productivity	Number of articles of the last 11 years (2001–2010)	10
	Number of articles of the current year (2010)	10
Research impact	Number of citations of the last 11 years (2001–2010)	10
	Number of citations of the last 2 years (2009–2010)	10
	Average number of citations of the last 11 years (2001–2010)	10
Research excellence	h-index of the last 2 years (2009–2010)	20
	Number of highly cited papers (2000–2010)	15
	Number of articles of the current year in high impact journals (2010)	15
Total		100

The PRSPWU was terminated in 2011

the last eleven years (contributing 10% to the index) and the number of articles published in the current year (10%). Research impact refers to the number of citations within specific time frames determining 30% of the index: 10% for the number of citations in the last eleven years; 10% for the number of citations in the last two years; and 10% for the average number of citations in the last eleven years (i.e. the number of articles divided by the number of citations). With regard to research excellence, 20% is derived from the h-index of the last two years, 15% is determined by the number of highly cited papers in the last 11 years and 15% is comprised of the number of articles of the current year in high-impact journals (Table 2.5).

As shown in the methodology of the index, the HEEACT considers publishing in international peer reviewed journals as the predominant mode of scientific research output, thus taking statistics on articles published in listed publications as an effective indicator of universities' research performance. It claims that analyses of SCI and SSCI make global university ranking fairer, with an emphasis on both quality and quantity of publications. It also incorporates the average number of criteria in its calculation of the score so as to prevent a predominance of large universities. Furthermore, it takes account of recent research performance in order to make a fair comparison between institutions with different lengths of history. Since 2008, the HEEACT has been launching a ranking by field by using the same methodology of overall performance ranking. There are six fields: agriculture, clinical medicine, engineering, life sciences, natural sciences and social sciences (HEEACT 2011b). Based on these sets of criteria, the HEEACT has analysed the top 500 universities in the world, by continent and by country. In its 2011 worldwide university performance ranking, institutions in the USA occupy predominant positions in the international higher education landscape. Eight of the world's top 10 universities in the table are universities in the USA. As for the performance of Taiwan's universities, only four universities were ranked among the top 500 universities in 2007. The number increased to seven in 2009, but dropped to five in 2010 and six in 2011. It is noteworthy that National Taiwan University reached 102 and 114, close to the aim of being in the world's top 100, in 2009 and 2010, respectively (Table 2.6).⁸

⁸ National Taiwan University was ranked 95 in 2009 THES-QS WUR.

Table 2.6 Ranks of Taiwan's universities in HEEACT Performance Ranking of Scientific Papers for World Universities, 2007–2011. (Source: HEEACT (2011b))

2007	2008	2009	2010	2011	University
185	141	102	114	120	National Taiwan University
360	328	307	302	320	National Cheng Kung University
429	366	347	346	364	National Tsing Hua University
471	463	456	479	411	National Chiao Tung University
/	/	479	493	498	Chang Gung University
/	/	483	/	/	National Central University
/	475	493	/	475	National Yang Ming University

Unlike the ARWU, the PRSPWU dispenses with Nobel indicators and learning researchers, and puts heavier weight on the number of publications in the last two years, but its outcome is not very different to that of the ARWU. In fact, both of them mainly utilise a method of publication counting to measure the performance of universities. It seems to be neutral and scientific, but there are still queries about whether the technologies of publication/citation counts are free from subjective interpretation and are able to reflect the universities' performance objectively and comprehensively (Kuan et al. 2006; Marginson 2009; Seglen 1997). The PRSPWU was terminated in 2011. Reportedly, the government no longer supports the HEEACT to run ranking exercises (Group of Eight 2012). The reason for the termination of PRSPWU will be further explained in Chap. 4.

2.4 Conclusion

The development of Taiwan's society outlined above indicates that the island has successfully transformed itself to a democratic, post-industrial society, attempting to enter into and integrate with the global knowledge-based economy. This rationalises its rapid expansion of higher education in the 1990s and its ambition of developing a world-class university in the 2000s. However, several local factors, such as isolation from the international community, the rise of Taiwanese nationalism and the continuous threats from the PRC, have been constantly influencing Taiwan's higher education system and have led to the Taiwanisation of higher education after the democratisation in the late 1980s. These trends of internationalisation and localisation have simultaneously affected the development of higher education in Taiwan and have created a context in which higher education is viewed as an instrument to strengthen the academic and economic power of Taiwan so as to help the island-state integrate with the global academic community and economy on the one hand and to defend Taiwan's interest in the more competitive academic and economic global environment and to nurture the notion of Taiwan as the homeland on the other. These trends have brought about contextual factors justifying an analysis of the influence of university rankings as a mechanism shaping individual higher education systems and the global landscape of knowledge production. The following chapters are devoted to that analysis.

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Chapter 3

Theorising University Rankings

University rankings have become a focus in the study of higher education among practitioners, policy makers and scholars since global league tables became prevalent in the mid 2000s. Generally, university rankings simply refer to a set of indicators used to measure and compare the performance of universities. However, as will be explained, university ranking can be theorised through various conceptual lenses. This chapter engages with literature from different disciplines to provide the conceptual materials for the general theoretical approach to analysing university rankings. To examine the changing field of higher education in which the ranking phenomenon has emerged, the chapter synthesises a number of concepts and theories, including transnationalisation, neoliberalisation, managerialisation, the adoption of a heterarchical mode of governance and the tension between the processes of colonisation and post-colonisation, to illustrate the complex world of higher education in the globalised and marketised era. It also delineates the definitions and characteristics of university rankings. Based on these theoretical elements, this chapter illustrates a ranking phenomenon in higher education. As will be shown, the phenomenon can be examined using four interrelated dimensions, each of which is drawn from different aspects of the complexity of higher education. These conceptual elements integrate and repack the many interrelated developments in higher education and, therefore, construct a framework of global competition at individual, institutional and system levels for understanding university rankings.

3.1 The Complex World of Higher Education

This initial section aims to present a comprehensive picture of the changing environment in which global university rankings have emerged. Five relevant theses of higher education are identified to form the theoretical context within which a classification of the features and purposes of rankings can be developed. The first thesis is global trends toward the prevalence of cross-border activities in higher education. While the concepts of globalisation and internationalisation are commonly used in the literature nowadays to conceptualise these dynamics, the global trends in higher education

incorporate phenomena in international and transnational dimensions. Here I use the term transnationality to reflect the fact that higher education has transcended national boundaries. The second thesis is about the effect of neoliberalism on higher education, reflecting on how the introduction of market elements has influenced higher education. The third demonstrates the changing governance structures at both systemic and institutional levels in higher education. The fourth thesis looks at how the relationship between various stakeholders of higher education has changed with the influence of globalisation and marketisation. I call this discussion of the new relation “the ecology of higher education”.¹ The fifth thesis delineates the global landscape of higher education in the light of world-system theory and post-colonial analysis, thereby illustrating the geography of higher education in the contemporary world.

3.1.1 Transnationality in Higher Education

Universities have become much more active in involving cross-border activities during the past two decades. These activities include the increase of student and staff mobility, the provision of cross-border higher education and the emphasis on international perspectives on teaching and research (Altbach and Knight 2007; Denman 2002; Zha 2003). Given the common awareness of the rise of global connectivity, the concept of globalisation has been widely used in literature on higher education in recent years. According to Altbach (2004, p. 5), globalisation, for higher education, means “the broad economic, technological, and scientific trends that directly affect higher education and are largely inevitable”. Indeed, globalisation represents integration on a worldwide scale.² Therefore, in this book, globalisation is defined as the process of convergence and integration over national borders (Carnoy 1999; Dolby and Rahman 2008; Guri-Rosenblit et al. 2007).

Drawing on the concept of globalisation, many commentators have sought to examine the influences of growing globalism on higher education. One of the major global educational discourses concerning globalisation and higher education is about the knowledge economy and technology. On the one hand, in this discourse about global economy, knowledge is seen as a key factor facilitating economic growth. As the World Bank (2003, p. xvii) put it:

A knowledge-based economy relies primarily on the use of ideas rather than physical abilities and on the application of technology... The global knowledge economy is transforming the demands of the labour market throughout the world. It is also placing new demands on citizens, who need more skills and knowledge to be able to function in their day-to-day lives. Equipping people to deal with these demands requires a new model of education and training.

¹ Ashby used this terminology to describe the relation between the university and the state with special attention to academic freedom and autonomy (see Ashby 1966).

² According to Mann (2003), there are five socio-spatial layers, namely local, national, international (relations between nations), transnational (pass beyond national boundaries) and global. Rizvi and Lingard (2010) added a regional layer and noted that these layers are interrelated. However, it is important to note that while the process of globalisation has significantly affected the capacity of governance at these layers, they are not necessarily in a hierarchical order.

This quote shows that higher education plays a role in nurturing human resources, and in innovating and applying new technologies in economic activities in the global era (Marginson and van der Wende 2007). On the other hand, the use of information technologies makes higher education more accessible to students, as technological innovations have diversified the forms of teaching and learning through new types of pedagogy (Stromquist 2002). This closer connection between economic development and higher education has led to the call for lifelong learning and more active private participation in education provision across the world.

Another focus on globalisation and higher education is the emerging role of supranational institutions in steering the growth strategy of individual countries. While the educational programmes run by the World Bank and Organisation for Economic Cooperation and Development (OECD) are often used as evidence to support the existence of the West-dominance in the post-colonial period (Tikly 2001, 2004), the General Agreement on Trade in Services (GATS), a treaty of the World Trade Organisation (WTO), is seen as an important step towards a closer link between trade and higher education because education is among the services covered by the GATS. A considerable amount of literature places a heavy emphasis on the role of GATS in liberalising the global market in educational services (for example Currie and Newson 1998; Henry et al. 2001; Hill 2003; Knight 2002a, b; Rikowski 2003; St. George 2006), because the agreement provides an environment in which transnational education becomes more common via various channels, such as cross-border supply and consumption abroad (OECD 2004). This newly emerging overseas demand and supply consequently has intensified competition between higher education systems and institutions (Healey 2008; UNESCO 2000). However, the influence of GATS should not be overstated, as many forms of transnational higher education have occurred outside the WTO/GATS framework, given the fact that nation-states remain strong in their control over higher education systems (Green 2007).³ However, the discussion about the supranational institutions and higher education is still important in terms of highlighting the emergence of a global market in higher education. An important aspect of the development of transnational education is neoliberalism, which will be discussed in detail in the next section.

Turning to a governance perspective on globalisation and higher education, transnationality leads to a network form of governance because globality and locality are inseparable in social practice. Thus, the emergence of supranational entities and the growth of subnational entities have formed the organising nodes of a networked world and hence have nurtured the notion of self-governance (Jayasuriya 2005; Rhodes 1996). As a result, “the state no longer primarily initiates action in, but rather reacts to, worldwide economic forces.... The state increasingly facilitates this process acting as its agent” (Mittelman 1996, p. 7). This conception of

³ There are questions about the transformative potential of WTO/GATS within national systems because, as analysed by Marginson and van der Wende (2007), many cross-border activities in higher education are largely non-commercial in nature, while GATS is concerned with commercial cross-border activities only. Also, individual countries can control the degree to which they want to open up their higher education market to foreign providers. However, in general, WTO/GATS has successfully promoted liberalisation of education in its member countries (Verger 2009).

networks of power illustrates a networked framework, within which national, sub-national and institutional entities are able to compete and cooperate with others without concerning the hierarchical structures of power. More importantly, these conceptual discussions have shown that the field of policy and politics of higher education is multilayered, stretched from the local to the global. This transformation also imposes a new method of governance in which the power, functions and authority of a nation-state are reconstituted (Rizvi and Lingard 2010; Robertson and Dale 2006). The WTO/GATS framework is an example of how supra-states are involved in this global governance of higher education (Verger 2009, 2010). This is an issue to which we will return later in this chapter. Nevertheless, this conception has illustrated a complex and more interconnected globe where universities are facing competition from both local and overseas counterparts and are assigned new missions of supporting the growth of the economy. While these new challenges and missions entail cooperation and coordination beyond national borders, they represent the features of transnationality in higher education.

3.1.2 Neoliberalism in Higher Education

The discussion about the link between international trade and higher education in the previous section has in some ways reflected the fact that higher education nowadays is seen more as a commodity than as a public good. As said, economic globalisation that emphasises neoliberalism and advocates trade liberalisation in education is an important reason explaining such a development. Because the pursuit of global free markets that involves “the abolition of tariffs or subsidies, or any form of state-imposed protection or support, as well as the maintenance of floating exchange rates and ‘open’ economies” (Olssen and Peters 2005, p. 315) is substantially connected to the discourse on globalisation through the emphasis on competition, though neoliberalism arose essentially in the 1980s, prior to communicative globalisation and the great expansion of cross-border activities. In fact, “in many cases, issues of higher education reform appear in the context of aligning limited capacity with expanding social needs, while creating or retaining quality” (Hawkins 2008, p. 532). Nevertheless, the connection between neoliberalism and internationalism in higher education is grounded on a condition in which “low transportation and communication costs, the increasing migration of people, and the rise of private funding and provision of higher education further facilitate the emerging international marketplace for higher education and academic research services” (van der Wende 2007, p. 277). As a consequence, many higher education systems need to face a dual challenge. On the one hand, in response to fierce competition for students and from prestigious academics from abroad, “institutions of considerable age and distinction are... demonstrating their ‘competitiveness’ by exhibiting ‘world class’ attributes—a not very disguised code for developing competitive international research capacities and attracting the best students” (Hawkins 2008, p. 532). On the other, to meet expanding social needs in local communities,

“institutions of lesser status are expanding rapidly and new institutions are coming into existence” (Ibid.). While the former aspect of the challenge specifically rationalises the trends towards internationalisation in higher education, the latter explains the move towards a diversified mode of providing and funding through the participation of private or non-state players in higher education.

Importantly, as competition has become the driving force of many social institutions along with global and national economies, neoliberalism not only affects instrumental adjustments, such as cost shifting and sharing, but fundamentally alters governing philosophy in policymaking and service delivery. Higher education has been impacted by these developments, and therefore has become more of a mixed good. The meaning embedded in this phenomenon is that of reinventing the conventional notion of education as a public good. As Neubauer (2008, p. 130) said:

Contemporary neo-liberal theory has reinvested public goods with the character of divisibility, seeking often to charge users of such goods in direct proportion to the benefits they individually receive. Charges may be levied in either the public or private sectors.

In terms of implications for public policy, this remaps public/private distinctions in contemporary states. Despite the existence of differences between the East and the West in terms of political, social and cultural history, in many cases the public and private sectors have been blurred (Giroux 2002; Hawkins 2008; Neubauer 2008; Stewart 2005).

Furthermore, the adoption of market principles and mechanisms and the participation of the private/non-state sectors in higher education means that universities now are required to reduce their financial dependence on the state and become more financially proactive (Bok 2003; Currie et al. 2002; Häyriinen-Alestalo and Peltola 2006; Liefner 2003; Lynch 2006). Universities thus have diversified their income sources across the state and the non-state sectors to secure their revenue. Non-traditional financial sources such as capital endowment, commercialisation of teaching, research and services, loans at privileged interest rates and grants from tycoon and charity organisations become more and more common and important. This diversified financing base has altered the traditional structure of universities. Peripheral units that promote outreach activities such as industrial liaison, technology transfer, consultancy and continuing education have become basic units parallel to disciplinary departments (Clark 2002). These units act as mediating institutions that link the university to outside organisations. Moreover, the enhanced peripheral units tend to integrate with the disciplinary departments in daily operations. This causes the distinction between disciplinary academic and peripheral units to become blurred.

Some commentators see these changes as a form of corruption of academic values (Bok 2003; Giroux 2002; Williams 2003). However, for me, these reforms in university financing and structure mean a change of the relationship among university, business and industry, and therefore have formed a new front for accountability. Traditionally, in many higher education systems, universities need to be accountable to government through a different evaluation system. But, now universities are also expected to be responsible for fulfilling different expectations from the community in response to the request for industry-centered knowledge. Consequently,

universities need to accommodate different types of accountabilities to establish and maintain connections with other social actors, and hence have to move towards the new “university-academic-productive sector relations” (Sutz 1997) and to adopt entrepreneurial culture through using the specific notions of “corporate academic convergence” (Currie and Vidovich 1998), “market-model university” (Engell and Dangerfield 1998), “entrepreneurial universities” (Marginson 2000), “campus inc” (White and Hauck 2000) and “education plc” (Ball 2007). In sum, academic values are now encircled by managerial and budgetary interests (Clark 2002).

3.1.3 *Heterarchical Governance in Higher Education*

Under the influence of neoliberalism, the role of the private sector has become complementary to that of the public sector in higher education. For Bessusi (2006), the central theme of the changes is the engagement with a multiplicity of actors in public policy. She said:

Governing through the negotiated interactions of a multiplicity of actors from public, semi-public and private sectors has become a recognised form of making and implementing public policies in Western states. It is a response to the failure of government and markets alike to provide an efficient and effective system of regulation and welfare services (Ibid., p. 12).

This concept of policy networks is closely related to neoliberalism and the associated discourse of New Public Management (NPM) or managerialism. For neoliberals, good public governance is to shift the public sector towards “less government” (or less rowing) but “more governance” (or more steering) through encouraging competition and markets, privatisation of public enterprises, reducing over-staffing of the civil service, introducing budgetary discipline, decentralisation of administration and making use of non-government organisations (Osborne and Gaebler 1992; Williams and Young 1994). Accordingly, this managerialisation or “destatisation” forms a way of “redrawing the public-private divide, reallocating tasks, and rearticulating the relationship between organisations and tasks across this divide” (Jessop 2002, p. 199).

These new governance theories have brought the concept of co-governance into the public policy process, thereby advocating the mobilisation of non-state sources and actors to be engaged in the provision and funding of public services (Kooiman 2000). These changes on the one hand can generate additional resources for the state to finance and provide social services. They can be seen as a “new state capitalism” that transforms the role of the state as commodifying agent (Cerny 1990). On the other hand, these neoliberal reforms can be seen as a process of internalising globalisation in which governments use trendy global practices to reshape their domestic economic constitution in order to develop their own policy agenda and fulfil their national goals (Cerny et al. 2005; Scholte 2005).

At a conceptual level of analysis, the changing governance in globalisation discourse represents a shift by which the state has changed its governance strategies from “positive coordination” to “negative coordination” (Jayasuriya 2001; Scharpf 1994). Different from the destatisation thesis, the shift in coordination is more like

a “refashioning of the modalities of governance” through which the role of the state is changed “to provide the institutional foundations for the autonomy of regulatory institutions and to constitute procedures.... for the functioning of these institutions” (Jayasuriya 2001, p. 110) and the state has prevented the corporatist state from being overburdened by social and economic policy commitments.

Meanwhile, there is a parallel process of formulating regulatory architecture based on the interlocking relationship between the public and private sectors. In the light of this concept of co-governance discussed earlier, this new architecture of regulation represents the diffusion of public power to private organisation by creating new private and quasi-private agents that are located outside the formal state apparatus. The “public in private” form of governance is viewed as an implantation of public power in non-governmental organisations (Jayasuriya 2005). This new governing pattern seems not a “hollowing-out of the state” (Rhodes 2000) but a form of “coordination and self governance”, “networks and partnership management” (Kooiman 2000), “a shift from government to governance” (Mok 2007a) or “a shift from hierarchy to heterarchy” (Ball 2009b).

Among these relevant concepts, Ball’s idea of heterarchical governance is especially useful to explain the complexity of higher education governance in the globally interconnected world. The concept helps us understand how different elements of the policy process can cooperate or compete while success criteria can be optimised individually. According to Ball (2009a, p. 100), this heterarchical relationship “replaces bureaucratic and administrative structures and relationship with a system of organisation replete with overlap, multiplicity, mixed ascendancy, and/or divergent-but-coexistent patterns of relation”. Concerning its function of governing disparate sites across public/private distinctions, there are new policy communities that bring “new kinds of actors into the policy process, validate new policy discourses” and enable “new forms of policy influence and enactment, and in some respects disable or disenfranchise or circumvent some of the established policy actors and agencies” (Ball 2008, p. 748). More importantly, heterarchies are not limited by national borders but are indicative of a new architecture of regulation that functions within and beyond national borders simultaneously.

To link these policy networks with transnationality in higher education, it is recognised that they provide a foundation for developing new governing structure to connect global and local, in addition to facilitating the blur of public and private distinctions. In line with heterarchy, Marginson and Rhoades (2002) proposed that the interactions between local, national and global layers do not need to work in a linear pattern but in a more complex way by which universities are able to move into the international niches and to remain serving local communities simultaneously. Based on this, Jones (2008) believed that that academic units within an institution, institutions and system-level authorities can be seen as various autonomous cells and can operate within a complex inter-relationship network and at the local, national and/or global dimensions at the same time.⁴

⁴ Marginson and Rhoades (2002) call their model of international network a “glocal agency heuristic”. Jones (2008) also developed a conceptual framework called the “global higher education matrix” to provide a conceptual foundation for how a local university can be a global institution.

These arguments sufficiently show the impacts of transnationalisation of higher education on the governing structure at both national and institutional levels. It is indicative of a networked form of structural framework in which universities and/or units of universities run as self-determining agencies together with institutions outside the higher education sector on the basis of an interactive behavioural pattern.

3.1.4 The Ecology of Higher Education

Though networks stress self-governing and self-determining behaviours, they “also impose a heteronomous order that requires continual responsiveness to the agendas of other” (Marginson 2009, p. 16). Regarding the relationship between governments (and/or related statutory bodies), universities and students, the order largely refers to accountability.

Accountability is considered an important component and parcel of NPM because it ties the many parties together in the network system that stress autonomy and self-governance through performance control (Deem et al. 2007; Huisman 2007; Salmi 2007). According to Olssen and Peters (2005, pp. 322–323), the approach of performance control is to replace the old centralised regulatory system by “a new system of public administration which introduces such concepts as clarification of purpose, role clarification, task specification, reliable reporting procedures and the freedom to manage” with an emphasis on contracts. While parties in higher education have some autonomy in performing their specified role, they are required to be accountable for their performance on the basis of agreement. And, while success in fulfilling the assigned responsibilities would bring rewards, failure would bring punishing consequences. This means relationships in higher education are driven by contractualism.

The direct consequence of performance-driven culture in higher education is that universities need to rethink their relationship with the state and students. In the relationship between the higher education sector and the state, the strong emphasis on performance introduces a culture and a mode of regulation, on the basis of which:

The performance of individual subjects or organisations serves as measures of productivity or output, or displays of “quality”, or “moments” of promotion or inspection... It allows the state to insert itself deep into the culture, practices and subjectivities of public sector organisations and their workers, without appearing to do so. It changes that which it “indicates”; it changes meaning; it delivers re-design and ensures “alignment” (Ball 2007, pp. 27–28).

As a result, higher education, as a form of production, is standardised to make “outputs”, “levels of performance” and “forms of quality” more calculable and comparable (Ibid.).

The introduction of a performance-based funding system has further encouraged the performance-driven culture in higher education. Indeed, academia has now entered an era of performance-funding regime that is considered as a response to managerialism and as a way to pursue quality and cost-effectiveness (Sörlin 2007).

A variety of competitive or performance-based allocation programmes thus have been introduced in countries in Europe (Liefner 2003; Lucas 2006; Weiler 2000), Asia (Chan and Lo 2008; Mok 2010) and America (Jin and Whalley 2007; Sörlin 2007). As a result, institutions differ and funding is heavily concentrated on prominent universities. In many cases, they are research-intensive universities.

Accountability to students is strongly based on market systems through which consumers can reward and punish the service providers in accordance with the achievement of pre-set targets and imposed objectives (Olssen and Peters 2005). This is closely related to the neoliberal reforms that have commercialised higher education, and, as argued by Giroux (2002), have transformed the teacher-student relationship into an economic relation. As a consequence, students have taken on more of the attitude of customers. They view themselves as customers who pay for a service and treat higher education as a commodity to be bought (Delanty 2002; Newman et al. 2004).

As observed by Frank (2001, 2004), the market-driven mechanism and customer-oriented behaviours have brought the increase of transparency in the US's higher education sector. However, the information provided to students is often enclosed with the objectives of attracting students and brand-building. To further complicate the story, students have diverse preferences for different aspects of the bundle. And universities are expected to be responsive to the priorities of students in such a multi-dimensional market. This has caused a "positional arms race" that forces universities to invest a large amount of expenditure on specific ingredients of elite educational status so as to show that they are better than other institutions in some areas and to develop a strong reputation in the market for students (Frank 2001, 2004; also see Kirp 2003).

Given the emergence of the global higher education market, the "positional arms race" has been placed on an international scale. As an impact on the academic life of individuals, the global competition is translated into pressure on academics to concentrate their efforts on research and to publish in international English-language outlets because these activities can generate more impact at the international level, thereby enhancing the international standing of the academics and their affiliations (Mohrman et al. 2008). This is particularly true for the situation in non-English-speaking countries. Meanwhile, the pursuit of prestige and reputation has strengthened the rationales for advocating the performance-driven culture and the associated differentiation in higher education through government policies at the systemic level. It is suggested that these pressures on individuals and higher education systems are essentially based on the global landscape of higher education that will be examined in the next section.

3.1.5 The Geography of Higher Education

Two theoretical perspectives, namely the world-systems theory and post-colonial analysis, are useful to map the global landscape of higher education. While the former highlights the existence of two unequal zones in the integrated globe, the latter sees globalisation or the Western paradigm as an imposing force of particular agendas on the global society (Spring 2008). In educational research, these two

theories are particularly useful to explain how higher education systems and HEIs in centres and peripheries are stratified in accordance with their access to academic resources and how convergence and divergence are produced simultaneously to respond to the global forces that are based on the hegemonic force of the centres over the peripheries (Arnové 1980). Altbach (1987) identified five factors constructing this “centre-periphery” framework, which I have adapted and modified.

First, it is argued that the establishment of modern universities is based on the Western tradition and has little or even nothing to do with the intellectual or educational traditions of the developing countries. The role of developing countries therefore is mainly as a follower in the development of the university model. Indeed, as pointed out by Castells (1994), the specificity of the university in the developing world is rooted in its colonial period. Thus, many former colonies to a large extent retain the characters of the colonial foundations of the university system in their post-independence period, even though universities in these countries are assigned to play the role of ideological apparatuses in order to react against cultural colonialism.

The second factor draws on the substantial dominance of the English language. This has caused non-English speaking scholars and their research and contributions to be less visible and significantly delayed from reaching the attention of the mainstream academic community. Meanwhile, in the academic labour market and in terms of publishing and presenting research output, academics from English-speaking nations or from nations where English is widely used enjoy a privileged status vis-à-vis their non-English-speaking peers (Welch 2002). In addition, as English is the premier language of business and other professions, students usually want to pursue degrees from English-speaking systems rather than from non-English-speaking ones. Some non-English-speaking countries thus have decided to adopt English as their teaching language, especially in higher education (Hatakenaka 2004). This causes the spread of English as the medium of instruction in non-English-speaking countries.

The third factor is that there is an uneven allocation of research capacity among different higher education systems. This is because the industrialised nations are the major producers of knowledge and the developing countries are basically consumers. For instance, the US and major European nations accounted for about 63% of world research and development (R&D) in the period of 1993–2003 and employed about 66% of full-time equivalent researchers in the world in the period of 1995–2002 (Galama and Hosek 2008, pp. 21–25). The point of view here is that the resource-intensive nature of R&D forces low-income countries to apply research done in developed nations, instead of conducting their own research. As a consequence, in many cases, these research imports from abroad are less relevant to the indigenous context.

Fourth, many major means of communication of knowledge (such as scholarly journals, publishers, bibliographies and libraries) are based in Western countries. Academics hence heavily rely on the academic networks based in the industrialised world. For example, the US and major European nations were the home of 35 and 37% of the volume of science and technology publications respectively from 1997

to 2001, while 63 % of the highly cited publications were based in the US in the same period (Galama and Hosek 2008, pp. 31–35).

The fifth factor is the brain drain that many developing countries are facing. Though there are a significant number of students from poorer parts of the world studying outside their home countries, many of them do not return home after completing their studies. More specifically, the US is a magnet for talented doctoral students and an overwhelming brain-gainer. According to OECD statistics, the US received the most with 20 % of all foreign students worldwide in 2006 and hosted the largest foreign doctoral population in 2001 with about 79,000 students from abroad (OECD 2007, 2008). Meanwhile, their propensity to stay grew. From 1987 to 2001, the stay rate for foreign doctoral graduates rose from 49 to 71 % (cited in Marginson and van der Wende 2007, p. 23). This has led to a concentration of intellectual human capital in the industrialised nations and in the US in particular, whereas many developing countries face a net loss of human capital.

This “centre-periphery” thesis suggests that there is a Western hegemony, which is founded on the dominance of English, the distinguished elite status of their central institutions (e.g. Harvard and Cambridge), their large population of foreign students, and Pax Americana and Pax Britannica heritage.⁵ This reinterprets globalisation as an Anglo-American process (Altbach 2007; Marginson and van der Wende 2007). In response to the effects of such a hegemonic global power, different countries and regions have made attempts to raise and improve the status and visibility of their higher education sectors so as to develop a more balanced and equal academic environment globally. The European Union (EU) has imposed the Lisbon Strategy and the Bologna Process to improve the quality of research undertaken in European universities and to unify their higher education systems respectively. At the same time, there is a regional trend of building world-class universities that is associated with role differentiation and fund concentration in Asia. Individual universities are assigned to compete for a more prestigious and visible position in the worldwide landscape of higher education (Deem et al. 2008). These developments herald a global competition that drives policy practices of different countries to move toward convergence. Examples are the rise of performance measurement and control that exist in various higher education systems but project a similar image of excellence discussed earlier. This draws concerns about re-colonisation and neo-colonialism in forms of advocating policy copying and nurturing dependency culture in academia, especially in former colonies (Altbach 1987; Deem et al. 2008; Tikly 2001).

Up to this point, this chapter has examined the dynamics of higher education in the globalised and marketised setting. These dynamics are considered as essential components, with which university rankings, especially the global ones, have been developed as an important tool in connecting terrains of knowledge production. The following sections therefore turn to deconstruct university rankings on the basis of what has been discussed.

⁵ Altbach (1987) used the terms “dependency” and “neo-colonialism” to describe these inequalities.

3.2 Definitions and Characteristics of University Rankings

There are different claims about the origin of university rankings. Usher and Savino (2006) in their recent survey of university rankings traced the origin to the comparison by Morse at the *US News and World Report* in 1981, while Salmi and Saroyan (2007) reported that the first media-initiated comparison of HEIs was the one by Chesly Manly of the *Chicago Tribune* in 1957. However, Stuart (1995) noted that *A Study of the Graduate Schools of America* published by Raymond Hughes in 1925 was the first college ranking based on a school's reputation among others in the field and university rankings initiated by academic and educational organisations actually can be traced to the 1870s.⁶

No matter when the first ranking occurred, university rankings seem to bear a clear meaning. They aim “to grade HEIs according to various indicators or metrics” (Hazelkorn 2007b, p. 83). In this regard, they are “lists of certain groupings of institutions... comparatively ranked according to a common set of indicators in descending order” (Usher and Savino 2006, p. 5). Similarly, Roberts and Thompson (2007, p. 10) defined university ranking as “a published set of quantitative data designed to present comparative evidence regarding the quality and/or performance of universities”. At the outset, parallel to other evaluation approaches such as accreditation, surveys, self-studies, alumni studies and evaluation of student achievement and opinion, rankings were carried out with the objective of informing higher education scholars and professionals and government officials (Salmi and Saroyan 2007). Nowadays rankings are viewed as an important consumer information tool (Hazelkorn 2008). To underline the function of rating, Usher and Savino (2006, p. 5) noted that “university rankings are usually presented in the format of a ‘league table’, much as sports teams in a single league are listed from best to worst according to the number of wins and losses they have achieved”. Truly, ranking in the format of a league table is an effective way to demonstrate win/loss in order to attract widespread public attention, like what happens in football leagues (Tight 2000).

Concerning the scope of comparison, university rankings usually compare HEIs within a single national jurisdiction. The *US News and World Report's America's Best Colleges* in the US and the *Times Good University Guide* in the UK for example are prominent instances of national league tables. There are some international rankings focusing on professional schools and programmes, such as those published in the *Financial Times*, the *Economist*, the *Wall Street Journal*, and *Business Week* as well as Eduniversal Worldwide Business Schools Ranking (Sadlak 2010). Nevertheless, we have witnessed worldwide university rankings becoming more and more common and important. Apart from the earlier mentioned ARWU and THEWUR, well-known global rankings include *Webometrics Ranking of World Universities* by the Cybermetrics Lab at the Consejo Superior de Investigaciones Científicas

⁶ Webster (1986) reports that the article written by the noted psychologist William Cattell in 1910 ranking the quality of academic programs was the first effort to rate and rank HEIs.

Table 3.1 The construction of the academic rankings of world universities. (Source: Shanghai Ranking Consultancy (2013))

Criteria	Indicators	Weight %
Quality of education	Alumni of an institution winning Nobel prizes and fields medals	10
Quality of faculty	Staff of an institution winning Nobel prizes and fields medals	20
Research output	Highly cited researchers in 21 broad subject categories	20
	Articles published in <i>Nature</i> and <i>Science</i>	20
	Articles in Science Citation Index Expanded, Social Science Citation Index	20
Size of institution	Academic performance with respect to the size of an institution	10
Total		100

(CSIC) in Madrid; *Leiden World Ranking* published by the Centre for Science and Technology Studies at Leiden University; *SCImago Institutions Rankings* published by the SCImago Research Groups in Madrid and *Performance Ranking of Scientific Papers for World Universities* (PRSPWU) published by the HEEACT. Today, there are over 50 national ranking systems and eight global rankings of varying significance (Hazelkorn 2011; Usher and Medow 2009; Usher and Savino 2006).⁷ Among them, the ARWU and THEWUR are seen as the “brand leaders” of global university rankings and, therefore, were selected by many commentators to examine the impacts of global rankings on higher education in recent studies of university rankings (Da 2007; Hazelkorn 2007b, 2008; HEFCE 2008; IHEP 2009; Marginson 2007; Roberts and Thompson 2007; Salmi and Saroyan 2007; Tai 2007; Turner 2005; Williams and Van Dyke 2008 for example). Hence, it is worth elaborating on how these two principal ranking systems operate.

The ARWU was the first comprehensive set of global university rankings and was launched by the Center for World-Class Universities and the Institute of Higher Education of Shanghai Jiao Tong University, China, in 2003. Since 2009, it has been published by Shanghai Ranking Consultancy, a fully independent organization (Shanghai Ranking Consultancy 2013). The ARWU is not a holistic university ranking but focuses on research performance of HEIs because, as argued by the ARWU group, broadly available and internationally comparable data of measurable research performance is the only sufficiently reliable data to construct a ranking of the world’s universities. Based on this perspective, as presented in Table 3.1, the major part of the ARWU index is determined by publication and citation in the sciences, social sciences and humanities: 20% for articles indexed in Science Citation Index Expanded and Social Science Citation Index, 20% for articles published in *Nature* and *Science* and 20% for the number of highly cited researchers in the 21 broad subject categories defined by Thomson/ISI website. Another 30% of the index is determined by the number of winners of Nobel Prizes in the sciences and

⁷ Hazelkorn provided a comprehensive list of indicators of global university rankings (see Hazelkorn 2011, pp. 32–39).

Table 3.2 The construction of the Times Higher Education–QS World University Rankings/QS World University Rankings. (Source: QS World University Rankings (2011))

Criteria	Indicators	Weight %
Peer review	A survey on worldwide academics' opinion	40
Employer review	A survey on important international employers' opinion	10
Citation impact per paper	Number of citations of papers that university staff have published as measured by Thomson Reuters, Scopus from Elsevier and Google Scholar	20
Faculty staff-student ratio	The number of faculty in relation to the number of students, where a higher rate is conceived of as higher quality	20
International faculty	The ability of the university to attract faculty from other countries	5
International students	The ability of the university to attract students from other countries	5
Total		100

From 2007, a normalization method, which involves z-scores, has been adopted in calculation

economics and Fields Medals in mathematics: 10% for alumni of the institutions as an indicator of quality of education and 20% for staff as an indicator of the quality of the faculty members. The remaining 10% is derived from the total scores of the above five indicators divided by the number of full-time equivalent academic staff (Shanghai Ranking Consultancy 2013).

Furthermore, the ARWU group considered that it is impossible to compare teaching and learning worldwide “owing to the huge differences between universities and the large variety of countries, and because of the technical difficulties inherent in obtaining internationally comparable data” (Liu and Cheng 2005, p. 133). In line with this, subjective measures of opinion or data sourced from universities themselves are not employed; only the third-party data that everyone can access is compiled in the calculation of the index. It is claimed that the feedback on the ARWU is positive in general and the ranking has attracted the attention of universities, governments and other stakeholders worldwide (Liu 2009; Liu and Cheng 2005). “The successive measures have proven to be increasingly robust. It is broadly accepted that Jiao Tong provides solid measures of where university research is at”, Marginson (2007, p. 133) remarked.

THEWUR was originally known as *Times Higher Education–QS World University Rankings* (THE-QSWUR), as its data was supplied by Quacquarelli Symonds (QS), a London-based higher-education media company. Since 2010, THEWUR has been developed based on data provided by Thomson Reuters and has adjusted its methodology, while QS publishes its ranking, QS World University Rankings (QSWUR) (Butler 2010; THE 2010). Different to the ARWU, the *Times Higher Education* aims to construct a holistic ranking rather than one limited to research. Therefore, the THE-QSWUR (2004–2009) was developed based on several indicators, when it was first published in 2004. As presented in Table 3.2, the largest part (40%) of the index relies on “peer review”, i.e. an international opinion survey of academics. Research performance, in the form of citations per faculty staff, contributes 20% of the index only. A similar approach is used to compile a review of

Table 3.3 The construction of the Times Higher Education World University Rankings. (Source: THE (2012))

Criteria	Indicators	Weight % (2010–11)	Weight % (since 2011)
Teaching	Reputational survey–teaching	15	15
	PhD awards per academic	6	6
	Undergraduates admitted per academic	4.5	4.5
	Income per academic	2.25	2.25
	PhD awards/bachelor’s awards	2.25	2.25
Research	Reputational survey–research	19.5	18
	Research income (scaled)	5.25	6
	Papers per academic and research staff	4.5	6
	Public research income/total research income	0.75	n/a
Citations	Citation impact (normalised average citations per paper)	32.5	30
Industry income	Research income from industry (per academic staff)	2.5	2.5
International mix (2010–2011)/Inter- national outlook (since 2011)	Ratio of international to domestic staff	3	2.5
	Ratio of international to domestic students	2	2.5
	Proportion of journals having international co-author and rewarding higher volumes	n/a	2.5
Total		100	100

A normalization method involving z-scores has been adopted in calculation

opinions of global employers that contributes 10% of the index. Another 20% is determined by the faculty-student ratio, a proxy for teaching quality. Evaluations of the proportion of international students to faculty are taken as indicators of an institution’s international attractiveness and comprise 5% of the index (THE 2009).⁸

In the 2010–11 THEWUR, the *Times Higher Education* appointed Thomson Reuters as its new data supplier and initiated a new methodology, which contains 13 indicators categorised into five categories: teaching (30%), research (30%), citations (32.5%), industry income (2.5%) and international mix (5%). A worldwide Academic Reputation Survey on research and teaching was carried out to contribute 34.5% of the overall ranking score (15% for teaching and 19.5% for research). In other words, despite the adjustment of methodology, reputation still remains the most important forceful indicator in the ranking system. The ranking method changed again in the 2011–2012 THEWUR with a reduction in the weighting for citation impact and an inclusion of international collaboration. Specifically, the criterion “international mix” was renamed “international outlook”. This criterion includes the proportion of a university’s total research journal publications that have at least one international co-author and reward higher volumes in the calculation (see Table 3.3, THE (2012)).

Whereas the *Times Higher Education* claimed that it presents a multi-faceted view of the relative strengths of the world’s leading universities, it is criticised for

⁸ QS maintains this methodology in QS World University Rankings.

its reliance on reputational data that constitutes a strong bias in favour of long established HEIs but a serious disadvantage for new ones. This means that there are “halo effects” (Salmi and Saroyan 2007) or “anchoring effects” (Bastedo and Bowman 2010; Bowman and Bastedo 2011) under which the judgement of one quality influences the assessment of others. In addition, the survey respondents are likely to be subjective in rating, given their lack of familiarity with programmes they have been asked to rate. Also, there is not a common frame of reference of quality for these surveys (Brooks 2005). Considering the strong criticisms of reputation surveys, the research performance-based approach seemingly is more advanced than the approach of measuring reputation in terms of breaking the traditional academic hierarchy down. Nevertheless, it is argued that the research performance-based approach is not free from the reputation-based system. This point will be explained later.

In addition to the two principal global ranking systems, this research also pays attention to PRSPWU developed by the HEEACT, given that this research focuses on Taiwan’s higher education system. As has been illustrated, the PRSPWU adopted an approach similar to that used by the ARWU. It therefore mainly measures the research performance of HEIs worldwide to rank the world’s top 500 universities in league table order, while it dispenses with the award indicators and the number of leading researchers.

Usher and Savino (2006) noted that the various indicators used by different rankings can be encompassed by six elements, namely beginning characteristics, learning inputs, learning outputs, final outcomes, research and reputation. Nevertheless, it is argued that research and reputation play especially important roles in ranking exercises, thereby causing a trend towards convergence. It is noteworthy that all four of these global university ranking systems (ARWU, QS, THEWUR and PRSPWU) have developed regional and subject rankings in response to this type of criticism. However, the methodologies used by the principal global ranking systems have been continuously criticised for their weaknesses. As Teichler (2011, pp. 62–67) summarised, these weaknesses include methodological biases and distortions, the lack of agreement on quality and function of university and concentration of resources and quality that leads to steep stratification and anti-meritocracy in higher education sectors. To illuminate the consequences of university rankings on higher education, particularly in Taiwan, I intend to generalise elements of these weaknesses to the ranking phenomenon, which will be further explained in the following sections of this chapter, and will be used to guide the analysis in the following chapters.

3.3 The Ranking Phenomenon

As argued by Salmi and Saroyan ((2007, p. 28), “the flood of cross border private and distance providers, the trend towards internationalisation of tertiary education, and the related increased stakeholders’ demand for greater accountability, transparency and efficiency” are critical factors in the growth of activities of quantifying quality and ranking academic institutions in recent years. In this book, I thus

consider global university rankings as a corresponding development brought by the complex and intimate world of global higher education, and as a way of illustrating the networked competition of HEIs in the globalised and marketised environment.

This understanding of university rankings provides the main theoretical basis of the research presented in this book. As mentioned earlier, there is a global/transnational layer of policy-making in which policy actors and institutions within nations are strongly influenced by globalised policy discourses. As Moutsios ((2010, p. 121) argued, key concepts, such as competitiveness, growth and productivity, have produced “widespread consent around a largely common set of education policies promoted across countries”. Lingard and Rawolle (2011) also argued that there is a global meta-policy consensus on national policy tools. This theory of rescaling of education policy and the relocation of political authority illustrates the significance of a globalised policy discourse in national policy formulation.

If this is so, this notion of transnational education policy can explain why, in the global trend of developing world-class universities, an emphasis on outputs in the global sphere has been widely adopted in national policies. I adapted this notion to examine global university rankings and argued that ranking exercises are parts of a “multilateral surveillance”, which serves as an institution projecting discursive power and policy convergence in global education policy networks (Lingard and Rawolle 2011; Lo 2011). In fact, recent studies report that governments intend to use rankings to drive institutional behaviours (Dill and Soo 2005; Hazelkorn 2008). This is especially true for governments in East Asian nations because ranking is seen as an effective way to visualise the image of world class excellence (Mok 2007a).

Indeed, we have witnessed the growing importance of global university rankings, and associated discourses and practices, which this book refers to as the “ranking phenomenon”, in which a single standard, heavily based on the model of universities in Western countries, is promoted through policies and practices at system, institutional and individual levels (UNESCO 2010).⁹ At the system level, policies are driven by the alluring feature of the Anglo-American paradigm (i.e. the world-class image) that is promoted by global university rankings, which serve an institution in the global politics of education. This soft power in the global education policy field is internalised and institutionalised by national policies, thereby projecting a form of hard power within the national system (Lo 2011). On this basis, I see a hybrid of formal regulatory mechanisms (such as quality assurance measures created by quality assurance agencies and accountability measures imposed by government agencies) and informal surveillance (mainly referring to global rankings by the media and accreditation agencies) as the ranking phenomenon (Sadlak 2007; Swedish National Agency for Higher Education 2009).

The homogenising effects brought on by the ranking phenomenon have been underlined in a considerable number of literature (for example Altbach 2006; Ishikawa 2009; Marginson 2007; Teichler 2008). One of the core issues is that the approach adopted in many ranking systems overlooks the incomparability of complex HEIs

⁹ Teichler (2011) and Vaira (2009) called this phenomenon a “ranking movement”.

with different goals and missions and may infringe the autonomy of individual higher education systems and HEIs (Hazelkorn 2007b; Salmi and Saroyan 2007). However, my empirical findings suggest that aiming to be in top 100 internationally is taken as a slogan to mobilise HEIs and academics in Taiwan to improve their quality of research (as well as teaching). Given that research output is used as the predominant indicator of university performance in global university rankings, many universities have restructured their departments to increase their research capacity to improve their performance in university rankings. Reportedly, some HEIs even use rankings to guide their strategic, organisational, management and academic decisions (Hazelkorn 2007b). In this sense, university rankings have pervaded nearly every aspect of the institution.

Performance in rankings is also a critical factor affecting the public's view on institutional position. If a university's ranking is viewed as poor, there will be an accumulation of negativity that may generate public pressure on the institution (Salmi and Saroyan 2007). However, university leaders are concerned more about the negative effect on resources due to poor performance in rankings (Brewer et al. 2002; Coates 2007; Hazelkorn 2008; Jin and Whalley 2007), even though some commentators point out that rankings denote and reward prestige instead of quality and performance (Burke 2005). In sum, "rankings are propelling a growing gap between elite and mass higher education with greater institutional stratification and research concentration. HEIs which do not meet the criteria or do not have 'brand recognition' will effectively be de-valued" (Hazelkorn 2007a, p. 1). In this sense, university rankings can be seen as a rationale for the emergence of a performance culture in higher education.

For university faculty members, the prevalent and oft-referenced university rankings have altered their working environment and have created a new academic atmosphere in which academics, especially young ones, have very limited choices in their aspiration for scholarship. They are expected to live with the quality assurance discourse and to focus on the tasks that have been set as performance indicators of the evaluation system (Chen 2008). Given the strong link between publication and promotion, they ostensibly aspire to concentrate solely on research. By looking at the situation of the UK, Schimank and Winnes (2000) explained that this phenomenon is tied to the inter- and intra-differentiation of resources for teaching and research. These organisational differentiations led to role differentiation at the individual level, which in turn causes a predominant culture of pursuing research performance. This is because, for the researchers who are relatively the best, "it is rational to neglect teaching in favour of research, because the latter is far more important for their resource base" (Schimank and Winnes 2000, p. 402). In this context, therefore, many studies provide evidence that the educational missions and functions of many HEIs, particularly research universities, have considerably deteriorated (Leisyte et al. 2009; Lewis 2006).

In response to these criticisms of university rankings, much effort has been made to provide alternative approaches to developing, interpreting and understanding rankings in order to preserve and promote institutional diversity and disciplinary differences (Butler 2010; Jeremic et al. 2011; Lopez-Illescas et al. 2011; Tofallis

2012; Usher 2009). Nevertheless, recent work also addresses the anchoring and self-disciplinary effects of rankings. According to these studies, there is a process of normalisation in which the external enforcements of institutional pressure are internalised by faculty members into self-discipline (Espeland and Sauder 2007; Sauder and Espeland 2009).

The normalisation process represents an empirical and theoretical stretching in the analysis of university rankings. It reflects both the allure and hegemony of ranking exercises. It also reframes the contexts, practices and consequences of university rankings. This leads us to explore different dimensions of the ranking phenomenon while investigating the implications of university rankings.

3.4 Four Dimensions of the Ranking Phenomenon

Based on the literature reviewed above, this section looks at four directions to which research on university rankings may point. According to Hazelkorn (2011), the existing literature on rankings can be roughly categorised into two types: *methodological concerns* and *theoretical understanding*. While the former focuses on questioning and challenging the basis on which the indicators have been chosen, the weighting assigned to them, and the statistical method and accuracy or appropriateness of the calculations, the latter seeks to theorise about the growing obsession with rankings in order to demonstrate the impact of league tables on higher education. In the light of the theoretical context mentioned above, I argue that we can view rankings in four dimensions, which form the analytical framework for this study.

3.4.1 *University Rankings as a Technology*

Focusing on the methodology of rankings, much work has been done to examine the impact of rankings on higher education. The following two perspectives on the influence of league tables view rankings as a technology impacting various levels of the higher education sector, including individual, institutional, systemic and international.

3.4.1.1 From an Ecological Perspective

The ecological perspective is the mainstream perspective in analysis of university rankings. This perspective primarily aims to illustrate how weaknesses and loopholes in methodology can cause bias in ranking exercises, thereby leading to arguments for and against rankings and proposals to strengthen them. As the focuses of this type of analysis are on the methodologies used by ranking exercises, it could be

argued that this stream of studies sees rankings as a technology causing effects on HEIs and their members. As Hazelkorn (2007a, p. 1) wrote:

University leaders believe rankings help maintain and build institutional position and reputation; good students use rankings to “shortlist” university choice, especially postgraduates; and key stakeholders use rankings to influence their decisions about accreditation, funding, sponsorship and employee recruitment.

Her study and many others suggest that ranking exercises become an important technology affecting the actions and decisions of stakeholders in their participation in higher education. Stakeholders mainly include consumers (students/parents), faculty members, university leaders, government and the general public.

Consumers use rankings to make their choices because rankings provide useful comparative information for making an intangible purchase (Bowman and Bastedo 2009; Hossler 1998). Along the neoliberal discourse, better-informed consumers would make better decisions, thereby upholding market accountability (Burke 2005). Nevertheless, several studies found that students with different backgrounds and perspectives may have different attitudes towards rankings. For example, Hossler (1998) reviewed several studies of US cases and pointed out that information from parents, friends and classmates is more influential than ranking in students’ decision-making, especially for those who are considering local and regional public HEIs. The UNITE also reported that rankings were mentioned by only 29% of respondents and placed sixth in ordering the factors affecting students’ choice of university (cited in HEFCE 2008, pp. 12–13). A study conducted in 2002, however, reported that 57% of first-time, full-time freshmen in the US considered rankings as either a very important or somewhat important factor in selecting their college or university (Roberts and Thompson 2007, pp. 17–18), and the importance of rankings has generally increased from 2001 to 2007 in the UK (HEFCE 2008, pp. 12–13, citing UNITE 2001–2007). More importantly, it is often claimed that league tables have a greater impact on international students (Hazelkorn 2008; HEFCE 2008; Roberts and Thompson 2007). This observation sufficiently demonstrates why the rise of university rankings, especially the global ones, is considered as a development corresponding to the transnationality in higher education.

Two explanations may be possible for this view. Firstly, enrolment in an overseas HEI is usually viewed as a more intangible, risky and expensive decision. Ranking for international students is a handy information tool to help them make decisions. Hence, “student choice is influenced by ranking and status”, “prestige is considered in decision-making” and “parents use rankings as a ‘benchmark for judging the best university’, and advise their children accordingly” (Hazelkorn 2008, p. 196). Secondly, in many cases, higher education is more likely to be a private commodity for international students, as many of them are not subsidised but self-funded. The nonexistence of publicness in cross-border higher education reinforces reiterates their role as a consumer. In turn, despite the fact that international students may not know the methodology, they might see the widespread use of ranking exercises in a positive light, as they would regard it as an enhancement of transparency and market accountability.

Since rankings influence faculty members' engagement in research and competition for research funding, they are more aware of their importance. This phenomenon of faculty being aware of the influence of rankings first took place in the UK where the introduction of the Research Assessment Exercise (RAE) transformed the way in which the quality of universities is measured. Although the RAE evaluations are intended to rate rather than rank universities, it is argued that RAE scores are reconstructed in terms of rankings. As Rolfe (2003) observed, student applicants use commercial league tables to assess university quality and, therefore, university managers make many efforts to enhance the position of the university in these rankings by improving the university's RAE scores. As a consequence, almost all universities, even the newer ones, are intent on improving their research position and therefore attempt to enhance their research rating and increase research income through recruiting "research stars". Vaira (2009) called this link between evaluation and rankings "the rankings movement", which has strengthened the process towards the system's unification and stratification. On the one hand, the emphasis on publishing high quality research can probably make standards for appointment and promotion more clear and transparent (Hazelkorn 2008). On the other, this can further encourage the "publish or perish" phenomenon in academia. More importantly, this has brought about a comparison between research output and teaching quality, thereby altering the traditional role of academic staff and affecting the balance between teaching and research (Dill 2009; Hazelkorn 2008).

At the institutional level, *university leaders* also agree that rankings influence the willingness of others to partner with them or support their affiliations. In return, they "consider a potential partner's rank prior to entering into discussion about research and academic programmes" (Hazelkorn 2007a, p. 1). Arguably, this is truer for key universities in developing and newly industrialised countries where the pursuit of a world-class university is interpreted as building centres at the peripheries (Kim and Nam 2007; Marginson and Sawir 2006). Therefore, universities in these countries are more eager to establish connection with those "top brands" in the centres. In addition to establishing partnership, Hazelkorn (2008) found that university leaders use rankings to guide their strategic, organisational, management and academic decisions. They often take rankings as a benchmarking tool to set their goal of strategic development. "Aim to be in the top 100 internationally" is a good example of the impact of ranking on an institutional strategic objective. This type of strategic goal would also affect arrangements for:

Setting student and faculty recruitment targets (e.g. specifying academic entry criteria, making conditions of appointment/promotion clearer and more transparent, appointing Nobel prize winners), indicating individual academic performance measurements (e.g. research activity and peer-review publications, programme development), setting school/college level targets, and/or continual benchmarking exercises (Hazelkorn 2008, p. 200).

Some HEIs have also restructured their departments to increase their research capacity so as to improve their performance in rankings, especially in the ARWU. A common practice is to establish an institutional research office to "collect data, monitor their performance, better present their own data in public or other official realms, and benchmark their peer's performance" (Hazelkorn 2008, p. 201).

A government's decisions are also influenced by university rankings. Salmi and Saroyan (2007) reported that in Germany and Pakistan, where evaluation or accreditation mechanisms are not well developed, rankings are used to monitor and enhance quality. In addition, governments use rankings to drive institutional behaviours (Dill and Soo 2005; Hazelkorn 2008). This is especially true for governments in East Asian nations, because ranking is an effective way to visualise the image of world class excellence that is set as the goal of higher education policy by many governments in the region. Thus, some nations (e.g. Malaysia and Taiwan) request those HEIs benefitting from the policies of role differentiation and funding concentration to climb to the world's top 100 places within a set period of time (Lo 2009; Mok 2007b). Furthermore, rankings also influence the partnership between national governments and HEIs. Singapore tactically sought such top ranked US universities as the Massachusetts Institute of Technology, the University of Stanford and the University of Chicago to be the foreign partners to develop transnational higher education in ways such as setting up branch campuses, joint postgraduate programmes, dedicated teaching rooms and laboratories in the territory (Healey 2008, pp. 339–340). In this regard, it is expected that the willingness to team up with better-ranked universities will drive the direction of the global-national-local activities mentioned earlier (Jones, 2008; Marginson and Rhoades 2002).

Performance in rankings is also a critical factor affecting the public view of the *general public* on institutional position. If a HEI's ranking is viewed as poor, there will be an accumulation of negativity that may generate public pressure on the institution. Salmi and Saroyan (2007, p. 49) considered this as a merit of ranking that “stimulate[s] public discussions around critical issues affecting the tertiary education system that are often ignored either for lack of a broader perspective or out of reluctance to challenge established practices or vested interests”. They used the cases of France and Brazil to explain that rankings provide the public an opportunity to review their higher education systems in the increasingly competitive world (Salmi and Saroyan 2007, pp. 49–50). In this view, poor performance in rankings may bring a bad reputation, which can lead to a decline in student enrolment, private gifts, donations, sponsorships and even public funding (Brewer et al. 2002; Coates 2007; Hazelkorn 2008; Jin and Whalley 2007).

These observations about the impacts of rankings on higher education lead to a debate over the relevance of rankings and a dialogue between ranking organisations and commentators/critics. According to Hazelkorn (2007b), these possible concerns about rankings can be divided into three categories: *technical and methodological processes, usefulness of the results as consumer information and comparability of complex institutions with different goals and missions*. The first type of concern imposes questions on the way in which data is collected and interpreted (Coates 2007; Eccles 2002; Federkeil 2002; McGuire 1995). From the post-colonial perspective, the selection and interpretation of indicators are full of bias because of the unequal allocation of resources (i.e. the “centre-periphery” platform) (Altbach 2006; Deem et al. 2008). The second concern questions whether or not information provided in rankings is useful to guide students' choices (Brooks 2005). Views are diverse on this issue (see Hazelkorn 2007b, pp. 84–85). The third questions the core value of

university rankings, i.e. imposing a “one-size-fits-all” definition on HEIs (Altbach 2006; Vaira 2009). As asserted by Turner (2005), in the absence of both absolute standards of efficiency and the ability to differentiate between inputs, process and outputs, league tables compare institutions with dissimilar comparators. He also argued that the technique used in rankings is too simplistic to assess the complex reality. This lack of agreement on quality becomes more prominent when making comparisons globally. Creating generally agreed-upon criteria and providing appropriate ways of measuring universities’ performance are of course the possible solutions to these significant problems. Nevertheless, these will not be easy tasks because “there are many conflicting interests at play in the ‘ranking game’” (Altbach 2006, p. 3).

In sum, by illustrating their impact on various stakeholders, this type of research on league tables accounts for how rankings are linked with the formation of a new academic environment in which competition has become a key element of academic life.

3.4.1.2 From a Geographic Perspective

This dimension of university rankings illustrates how the validity of criteria used for assessing HEIs can uphold national interests in higher education and knowledge production. From this perspective, university rankings are seen as national projects entrenched in the geopolitics of knowledge, and as a technology used by individual countries to achieve their national goals for higher education.

In Marginson’s (2009) analysis of rankings and the old/new map of global knowledge status, the scope of comparison reflects different attitudes and agendas towards global competition in higher education. As he observed, the US shows little interest in engaging in a single system of the “global imaginary”. This option of non-engagement is based on an ideology of national exceptionalism that limits the domain of status competition between American universities within the national borders. This is not to suggest that universities and academics in the US are not actively participating in cross-border activities and marketing. Nevertheless, for them, “the ‘world’s best universities’ are identified by *US News and World Report*. Best in America is best in the world. The national horizon is the global horizon” (Marginson 2009, p. 30).

Along the same lines, Marginson further argued that the rationale for the reputation-based approach adopted in the THEWUR (and the QSWUR) is to preserve the central status of the UK universities by utilising the heritage of the British Empire. This argument is supported by the fact that the index of the THEWUR is heavily grounded on a reputation survey (THE 2009), in which the pool of responses was weighted towards the UK and the former British colonies where *The Times* was well known. Rates of return from Europe and the USA were significantly lower. The return, however, was not reweighted to correct this compositional bias (Sowter 2007). Thus, Marginson (2009, p. 26) put it:

It elevated the stellar universities in the USA and the UK via the reputational and research indicators; it picked up the best known institutions in national systems, especially those

located in national capitals, via the reputation indicators; and it elevated UK and Australian universities involved in intensive cross-border marketing.

These interpretations of the national use of university rankings have highlighted how the methodologies adopted in particular ranking systems are relevant to maintaining the status quo of the centre-periphery platform in the global higher education landscape.

From the point of view of the peripheries, it can be argued that the research-based approach to classification adopted in the ARWU presents a way of upholding China's catch-up strategies (Liu 2007, 2009). In this view, the ARWU was not initiated to promote the reputation of Chinese universities. In contrast, despite its nationally-supported nature, the criteria used in the ARWU show no favour to Chinese universities. Rather, the indicators and indices used in the ARWU tend to favour the US system. Therefore, some commentators criticise that the prevalence of the ARWU represents the configurations of power that create a global hegemony in knowledge construction (Ishikawa 2009).

However, the ARWU is still seen as a way of serving the national interest of China, whereby Chinese universities are benchmarked with their counterparts in the US as well as other developed nations. In this view, the ARWU is understood as a tool for the Chinese government to monitor the research capacity and, to a lesser extent, the education quality of the Chinese higher education system. This proposition is confirmed by Liu, a principal member of the ARWU group: "the project was carried out for our academic interests, with potential impact on the strategic planning of Chinese universities" (Liu 2009, p. 2). This insight gives a glimpse of what is occurring behind the scenes of the emergence of world-class university models. Though reinstalling the traditional hierarchical structure of global higher education, the emphasis on research in the ARWU index helps China to know where its research-intensive universities stand so as to identify and narrow the gap between the Chinese HEIs and their Western counterparts in accordance with the benchmark of the American comprehensive research-intensive science university, thereby lobbying the Chinese government for suitable support to build world-class universities and supporting "the dream of generations of Chinese" (Liu 2009, p. 2). This understanding is also an economic analysis that reiterates the role of research in the knowledge-based economy (OECD 1996). In this sense, the ARWU is an instrument helping China transit from a labour-intensive, medium-technology manufacturing economy to a knowledge-intensive, high-tech economy.

These cross-national analyses of university rankings are important in terms of highlighting specific national interests in the formulation of a policy approach in response to the prevalence of a world-class university model and global ranking systems. However, while talking about the connection between global rankings and the new landscape of higher education, there are arguments that rankings are not very useful and relevant to the development of higher education in individual countries. As Sheil (2010) noted, for new and non-research-intensive universities as well as those from smaller nations, it is quite impossible, or at least ineffective, to challenge the centre/superior status of the world's top research universities, while they can compete well at the subject level. For him, "many excellent universities are not placed in the top 500 listings and continue to grapple with the one-size-fits-all

approach of rankings... Rankings devalue the role of these ‘niche’ players in the higher education ecosystem and distort the policy signals in many nations” (Sheil 2010, p. 71). As a consequence, some countries have started to reflect on the road towards the world-class image generated by the one-dimensional global rankings. In Australia, for example, the government has stopped stressing the development of a few elite world class universities to uphold a policy of differentiation and fund concentration. Alternatively, resources were allocated more evenly to different parties in the higher education sector in order to achieve system-wide revitalisation (Sheil 2010, p. 75).

Meanwhile, a “process of smartening up” in rankings has started, given the many valid reflections on one-dimensional rankings (Butler 2010; Sadlak 2010). UNESCO therefore initiated the International Ranking Expert Group (IREG) in 2004. In 2006, the IREG adopted a document containing principles of quality and good practices called the *Berlin Principles on Ranking of Higher Education Institutions*. The 16 Berlin Principles generally emphasise:

- the importance of transparency,
- the recognition of the diversity of HEIs,
- the use of audited and verifiable data,
- the preference for measuring outcomes rather than inputs and
- the importance of providing consumers with a clear understanding of all of the factors used to develop ranking and offering them a choice in how rankings are displayed (CHE/CEPES/IHEP 2006).

These principles are considered as a crucial step in the development of standards of quality and accountability in ranking systems, as they consider the autonomy of consumers and HEIs in ranking exercises (Harvey 2008). Since then, multi-dimensional rankings (Usher 2008, 2009) and disciplinary specialisation (Lopez-Illescas et al. 2011) provide new directions in ranking exercises.

However, this is not to suggest that the pressure or the tendency towards convergence generated by one-dimensional rankings has been eliminated. In the face of the emerging global hegemony, higher education sectors in different parts of the world are at a crossroads (Kehm and Stensaker 2009; van Vught 2009). This point will be further illustrated in the theoretical understanding of rankings in the geographical dimension. Summing up, this dimension involves a debate over the relevance and usefulness of ranking exercises in boosting the quality of higher education, the capability of research and, to a lesser extent, the economic growth of a nation. And, more importantly, this dimension is concerned with the question of how the landscape of global higher education has been affected under the growing influence of worldwide rankings.

3.4.2 *University Rankings as a Concept*

More recent thinking tends to view rankings as a discipline or a normative force with ideological components. The work of several key social theorists, such as Foucault, Bourdieu, Gramsci and Wallerstein, provide important ideological foundations and

elements for this type of study. This analytical approach to examining rankings allows us to understand the theoretical dimensions of league tables.

3.4.2.1 From an Ecological Perspective

From this theoretical perspective of analysis, rankings are considered as a factor affecting the environment in response to which institutional culture and behaviours are transformed and as a mechanism altering and controlling students' and faculty members' self and peer perception of status and quality.

In regard to the changes of institutional culture and behaviours, several recent studies have made attempts to provide a sociological perspective on understanding the institutional response to rankings. As has been discussed above, accountability, transparency and efficiency have become important elements of contemporary university governance, with the aim of holding HEIs accountable through providing procedural and accessible information to educational consumers. This therefore has generated an "accountability movement" which has led to a proliferation of evaluative measures and a performance-driven culture in higher education. Based on the reactive nature of measures, Espeland and Sauder (2007) argued that university rankings, as a form of measure, change expectations and permeate HEIs. Drawing on the concept of reactivity, they noted that two mechanisms, namely, self-fulfilling prophecy and commensuration, are useful for analysing the reactive elements of rankings. As they observed, rankings induce self-fulfilling prophecy that causes a gradual transformation of HEIs "into entities that conform more closely to criteria used to construct rankings" (Espeland and Sauder 2007, p. 33). Meanwhile, owing to the nature of commensuration embedded in rankings, a metrical relationship is constructed between HEIs, by which, on the one hand, HEIs are united as they are measured by being put in the same category, and on the other, they are distinguished as, over time, individual institutions are usually located and limited in specific position tiers. As a consequence, "rankings prompt the redistribution of resources, the redefinition of work, and gaming" (Ibid.).

Furthermore, drawing on Foucault's (1977) conception of discipline, Sauder and Espeland (2009, p. 65) argue that "rankings, as commensurate, relative and broadly circulating measures, are more difficult to buffer than other types of institutional pressure", therefore less "decouple-able" than other environmental pressures. This is because rankings are practices of disciplinary power. The nature of rankings therefore is "capillary", "continuous" and "diffuse" (Sauder and Espeland 2009, p. 69). To demonstrate the tight coupling between rankings and organisational activity, Sauder and Espeland analyse rankings as a form of surveillance that magnifies the visibility of HEIs' reputations. This surveillance has three characteristics according to their analysis. Firstly, rankings generate continuous scrutiny with which faculty members are obsessed. This creates an environment where pressures are sometimes explicit, but often subtle. Rankings also are usually seen as the source of these many pressures even when it is hard to connect them with rankings. Secondly, universities are forced to pay attention to numerous details, given the surveillance

of rankings. This “eminence of detail” causes ongoing production of statistics to become a routine at universities, which shows how an external inspection is transformed into an internal one, thus internalizing the outside control. Thirdly, rankings enable distant and diffuse parties to scrutinise HEIs, even on a global scale. Such remote surveillance extends the transparency of HEIs to a larger external audience. Therefore, universities are held accountable to different constituencies. Moreover, normalisation is another mechanism by which rankings discipline universities. Obviously, rankings apply a common metric to compare different HEIs, hence concealing differences and homogenising goals and missions of all HEIs. Yet rankings simultaneously differentiate one university from another through the creation of a hierarchy. While some are hierarchically ranked, those being excluded from this tiered hierarchy are stigmatised and punished. Consequently, as universities rely heavily on continuing financial support from external sources, they “have adapted to these shifts in evaluation both in their internal structure and culture as well as in their external presentation of organisation identity” in response to the rankings as a threat in the environment” (Bastedo and Bowman 2011, p. 4).

For higher education stakeholders, the above changing environment has formed subjective norms toward their choice of university and perceived control over their acceptance of HEIs that influence and incentivise their behaviours and attitudes, “above and beyond one’s own perceptions of quality” (Bowman and Bastedo 2011, p. 418). Indeed, as Bourdieu (1988) argued, academic power is closely related to reputation and status. To construct the power, academics need a mechanism in which several competitors compete for better reputation and higher status. However, given the nature of a competitive setting, there is and limited access to better reputation and higher status. In the light of this, I argue that university rankings provide a field of competition and create expectations about HEIs and, therefore, some faculty members change their behaviour accordingly. For instance, as mentioned earlier, a change to a HEI’s rank significantly affects the choices of prospective students and other constituents such as trustees, boards of visitors and alumni (Bastedo and Bowman 2011; Espeland and Sauder 2007). However, when rankings create such precise distinctions, these distinctions are sometimes based on insignificant differences. On this point, Frank and Cook (Frank 2001; Frank and Cook 1995) consider the market for higher education as an ultimate “winner-take-all market” where a small difference in performance can result in extremely large differences in reward. They suggest that the best ranked may only be marginally better than the second best. Yet, owing to the perception of external audiences, the initial reputation of a HEI makes it easier to attract top students and staff, and in turn produces further improvement in reputation (Frank and Cook 1995). This circular effect consequently causes the “success breeds success and failure breeds failure” outcome (Frank 2001, p. 3). The crucial point here is that rankings, as mediators, are important in the development of HEIs’ organisational reputation as they can synthesise, select, and simplify information so as to create, shape and propagate reputation. This phenomenon of the “reputation race” negatively affects the diversity of missions of different HEIs. Because those HEIs with good traditional academic performance, particularly in research, have an advantage in ranking exercises, this encourages “an increase of mimicking

behaviour (imitating the high reputation institutions), and hence.... more homogeneity, rather than diversity” (van Vught 2008, p. 172).

These analyses of rankings provide a dimension in which the meanings and implications of university rankings for organisations and individuals, especially for faculty members and university leaders, are deconstructed and examined in terms of forms and relations of power in the academic field. These approaches demonstrate how increasingly important university rankings change the ecology of higher education not only apparently but also fundamentally and substantially.

3.4.2.2 From a Geographic Perspective

The interplay between the global and the local is an important issue in the geography of higher education. As mentioned above, the dialectic of the global and the local largely involves the dynamics of the centre-periphery platforms concerning international inequality in higher education. By and large, this is primarily related to the tension between the global flow of homogenisation and that of heterogenisation in the process of globalisation (Appadurai 1996; Lo 2010; Marginson and Sawir 2005).

It is argued that a conceptual dimension of rankings in this aspect can demonstrate the relation of ranking to these global flows. As explained by Marginson (2009, p. 28), this denotes “its audacious imagining and ordering of the global knowledge economy and the profound implications of this imaging and ordering of the global, for the patterns of openness/closure, past/future and freedom/heteronomy played out in that space”. From the post-colonial perspective, this involves resistance to the imperialism manifested through university rankings (Teichler 2011) and to the Western dominance in discursive terrain, the self-identity of non-Western nations and cultural diversity in the post-colonial world in a broader sense (Hickling-Hudson et al. 2004; Tikly 2001, 2004).

In this antinomy of the knowledge economy, global university ranking has two distinctive sides. The *bright* side of it underlines the openness, novelty and complexity of the global knowledge economy, in which global ranking plays the role of connecting the diverse higher education systems and HEIs with the global knowledge network through its function of benchmarking. In this view, global ranking can be a cardinal project that is installed as the index of value in the global knowledge economy and translates ordering systems into a mathematised economics “in which status functions as a calculable standard of value, enabling prices and a transactional status market” (Marginson 2009, p. 28).

The existence of such an open platform reasserts the value of building research universities, which refer to research-oriented academic institutions with the capability of fully participating in the global academic community, in developing and newly industrialised countries. This becomes an important advocate for the “world class worldwide” perspective on higher education development (Altbach 2007) and for the “new growth theory” (OECD 1996) and the theses of “knowledge

for development” (Peters 2008) and of “building knowledge cultures” (Peters and Besley 2006).¹⁰

With respect to the dialectic of the global and the local, this bright side of ranking is in line with the divergence thesis that views globalisation as a subject to be enacted by local and national agencies and stresses national/local manipulation in the processes of globalisation (Appadurai 1996; Burbules and Torres 2000; Hirst et al. 2009; King 1991; Mittelman 1996; Waters 1995). From this viewpoint, global university ranking is a mechanism designed to actualise the global flows. It might be politically, economically and culturally neutral. The real meanings of the global rankings are determined by national and local factors including histories, cultures, needs, practices and institutional structures.

As I have argued elsewhere, (Lo 2011), global rankings are used as non-biased metrics to project a world-class image and to guide the development of higher education in East Asia. The model of an American research-intensive university is selected and publication and citation quantity and quality in Western-based journals are picked for the measurement in the ARWU of China and the PRSPWU of Taiwan because these measures are constructive in developing the knowledge production sector in the two societies. In some respects, they stand for the interests of the peripheries and, to a certain extent, for global diversity. This argument is based on an assumption that peripheral nations are free and autonomous to decide which university model is attractive and what performance indicators are useful to project world-class excellence precisely.

However, the *dark* side of global rankings represents the closure, convention and hegemony of the global knowledge economy. This is because ranking exercises heavily rely on “prestige” in which “perception dominates the evidence” (Sadlak 2006). Gramsci’s (1971) notion of hegemony is useful to supplement this discussion. As he believed it, power is exercised through lived experience or common sense. In this regard, it is a social construction. For instance, the THEWUR is mainly grounded on reputation surveys which tend to privilege the privileged. This approach of reputational exercises in turn leads to the reproduction of status and reputation that rewards a university’s performance in marketing rather than its research performance and re-strengthens traditional academic hierarchy (Sadlak 2006).

More importantly, the nature of hegemony with its grounding in civic society is potentially global.

Every relationship of “hegemony” is necessarily an educational relationship and occurs not only within a nation, between the various forces of which a nation is composed, but in the international and worldwide field, between the complexes of national and continental civilizations (Gramsci 1971, p. 350).

This is empirically supported by the fact that the citation and publication counts used in the ARWU and the PRSPWU are not free from the reputation-driven framework,

¹⁰ The “world class worldwide” perspective advocates building research universities in low- and middle-income countries. The “new growth theory” sees knowledge distribution power as a determining factor in economic growth in the knowledge-based economy. The “knowledge for development” thesis emphasises the role of universities (as knowledge institutions) in national development. The “building knowledge cultures” thesis talks about accumulation of knowledge, as a type of capital, in different cultural and social contexts (see OECD 1996; Peters 2008; Peters and Besley 2006 for detail).

given the concentration of publications and citation systems in the major English-speaking centres of science and scholarship, i.e. the US and the UK (Altbach 2006). In this sense, global university ranking can be seen as an ordinal project that:

is the creation of a vertical system of valuation which is interpolated into the knowledge economy (or at least the codified academic disciplines, basic research and innovation in the universities). This system of valuation rests on the old/new structure of university authority that rankings have reproduced. The primary move made by the systems of university ranking is to restore an apparent certainty in the face of the open source ecology, by reinstalling a traditional university status hierarchy that maps roughly onto the existing concentrations of wealth, technology and knowledge power, and which by supporting those concentrations is able to buy its own stable reproduction as a hierarchy with a system of value-creation (Marginson 2009, p. 28).

This dark side of rankings formulates or at least echoes the convergence effects by which “higher education governance, institutional, organisational and curricular arrangements thus are deemed to converge toward a common pattern” (Vaira 2004, pp. 492–493) because the global university rankings “largely tend to favour traditional academic performance, particularly in research; these ranking instruments lead to an increase of mimicking behaviour (imitating the high reputation institutions), and hence to more homogeneity, rather than diversity” (van Vught 2008, p. 172). This demonstrates a structural loophole of global university rankings in which the simplification approach adopted in league tables overlooks the incomparability of complex HEIs with different goals and missions and becomes an intolerable infringement on the independence of individual higher education systems and HEIs (Hazelkorn 2007b; Salmi and Saroyan 2007). These arguments are based on a post-colonial perspective from which the global university rankings stand for the Anglo-American hegemony that is an oppression on indigenous culture and knowledge and aims to maintain and legitimize the Western dominance and privilege (Crossley and Tikly 2004; Deem et al. 2008; Dei 2006; Hickling-Hudson et al. 2004).

The above divided account of the global university rankings illustrates an antinomy of the geo-politics of knowledge in the contemporary world. On the one hand, it denotes new opportunities of achieving diversification and better research capacity and education quality worldwide through international comparison and peer monitoring. On the other, it reiterates and reinstalls the continuing old hierarchical structure that sets a barrier to the creation of the non-Western-dominated realm of scholarship. While the former point imposes a challenge to the significance of the “centre-periphery” thesis (Postiglione 2005), the latter reiterates the continuous relevance of the world-systems theory and post-colonial analysis to our understanding of the global landscape of higher education (Harvey 2003; Wallerstein 1974).

3.5 Conclusion

This chapter has sought to develop a theoretical basis and an analytical framework for the research presented in this book. A synthesis of literature related to a number of theories (including including transnationalisation, neoliberalisation,

Table 3.4 Four dimensions of the ranking phenomenon

	Technological	Conceptual
Ecological	Dimension 1 (Influence of rankings on policy, university governance and individual behaviours)	Dimension 2 (Love and hate for rankings and the normative power of rankings)
Geographical	Dimension 3 (Local interests in rankings and the global landscape of higher education)	Dimension 4 (Openness and closedness of rankings and the relation to post-colonialism)

managerialisation, the adoption of network heterarchical governance and the tension between the processes of colonisation and post-colonisation) is presented to set out the theoretical context. On the basis of these theoretical elements, this chapter illustrates a four-dimensional framework, in which two aspects (ecological and geographical) of higher education development correspond with two focuses (technological and conceptual). Table 3.4 illustrates and numbers these four dimensions.

In the following chapters, these four dimensions will be used as a lens to study the evidence collected in the field. To provide an explicit explanation, these four dimensions are characterised by different features. Dimension 1 focuses on how the criteria and indicators of university rankings directly influence higher education stakeholders. It reminds us that the criteria and indicators used by league systems might affect the academic work environment. Therefore, in Chap. 4, we will look into this dimension of university rankings through investigating the experience of faculty members from five universities in Taiwan. Dimension 2 investigates the manifestations of normative power imposed by university rankings in the higher education sector. In light of the connection between power and rankings illustrated in this dimension, Chap. 5 will examine the attitudes of Taiwan's faculty toward rankings in order to illustrate how the normative power of rankings is manifested in the Taiwanese higher education system. Dimension 3 looks at the systemic responses to rankings with a focus on the local interests in league tables and the implication for the global landscape of higher education. It underlines the potential function and use of rankings in the geo-politics of higher education. This guides us to investigate how rankings can be used to promote Taiwan's interests in global higher education in Chap. 6. Dimension 4 is concerned with the tensions between the openness and closedness of rankings with reference to post-colonial thoughts. Based on an antinomy of university rankings drawn from this dimension, Chap. 7 will discuss the bright side (i.e. the opportunities of enhancing the quality and visibility of Taiwan's universities in the globalised world of higher education) and the dark side (i.e. the challenge of the homogenising effects brought by rankings) of ranking exercises. While these four dimensions are characterised by distinctive features, they are interrelated and possibly overlap in some senses, which provides an intermediate link between chapters, thereby providing a more comprehensive picture of the ranking phenomenon.

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Chapter 4

Dimension 1: Influences of University Rankings: Changes in Policy, University Governance and Individual Behaviours

In the previous chapter, we have explored how the ranking phenomenon can be assessed and interpreted from ecological and geographic perspectives and have noted how university rankings consist of technological and conceptual components and how in turn these characteristics can be combined in order to form a four-dimension framework to examine the implications of university rankings. This chapter draws on Dimension 1 of the four-dimensional approach to examine how university rankings have influenced Taiwanese higher education at policy, organisational and individual levels. The ideas of the ranking phenomenon suggest that the prevalence of university rankings facilitates the emergence of a strong output-oriented research culture that is narrowly targeted at journal publication. Fulfilling the criteria set in major ranking exercises for enhancing HEIs' research performance facilitates a transition to a more differentiated university sector and cultivates the policy environment in which resources are concentrated on a small number of HEIs for building flagship, world-class universities. With the goal of pursuing world-class excellence, ranking exercises are used as a tool or technology to impose and promote an output-oriented research culture and to monitor the research performance of HEIs. As a reflection of the policy changes at organisational and individual levels, a competitive mentality has suffused the observations that academics have on their working environments and the accounts that academics give of their working lives.

4.1 Impact on Policies and System Arrangements: Differentiation and Concentration of Resources

One important impact of university rankings is a change in strategy in resource allocation on the policy level that encourages HEIs to refocus their activities, especially to improve research quality, thereby gaining better ranks in league tables (Altbach 2007; Marginson 2007). Truly, many countries where government is the key funder for education have adopted the policy of concentration of research funding as the strategy to sustain or even strengthen the research capacity of their university sectors. However, as pointed out by Vaira (2009), in the UK, there is a

Table 4.1 Budget for the programme for aiming for top university. (Source: MOE 2010a)

Phase one (year)	2006	2007	2008	2009	2010	Total
Total budget	10	10	10	10	10	50
World-class university programme	3.5–6	3.5–6	3.5–6	3.5–6	3.5–6	17.5–30
Top research centre programme	4–6.5	4–6.5	4–6.5	4–6.5	4–6.5	20–32.5
Phase two (year)	2011	2012	2013	2014	2015	Total
Total Budget	10	10	10	10	10	50
World-class university programme	3.5–6	3.5–6	3.5–6	3.5–6	3.5–6	17.5–30
Top research centre programme	4–6.5	4–6.5	4–6.5	4–6.5	4–6.5	20–32.5

Unit: NT\$ billion

“rankings movement” synthesising institutional rankings and hierarchies, quality assurance and a policy of concentration of funding, thereby strengthening the tendency towards systemic convergence and institutional differentiation. Such a trinity of rankings, evaluation and financing facilitates the system’s stratification and, in turn, leads to a situation in which limited government funds are concentrated on funding several leading universities to sustain a critical mass of research excellence that drives up quality in higher education and ensures the country global competitiveness (Adams and Gurney 2010; Russell Group, n.d.).

Taiwan is an example of the impact of university rankings detailed above. The level of assessed quality of a HEI in Taiwan determines its level of funding. In this regard, pursuing higher ranks in international league tables is closely connected with the policy of funding concentration because rankings are considered to be a symbolic and powerful indicator to prove the standard of universities (Ewell 2008; Lynch 2006). As a section chief of MOE explained:

We started to think about the “five-year-fifty-billion” programme in 2002 and confirmed its promulgation in 2004. Global university rankings emerged during this period of time. Do they have any influence? Of course, yes. But being ranked among the world’s top 100 is not our goal. It is a slogan. Rankings provide us a spirit or a direction. They are useful in providing indicators, which can be used by universities to set their performance targets. (Section Chief, MOE)

Hence, as mentioned in previous chapters, the Taiwanese government clearly stated that it aimed to build a world-class university ranked among the top 100 universities in the world within 10 years, and to develop elite departments or research centres in different areas of specialisation within 5 years. It drew up the Programme for Aiming for Top University (the “five-year-fifty-billion” programme) which was designed to promote research excellence and internationalisation in Taiwan’s higher education sector. Under this programme, the MOE set aside NT\$ 50 billion to be used within 5 years (2006–2010), with the prospect of an additional NT\$ 50 billion being provided for a further 5 years (2011–2015) (Table 4.1). Table 4.2 lists the details of the grants to individual institutions.

Table 4.2 Universities funded by the programme for aiming for top university. (Source: Department of Higher Education 2008)

Institution	Phase one ^a	Phase two ^a
National Taiwan University	3,000	3,000
National Cheng Kung University	1,700	1,700
National Tsing Hwa University	1,000	1,200
National Jiao Tong University	800	900
National Central University	600	700
National Sun Yat-sen University	600	600
National Yang Ming University	500	500
National Chung Hsing University	400	450
National Chengchi University	300	200
National Taiwan University of Science and Technology	300	200
Chang Gung University	300	200
Yuan Ze University	300	/

^a The numbers refer to the annual grant offered by the MOE to these institutions
Unit: NT\$ million

As stated in the blueprint document, the programme provides financial support to the twelve participating universities on specific areas,¹ including school operational management and organisational implementation systems, infrastructure, teaching, academic production and R&D, industry-academia cooperation and internationalisation. The main objective of the funding provided under the programme is to upgrade the basic overall facilities of schools. The MOE specified that the funding can be used for improvement or upgrading of libraries, construction, and conducting international academic exchanges. The participating universities can also use the fund to employ extra staff, including distinguished scholars, experts, technical staff and post-doctoral research fellows from Taiwan and overseas (MOE 2010a). By enhancing both the research capacity and international standing of Taiwanese universities, the MOE expected that the “five-year-fifty-billion” programme will help to increase the number of Taiwanese university graduates going on to research universities to undertake post-graduate research. The MOE hopes that 10% of university graduates will go on to undertake post-graduate research in Taiwan’s research intensive universities. Participating universities are also expected to increase their undergraduate numbers by 5% each year during the programme, and to increase their international students to at least 5% of their student population.

However, the programme became controversial because the funds were unevenly allocated to a number of selected universities. The MOE believed that the funding the “five-year-fifty-billion” programme was valid, as it would benefit other non-participating universities through inter-institutional exchanges and collaboration as well as through developing the models for teaching, research, internationalisation

¹ Yuan Ze University had been deregistered from the second phase of the program, but has been granted NT\$ 90 million by the Program for Subsidising Key Areas with Characteristics. There are three other institutions (National Taiwan Ocean University, Kaohsiung Medical University and Chung Yuan Christian University) being funded by this program.

and establishing world-class research centres (also see Lawson 2008). This explains the establishment of a university alliance in Taiwan. The government's expectation was reflected in the extracts below:

There is no absolute equality. The rationale for the policy of funding concentration is to drive the development of higher education of the country... We need flagship universities that can play a leading role and would be of benefit to other universities... The flagship universities should have confidence in their academic status and should provide support to their counterparts... I think allocating funds evenly is not a good thing. If the flagship universities can fulfill their roles, no one would think this is unequal.
(Section Chief, MOE)

On this issue, the MOE expects that the policy would bring cooperation rather than competition in the higher education sector. However, as will be discussed in the next section, it seems not to be the case. Those who oppose such a policy of concentration of funding argued that the policy is unfair to the HEIs that are not funded by the “five-year-fifty-billion” programme. For instance, a head of department from University E, a non-prestigious university, criticised that the “five-year-fifty-billion” programme is a “wrong policy”. She remarked:

When the policy was under review, the government also found that the programme was not very successful. There was waste of resources in the “five-year-fifty-billion” programme. Over NT\$ 100 million was spent on purchasing toner.² I think the MOE should encourage a diverse range of universities in developing their own specific missions, instead of concentrating resources on several universities. In fact, the universities being funded are similar. I believe these universities should have some advantages over others. But, we should not give all the funds and good things to them, and abandon other universities. I think this situation is unfair.
(Head of Department, Social Sciences, University E)

A head of department from University B, a mid-level university, also pointed out that the emphasis on performance in rankings has substantially reduced the government's financial support to his university. He said:

University B was not selected to be one of the participating universities in the “five-year-fifty-billion” programme. Its funding therefore is relatively less. Research universities are able to spend millions to hire overseas visiting scholars to help the university enhance the visibility of its research work. However, University B is not capable of employing overseas visiting scholars because its funding has now been reduced. Consequently, the strong get stronger and the weak get weaker.
(Director of Research Institute, Social Sciences, University B)

He further criticised that the short sightedness of the government was the cause of the policy:

They (officials of the MOE) brought several universities into the so-called world rankings. For them, this is a way of demonstrating that they achieved good policy results... This explains why they concentrate government funds on research universities. They want quick success and instant benefit... This is their way of thinking.
(Director of Research Institute, Social Sciences, University B)

² The Control Yuan, the auditing branch of the ROC government, launched a report in March 2010 criticising that several universities funded by the “five-year-fifty-billion” program had spent NT\$ 117 million on buying printer ink and laser toner (Control Yuan 2010).

This view was strongly echoed by two respondents from University D, a non-prestigious university:

Policy makers need to face election. They therefore have to work with short-term plans and need to seek quick results. Funding must bring an effect shortly. A long-term plan is useless because they will leave the positions after a few years.

(Head of Department, Social Sciences, University D)

Many things in Taiwan are politically oriented. Some government officials might have visions, but their visions disappear when they sit in the parliament.

(Director of Research Institute, Social Sciences, University D)

Nonetheless, a dean of faculty from University B elaborated the connection between funding concentration and university ranking in a rather positive way:

They (government officials) work tactically. Becoming one of the world's top 100 is a form of instant success. It provides an indicator for achieving results within a short period of time. A university, however, needs people who are committed to its long-term development. Money may attract good people. However, if these people are not committed to the university's future, they will eventually leave. Nevertheless, in the short run, the government needs to emphasise university rankings.

(Dean, Social Sciences, University B)

An assistant professor from the same university had some observations about how university rankings have influenced higher education policy under the political circumstances of Taiwan. He noted:

These so-called global university rankings have captured the media's interest, and then the media reports have attracted the government's attention. The media might criticise that the performance of individual HEIs was bad in rankings in terms of effectiveness or accountability... The government would then use rankings to pressue HEIs into accepting reforms. Apparently, the "five-year-fifty-billion" programme is an example. However, there are other policies affected by this circumstance. I would not say that it is all about rankings. Yet, going up or down in league tables would probably exert an influence on the government. The media is free to criticise the government in Taiwan. If an HEI's performance were poor in rankings, the government would be under lots of pressure. In this sense, I think rankings have a direct impact on policies.

(Assistant Professor, Social Sciences, University B)

These views are important in terms of confirming the point about the interaction between rankings and public pressure on higher education policy (Salmi and Saroyan 2007). By contrast, it is not surprising that academics from University A, a prestigious university and one of the participating universities in the "five-year-fifty-billion" programme, tend to support the policy of funding concentration. A head of department commented:

It (funding concentration) is absolutely right. The government should selectively support a small number of universities. From the government's perspective, it is impossible to evenly allocate the resources because there are over 160 HEIs in Taiwan. It needs a focus, though it needs to consider some geographic issues, therefore fairly looking after the northern, central and southern parts of Taiwan. It cannot put all the resources on either the north or the south. However, the fund should be concentrated on supporting several HEIs only.

(Head of Department, Health Studies, University A)

An associate professor tried to explain the research environment in Taiwan so as to rationalise the concentration of resources in a relatively small number of universities:

If you look at the university sector only, you might say that University A has quite sufficient resources. It is one of the key HEIs. But you may know that we have Academia Sinica, which is the preeminent research institution in Taiwan. All key research is concentrated in it. If you compare University A with Academia Sinica, the difference in resources is gigantic... University A's resources are only about one-fifth of Academia Sinica's. Therefore, this is an issue of whom you are comparing with. If you compare University A with private universities or other HEIs, you might say University A's resources are rich. But if you compare with those national research institutions, University A's funding is far from sufficient. (Associate Professor, Health Studies, University A)

He argued that it is an exaggeration to say that University A is superior to its counterparts in competition for funding:

Outsiders might think that University A has received a large share of the NT\$ 50 billion. People might think that the NT\$ 20 billion or NT\$ 30 billions it gained was a lot. But University A is a large university. It has quite a few faculties. So, as the grant needed to be shared by several faculties, the actual amount for one faculty was small. My faculty has been granted NT\$ 80 million for a year only. Outsiders do not know this, but members of the faculty do. Some of my colleagues were upset about this and tried to ask for more resources from the university. However, the university said that the allocation was based on the number of faculty members. Hence, my faculty gained only NT\$ 80 million. In contrast, National Yang Ming University (NYMU), for example, has gained NT\$ 700 million, or NT\$ 400–500 million.³ But, over half of its grant has gone to its school of medicine. This is because the university was promoted from a college of medicine, and it is still dominated by the medical school. Thus, if a comparison were made on a faculty-to-faculty basis, it would be talking about NT\$ 300 million versus NT\$ 80 million. In this regard, the allocation of resources looks different from inside.

(Associate Professor, Health Studies, University A)

No matter the rationale, the new mode of objectifying academic excellence and the related policy of funding concentration deeply affects domestic academic hierarchies. Even a prestigious university had concerns about its status:

Although University A is traditionally one of the key universities in Taiwan, it needs to follow a certain trajectory. If it does not follow this trajectory, its resources might be taken by other universities. As a result, University A would become an inferior in the competition within the country.

(Head of Department, Social Sciences, University A)

From this department head's opinion, being included in the world's top 100 is given a meaning that attributes competition for resources and status to the position of a university in rankings. His view reflects the fact that university rankings have become a crucial factor in the competition among HEIs for funding. Indeed, an academic, who served as researcher at HEEACT, also remarked about the effects of ranking on resource allocation she had witnessed:

When the Taiwanese government started to allocate the NT\$ 50 billion grant, there was a question of who should be funded. Global ranking had gradually played a role in resource

³ NYMU had actually been granted a subsidy of NT\$ 50 million in the Program for Aiming for Top University.

allocation because we needed to provide evidence. We needed to allocate the resources on the basis of evidence. Global ranking then became a mechanism. It certainly cannot represent everything. However, it can show that an institution has an advantage over the other players. Therefore, being ranked in a league table became very important.
(Researcher, HEEACT)

These responses extend the analysis of university rankings to the politics of education in the island state. In fact, the political developments, educational autonomy and performance culture are interrelated in Taiwan, where democratic transition plays an important role in terms of motivating different social sectors to participate in higher education governance (Lo 2010). On the one hand, this has led to a more decentralised framework of governance, in which individual stakeholders, especially faculty members, exercise more autonomy. On the other hand, higher education policy needs to be more responsive and accountable to society.

Apart from exemplifying the anticipated gains and losses in such a system of zero-sum funding, comparing what the academic respondents thought with the response of the MOE section chief interviewed reveals some lack of consensus on the development of the higher education system and of consistency in understanding the policy:

Respondent: Frankly, during the process of implementation, some universities wrongly took indicators as goals. Rankings are meaningless if they cannot be used to promote institutional changes. Based on the current situation of the implementation, we do not think the policy is successful.

Interviewer: What do institutional changes mean?

Respondent: Rankings and the indicators used were useful in monitoring research outputs of universities. Currently, universities reward individual academics with cash bonuses for good research performance. This helps create the figures to fulfil the requirements set in ARWU. But how does this have an impact on the real academic results at these universities? Institutional changes mean developing a critical mass with which a group of researchers can work together effectively in specific subjects... Otherwise, the improvement stays at the personnel level.

(Section Chief, MOE)

While the government talked of the long-term trickle-down effect brought by funding concentration, most respondents had an intuitive understanding of the policy, and criticised it as being short-term and superficial. This quotation also demonstrates that the policy has brought substantial university governance changes (e.g. the cash reward system), which, however, were not what the government wanted. These changes in university governance will be further discussed later in this chapter.

The above discussion illustrates a blend of performance culture and the notion of decentralisation, which demonstrates the situation of higher education governance in democratised Taiwan. In this sense, university rankings provide the function of performance appraisal of universities, allowing the government's funding mechanism to become more mission- and performance-based. Yet I think that there is a certain degree of pragmatism in Taiwan that tries to combine and balance the external trends and requirements (i.e. global ranking exercises) and the internal pressures (i.e. democratic elements in higher education governance). In this regard, it is important to be aware of the relevance of domestic issues to the policy changes,

although the significant impact of global trends is reiterated (Yen and Cho 2010). The extracts from the interviews confirm this argument. It is clear that democratisation and the associated deregulating reforms have increased both institutional and individual autonomy, but all of these reforms were heavily influenced by political responsibility and sensitivity.

4.2 Institutional Responses: Evaluation and Competition

As mentioned earlier, a “ranking movement”, which commenced with the introduction of the Research Assessment Exercise (RAE) in the UK, links quality assurance and ranking exercises together to promote a performativity culture. As Vaira (2009, p. 143) explained:

Although the RAE evaluations were not, and are not intended to give rise to institutional rankings and hierarchies but just to ratings, in a short time they were socially—and to some extent politically—transformed and reconstructed in terms of rankings... It is worth mentioning here that this quality measure and the rankings it generates are based on institution capabilities, which is a typical feature and activity of universities.

We have identified similar developments, which simultaneously use rankings and evaluations to encourage performance culture that emphasises rigorous scrutiny and assessment, in Taiwan. In fact, Taiwan has adopted a sophisticated evaluation mechanism that has been run since 2005 by the HEEACT (as discussed in Chap. 2) (Chen and Lo 2007; Hou and Morse 2009), the statutory body that also launched the PRSPWU, an international ranking to compare the performance of HEIs on a global scale. Despite the fact that there is no direct link between the two separate assessment exercises, the dual role of HEEACT in assessing HEIs in Taiwan and developing performance indicators for ranking universities across the world encourages an output-oriented research culture (Hou 2012). Nevertheless, the PRSPWU was considered to be an unsuccessful experiment:

Respondent: the HEEACT proposed (the development of the PRSPWU) and the MOE approved. We did not think carefully. And the result was negative... It was a process of trial and error. We did not know that it would have a great effect on the university sector.

Interviewer: Do you mean that the methodology that focused on counting publications and citations in SCI and SSCI journals did not reflect the government’s view?

Respondent: No, it did not. But, as the HEEACT is a public agency, the government needs to be responsible for its actions. The methodology used was controversial. Personally, I think it was not a good method. But we did it. Now, it has been terminated.

(Section Chief, MOE)

However, changes have been made in the university sector. Hou and Morse (2009) noted that quality assurance in Taiwanese higher education was generated in the context of a growing pressure toward quality within and beyond national borders. As for the pressure within Taiwan, the government and the public have paid increasing attention to the quality of higher education after the accomplishment of the massification of higher education (Wang 2009). On the international front, the increasingly intense and international competition between HEIs has forced both

the Taiwanese government and universities to adhere to established paradigms and themes in the global academic community. Consequently:

more and more Taiwan institutions are using the performance indicators of the annual ranking reports as a tool of self-enhancement and changed their institutional policies in some aspects in response to the ranking... Besides, some schools attempted to reallocate resources and revise the faculty reward system in order to improve their weaknesses in the indicator of research output. Some formed a task force to make short-term and long-term strategies on how to achieve the designated rank several years later (Hou and Morse 2009, p. 64).

Based on this, ranking “is now also an accepted component of an external tool for quality assurance” (Hou and Morse 2009, p. 48), and may provide a function of goal setting for universities (Hou et al. 2011)

To some extent, findings from the interviews confirmed the above arguments. In the interviews, respondents were asked about how university rankings had an impact on their institutions. A dean of faculty from University D noted that the direction of development of his university was heavily based on the criteria used in university rankings. He went on to explain that when the institution was an institute of teacher training, the faculty members could focus on teaching only. But, the university had now become a comprehensive university and needed to look for better performance in both ranking and evaluation. It therefore requested the faculty members to put more effort on research (Dean, Social Sciences, University D). A dean of faculty from University E also stated:

There is competition in society. Thus, HEIs should use rankings to prove themselves and improve their performance. The intent is not only that outsiders can look at the internal situation of a university, but also that the university can understand itself... Universities can use this as an opportunity for self-improvement. Indeed, many indicators used in evaluation might be used in rankings in the future. There are integrated parts of evaluation and university ranking... The indicators and standards used in rankings indicated the areas that universities should work on. Of course, there are numerous ranking and evaluation agencies using different standards and indicators. Hence, universities needed to recognise the criteria their evaluation agency used to assess them, and to decide which rankings they wanted to work on. (Dean, Social Sciences, University E)

These views reflect the fact that some academics saw university rankings and evaluation as a package of assessing performance of HEIs. There is a response from the HEEACT member further explaining the connection between the two:

It is not all about rankings. Evaluation is relevant as well. Both ranking and evaluation have an impact on higher education in Taiwan... However, evaluation provides lots of accessible information on the performance of HEIs for ranking agencies to develop league tables, as the data has been collected. Certainly, evaluation involves more aspects [than ranking does]. But, when a more comprehensive database was developed, the information gradually became composite indicators for ranking universities.

(Researcher, HEEACT)

These views reflect the fact that some academics saw ranking and evaluation as a package for assessing the performance of HEIs. They show that criteria and indicators used in ranking and quality assurance exercises become an important consideration in the development of institutional policies. Moreover, though there are different criteria and indicators, research performance has dominated the discourse of the pursuit of quality and excellence. Apparently, this is because research

performance is adopted as a criterion in almost every ranking system and as a dominant one in some (e.g. ARWU and PRSPWU). Thus, research performance becomes a major criterion in evaluation of a faculty member's job performance in some universities. In the five sampled universities, four used research performance to be a criterion to assess their faculty. Universities A and B, who weighted research at 60% in their faculty performance appraisals, had the highest emphasis on research, while research received a weight of 40% in Universities C and D. Only University E did not put an emphasis on research in the performance appraisal for faculty.⁴

It is clear that University A is a research-intensive university and hence intends to place research in an important position. A respondent from University A expressed that although teaching occupied 30% of weighting in assessing a faculty member's performance, research actually was the predominant criteria in the evaluation (Assistant Professor, Social Sciences, University A). However, a respondent from University C also indicated that her university heavily stressed the importance of research, despite the fact that 60% of weighting of evaluations was assigned to teaching and services (Associate Professor, Management, University C).

According to a respondent, some universities adopted a scoring system in which a faculty member would score 40 points for publishing an article in a SSCI journal, and 20 points for a paper in a TSSCI journal. Faculty needed to have at least 240 points to be promoted from assistant professor to associate professor. Some universities even offer financial incentives to encourage faculty members to be more productive in research activities. He noted that faculty in his university would be rewarded differently, depending on the journal in which they had published. He specified:

It is not only about [being published in a] SSCI [journal], but impact factor is also taken into consideration. It is like a subsidy or an award. If you are published in the top 15% of SSCI journals, as I remember, you would gain NT\$ 40,000 or 60,000. If your publication was in the 15–40% range in the journal list, the amount would be lower. If it was below 40% or it was in a TSSCI journal, you would gain NT\$ 20,000. This is a reward mechanism in which quantization is put to an extreme level.

(Assistant Professor, Social Sciences, University A)

The impact of university rankings on life in Taiwan's academia will be discussed in more detail below. However, these findings suggest that rankings have substantially influenced institutional policies in employing, promoting and dismissing staff. Nonetheless, as remarked by Harvey (2008, p. 193), "the predominant focus on the whole institution is also problematic given that universities have particular strengths in one field of activity, such as research or teaching, and weaknesses in others. Or they may even be focused on specific areas, while not offering activities in many other areas". He further stated that a singular standard in ranking is unhelpful in validating various programmes and disciplines (Harvey 2008). Given the prevalence of standardised assessment of research performance, Lu and Chou

⁴ In University E, faculty performance appraisal mainly takes teaching and services into account. Faculty can decide whether research performance will be included as a criterion in their performance appraisal or not. In other words, research duties are optional.

(2013) pointed out that the value and importance of other forms of publication, such as book chapters and monographs, are overlooked, and that this may threaten the development of social sciences in Taiwan (also see Ku 2005) (see Chap. 7 for further discussion on this point). Concerning the influence of this standardisation upon university governance, a department head's comment on his friend's experience somehow echoes these views on the sole requirement for different disciplines:

Originally, [my friend's] university provided a subsidy of NT\$ 100,000 for publishing a paper in a SSCI journal. However, the university had to lower the subsidy to NT\$ 30,000 because my friend had published 10 articles in a year. The change of the incentive scheme was owing to her. People who study in the field of educational technologies [his friend's field] could produce a paper by slightly changing the data. Therefore, it was not difficult for them to publish 10 articles in a year. However, in my field [philosophy of education], people might need to take at least a half year to one year in order to write a proper article. It is possible to spend two or three on writing a paper... You would become short-sighted and would cut your research into small pieces in order to keep publishing one or two papers every year. People in my field still need a longer period, probably three to five years, to finish one publication. However, before you had finished your article and published it, you might have already been considered as one without research capacity. And this would affect your promotion.

(Director of Research Institute, Social Sciences, University B)

Nevertheless, it is important to note that even though many respondents reported that their universities placed heavy emphasis on having a good research performance, there are differences between institutions at different tiers. The response from a respondent, who taught at University A before joining University C, is useful in illustrating such a difference. He said:

I was in University A before coming to University C. These are two totally different universities. University A is a research university. University C is a teaching university... In University A, faculty are required to have breakthroughs in their research. But University C mainly focuses on teaching and expends less effort on research... In regard to faculty performance appraisal, University C adopts a low standard, with which you can be promoted if you have published one SSCI paper. University A, however, adopts a high standard that is six times higher than that of University C. It requires six SSCI papers within three years. I taught at both of these universities. I decided to join University C because I was not that competitive in this area [research]. I needed much more time to meet the promotion requirements in University A. I think it is impossible for me to write that many papers. That was why I came to University C.

(Assistant Professor, Natural Sciences, University C)

This response shows that the distinction between research and teaching universities is still apparent in Taiwanese higher education. Based on the above discussion, I argue that this trend that stresses research considerably affects institutional policies, especially those of evaluating faculty performance, in HEIs from different tiers. Rankings have also made significant contributions to the formation of this trend. However, the homogenising effect brought by rankings should not be exaggerated. There are different tracks that universities develop along in the higher education system. This has led to a situation in which HEIs compete differently for resources and status.

In the existing literature, university rankings are described as a factor intensifying competition between HEIs that is considered to be unhealthy by some authors. For instance, Stella and Woodhouse (2006, p. 16) argued that "institutions competing

for top rankings may forego cooperation with other institutions, which can be detrimental to the student and the institution as well as higher education in general". Dill and Soo (2005) noted that competition between universities for staff, students, resources and status has become more common both within and between countries, and that HEIs have gained their rankings through data manipulation. Harvy (2008) also reported that many HEIs have amended their mission statements and other institutional arrangements so as to win the competition.

To a certain extent, findings from the interviews prove these arguments and observations. For example, an associate dean of faculty from University A pointed out that his university attempted to improve its rank in league tables by changing its personnel policies and recruiting more productive researchers. He said:

I think University A has changed tremendously in recent years. In order to keep up with competition, we stole talent from other universities in Taiwan, or even from Hong Kong. I think rankings provide an objective standard which is an advantage. However, the disadvantage is that rankings have brought a lot of pressure to university faculty...Now we headhunt those with many SSCI papers. In fact, we recruited several young men who had won awards. They brought credit to the faculty, but also brought competition between colleagues. Some associate professors had not been promoted for seven to eight years, while some headhunted assistant professors were promoted to associate professor quickly, and are likely to become professor in the near future.

(Associate Dean, Social Sciences, University A)

He concluded that these changes were owing to the single standard used in rankings that merely stressed research output in indexed journals, thereby reducing the diversity of institutions. Another respondent from University A had similar comments. She has witnessed that many HEIs, including hers and those from lower tiers, put heavy emphasis on producing articles in indexed publication outlets, but ignore their own characteristics (Professor, Social Sciences, University A). These responses indicate that university rankings have brought a significant change in institutional environment where faculty and HEIs compete and compare with each other in very particular and specific areas. As argued by Harvey (2008, p. 195), ranking brings a loss of freedom and independence for HEIs to control the terms of their success. In this sense, the pursuit of climbing up league tables means "a drift to homogeneity".

However, at the same time, the findings from my fieldwork also suggest that HEIs in Taiwan are competing differentially. University A, one of the top-tier research universities in the island state, clearly sets out its aim of becoming a world-class university. Indeed, there is a response from University A saying that the university identified several renowned universities in the Asian Pacific region to be its benchmarks, against which the university would know how to move forward (Associate Dean, Social Sciences, University A). A dean of faculty from University A then connected the competition across countries to that within the national borders. He said, "Taiwan wanted to integrate with the international community and maintain its international competitiveness. Several universities therefore were selected [to compete internationally]. Originally, only two or three institutions were in [the Programme for Aiming for Top University]". He explained that eventually several universities were selected because they had strengths in different areas, and different characteristics,

and the MOE wanted them to compete with each other. From the national perspective, “if one became the world’s top 100, this might help other institutions enter the world’s top in some areas”, he added (Dean, Social Sciences, University A).

Based on these responses, it is clear that universities from this tier were assigned to compete with foreign HEIs for reputation and status internationally and with each other for resources domestically. It is reasonable to say that they are the group most affected by the homogenising effect brought about by global university rankings, because they need to achieve better rankings to prove themselves in the competitive environment (Lo 2009). Nevertheless, it is important to note that although rankings are influential in terms of upholding and developing quality assurance and performativity culture, they are not essentially powerful in affecting the domestic higher education market. As pointed out by a respondent from University A, there is an “established ecology of higher education” in which “every university has its own position that is not easy to be changed”. In this aspect, “the influence of university rankings is limited” (Head of Department, Social Sciences, University A). This point will be further elaborated later in this chapter.

Turning to those located at the mid-level of the system, respondents from these universities indicated that they were keen to compete for a better position in the system. For example, University B saw itself as a research university with the potential to be internationally competitive. Therefore, it clearly stated the goal of being a world-class university in its website. In fact, several respondents from University B believed that the performance of their university has been overlooked or underestimated by the government, and deserved a better position. One of them noted:

There were eleven institutions being included in phase one [of the Programme for Aiming for Top University]. Probably, University B was the twelfth or thirteenth. It was marginally excluded from the Programme for Aiming for Top University.
(Dean, Social Sciences, University B)

We re-elected the president of the university last year. A candidate looked at the performance of different colleges of the university. He found that individual subjects of the university were in the top ten of Taiwan. But it dropped to 11th or 12th if looking at the overall performance of the university. As I have said, University B has a feeling of grievance. When the MOE decided to fund the top 12, University B was ranked 13th. When the MOE decided to fund the top ten, University B was ranked 11th. It [funding] always closely passed by University B.
(Director of Research Institute, Social Sciences, University B)

At University B, all people, including the president, faculty, students and staff, clearly know that its position is one of being a research-oriented university. We might have claimed that teaching was important, but we put a great deal of effort into research. Thus, University B worked seriously at every opportunity. We hoped that at some time later we could gain the funding from the Programme for Aiming for Top University, instead of from the Programme for Encouraging Teaching Excellence in Universities.
(Assistant Professor, Social Sciences, University B)

In contrast, University C has adopted a different strategy in the competition, as a dean explained:

There were limited places in the “five-year-fifty-billion” programme. Also, it is impossible for University C to be included in the global rankings at the moment. We aim to compete with the *zhong* group [*zhongzibei*],⁵ like National Chung Cheng University and National Chung Hsing University. We see them as our benchmarks... We see the *zhong* group as our competitors, and we focus on the Programme for Encouraging Teaching Excellence in Universities. Indeed, we think our teaching excellence project has made some achievements.
(Dean, Social Sciences, University C)

Comparing this response with those from University B, we can see that the differential competition between institutions is based on special funding programmes, primarily the Programme for Aiming for Top University and the Programme for Encouraging Teaching Excellence in Universities. These programmes marked a dividing line between research and teaching, and between the international and the domestic in the Taiwanese higher education system (see Lo 2009). While the prevalence of global university rankings has put pressure on policy makers to use competition to motivate HEIs, it also helps individual HEIs determine their positions within the higher education sector (Dill and Soo 2005). As pointed out by a researcher from the HEEACT:

Rankings are important in terms of answering the question “who is the winner”? On this basis, their influence is massive because many universities identify their benchmarks in rankings. They can find the most suitable competitors and know how to improve. This is very important.
(Researcher, HEEACT)

In this regard, despite the fact that those mid-level HEIs would not be directly affected by international competition and the emergence of global rankings, rankings have affected universities in Taiwan across different tiers.

Nevertheless, this argument may be less relevant in understanding the situation of the non-prestigious universities, which are not funded by these major special funding schemes. Although most respondents from Universities D and E noted that they face increasing competitive pressures under reforms, many also denied the significance of university rankings in affecting their institutional environment. For example:

Those universities, such as Harvard University, National University of Singapore and University of Hong Kong, are excellent. But, it is impossible for us to compete with them. What they are doing is irrelevant to me. I am only concerned with the research and teaching in my university.
(Director of Research Institute, Humanities, University D)

I can feel the competition but I think the relationship between the competition and rankings is not strong. For us, competition is more related to employment and destination of our graduates. This is more relevant.
(Dean, Social Sciences, University E)

⁵ The *zhong* group (*zhongzibei*) roughly refers to four national universities, namely Central University (中央大學), Chung Hsing University (中興大學), Sun Yat-sen University (中山大學) and Chung Cheng University (中正大學), as their names start with the Chinese character “中” (*zhong*). *Zhong* also means middle in Chinese.

National Taiwan University might care about its rankings. But I do not think global rankings have any impact on us because we are not able to be included in the rankings.
(Head of Department, Social Sciences, University E)

However, when a dean of faculty from University D was asked about the effects of rankings on his university, he provided a different view on the issue:

University D has been working very hard. But it is very difficult for us to be included in the world's top 100 owing to our limitations. Do global rankings make an impact on University D? Yes, of course. There is stimulation. National Taiwan University and National Cheng Kung University ranked high. We also want to follow their practices. So we would improve ourselves in the areas of research and the number of teaching staff.
(Dean, Social Sciences, University D)

This response is similar to those from Universities B and C. The quotes show that those from Universities D and E might have different expectations of their universities, and suggest that it is plausible that HEIs from this tier were less influenced by the prevalence of world university rankings.

In addition, on the basis of the responses from the sampled universities, it is sensible to say that global university rankings have generated a competitive culture in Taiwan's higher education system, in which HEIs are encouraged to triumph over their same-tier counterparts. In this study, there is no evidence that shows universities work competitively instead of cooperatively (cf. Stella and Woodhouse 2006). However, the special funding schemes and the ensuing competition for funds have brought an effect on the relations and interactions between HEIs. A remark made by an academic teaching at University B reflects the change:

Nowadays, there are three types of universities: institutions funded by the "five-year-fifty-billion" programme, those funded by the Programme for Encouraging Teaching Excellence in Universities and those without any special funding. And there were traditional categories: general (comprehensive) universities and universities of science and technology... In my view, if this programme [the "five-year-fifty-billion" programme] was run for another ten years, the categories of universities [in Taiwan] would be totally changed.
(Assistant Professor, Social Sciences, University B)

This comment shows that the domestic academic hierarchies were under challenge owing to a changing higher education policy and environment brought about by the prevalence of world university rankings. To sum up, rankings have brought differential competitions among HEIs that could lead to a (re)stratification of the Taiwanese higher education system.

4.3 Reactions and Reflections of Academics: Research versus Teaching

There is a predominant culture of pursuing research performance, under the influence of which the educational missions and functions of many HEIs, particularly research universities, have been considerably deteriorating across the world. Lewis's (2006) remark about the educational function of universities illustrates how teaching is threatened by the tendency for emphasis on research in contemporary higher education:

Tenure is given mostly for research, in part for teaching, and not at all for interests or skill in helping students become adults. Few of today's professors enter academia as a mission, a noble calling. Of those who do, few survive to tenure at top universities. The pressure to publish a great deal in short time makes academic writing duller, less adventurous, and more technical, since junior faculty members opt to write what they know to be acceptable to the journals and academic presses (Lewis 2006, p. 8).

With reference to the discussion in the previous sections, it is recognised that the prevalence of university rankings is a very important factor leading to this phenomenon. Given the fact that heavy weight has been placed on research output to measure performance of HEIs in many university ranking systems, such as ARWU and PRSPWU, many universities consider research as a key measure to reach higher positions in league tables. As a consequence, as examined above, most sampled universities use research output as a major factor in evaluating the performance of faculty members. This section then examines how faculty members view their research and educational duties within the context of performativity culture that stresses "publish or perish".

A young faculty member from University A elaborates upon his experience of this "publish-or-perish" culture. He said:

I think there is an overemphasis on research that influences people who, like me, want a promotion. In fact, when I had just joined University A, I participated in some teaching skills workshops for new teachers. In the workshops, I was taught how to improve my teaching methods. And I was willing to participate. But I need to say that I am still an assistant professor. If I apply for promotion to associate professor, my research performance counts for 60% of the criteria. The rest comprises 30% for teaching and 10% for administrative service. I should focus on research only, if I work pragmatically. I remember the instructor of the workshop said that teaching is a matter of whole life because students appreciate it for their whole lives. However, after working for two years, sometimes I see teaching as a charity because students might think your teaching was good and they could learn more. But that was all. This would not help my promotion. Only research makes a direct impact on my promotion. One of my colleagues also talked to me honestly. He said that he spent 90% of his time on research but only 10% on teaching. I think this is a very rational choice... Students evaluate their teachers and rate them on a scale of one to five at the end of the semester. Normally, over four is good enough. Either 4.1 or 4.9 makes no difference for my promotion. Eventually, everything is about research.

(Assistant Professor, Social Sciences, University A)

This response substantially confirms Lewis's remarks. Indeed, other respondents who held higher positions at University A had similar observations. For instance, a professor who held the position of associate dean described the pressure that his young colleagues were facing:

Nowadays, the lives of young faculty members are harder. They have difficulty in getting promoted if they cannot not publish their papers in SSCI or TSSCI journals and cannot get their research projects being funded by the NSC. There is a principle under which a faculty member will be dismissed if he is not promoted in six years. This principle has not been strictly implemented in this faculty, but other faculties have already implemented it. I think this faculty will implement it in two years as well.

(Associate Dean, Social Sciences, University A)

An associate professor also reported that:

Some academic staff were criticised for their bad teaching and poor performance in service. But, if they had published good papers, they could get job promotion easily... Although there are not many, there really are people who ignore their teaching.
(Associate Professor, Health Studies, University A)

A dean from University A admitted that there is an underlying trend toward overemphasis on research. As explained by him, in response to this trend, there are two different tracks for academic staff: research track and teaching track. People who are on the teaching track can focus on teaching, as teaching is 60% of their evaluation and the research portion is lowered to 20%. He pointed out that this institutional policy allows the faculty to keep people who have excellent performance in teaching but are relatively weak in research. Nevertheless, the salary and other service conditions of the teaching-track faculty are slightly lower than those of the research-track faculty (Dean, Social Sciences, University A).

These responses reflect the apparent imbalance between research and teaching in University A, an elite university in Taiwan. However, the phenomenon is not limited to the top-tier research universities. In fact, the Taiwanese government also recognised the phenomenon of “emphasising research but neglecting teaching” in the higher education sector (MOE 2010b). It therefore launched the Programme for Encouraging Teaching Excellence in Universities to encourage mid-level universities to put more effort into teaching. The universities funded by this programme formed the second tier of the Taiwanese higher education system, which has a mission of achieving teaching excellence (Lo 2009).

Nevertheless, according to the respondents from Universities B and C, research is still very important, sometimes even more important than teaching in their institutions, despite the fact that both universities are funded by the Teaching Excellence Programme. When asked whether teaching has been overshadowed by research, respondents from Universities B and C, who are yet to receive promotion to the rank of full professor, expressed their views on the balance between teaching and research:

Faculty have pressure before being promoted to full professor. They tend to focus on research and this might affect their teaching. There are different types of universities in Taiwan. But many faculty members in those poorly ranked universities also work on research, although in theory they should focus on teaching. This is because research is an important criterion in job promotion. This pushes faculty members to spend more of their time on research. This is a trade-off. You have to choose one instead of making a balance between two [research and teaching], unless you are an extraordinarily capable person.
(Assistant Professor, Social Sciences, University B)

I tried to divide my time between research and teaching. I spend roughly four days on teaching and three days on research in a week. But I do not think many teachers could do the same because if you are still an assistant professor, your lessons are evenly allocated in the week. Then you are not able to focus on teaching or research within a period of time. In addition, service is also an area academics need to look after... [Service] includes attending government meetings and providing counselling to students. Providing counselling is fine by me because I love my students. But, attending government meetings is a burden to me.
(Associate Professor, Social Sciences, University B)

In theory, research counts for 40% [in performance appraisals for faculty], but I think that it is much more important than the ratio stated in the documents. I would say it counts for about 60–70%. Some faculty might have a passion for service and teaching. But after

they fail to get a promotion they will decline to take up any additional duties not related to research. They will only teach the subjects they are familiar with. Students are the ones suffering from this situation. When they organise activities, they cannot find an advisor. Teachers do not concern themselves with them, even if students need counselling.
(Associate Professor, Management, University C)

A faculty member with full professorship even said:

I tell young faculty members that they should not think about whether research or teaching is their primary duty, and that their primary duty is neither research nor teaching. I tell them that their primary duty is to achieve promotion... Their real research will start only when they are promoted.
(Professor, Social Sciences, University B)

These responses indicate the fact that junior faculty members from Universities B and C also had difficulty in finding a balance between research and teaching, despite the fact that their universities were assigned to pursue teaching excellence by the government through the special funding scheme.

However, faculty members from University D were asked the same question. They held different views on the issue, though all four respondents agreed that there is increasing pressure in their university to publish. An associate professor, for example, noted that there is a phenomenon of “emphasising research but neglecting teaching” in University D (Director of Research Institute, Social Sciences, University D). Yet a head of department mentioned that established faculty members might not care much about research, as they do not have the pressure to achieve promotion. By contrast, young faculty members put enormous effort into doing research because they need to publish in order to gain promotion (Head of Department, Social Sciences, University D). Another respondent from the same university who held a position of director of research institute also reiterated that publication is important in job promotion. However, he said that he would not pressure his colleagues to publish more, although he would encourage them to do research. He explained:

Some faculty members might tend to focus on research because they want to be promoted. It is difficult for them to get a promotion if they do not have research projects funded by the NSC and good papers. But teaching is their core duty. Indeed, my colleagues tend to focus on teaching and do not publish a lot. I hope there is a balance [between teaching and research]... I try to let them know [the importance of research], but I do not force them to do research.
(Director of Research Institute, Humanities, University D)

In contrast, comments made by respondents from University E are more consistent on this issue. Generally speaking, they responded that faculty members in their institution would not abandon their educational duties. These are their responses:

There is no such phenomenon [of neglecting teaching] in this university. Teaching forms a major part of this institution because we position ourselves as a teaching university. In addition to teaching, research is certainly important. So we also take research as an item in our faculty performance appraisal.⁶
(Dean, Social Sciences, University E)

⁶ Research is optional for faculty in University E.

I cannot see that faculty overlook teaching [in this university]... Our teachers have already spent a lot of time teaching students who were not expected to enter university studies. How could we manage that, if emphasis was put on research?

(Associate Professor, Social Sciences, University E)

We are a teaching university focusing on educational duties. Our primary missions basically are teaching and counselling. Research is optional for faculty members. They can work on any research area that they are interested in. But teaching and service already occupy much of their time. Thus they are not blamed for low research output. Their time is limited. They would be exhausted if they needed to strike a balance [between teaching and research].

(Head of Department, Social Sciences, University E)

Comparing this response with the analyses in the previous sections, it is apparent that universities at this tier are not expected to compete for better rankings by performing in research. In this sense, academics teaching at these universities are not strongly influenced by the “publish-or-perish” culture because they feel a distance from the global competition. However, competition affects individual academics, as explained by a respondent from University D:

There are personal considerations. People who are working at a private university or institute of technology might want to join a national university. Publications are something that can be easily seen... People are interested in things they can take away. Publications are something that can be taken away and can contribute to their personal profile. In addition, the current system tends to reward people for research instead of for teaching and service.

(Director of Research Institute, Social Sciences, University D)

This view can, to a certain extent, explain the variety of the responses from the mid-level universities. Looking at this explanation from a positive perspective, the prevalence of global rankings has brought a trickle-down effect that has promoted a more vibrant research culture in non-research-intensive universities. Nonetheless, Lewis’s observation about the deteriorating educational function of universities remains a serious problem for higher education in Taiwan, as well as other parts of the world.

4.4 Conclusion

This chapter has examined the rationale behind the policy of differentiation and funding concentration in relation to the ranking phenomenon, mainly based on information in government documents and from an interview with a government official. It has also discussed the impact of the policy on university governance reflected in the perceptions, practices and values and in the working lives of individual academics as expressed through their own accounts. This discussion provides an overview of the implications of the ranking phenomenon for Taiwan’s higher education system at policy, organisational and individual levels. The findings suggest that that criteria and indicators used in global rankings were widely adopted as measures of individual and institutional performance in Taiwan’s higher education system. While the focus and context here has have been Taiwan, the theme of the ranking

phenomenon and the associated SCI/SSCI craze are more generally applicable to many academic systems in East Asia. On this issue, I see that although rankings exercises are not the only reason for the rise of competitive culture, global university rankings are key elements in the emergence of a research culture in the region that is narrowly targeted at journal publication. In the case of Taiwan, the data suggest some lack of congruence between the policy intention and its implementation and interpretation at organisational and individual levels.

Equally importantly, the findings also reveal that the impact of the ranking phenomenon was not equal across institutions. While climbing the rankings was interpreted as a way of pursuing world-class status and quality excellence among HEIs at the upper tiers of the Taiwanese higher education system, the hegemonic effects of the ranking phenomenon became less influential in the lower tiers of the sector. Such a phenomenon appeared as particularly important because it was regarded as an indication of the antinomy of globalisation, which suggests that “globalisation has created greater segmentation in higher education worldwide, which advantaged some institutions and disadvantaged others” (Cantwell and Maldonado-Maldonado 2009, p. 304). In other words, some institutions and individuals face the threat of becoming marginalised from the global academic community during the process of globalisation, although some others are co-opted and benefit from the asymmetric social structure of “global”. This observation is important in terms of demonstrating the tension and conflict between the tendency of HEIs to pursue excellence and that of promoting diversity (Ghosh 2012). The issues here are not only the uneven allocation of resources or the partiality of assigning roles and duties within the system, but are more importantly the unequal opportunity of accessing the global domain in the global age. This leads us to further reflect on the values behind the ranking phenomenon in the following chapters.

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Chapter 5

Dimension 2: Manifestations of the Normative Power of University Rankings: Struggling between Love and Hate

In the previous chapter, we have seen evidence of how the ranking phenomenon impacts higher education policy and organisational and individual behaviours in Taiwan's university sector. The discussion has illustrated how academics perceived the changes of their working environment in relation to the prevalence of university rankings. This chapter follows up the discussion with an examination of the nature and exercise of the normative power of university rankings. Based on the theoretical arguments in the existing literature, it is recognised that Foucault's critique of power (Sauder and Espeland 2009) and Bourdieu's analysis of the hierarchy of academic disciplines (Deem et al. 2009) can show how to analyse manifestations of the normative power of university rankings. While the former is useful in explicating the subtleness of the dominance of the ranking phenomenon, the latter vividly illustrates the reflexive nature of the power of university rankings. This understanding of the ranking phenomenon formulates Dimension 2 of the four-dimensional framework, based on which this chapter considers the exercise of the disciplinary power to be a type of dichotomisation known as a "love-hate complex". The chapter also argues that while rankings impose significant power that has shaped the normative environment of the university field, the degree of the penetration of the normative power is determined by the hierarchical structure of the higher education system.

5.1 The Normative Power of University Rankings

Recent research on university rankings reveals that organisational and individual responses to university rankings can be seen as phenomena in which discourses manipulate temporal elements in higher education. In the existing literature, efforts are made to examine the discourse of rankings to explicate the natures of the proliferation and dominance of ranking systems (for example Bastedo and Bowman 2010, 2011; Bowman and Bastedo 2009, 2011; Espeland and Sauder 2007; Sauder and Espeland 2009). These studies exemplify how the model proffered by university rankings is internalised by HEIs and their faculty members, thereby forming a propensity of self-disciplining in academic circles.

In this sense, university rankings provide a paradigm case of a disciplinary technology that epitomizes the subjection of individuals to the mechanism of disciplinary power. Foucault's conception of discipline is used to explain the characteristics of control enacted by rankings, because university rankings exercise the functions of "disciplinary technologies" through which people become the objects of particular types of knowledge. As Foucault (1977, pp. 145–146) noted:

In discipline, the elements are interchangeable, since each is defined by the place it occupies in a series, and by the gap that separates it from the others. The unit is, therefore, neither the territory (unit of domination), nor the place (unit of residence), but the *rank*: the place one occupies in a classification, the point at which a line and column intersect, the interval in a series of intervals that one may traverse one after the other. Discipline is an art of rank, a technique for the transformation of arrangements. It individualises bodies by a location that does not give them a fixed position, but distributes them and circulates them in a network of relations. [*italics in the original*]

This analysis of disciplinary practices indicates that power can be exercised not only in a direct manner but also through a mechanism of codifying prescriptive aspects of qualifications. Indeed, research shows that university rankings can be substantially connected to surveillance and normalisation, two key forms of disciplinary technologies in Foucault's analysis of disciplinary power (Sauder and Espeland 2009). Constant surveillance of performance through university rankings becomes a type of control that allows meticulous attention of rankers towards HEIs within the context of a marketised higher education. As a result, HEIs' "reactions to rankings are best understood as the evolving responses of an assortment of actors who struggle to reconcile their sense of themselves as professional educators with an imposed market-based logic of accountability" (Ibid.: 66). Indeed, as indicated in previous discussion, "the quality management process" (Dill 1995, 1999) and "audit culture" (Strathern 1997, 2000) in higher education have generated an environment in which stakeholders in higher education are continuously influenced and monitored by many performance measures. Among them, university rankings are especially important because they substantially affect stakeholders' decisions on various matters in higher education (Hazelkorn 2007; Sauder and Lancaster 2006).

In time, university rankings have caused reactivity¹ by which faculty and HEIs "alter their behaviour in reaction to being evaluated, observed, or measured" (Espeland and Sauder 2007, p. 6). This is not only a threat to the validity of ranking exercises, but also represents a process of internalisation of the external perceptions of a university (Sauder and Espeland 2009). Indeed, the discipline of rankings has imposed a process of normalisation in which university rankings have intensified comparison between HEIs by applying a common metric to all institutions. This "single norm for excellence" (Ibid.: 73) created by ranking exercises means that league tables become tools of differentiation which generate or reinforce the hierarchical structure of higher education systems. As a consequence, differences among HEIs

¹ The concept of reactivity indicates that measures are reactive. The concept "blurs the distinction between the act of measuring and its object" (Espeland and Sauder 2007, p. 3). Some argue that it contaminates results of measurements, while some believe that it is an inevitable part of social measures because of human reflectivity (see Espeland and Sauder 2007 for detail).

are seen as a shortcoming as institutions are driven to conform to the norm as closely as possible. In other words, university rankings are mechanisms of homogenisation that discourage diversity in higher education (Dill 2009; Teichler 2009).

These analyses indicate that university rankings have become a self-disciplining force, and therefore stakeholders of higher education may feel it difficult to decouple from the pressure created by league tables (Sauder and Espeland 2009). However, the work of Bourdieu (1988, p. 84) calls our attention to the necessary prerequisite to the manifestations of the normative power of university rankings. He said, “academic capital is obtained and maintained by holding a position of enabling domination of other positions and their holders”, and it “is much more linked to hierarchical position than to any extraordinary properties of the work and the person”. This indicates that power relations and the related stakes in academic circles are closely connected with the hierarchical settings of the field. Hirsch’s (1976) concept of “positional goods” further explains this desire for competition and (re)production of hierarchy in a more explicit way. In Hirsch’s view, the status value of education (as a positional good) depends on the relative level of consumption. It is based on exclusivity or scarcity, and hence leads to positional competition. This is a zero-sum game, because when some people gain, others lose out. Obviously, university rankings provide a function of institutionalising such a positional competition in higher education. As Bastedo and Bowman pointed out (2011, p. 8), “rankings constitute a third-party status system that forms a significant part of the normative environment of universities... they have a unique power to shape the normative environment of the organisational field without participating or providing material resource flows”. This “sub-intellectual” power in the public discourse “arouse[s] feelings of doing something which leads to satisfaction” and “stir[s] up feelings of shame and desires for boasting, and the like” (Teichler 2011, p. 58). Returning to the “positional good” thesis, university rankings give the function of currency in the market of status, reputation and prestige. In short, the power of university rankings can be strong with the desire for “game playing” in academia (Bourdieu 1993).

Nevertheless, Bourdieu’s (1988, p. 88) analysis of academic capital also reminds us that this power only functions with “the structure which renders them [the hierarchical settings] possible and effective”; and “on condition that they are willing to play the competitive game, and accept its objective”. This means that individual HEIs and academics can enjoy autonomy if they keep a distance from participation in this competitive game. However, it is difficult for HEIs and academics to resist the power of university rankings because individual institutions and academics are somehow in an unequal position with rankers. As Teichler (2011, p. 58) observed, “the producers and advocates of the issue at stake invest so much time and energy in ruling the debate that discourse is dominated by the lobby and the critical voices have little chance of being heard”. This lobby can be linked to a social network or a reputational hierarchy which institutionalises mutual acquaintance and recognition, thereby generating social capital in the academic field. More importantly, the social capital can be transformed into economic capital through various types of funding sources (Bourdieu 1986; Federkeil 2009). This “extra-intellectual element” of rankings suggests that it is not easy for HEIs and academics to stay away from the normative power of rankings.

Meanwhile, there is a strong emotion which forms a resisting force against the normative power. To a certain extent, this negative discourse is related to universities' and academics' negative attitudes toward rankings because the prevalence of rankings is a serious challenge to their core role and power in quality assurance (Harman 2011). Also, it is extremely difficult, if not impossible, for various stakeholders to reach a consensus on the concept of quality (Usher and Medow 2009; Usher and Savino 2006). Hence, there are always queries on methodologies used in different ranking systems and their relevance to measuring the productivity of academics (Webber 2011). Moreover, the criticism of homogeneity and the call for diversity in higher education provide a strong response to the effects of homogenisation brought by one-dimensional rankings (Dill 2009; Teichler 2009; UNESCO 2010; Vaira 2009; Watson 2009).

In addition, there is a negative public discourse on rankings that is grounded on the winner-take-all effects on the higher education market and allocation of resources (Elkus 2008; Frank 2001, 2004; Frank and Cook 1995). Given that this has caused a positional arms race in higher education, Dill (2009, p. 102) summarises these negative effects of rankings as a “highly costly, zero-sum game, in which most institutions as well as society will be the losers”. The focus here is on whether or how these responses from the academic field can become a force counterbalancing the normative power of university rankings, thus allowing HEIs and academics to remain independent of the competitive game.

In sum, these discourses on university rankings illustrate “a thin line between love and hate” (Salmi and Saroyan 2007, p. 10), which is used to conceptually frame the ranking phenomenon. By looking into both sides of the above, it is argued that the degree of penetration of the normative power is determined by the hierarchical structure of the higher education system.

5.2 Struggling between Love and Hate

This section aims to examine the capillary effect of the normative power of rankings on Taiwan's higher education system. As indicated in the previous section, the degree of penetration of this power is dependent upon whether a HEI or a faculty member is willing to embrace the competition or how much autonomy individual institutions and faculty members have in making such a decision. On this basis, two different attitudes toward the normative elements of ranking exercises illustrate the capillary effect of rankings. “Love” implies embrace of the ranking phenomenon, and “hate” refers to resistance.

5.2.1 “Love”

Two characteristics of the academic world, its hierarchical power structure and its orientation to competition, incline academics to think that “rankings are sexy” or at least “necessary evils” (Teichler 2011), thereby facilitating manifestations of normative power.

5.2.1.1 The Way of Achieving Pride

HEIs and faculty members are keen to pursue better performance in ranking exercises because the normative standard imposed by league tables is expressed as a channel of actualising reputation. Reputation, in Luhmann's (1990) view, is the "second selective code" in the world of science, if the basic distinction of true-false is the first. Yet, as reputation is invisible, society, including the academic community, needs indicators and mechanisms to indicate and allocate reputation. While the information collected in ranking exercises is translated into indicators of an HEIs' performance, ranking systems somehow have become a mechanism for allocating reputation, therefore making reputational hierarchies of the academic world more visible (Federkeil 2009).

Sauder and Espeland (2009, p. 72) see the construction of reputational hierarchies as a process of normalisation of the discourse of a competitive game. They noted that "normalisation serves a 'double function' by creating a classificatory system that immediately rewards or punishes those it classifies". Thus, those who are likely to be rewarded would not mind being objects of comparison or would even proactively join the competition, as they believe rewards are commensurate with reputation and in some ways with performance in ranking systems. A department head from University A explained:

University A will not offer me a better salary, but it can provide me a better environment, such as its location, its leading position and so on... I would not leave University A after I have built up a relationship with its reputation.
(Head of Department, Social Sciences, University A)

This view strongly indicates that individual academics are in a relationship of wide-ranging and prolonged dependency upon institutional position in the hierarchical setting. As Schleef (2006) explained, there is a close link between members' perception of their organisation's identity and their own social identity. This analysis shows that the interests of both HEIs and faculty members are deeply involved in reputational competition in higher education, and they are able to benefit from this positional advantage in the process of accumulation of academic capital. As explained by Bourdieu (1988, p. 85):

... capital breeds capital, and holding positions conferring social influence determines and justifies holding new positions, themselves invested with all the weight of their combined holders.

From this perspective, the "love" toward university rankings is based on vested interests or a prospect of obtaining such interests in the hierarchical settings of higher education.

Nevertheless, it is obvious that, for some HEIs and their faculty members, rankings are pressure rather than attraction, though this pressure sometimes is subtle. For them, rankings are "necessary evils" to survive in the competition for academic power and resources. In this sense, the pressure for comparison is difficult to resist. A dean from University B explained:

Universities are in a helpless situation. They are not willing [to join the comparison], but are forced to do so. When every institution pays a great deal of attention to rankings, you cannot ignore the phenomenon... Competition has been intensified since the launch of the “five-year-fifty-billion” programme and the Teaching Excellence programme, because the universities that received grants from these programmes used these grants to identify themselves in their publicity campaigns.

(Dean, Social Sciences, University B)

Here we have witnessed that university administrators worry that their universities would be stigmatised and punished if their affiliations stray from the competition field set by university rankings. As a result, HEIs and academics “conform to normative standards they purport to reject” (Sauder and Espeland 2009, p. 73).

This example illustrates how the normative power imposed by rankings is manifested in Taiwan’s higher education system. However, it is also important to note that the manifestation is closely linked to the public discourse on rankings as well as related policies and practices. According to a faculty member from University B:

Rankings draw the media’s attention. The media then criticises governments and universities based on the result of rankings. No matter whether the criticisms are relevant or not, they attract the public’s attention and force us to consider the issues.

(Assistant Professor, Social Sciences, University B)

Because of this extra-intellectual element of the ranking debates (Teichler 2011), academic managers have to pay attention to the ranking discourse, even though it is “impossible [for their institutions] to enter the global rankings”, as a dean from University C said. This is because:

Everyone is competing for resources, including good teachers, outstanding students and staff, equipment as well as funding... we need to identify the right direction towards which we should go.

(Dean, Social Sciences, University C)

This dean’s view significantly highlights the nature of university rankings as an inter-organisational dependency, which indicates the fact that “universities as organizations are highly dependent and contingent upon the continuing financial support generated by external resource providers” (Bastedo and Bowman 2011, p. 4), and “how organizations adapt and manage the norms, values, and beliefs in their environment to increase the probability of organisational survival” (Ibid.: 8). This resource-dependence account of university rankings illustrates an environment in which university rankings influence resource flows in higher education. Consequently, there is a resource dependency relationship in which, through their influence with external resource providers, assessments conducted by certain legitimate third parties can generate steering effects on HEIs.

Given the fact that the government is the major resource provider in Taiwan’s higher education system and it uses rankings as an external quality assurance mechanism to prove HEIs’ quality as well as to uphold their accountability, it seems impossible for universities to develop tactics to respond to or even reduce the influence of rankings over their resources.

In this regard, rankings become a way of transforming social capital into economic capital (Federkeil 2009). From an institutional perspective, this inter-organisational dependency provides a predicted set of strategic responses, with which universities

are expected to take university rankings into serious consideration when organisational strategies are made. From an individual perspective, this resource dependence plus other elements of the ranking phenomenon contribute to shape the *habitus* (Bourdieu 1988, 1993), which influences how individual faculty members play the academic competitive games. This point will be discussed in the following section.

5.2.1.2 Competitive Disposition

According to Bourdieu (1988), academic competitive games are based on the concentration of academic power that leads to accumulation/monopoly of academic capital and reproduction of the academic hierarchy through creating the order of succession. Thus, he described the competitive disposition as a part of the working environment of the academic field, and argued that faculty members working in such an environment need to have “unconditional respect for the fundamental principles of the established order” (Ibid.: 87) because, for him, academic power is grounded on prestige and attraction and the professoriate is a body filled with norms and legitimate expectations. To defend the corps, professorial members, especially new entrants to the field, are obliged to adapt to the rhythms of the system and to protect and consolidate the reputation of the power. Therefore, despite the existence of competition in the field, norms and legitimate expectations assure the reaction to the competition proceeding to equilibrium, with which:

the institution manages, more or less well, to persuade all the agents to stake their investments in the games and objectives which it proposes, so that the frustrations which it inevitably provokes in some people are not transformed into a revolt against the principle of the investment, that is against the game itself (Bourdieu 1988, p. 144).

He believed that sometime later these behaviours would become a brief with which academics would follow the way of the *habitus* more unconsciously than consciously.

Based on Bourdieu’s analysis of the exercise of normative power in the academic circle, analysing the influences of university rankings cannot simply be a demonstration of the immediate and temporal effects of league tables only, but also an investigation of their impact on power relationship and structure in the field. When an associate dean from University A was asked how rankings affect the distribution of power and resources in his university, he described the situation this way:

For me, there is an inclusive environment at University A. It can give me the space in which I can have my own thoughts. Because I am a full professor, I do not care about whether I am given the resources. In any case, I can do my research. But, I object to egalitarianism... there would be free riders. So, concentration of resources, emphasis on research and performance indicators, all these are a mix of love and hate for me... other universities may complain that all resources are allocated to University A. But, actually, the schools of University A are divided into three tiers. The first tier includes the medical school and engineering schools. The second consists of the science school, agriculture school and so on. The third tier refers to social sciences school, law school and humanities school. Our school is inferior in this university, and we are given less money. So, there is stratification among HEIs, but also within the university, and among the faculty members.

(Associate Dean, Social Sciences, University A)

When he was asked about the processes of differentiation and homogenisation imposed by rankings in Taiwan's higher education system, he saw the processes as a part of the formation of the habitus:

There are new indicators, but there are established mainstream values or standards in a university. A newcomer will become a part of the mainstream. He will hold a vested interest in it. And he will not give it up. This is the situation in universities. Only those who are fools or really capable may want to change the situation... These kinds of people are very rare. Among the 200 faculty members in our school, I only see one or two having the talent. I cannot do that. It is too difficult.
(Associate Dean, Social Sciences, University A)

His statements provide an explicit account of the hierarchical settings that exist in different levels of Taiwan's higher education system. Analysing his view in light of Bourdieu's (1988) work, it is realised that he had held a hierarchical position allowing him to obtain and maintain the academic capital he needed, and enabling him to dominate faculty in other positions. He therefore did not see university rankings and other related policies and practices as a threat, but tended to view such a ranking effect as a way of defending and reproducing the academic hierarchy by restricting the access to the "corps".² In fact, many respondents reported that the current practices of weighting and rankings differences among institutions and staff members are unfair to new faculty members who are under a lot of pressure to publish, while experienced academics, especially those who hold full professorship, preserve resistance to the normative power of rankings. The situation described by another full professor from University A confirms this standpoint:

I can decide what I want to do based on my research interests. If my interests fit with the "five-year-fifty-billion" programme, I would be happy to apply for the fund. But I would not neglect my teaching because of research... I even hope that my research is not funded by the "five-year-fifty-billion" programme, because in that case I can have more freedom. Right! I can spend as long as I wish with my students. I can choose my research topic freely. I can decide to publish in any journals I like, no matter whether they are local or international ones. I do not have to care about whether it is SSCI or not.
I think this is a personal choice. You can do the same if you want... But new teachers who want to get job promotion would focus on publishing in SSCI journals and tend not to spend time on teaching or service. I would say it is utilitarianism.
(Professor, Social Sciences, University A)

This response strongly suggests that some stakeholders in the Taiwanese higher education sector have the capability of resisting the normative power of rankings. According to Foucault's (1980) approach to power, this represents a challenge to the particular typical type of subjectivity that discipline imposes. This point about "resistance" will be further discussed below. The focus here is on the "anxiety" and "allure" imposed by dismissal and promotion, respectively (Sauder and Espeland 2009). Though this professor claimed that academics had choices in planning their academic life, she obviously ignored the fact that she holds the academic capital that her younger colleagues do not. As argued by Lin (2013), the unfairness that junior academics are facing has produced the emergence of "a 'sweat university'

² Sauder and Espeland (2009) made a similar point in their analysis of the discipline of rankings by using Burawoy's (1979) study of labour relations.

culture” in Taiwan. Thus, not surprisingly, for junior faculty who are the subjects to be measured in the competitive game, the trajectories and itineraries set by those who hold the dominating positions become the golden rules they follow:

I am not on that level. Hence, I only care about how to get a job promotion in the shortest possible amount of time. Actually, I rarely think about rankings, but I know I need to publish in SSCI journals. This is about my own interests, but I know the university would benefit from my publications too. Currently, I do not think much about what the university should do, as my status is low. I am a follower. I will do whatever the university wants me to do.
(Assistant Professor, Social Sciences, University A)

I feel less stressed since I have been promoted. If I had not been promoted, I would have been dismissed. I have to confess that before being promoted, I did research for promotion; I did research for survival. But I think this situation is abnormal. Although the government said that we need to change the situation [SCI/SSCI craze], I think it is difficult to change it... The norm is that we use SSCI publications to prove our status in the field.
(Associate Professor, Social Sciences, University B)

All in all, the competitive game is about the accumulation of academic power and capital. As the core theme of the normative power of rankings is to pit one person’s or one institution’s performance against all others, the competitive disposition can be concluded by a quote from Bourdieu (1988, p. 89):

Academic power thus consists in the capacity to influence on the one hand expectations—themselves based partly on a disposition to play the game and on investment in the game, and partly on the objective indeterminacy of the game—and on the other hand objective probabilities—notably by limiting the world of possible competitors.

5.2.2 “Hate”

Academics may attempt to resist the normative power imposed by university rankings. They intend to keep independent from the competitive game, although they are aware of the changes brought by the prevalence of university rankings and the emergence of performativity culture. While Sauder and Espeland (2009) noted that unremitting surveillance of performance through the use of rankings can bring an obsessive form of internalised control over organisational and individual behaviours, they also recognised that resistance should not be seen as an antithesis but a core feature of the internationalisation process. The fieldwork evidence of this study then suggests that the characteristics of resistance can be shown by looking at personal emotions against the ranking movement and the enduring stability of the academic hierarchy.

5.2.2.1 The Target of Anger

Emotion is an important element affecting the formulation of the ranking discourse. As Teichler (2011, p. 59) said, “we note a ‘movement’ in favour of rankings by the key producers and advocates as well as a congregation of ‘concerned scholars’ in the critique of rankings”. While he sees this as a normal and common practice in

higher education reforms, he does not think that the emotions make any intellectual contributions to the clarification of the ranking phenomenon. However, several respondents of my study noted that their ill feelings against rankings or performativity culture are on the basis of their reflections on integrity of academics and respect for and within academia. When a department head from University A was asked about how university rankings have changed the work environment for academics in Taiwan, he responded this way:

The present academic situation does not allow much freedom for academics in their personal development. This is what I feel strongest about regarding the changes in recent years. The situation is very different from the time when I had just returned to Taiwan. Over a decade ago, as an intellectual in Taiwan, you would be well respected. You could have the space to reflect and develop what you wanted. You could pass your ideas to the next generation. Working in a university was a lifelong career. But, universities have been changing gradually. Now what you are talking about is only a job. You need to face many evaluations and indicators. These have nothing to do with a lifelong career... I am a senior faculty member now. I have no pressure to get a job promotion. But, I still face the pressure brought by assessments.

(Head of Department, Social Sciences, University A)

He reiterated the importance of “respect” throughout the interview. On the one hand, his view can be linked with the issues about academic freedom under the trend of managerialisation and academics’ role in quality assurance (Currie et al. 2006; Harman 2011). On the other, his statement can also be understood as an expectation of the respective niches of intellectuals in Confucian societies. In fact, the Confucian model of education heavily relies on a social context of interpersonal relationships featuring trust and respect, within which people, especially intellectuals, can sustain and fulfil their humanity through self-cultivation (Cheng 2006). Hence, while this understanding of learning and education stresses the importance of self-cultivation, it also suggests that academic circles in the Chinese context revolve around relationships. This point illustrates the importance of context in the use of rankings.

On this basis, a department head from University D expressed his doubts about the usefulness of rankings in improving the quality of higher education in Taiwan, despite recognising the intention of increasing the overall quality of the Taiwanese higher education system through a strong concentration within a few elite universities. “When we decide to adopt Western practices, we need to think about whether they fit our cultural context”, he said (Head of Department, Social Sciences, University D). He believed that the trickle-down effect relies on an effective evaluation mechanism, but:

There is a serious problem in Chinese culture. We talk about dignity [*mianzi*]³ and reliance on relationships [*guanxi*]. And I saw this phenomenon [of saving face] in our university evaluation. Some evaluators do not tell the truth because they want to be polite.

(Head of Department, Social Sciences, University D)

³ This viewpoint involves the notion of “face” in the Chinese context.

There is no evidential basis for his questioning the credibility of the evaluation system in Taiwan's higher education system. The value of this remark, however, is that emotional responses from academics may undermine one of the foundations of the ranking movement, which perceives that "rankings reinforce virtuous, healthy competition" because "the information on rankings has an overall stimulating effect of increasing efforts to improve" (Teichler 2011, p. 60). As a dean said:

The objective of rankings and competition is to provide a platform for us to observe each other, and then to make improvements. However, we should not lose the essence of education and research.

(Dean, Social Sciences, University A)

Indeed, many respondents showed their concern about the process of commensuration, by which the process of measurement changes how people think about the notion of quality of higher education, even though some of them demonstrated a rather positive attitude toward ranking exercises. For their part, the emphasis on quantitative information in the interpretation of quality means a threat to the nobility of scholarship and education. A department head from University A explained:

Some people worry that we are building an elite university, which is a castle in the air [*kong zhong lou ge*] and makes no contribution to our country and society. University A is seen as a leading university because of its contributions to Taiwan, but not its research outputs. We can see our graduates playing the role of leaders in different aspects of the society. But, this part is not shown in any indicators of rankings...

If you do not publish in international journals, you will be identified as a loser in the current system. Many people, including students, feel negative toward this part of rankings. Therefore, when University A entered the world's top 100, students carried a coffin to protest on campus. This represented the death of the spirit of University A.

(Head of Department, Social Sciences, University A)

To rankers and advocates of rankings, this viewpoint can be controversial, especially regarding the irrelevance of rankings in reflecting a university's contributions to the society. Nevertheless, it is important in terms of demonstrating the emotional reactions that exist in the public discourse on university rankings.

In sum, it is argued that the emotional interpretations of university rankings by the respondents demonstrate a defence of the conventional notion of academic nobility, and, more importantly, illustrate the public concern over corruption, which mainly refers to deterioration of professional standards and ethical loss (Chou 2008; Weidman and Enkhjargal 2008), particularly in the context of neo-liberalisation, managerialisation and internationalisation of higher education and the growth of performativity culture in the academic field.

5.2.2.2 Habitus Fragmentation

For Bourdieu, the attribute of competition is embedded in academic circles and determines the allocation of academic capital and power. This imposes a habitus in the academic field. However, it is argued that there is a *habitus fragmentation* within the differentiated, hierarchical higher education system in Taiwan. As such, some academics, especially those working in universities from the lower tiers of the

system, feel that they are isolated from the normative influence of the competitive game and university rankings in particular.

According to those interviewed, the relevance of university rankings to them and their institutions is dependent on the categories and positions of their institutions. For instance, when asked if his university uses the criteria used in ranking systems to guide its development, a dean from University B, a mid-level university, replied:

To be frank, we have a long way to go before entering the world rankings. Thus, though rankings do have impact on us, their influence is not as serious as expected.
(Dean, Social Sciences, University B)

He continued to explain that although there is not such a formal category as “research-oriented university”, individual HEIs have a position in the higher education system. He put it:

For example, while National Taiwan University would position itself as a research-oriented university, outsiders would see it as a research university too. Other universities also give themselves a position, but it could be controversial. Different stakeholders might have different views on which categories a university belongs to. Since there is not a formal categorisation, the positioning of a university is always open for discussion. However, the positioning of an institution would eventually affect the direction it would go in. This would also decide its views on rankings.
(Dean, Social Sciences, University B)

While many respondents agreed that there is an emerging rankings discourse intensifying the competition between HEIs and even among the faculties within institutions, quite a number of them, especially those from the non-prestigious universities, think that they and their institutions are not significantly affected by the discourse. As a professor who chaired a research institute at University D said:

Those universities stress that they are research-oriented and hence want to pursue higher ranks in league tables. Their faculty members need to work very hard to produce papers... However, my university is compared with itself only, not with other institutions. Every department [of the university] has a clear goal for development. We develop our curriculum under this goal in order to pass the MOE’s evaluation. We do not have to compete with other universities. We do not need benchmarks and being ranked.
(Director of Research Institute, Humanities, University D)

Another respondent from University E focused on the trend toward internationalisation in the ranking discourse. While he recognised that attracting international students and staff and publishing in English and in international journals are important criteria used in rankings, he denied that these ranking criteria had any implications for the development of his university. For him, these are considerations for top-tier universities:

Those institutions in the upper tier, such as National Taiwan University, National Tsing Hua University and National Chiao Tung University, might be under pressure to internationalise themselves... But local trends are more important to us. Internationalisation for us means organising exchange programmes only. In fact, internationalisation is far away from us.
(Associate Professor, Social Sciences, University E)

This emphasis on self-fulfilment reflects a perception of rankings in which ranking criteria, namely “research performance” and “internationalisation”, are only relevant to those HEIs with ambitions to pursue higher ranks in ranking exercises. For these respondents, the ranking criteria do not necessarily represent the notion of

quality. This reflects the resistance generated by the hierarchical and differentiated structure of the Taiwanese higher education system. Two insights from the existing literature are useful to explain this phenomenon.

First, it is argued that the responses from the interviewees largely are determined by their organisational identity. According to Elsbach and Kramer (1996), there is a strong connection between the self-understanding of organisational members and the organisation's identity. Their study reported that university ranking is an important variable changing or reshaping the core organisational identity of members of an HEI. However, the fieldwork evidence suggests that the conventional hierarchical settings of the higher education system still play a key role in identity management. Thus, the respondents' attention to the aspects of performance and the perception of their identities are decided by the conventional hierarchical structure rather than university rankings. In other words, the effects of rankings on identity management are diluted by the organisational categorisation process imposed by the hierarchical structure.

Second, there is the effect of self-fulfilling prophecy, by which "reactions to social measures confirm the expectations or predictions that are embedded in measures or which increase the validity of the measures by encouraging behaviours that confirm to it", and consequently, academics "change their behaviour accordingly" because "rankings create expectation" of HEIs (Espeland and Sauder 2007, pp. 11–12). Nonetheless, here it is suggested that the expectations created by university rankings mainly influence academics from prestigious universities (e.g. University A) while those from mid-level universities are influenced less (e.g. University B and C). Academics from the bottom-tier universities (e.g. University D and E) tended to define their situation based on their conventional perception of their own organisational identity and hierarchical structure. Hence, the lines of distinction produced by and the reactivity of university rankings are subtle in this part of the higher education sector in Taiwan. For these locally focused institutions, indicators of local influences and contributions are more relevant and important (Lin 2011).

This section suggests that the effects of the normative power of rankings are subtle in some parts of the higher education system in Taiwan. This is because the conventional hierarchical structure imposes another set of expectations and discourse shaping the normative environment in universities. This situation can be seen as a normal circumstance in the field of "game playing". As Bourdieu (1988, p. 113) said:

As in the field of power or in the university field taken as a whole, here too there is no absolute domination of a principle of domination, but the rival coexistence of several relatively independent principles of hierarchisation. The different powers are both competitive and complementary.

The significance of this finding is that it demonstrates the stability of the traditional hierarchical settings that create or retain a set of dominant principles competing with the set of dominant principles generated or represented by university rankings. This observation is important in terms of illustrating the coexistence of convergence and divergence in Taiwan's higher education system.

5.3 Conclusion

In this chapter, the focus has been on examining the critique of university rankings as a disciplinary technology in the context of Taiwan. The chapter has illustrated how the accounts of the respondent bear out the theoretical argument that considers the power of university rankings a subtle form of domination. Though the data illustrates that there is resistance to the normative power, there is little sign of a denial of the symbolic power relations imposed by the synthesis of the image of the global research university and the dream of being in the world's top 100. In contrast, the findings concerning the "love" side have proven the considerable effects of the power of university rankings on academics' behaviours and attitudes in Taiwan's higher education system, especially those from the upper-tier universities. What the respondents thought has revealed a collusion that results from responding to Bourdieu's illustration of the university field as a corps and as a hierarchy.

The value of the findings, which are summarised as "hate" in the current discourse, is to exemplify the existence of resistance in a Foucaultian illustration of the disciplinary power of university rankings. This analysis also provides a dimension of the ranking phenomenon, in which manifestations of the normative power of rankings are related to or even grounded on policy elements and hierarchical settings. Seen in terms of the dialectic of the global and the local, the responses from the lower-tier universities show a clear distinction between global and local in the normative environments in Taiwan's universities. The dichotomisation shown in the findings can be good evidence to support a question about the optimistic prospect of a strong connection between local communities and the elite universities' advantage of global access to the world's knowledge network (Gallagher 2011; Yonezawa 2011), and to demonstrate a hypothesis of inequality (Amsler and Bolsmann 2012) in which elite universities play a role of serving the global society and global markets, while non-prestigious universities are under threat of marginalisation in the world of globalisation.

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Chapter 6

Dimension 3: University Rankings and the Global Landscape of Higher Education: Using University Rankings to Promote Local Interests

Chapter 3 examined the use of university rankings and its influence on higher education in various academic systems, while Chap. 4 concentrated on how the Taiwanese government has incorporated university rankings as a tool in monitoring and restructuring its university sector. This chapter continues with the discussion on university rankings as technology in relation to the international dimension of higher education. An articulated rationale for the increasing importance of university rankings is the improvement of global brands and standings of universities, given the emergence of a global higher education market. In other words, the ranking phenomenon is part of the international marketing campaign. However, it is argued that global competition can be analysed from a centre-periphery perspective. This approach formulates Dimension 3 in the four-dimensional framework, which considers global university rankings a mechanism upholding Taiwan's interests in light of cross-national analysis of university ranking and recent discussion on regionalisation of higher education in Asia. To be specific, the chapter suggests that global university ranking can be used as: a governing tool adopted by individual countries to govern their higher education sectors, a zoning technology forming an imaginary line of cultural and academic sovereignty and a mechanism of agenda setting that affects university strategies and government policies at an international scale in worldwide higher education.

6.1 University Ranking as a Governing Tool

The notion of the “world-class university” is related to global university rankings because these ranking exercises provide a function of visualising the notion of a world-class university (Liu et al. 2011). In other words, the prevalence of university rankings is closely linked to the request for building world-class universities in many countries. In fact, we have witnessed a worldwide expansion of higher education in recent decades (Schofer and Meyer 2005) and, in particular, a higher education massification in some relatively wealthier East Asian countries (Postiglione 2005). Given the accomplishment of higher education expansion in parts of the region,

some of these countries have shifted their attention from quantity growth to quality consolidation in the enforcement of catch-up strategies in higher education. As a result, the pursuit of excellence and the establishment of quality assurance activities and mechanisms have entered the discourse of higher education development in a number of countries in the region. This contextual background rationalises an argument in which global university rankings are considered as a technology used by these peripheral countries to defend or even promote their interests in global higher education, thereby changing the global landscape of higher education and questioning the core status of Western developed countries in higher education.

The challenge of coping with the changing higher education landscape is increased competition in the context of globalisation and higher expectations on the role that universities play in society. This illustrates the link between global university rankings and the increasingly competitive environment associated with globalisation. For example, in the case of the Chinese use of university rankings, the pursuit of building world-class universities was interpreted as a national will which was influential in directing the development of the Chinese higher education system in the globalised context. As explained by Liu et al. (2004, p. 101), a member of the Jiao Tong Group, one key purpose of the ARWU is to provide comparable data to enable the comparison of higher education institutions worldwide, thereby finding “the gap between Chinese universities and world-class universities” (also see Shin 2011). This point rationalises the emphasis on research performance set in the ranking system. Indeed, there is a continuing gap in research performance between Chinese universities and their counterparts in the West. The model of the American comprehensive research-intensive science university therefore is considered a benchmark and university rankings are used as a tool to monitor the gap. Hence, although the ARWU is a China-based system, it does not favour universities in China to boost their global reputation but to show exactly where they stand (Marginson 2009). What is crucial in adopting this approach to evaluating Chinese universities is that:

The Chinese government knew that China would need to make a transition from the medium technology manufacturing economy that was generating phenomenal economic growth based on cheap labour from the countryside, to a knowledge-intensive services economy based on higher educational levels. It set itself the goal of forming a modernized tertiary education system at OECD levels of participation, the rapid expansion of R&D and the creation of a system of world-class research universities (Marginson, 2009, p. 23).

In this view, the rapid growth of R&D and the output of scientific papers in China are seen as an “accelerated investment programme” (Marginson 2009), and the ARWU is an instrument to guide the programme.

This analysis of the Chinese use of the ARWU in university governance and higher education development largely reflects the situation of Taiwan, in which higher education development, to a large extent, is also subject to external standards of measurement because the island is an externally dependent and export-led economy. Indeed, globalisation has intensified competition in all aspects of higher education. A typical response on higher education in the age of globalisation is as follows:

In the globalisation era, Taiwan should not be isolated from the world. If we have recognised the global trends, such as academic mobility and higher education as a service

industry, we need to rethink the role of higher education... We should not look at higher education development from a local perspective only.
(Section Chief, MOE)

This view of the international dimensions of higher education vividly reflects an awareness of the interconnectivity and a consciousness of the world as a whole emphasised in world culture theory. Nevertheless, it is a debate over whether peripheral countries are heading to independence or dependence in the process of globalisation. This affects the development of higher education in many countries. In fact, Taiwan's higher education development still heavily relies on and measures itself against Western-based benchmarks, given the continuing existence of centre-periphery platforms in global higher education (Kehm and Stensaker 2009; Postiglione 2005). This is despite the economic success of Taiwan, by which the island has been successful in transforming itself into a post-industrial economy with a strong technology industry (e.g. semiconductor industry) and a large service sector (Simon and Kau 1992). As a result, similar to the situation of China, the Western standard is viewed as the sign of the world-leading knowledge that Taiwan used to standardise research performance data:

The [Taiwanese] government wants to know the position of Taiwan's universities in the global spectrum by using global university rankings. There are national rankings in Taiwan already. The country needs global rankings to know more about world-class universities and which of Taiwan's universities are capable of competing for a place in the global environment. (Researcher, HEEACT)

This remark is significant in that it reflects why the HEEACT in Taiwan developed merely a research- and publication-oriented ranking system when it decided to establish its own league table and provide a perspective from which the Taiwanese government uses the PRSPWU as well as other global university rankings (such as the ARWU and THEWUR) as a governing technology to align the architecture of and advance the competitiveness of Taiwan's higher education system (Mok 2010). The policies concerning this point highlight the discussion about the impact of university rankings on higher education policies and organisational and individual behaviours (as indicated in Chapter 4). Importantly, from this perspective, the policy changes, including the establishment of a stratified higher education system through the adoption of funding concentration and the launch of excellence schemes for promoting research excellence and internationalisation in Taiwan's HEIs, can be seen as a response to the new issues and challenges related to globalisation of higher education (Lo 2009).

Teichler (2011) notes that the selectivity in the provision of research funding mainly aims at enabling one or more of the elite universities to be internationally renowned through climbing league tables. The policy was developed based on the logic that encouraging universities to climb league tables is an efficient means of building world-class universities and therefore is also a way of keeping the higher education sector as well as the national economy internationally competitive. Indeed, experiences in both Europe and Asia show that ranking exercises have been taken as a metric by governments to indicate university standards, thereby proving a university's world-class status or reflecting its distance from it (Deem et al. 2009).

This evaluation of higher education policy has demonstrated the function of university rankings in indicating world-class status and integrating international elements with local higher education development. It is equally important that there is a globalised field of education politics and policymaking (Moutsios 2010) in which university rankings play a role in institutionalising the exercise of power (Lo 2011). This point will be elaborated on later in this chapter.

Worth noting is that national competitiveness is emphasised in the policy discourse. In this regard, university rankings are used by Taiwan to maintain its competitiveness in the region. As explained by the HEEACT researcher:

[Talking about world-class universities] is for national strength and competitiveness. If Taiwan does not have such a thing as a world-class university, it will not be able to survive in the globalised environment... For developing nations or small states, having several world-class universities is important in terms of having a positive effect on national development and the economy because such a university provides a foundation for knowledge production. Taiwan is small and has no natural resources. If there is no knowledge and talent, what else do we have? Taiwan relies on continuous growth in research and knowledge production. And universities play an important role, as they are a place for cultivating talents. (Researcher, HEEACT)

She specified that Taiwan needs to compete with its neighbouring countries and territories, such as Hong Kong, Singapore and mainland China. Therefore, the policy makers need a tool to indicate the strength and weakness of the higher education sector in order to improve it. From her point of view, university rankings to a large extent can provide such a function.

It is obvious that Taiwan has been using this logic to govern its higher education policy. For instance, in its blueprint document, the MOE (2010) highlighted the international competition as the context for the call for pursuing better performance in league tables. It further listed cases from the UK, mainland China, South Korea, Japan, the US and the EU to legitimise the policy of role differentiation and funding concentration, and pointed out that “bucking international trends in competitiveness in the era of the knowledge economy risks a decline in national competitiveness and inexorable marginalization” (MOE 2010, p. 4). While the Taiwanese government launched several policy initiatives to foster universities’ pursuit of better performance in certain areas so as to build at least one global top-100 university, it also noted that stronger industry-academia cooperation and technological research and development in the aspects of technology transfers and cultivating research talents would be one of the major benefits brought by the policy initiatives:

Growth of 10–15% on average per year is expected under the guidance of institutions’ industry-academia cooperation projects, amounting to 8,000 projects over 10 years. As regards patents and technology transfers among these, annual growth of 20–30% is expected, amounting to at least 2,000 projects over 10 years, including 500 technology transfers with a value as high as NT\$1 billion, and 300 innovation and incubation projects, generating an output value of NT\$10 billion. As well as increasing industrial profits, these have a direct effect on the upgrading of industries and related innovation and research and development.

Industry-academia cooperation and technological research and development will provide industrial technology research and development support and consulting in the high technology industries of electronics, information technology, optoelectronics, biochemicals,

healthcare, nanotechnology, environmental protection, etc, and in the traditional manufacturing industries of moulds, machinery, agriculture and maritime activities. Working talent expected to be cultivated in the relevant industries: Projected increases of 1,200 persons per year, or 12,000 persons over 10 years (MOE 2010, p. 30).

The points made in this document strongly indicate the connection between university rankings and local interests or Taiwan's interests in particular.

The driving concept behind the link between the ranking phenomenon and the growth of higher education quality and the resulting increase of national competitiveness is the notion of a world-class university. The emphasis on research performance and publication is closely related to the discussion of world-class image, in which building world-class universities is interpreted as adopting the US type of knowledge production, despite the call for a worldwide type of research excellence (Altbach 2007; Arimoto 2011; Toutkoushian and Webber 2011). Two concerns were raised regarding this issue. Firstly, seen in terms of global education politics, the definition of world-class universities involves a competition for normative leadership, which is considered a form of neo-colonisation or imperialism (Deem et al. 2008; Teichler 2011) and will be further discussed in Chapter 7.

Secondly, there are methodological concerns that relate the homogenisation effects brought by one-dimensional rankings exercises to the decline in diversity and choice in higher education. Many authors have heavily criticised this homogenisation of higher education landscapes (Sadlak 2010; Teichler 2009 for example). This criticism of university rankings has led to the creation of the Berlin Principles (CHE/CEPES/IHEP 2006), which promote a customer-centred and multi-dimensional approach to designing university rankings (Butler 2010; Sadlak 2010; Shin and Toutkoushian 2011). In Taiwan, the HEEACT launched a local ranking system called "College Navigator in Taiwan" (CNT) in 2008. Different to the PRSPWU, CNT is a local, user-based ranking that covers a wider range of criteria and indicators to rank HEIs in Taiwan. There are 11 criteria including 24 indicators in the ranking system (Table 6.1). This personalised ranking allows its users to select and weigh these criteria and indicators by their own judgement (Hou et al. 2012).

The importance of the CNT is to illustrate the tension and integration between two concurrent trends, convergence and divergence, in global higher education (Dill 2009; Vaira 2009). While the use of global university rankings and related policy initiatives and governance activities represent Taiwan's active participation in the "world championship league" in higher education, finding a way of retaining the best and brightest parts of the local dimensions in the progress of internationalisation of higher education remains a challenge for higher education sectors in Taiwan as well as other developing and newly industrialised countries (Lo 2009). A number of scholars have developed many useful frameworks and models to guide the development of higher education policy and institutional governance, thereby connecting global visions and national/local practices (Jones 2008; Marginson and Rhoades 2002; Zha 2009 for example). Nonetheless, in practice, individual HEIs need to respond to the tendency towards output-oriented culture in higher education, although the comparison and competition among them are not necessary to transcend boundaries. The emergence of the CNT therefore marks an attempt made

Table 6.1 Criteria and indicators used in College Navigator in Taiwan. (Source: HEEACT 2009)

Criteria	Indicators
1. Peer assessment	(1) Academic survey
2. Student selectivity	(2) Enrolment rate; (3) Number of national academic awards earned by students within last three years
3. Student demographics	(4) Proportion of graduate students enrolled
4. Teaching quality	(5) Faculty staff-student ratio
5. Faculty resources	(6) Proportion of full-time faculty members; (7) Proportion of professors with PhD; (8) Proportion of faculty members above assistant professor; (9) National Academy membership
6. Research output	(10) Number of articles published in SSCI per faculty member; (11) Number of articles published in SCI per faculty member; (12) Number of articles published in AHCI per faculty member; (13) Citations in SCI, SSCI and AH&CI per faculty member
7. Research grants	(14) Total amount of National Science Council grants by faculty members; (15) Total amount of National Science Council grants in sciences; (16) Total Amount of National Science Council grants in social sciences and humanities; (17) Number of National Science Council projects per faculty member; (18) Number of National Science Council projects in sciences per faculty member; (19) Number of National Science Council projects in social sciences and humanities per faculty member
8. Library	(20) Number of holdings per full-time-student
9. Financial resources	(21) Expenditure per student
10. Internationalisation	(22) Proportion of international students; (23) Proportion of international faculty members
11. Graduation Rate	(24) Proportion of graduates who earn degrees within four years

by the Taiwanese higher education sector to respond to the ranking phenomenon and corresponding activities, and possibly indicates one of the future directions of university rankings (Hou 2009).

More importantly, the recent debate and reflections on the ranking phenomenon and its unintended consequences (e.g. the SCI/SSCI craze) reveal that Taiwan is still searching for its position in the changing landscape of higher education. Both the government and the academic community in Taiwan have realised the homogenisation effect brought by one-dimensional rankings exercises. This explains the development of the CNT, a self-directed ranking, and the termination of the PRSPWU, a one-dimensional ranking system. Academics, especially those in the fields of sciences and humanities, also expressed strong opposition to the use of published research in SCI and SSCI journals in assessing research performance of university faculty members (Chou et al. 2013). However, the view expressed below shows the difficulties in defining quality in the context of global competition:

There is nothing wrong with criticism [of the SCI/SSCI craze]. I think they are right. But I think publishing in SCI and SSCI journals is important. How should we assess people's contributions to academic knowledge if we abandon using SCI/SSCI? I think this question is equally important and it is wrong if we simply abandon SCI/SSCI without finding an

effective alternative. SCI/SSCI represents a simple concept. But simple is not easy. How can we prove that our research is meaningful and is worth waiting for? This is the key question. (Section Chief, MOE)

This view indicates the bumps and diversions that Taiwan's higher education system is facing on the path to academic excellence (Chou and Ching 2012).

6.2 University Ranking as a Zoning Technology

The debate and reflections on the catch-up mentality draw our attention to the call for reinventing the self, rebuilding subjectivity and developing an alternative horizon in knowledge production (Chen 2010). It is argued that university rankings play a role in the process of this search for an alternative. This argument can be illustrated through seeing ranking systems as a zoning technology in the process of regionalisation of higher education (Lo 2011).

The prevalence of regionalisation of higher education in East Asia as well as other parts of the world (e.g. Africa) can be understood in some ways by looking at Europe's examples of the Erasmus and Bologna processes (Neubauer 2012; Watson 2009). Therefore, it is useful to discuss the European experience as a context for our discussion on Taiwan specifically and East Asia in general.

According to Castells (2000), European integration is a reaction to the process of globalisation, given the fact that Europe, in the sense of the European Union (EU), is active in the construction of globalisation. He considers that this is a realisation of globalisation, which removes the global-Europe-national hierarchy. As a consequence, the hierarchical conception of the relationship between two levels (i.e. Europe and EU member states) is undermined, and Europe has become a key, sometimes dominant, institution of governance in various aspects. On this basis, Dale (2008, 2009b) notes that there is a growing European role in education during the process of globalisation. From his view, competitiveness of the EU and its member states in education is to be achieved by "an incipient shift from 'national government' to 'European governance' in the Lisbon Agenda" (Dale 2009a, p. 26). He argues that the regionalisation of education in Europe characterised by the Lisbon strategy will foster the formation of a new European education sector, which on the one hand will strengthen the European value and identity, and on the other is essential to maintain and improve the status and visibility of its education sector globally by synergising the educational capacities of EU member states (Dale 2009b).

The crucial point here is that regionalisation (or Europeanisation in Dale's argument) shows the possibility of the emergence of a "Chinese-speaking zone" in education, given the possibility that English and Chinese may form a global linguistic duopoly in the context of China's rise (Neubauer 2010). As argued by Neubauer (2012), there has already been an old form of regionalisation that bands similar countries together (e.g. the Asia-Europe Meeting [ASEM], the Asia Cooperation Dialogue [ACD], and the Association of Southeast Asian Nations Plus Three [ASEAN+3]). The idea of "Greater China" may then represent a new form

of regionalisation that overlays older forms (i.e. ASEAN) with strong cultural elements and neoliberalism characterised by marketised features (e.g. bi-lateral trade agreements). In light of these views, it is recognised that regionalism is affecting higher education governance in the Chinese societies across the Taiwan Strait, and regionalisation is in progress. As reported by Mok (2010, p. 99):

Most recently, governments in China, Taiwan and Hong Kong have taken steps to offer mutual recognition to the academic qualifications granted by their different university systems, while China and Taiwan are actively developing closer research collaborations and recognising journals published in these two Chinese societies.

In addition, Taiwan has recently opened its higher education enrolment to students from mainland China. Universities in Taiwan have been allowed to enrol mainland Chinese students in both undergraduate and postgraduate programmes since 2011, though the number of enrolments is limited to 1,000 students. Despite the fact that there are regulations banning Chinese students from numerous activities, such as obtaining employment while studying and staying after graduation (Anonymous 2010; Sharma 2010), this educational reform not only reflects the increasing interest of Taiwan in cross border higher education, but also represents a stronger educational link between mainland China (plausibly including Hong Kong) and Taiwan.

It is argued that the global university rankings run by Taiwan and mainland China can possibly be used as zoning technologies facilitating alignment of higher education systems (Knight 2012)¹, thereby intensifying cross-border networks and integration in higher education in Chinese-speaking countries and territories, if more “Chinese elements” are incorporated in the ranking systems. For instance, both Taiwan and mainland China have developed their own citation indices in social sciences (namely, the Chinese Social Sciences Citation Index [CSSCI] and the Taiwan Social Sciences Citation Index [TSSCI]). If papers indexed in these indices or written in Chinese are counted as indicators of research performance in either the PRSPWU or the ARWU, a Chinese standard for measurement of university performance is formulated. The zoning effect of ranking on university performance would be strengthened if the mutual recognition of journals published in these two Chinese societies mentioned by Mok (2010) is enacted.

Three conditions are seen as the crucial factors determining the possibility and actuality of the above argument. Firstly, the primary mission of these global rankings determines their function as zoning technologies. The PRSPWU and the ARWU do not consider papers published in local journals as indicators of research performance, though both of them use citation and publication counts as the measures to rank universities across the world. This is because papers indexed in SCI and SSCI are to a certain extent seen as non-biased indicators that are needed by Taiwan and China to monitor the research capacity of their higher education sectors (Hou and Morse 2009; Liu et al. 2011). This rationalises the use of rankings as a governing tool in which, as examined in the previous section, the strategy of “catching up” is embedded. Hence,

¹ Knight (2012) argued that there are three regionalisation approaches, namely, functional, organisational and political. Quality assurance and accreditation and research citation indexes are seen as examples of functional approach initiatives, aligning higher education systems in the region.

in contrast to the first use of ranking as a governing tool, the second use of ranking as a zoning technology implies a paradigm shift to the “self-realisation” of Taiwan’s higher education system in the process of globalisation, because incorporating papers published in Chinese journals into the international ranking systems to some extent means an emphasis on local (for example, Taiwan’s) dimensions in global scholarship, thereby upholding the mission of higher education in state-building (Lo 2009).

Secondly, there is a contradiction between Taiwan’s political and economic interests in the process of regionalisation in higher education. In Dale’s (2009a) analysis, regional integration is a reaction to globalisation with an aim of pursuing national interests. As he puts it:

The EU and other regional organisations (the North American Free Trade Agreement and the Asia-Pacific Economic Cooperation) were set up as a defence against globalisation, and the purpose was to ascertain the consequences of this for education policy. This led us quickly to focus on Lisbon, which seemed to be a perfect case for this kind of analysis. However, it rested on implicitly hierarchical, tiered assumptions about the relationship between the “scales” of global, regional and national, where the regional acted as a kind of “collective security” that required the “national” to cede some of its power/discretion to the collective/regional in order to secure its fundamental interests more effectively (Dale 2009a, p. 26).

This quote indicates an important point: that a crucial common, shared interest is a foundation for regional integration, as nation-states may need to give up some of their sovereignties in the process of regionalisation. In fact, nationalism remains a powerful force that substantially affects the development of regionalisation (Hawkins 2012)

Then, if we consider university ranking as a zoning technology, it is important for us to look at Taiwan’s interest in strengthening the discourses and institutions of “Chineseness” in higher education. It is clear that Taiwan’s university sector would benefit from the growth of “Chineseness” in global higher education, as this would help extend its presence in the global academic community. The emergence of a Chinese standard of academic research and higher education would strengthen Taiwan’s discursive power in the international politics of higher education and could plausibly attract more students from overseas to study in Taiwan. Indeed, the Taiwanese government has been attempting to strengthen its role as education provider in the global higher education market through fostering recruitment of international students since the early 2000s. In this regard, Taiwan should welcome the emergence of a Chinese-speaking zone in education and of a Chinese-centred ranking system.

However, the relations between Taiwan and mainland China are not only about cooperation, but also competition. From an economic standpoint, many Taiwanese people are afraid of competition from mainland China brought about by the opening-up policy. The Taiwanese government’s decision to open its higher education enrolment to the mainland caused many debates and controversies on the island and many limits were set to restrict the number and activities of students from mainland China (Anonymous 2010; Sharma 2010). More importantly, though the rise of China provides many economic opportunities for Taiwan, politically it is also seen as a threat (deLisle 2010). Despite the fact that the cross-strait ties have been im-

proving since President Ma Ying-jeou took office in 2008, tensions and uncertainties across the Taiwan Strait still exist. While it is apparent that either unification or independence is not a real choice at the present stage, more attention should be paid to discussions of a possible and appropriate framework for the cross-strait higher education governance, especially the political ones that many collaborative activities at both individual and institutional levels rely on (Lo 2013).

Thirdly, it is argued that self-sufficiency in terms of status and prestige determines whether a Chinese-speaking zone in higher education is an appropriate way of responding to globalisation. As argued by Dale (2009a), regionalisation is seen as a defensive strategy against the external pressures of globalisation. From this perspective, the primary aim of region-centred projects is to enhance the competitiveness of the region as a whole, and to stress the role of its institutional architecture (i.e. EU) as a “collective competition state”. In his view, the two levels of regional and national should be blurred in the process of regionalisation.

Nevertheless, in addition to a response to external pressures, it is argued that regionalisation can also be viewed as a way of internalising globalisation by integrating “regional” with “global”. Such an analysis views the regional level, rather than the global, as the main arena of international competition (Hawkins 2012). In this sense, internationalisation of higher education, especially for non-elite universities, can mean the pursuit of being a key regional actor, instead of acting as a global player. This is because, for some HEIs, international competitiveness might be better achieved at the regional level, and thus through a new strategy of regionalisation. Hence, for those non-elite but nationally competitive HEIs that are currently pursuing internationalisation, regionalisation might also refer to “de-internationalisation”.

The US is a good case of a self-sufficient system. In that country, HEIs merely pursue higher ranking in the *US News and World Report's America's Best Colleges*, but are little interested in the global rankings imaginary invoked by the ARWU and the THEWUR/QSWUR. Marginson (2009, p. 30) characterises this attitude as “the option of non-engagement”, which is based on a belief that “best in America is best in the world”. Following this analysis, a Chinese-centred university ranking system represents an alternative to the prestige generator of existing global ranking systems, which can amply reflect the status and competitiveness of a university regionally and, to a certain extent, globally. Generally speaking, the self-sufficiency of such an anticipated Chinese-speaking zone relies on the size of its university sector, because it needs a critical mass to sustain a regional/international field for status competition and a regional/international market for positional goods.

Table 6.2 shows the numbers of HEIs, tertiary students and the world's top 100 universities in the US and those in four Chinese-speaking societies. If we see the size of the American system as a benchmark of self-sufficiency for its counterparts, the number of HEIs in the Chinese societies is in size comparable with that in the US, while the number of tertiary students is larger than that in the US. In this regard, a Chinese-speaking zone is a plausible anticipation of the growth of “Chineseness” in global higher education. Nevertheless, the number of the world's top 100 universities in the Chinese societies is much smaller than that in the US, no matter whether we follow the citation-count method used in the PRSPWU and ARWU or the reputa-

Table 6.2 The numbers of higher education institutions, tertiary students and the world's top 100 universities in four Chinese-speaking societies and the US. (Source: MOE, Taiwan (2013); MOE, China (2013); UGC, Hong Kong (2013); IPASS, Hong Kong (2013); NCES, US (2013); Tertiary Education Services Office, Macao (2012))

	Four Chinese-speaking Societies ^a					The US
	Taiwan	China	Hong Kong	Macau	Total	
No. of HEIs ^b	162	4,431	26	10	4,629	7,416
No. of tertiary students ^c	1,355,290	41,589,493	174,165	26,217	43,145,165	29,041,533
No. of the world's top 100 universities						
PRSPWU (2011)	0	0	0	0	0	55
ARWU (2013)	0	0	0	0	0	52
THEWUR (2012)	0	3	2	0	5	47
QSWUR (2013)	1	3	3	0	7	30

^a The four Chinese-speaking societies are Taiwan (ROC), mainland China (PRC), Hong Kong (a special administrative region (SAR) of the PRC) and Macau (a SAR of the PRC)

^b The definition of HEIs varies in different countries/societies. In mainland China, the number refers to the total number of postgraduate institutes, regular HEIs, HEIs for adult learning and non-state run/people-run HEIs. In Taiwan, the number refers to the total number of universities, colleges and junior colleges. In Hong Kong, the number includes government-funded and self-financing post-secondary institutions. In Macau, the number refers to the government-funded institutions. In the US, the number includes four-year institutions, two-year institutions, and less-than-two-year institutions

^c The numbers include students studying undergraduate, postgraduate and sub-degree levels. The numbers for Taiwan, Hong Kong, China and the US refer to the figures for 2012–13, and those for Macau refer to the figures for 2011–12.

tion survey adopted by the THEWUR/QSWUR (Table 6.3). If we believe that these rankings are non-biased metrics to project the world-class status, this fact can suggest that the university sectors of these Chinese societies are far behind on research quality as well as other aspects. Yet, if we accept the argument that, regardless of the methods used, performance in league tables relies on economic power (Li et al. 2011) and therefore ranking exercises are inevitably grounded in privileging the privileged (Sadlak 2006; van Vught 2008), the change to using a Chinese standard of academic research and higher education in measuring the performance of HEIs will not have a negative impact on the research quality of universities from the Chinese societies, but can strengthen their visibility in the global higher education landscape.

Table 6.3 The number of top 100 universities in US, China, Taiwan and Hong Kong in four major ranking systems, 2003–2013. (Source: HEEACT (*various years*); QS World University Rankings (*various years*); Shanghai Ranking Consultancy (*various years*); THE (*various years*)).

United States						China				
Year	ARWU	THE-QS	QS	THE-TR	PRSPWU	ARWU	THE-QS	QS	THE-TR	PRSPWU
2003	58	/	/	/	/	0	/	/	/	/
2004	51	35	/	/	/	0	2	/	/	/
2005	53	31	/	/	/	0	4	/	/	/
2006	54	33	/	/	/	0	2	/	/	/
2007	54	37	/	/	62	0	3	/	/	0
2008	54	37	/	/	60	0	2	/	/	0
2009	55	32	/	/	57	0	2	/	/	0
2010	54	/	31	53	56	0	/	2	3	0
2011	53	/	31	51	55	0	/	3	2	0
2012	53	/	31	47	/	0	/	3	2	/
2013	52	/	30	/	/	0	/	3	/	/
Taiwan						Hong Kong				
2003	0	/	/	/	/	0	/	/	/	/
2004	0	0	/	/	/	0	3	/	/	/
2005	0	0	/	/	/	0	3	/	/	/
2006	0	0	/	/	/	0	3	/	/	/
2007	0	0	/	/	0	0	3	/	/	0
2008	0	0	/	/	0	0	3	/	/	0
2009	0	1	/	/	0	0	3	/	/	0
2010	0	/	1	0	0	0	/	3	2	0
2011	0	/	1	0	0	0	/	3	2	0
2012	0	/	1	0	/	0	/	4	2	/
2013	0	/	1	/	/	0	/	3	/	/

Macau is excluded from the table because none of its HEIs are ranked in the world's top 100

6.3 University Ranking as a Mechanism of Agenda Setting

The previous section has argued that university rankings can be used as a zoning technology to promote a Chinese standard of academic research and higher education in Chinese societies. On this basis, this section anticipates that university ranking has a potential function of influencing higher education systems in non-Chinese speaking societies through promoting the discourses and institutions of “Chineseness” in global higher education. This anticipation leads to the prospect in which Taiwan, as part of the region, can use its ranking systems to extend its influence and build its reputation in global higher education (Lo 2011).

With regard to global university rankings as a mechanism of agenda setting, Marginson's (2009) analysis of the reputation-survey approach used in THEWUR/QSWUR is useful to explain how ranking has been used as a national project to reduce American dominance. He argued that there is a connection be-

tween the good performances of British universities in these ranking exercises and Pax Britannica heritage because of the existence of the “halo effect” (Salmi and Saroyan 2007) or “anchoring effects” (Bowman and Bastedo 2011). This argument can be proven by the fact that the methodology used gathers a large proportion of reputation survey responses from the UK and former British colonies. On this basis, the reputation competition enacted by these ranking systems is a successful case of reducing the American global dominance and sustaining the UK’s core role in the imperial global geopolitics of knowledge through the use of university rankings because “the UK universities performed extraordinarily well in *The Times*, much better than any other ranking system” (Marginson 2009, p. 26).

In light of this analysis, it is possible for Taiwan to use university rankings such as the PRSPWU as a mechanism of producing status and reputation and extending influence through reviewing the criteria used in the league table within the region. Hosts of the ranking systems are not totally free in setting the criteria and indicators used in their indices (Hou 2008; Liu and Cheng 2005). However, if we agree that there is a connection between the prestigious status of the American university system and Pax Americana, we can see the prospect of a relaxation of the Western preconception in global higher education by adding Chinese elements (e.g. the use of Chinese language) in the context of China’s rise (Neubauer 2010). Actually, the latest trend driving ranking development is to seek the possibility of reflecting and specifying various missions and activities of different HEIs in a league-table format through multi-dimensional national/global ranking (Butler 2010; Hou and Morse 2009; Sadlak 2010). For example, the EU is attempting to create a global database of universities called the Multidimensional Global Ranking of Universities (U-Multirank), with a hope of overcoming the overemphasis on research and the convergence towards a common pattern caused by existing ranking systems (Butler 2010). In addition, in order to reflect regional characteristics, there is an anticipation of the growing importance of regional ranking systems (Shin and Toutkoushian 2011). In fact, many major ranking systems, including the ARWU, the THEWR and the PRSPWU, have provided rankings by region as subsystems of their global rankings. On the one hand, this development proves the tendency towards regionalisation of higher education. On the other, it indicates that the global landscape of higher education is developing towards a multi-polar pattern.

Furthermore, the concept of “extra-regional” made by Robertson (2010) helps us come up with a view that a ranking system can be used to promote a regional academic standard globally. In her analysis of Europeanisation, Robertson presents Europe-centred projects as an explicitly extra-regional globalising strategy that realises a competitive European higher education area and market. She views the regional higher education governance that has been actualised by the Bologna Process as an institutional architecture spreading the essence of the European higher education system across the globe. In this sense, the Bologna Process is an institutional architecture of projecting European soft power globally.

Based on these analyses, the processes of regionalisation and globalisation of higher education might provide a new platform for normative leadership by the Chinese societies. In fact, China has been attempting to enhance its soft power

in different areas (Li 2009). In education, the country intends to promote Chinese language and culture through the establishment of Confucius institutes across the world (Yang 2007, 2010). This development indicates that the extension of a Chinese-speaking zone in education and of a Chinese-centred ranking system is not necessarily limited within the borders of the four societies, given the popularity of learning Chinese and also the increasing mobility of academics and students and the growth of Chinese communities across the world.

Bearing all these aspects in mind, it is not an exaggeration to say that Taiwan has already owned an important potential resource (i.e. the PRSPWU) for reshaping the global landscape of higher education. As a researcher from HEEACT remarked, “when talking about global university ranking, people used to think of ARWU and then THE-QSWUR. But now, people gradually pay more attention to PRSPWU” (Researcher, HEEACT). For Taiwan, the emergence of Chinese-centred ranking systems and its extra-regional effect might bring an opportunity to turn its position from periphery to core in the geopolitics of higher education. Crucial to this process are the political circumstances in which Taiwan is able and willing to collaborate with the other Chinese societies across the Taiwan Strait. As said, the prospect of the anticipated Chinese institutional architecture in higher education focuses on the economic and cultural interests shared between Taiwan and mainland China. Nevertheless, with regard to political interests, Taiwan might not welcome the growth of China’s soft power or an active response to the idea of “the Greater China” (Hawkins 2012; Neubauer 2012), because this might lead to political pressure to achieve Taiwan’s formal political integration into a larger China (deLisle 2010). In fact, my fieldwork suggests that people in Taiwan have diverse views on collaboration with the mainland. For example, one respondent said that mainland China is Taiwan’s major rival in higher education as well as in many other aspects. Taiwan, as a small state, should have threat perceptions in its assessments of a rising China’s capacity and will (Researcher, HEEACT). However, another respondent believed that collaboration or even integration in education is a way of enhancing Taiwan’s soft power in the mainland. He said:

Many people [in Taiwan] worry that students from the mainland will take our jobs, and that the government will spend our money to cultivate Chinese students. These people are short-sighted. They do not realise that opening enrolment to students from mainland China can make them accept the concepts of democracy and freedom. They will influence China in the future after returning to the mainland.
(Dean, Social Sciences, University D)

In a sense, Taiwan is at a crossroads. On the one hand, the tendency towards regionalism and regionalisation shows the possibility of the prevalence of a Chinese-speaking or Chinese-centred regime in higher education that may challenge the existing dominance of English-speaking countries in knowledge construction. The Taiwanese higher education sector can plausibly extend its influence by using its ranking system as a mechanism of agenda-setting in global higher education in such a process of regionalisation. This brings the “centripetal forces” (Hawkins 2012) that pull Taiwan toward this vision of regionalisation. On the other hand, however, Taiwan, as a weaker player in cross-strait relations, needs to consider its

position of defending its stand on sovereignty. This represents a type of nationalism that forms the “centrifugal forces” pulling the island-state away from regionalisation (Hawkins 2012). This tension illustrates the importance of political factors in regionalisation of higher education, though university rankings can be a powerful institutional architecture in projecting organisational and functional influences on higher education.

6.4 Conclusion

This chapter related the ranking phenomenon to the international dimension of higher education. It discussed how university rankings were used to enhance the competitiveness of Taiwan’s higher education system, and therefore proposed that university rankings can be a useful tool for Taiwan to improve its visibility and status in global higher education in anticipation of a change from an imperial geopolitics of knowledge production to a multi-polar world order in global higher education.

The ideas presented in this chapter were grounded on an emphasis on the rise of Chineseness on the global stage and the extension of its normative power in higher education through the process of regionalisation. Bringing the ideas together provides a response to the argument that the discursive basis for the establishment of the complex system of global higher education is outside the control frame of any national or multi-national setting (cf. Neubauer 2010). By contrast, it is suggested that individual states, even as small as Taiwan, are able to amplify their voices in the discourse of globalisation of higher education through intra-regional collaboration and the establishment of institutional architecture (e.g. ranking systems).

At the same time, this chapter has attempted to provide a critical reflection on the predominance of Anglo-American and Eurocentric approaches to knowledge production. It followed the existing literature on the counter-hegemonic decolonisation movement to examine how we may preserve local content and assessments in contemporary higher education in order to prevent internationalisation from becoming a process of denationalisation (Chen 2010). In this regard, the discussion of regionalisation and the associated reflections on Westernisation, imperialisation and colonisation are helpful in terms of enhancing our awareness of self-transformation through shifting our points of reference toward ourselves. Some of these ideas may be immature in terms of defining what “non-Western” means in the age of globalisation. However, it serves as an imaginary anchoring point that allows us to reinvent the self and reconstitute a critical subjectivity in knowledge production.

From this perspective, ranking systems might provide the function of institutionalising the transformation of the self. This argument is based on the theme of developing an alternative to the established global and world-class image grounded on the Anglo-American paradigm. This theme was touched upon in this chapter by looking at how university rankings might align higher education systems in the region. It warrants much further development if the antinomy of university rankings, in which global league tables can simultaneously be seen as an instrument for

upholding both hegemonic and anti-hegemonic forces, is to be fully understood. This issue will be further discussed in Chap. 7.

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Chapter 7

Dimension 4: Antinomy of the Power of University Rankings: World-class Worldwide versus Global Hegemony

In the previous chapter, we focused closely on an international dimension of the ranking phenomenon which considers global university rankings as a mechanism influencing national higher education policies and shaping the global higher education landscape. On this basis, it was argued that world university rankings can be used to promote local interests in the global politics of higher education. This chapter continues to examine the international dimension of the ranking phenomenon by discussing an antinomy of university rankings, which views rankings as an institution projecting forces of change in the global landscape of higher education, with particular reference to the development of Taiwan's higher education system. This understanding illustrates Dimension 4 of the four-dimensional framework, in which rankings have two distinctive sides: *bright side* and *dark side*. The bright side considers the emphasis on criteria and indicators set in the ranking systems an efficient way of enhancing the quality and visibility of Taiwan's universities in the globalised world of higher education. This argument assumes that there is universal agreement about quality in higher education. However, the counter-argument to this assumption challenges the foundation of the vision of "world-class worldwide" by illustrating the hegemonic features of the world-class movement. This formulates the dark side of global league tables and guides us to have an in-depth exploration of subjectivity in knowledge production.

7.1 University Rankings as an Institution in the Global Politics of Higher Education

Viewing global university rankings as an institution for transnational policy-making in higher education is a way of conceptualising the function of rankings in the study of power relations in global higher education. This conceptualisation is based on an assumption of the emergence of a globalised field of education politics and policy (Lingard and Rawolle 2011; Moutsios 2010) and is aimed at overcoming the over-emphasis on the hegemonic nature of the dominance of the Western paradigm in higher education, the predominant view that non-Western countries are considered

	Hard Power	Soft Power
Spectrum of Behaviours		
Most Likely Resources	force sanctions payments bribes	institutions values culture policies
Translation in Higher Education	role differentiation funding	global university rankings world-class image
Scope of Influences	National	Global

Fig. 7.1 Power in higher education. (Source: Lo 2011, p. 214)

as the colonised in the process of globalisation and the uncertainty about the interplay between core and peripheral nations in higher education in the post-colonial era. It uses the typology of power in Nye's (2004) theory to deconstruct the discursive basis of global governmentality in higher education.¹ When adopting such a soft-power perspective on power in higher education, different forms of power in higher education are ranged along a continuum that illustrates different power resources and their adaptation to higher education (Fig. 7.1).

The figure illustrates a perspective from which a world-class image is seen as a type of resource producing co-optive power in higher education that forms the end of the spectrum of behaviours in the analysis of power in higher education. This perspective chimes well with an analysis by Deem et al. (2008), which suggests that owing to the intensifying competition between higher education sectors, countries in East Asia are attracted by the world-class image originating from the Anglo-American paradigm, therefore these countries try to learn or even copy the Western-based world-class model in order to restructure their higher education systems. In fact, many countries in East Asia as well as other parts of the world have put a lot of effort into establishing world-class universities in their territories (Altbach and Balán 2007; Liu et al. 2011). The emerging quest for world-class status across the globe to a large extent reflects the fact that this form of soft power is viewed as an attractiveness generating impact on a global scale.

Furthermore, adopting the soft-power perspective on the global politics of higher education leads us to pay special attention to the emerging global university rankings in the dialectic of the global and the local. It is suggested that global university rankings provide the function of institutions along Nye's spectrum of resources of power. Institutions here refer to formal constraints (rules, laws and constitutions),

¹ Coined by Nye, the term "soft power" refers to the ability of one entity to change what another does and shape what the other entity wants (Nye 1990, p. 2002). He notes that "soft power is not merely the same as influence... it is also the ability to attract, and attraction often leads to acquiescence" (Nye 2004, p. 6). Based on this concept, he develops a spectrum of power, in which behaviours range from commands that enact hard (commanding) power at one end to co-option that enacts soft (co-optive) power at the other, and corresponding behaviours/sources (Nye 2004, p. 7–8).

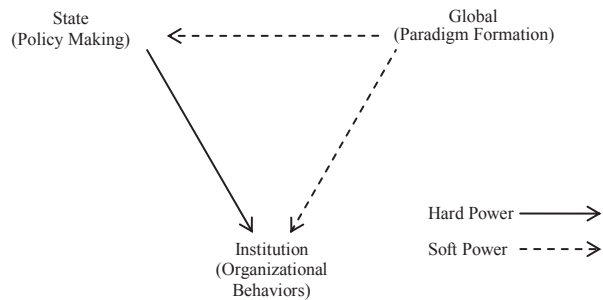
informal constraints (norms of behaviours, conventions and self-imposed codes of conduct) as well as their enforcement characteristics by which social agents interact (North 1993). Institution builders can be diverse, including policymakers, business people or community members. Therefore, the types of institutions can be diverse—such as public institutions (e.g. corporate, collateral and bankruptcy laws) and private institutions (e.g. banks, reciprocity between community members and land inheritance norms). Interestingly, institutions can be built as either internal or external enforcement mechanisms to generate effects. No matter what kind of institutions they are, “effective institutions are those that are incentive-compatible”, and the design of institutions should ensure that “the incentives that are created actually lead to desired behaviour” (World Bank 2002, p. 6). In other words, institutions define the incentives present in society and therefore structure social practices.

These quick definitions of institutions suggest that university ranking can be seen as a mechanism of providing the functions of external and informal institutions that cause significant effects on internal and formal institutions (e.g. funding and evaluation mechanism). With reference to the analysis of power in higher education illustrated in Fig. 7.1, I argue that global university ranking is a missing link that connects the scope of hard power (i.e. local) with that of soft power (i.e. global) by which hegemony and self-determination are able to work within their scopes of influence interactively.

Taking the ARWU (a ranking system focused on research capacity) and the THE-QSWUR (a composite ranking with a heavy emphasis on reputation survey) as examples, recent studies reported that criteria used in these systems of university comparison have become important considerations in the making of higher education policy and university governance (for example, see Hazelkorn 2011; Kehm and Stensaker 2009). On this basis, we have seen that global university rankings have become a mechanism of agenda setting, which project a structured form of soft power influencing the higher education policy of many countries and the organisational behaviours of HEIs. Indeed, Chap. 6 discussed the fact that Taiwan or individual countries in general have limitations in deciding their higher education because of the agenda (i.e. rankings in the present study) set by the external parties. In this sense, it is difficult to ignore or decouple from these normative elements of rankings in the world of globalisation.

Finally, the power relations between global and local institutions are noteworthy features of global higher education. According to the World Bank (2002), there is an interactive nature of the relations between institutions, policies and organisational behaviours. It noted that “policies affect which institutions evolve—but institutions too affect which policies are adopted. Institutional structure affects behaviour. But behaviour may also change within existing institutional structure” (World Bank 2002, p. 6). This definition is useful for understanding the non-linear mode of interactions in the global-local dialectic. In adding institution to make up the soft-power perspective on power in higher education, attention has been paid to the idea of network in illustrating the power relation in the global context. It is suggested that the exercise of soft and hard power is not in a linear (i.e. global-nation-institution) manner, but, as illustrated in Fig. 7.2, is in a networked form.

Fig. 7.2 Power relations in global higher education. (Source: Lo 2011, p. 216)



The figure illustrates a situation in which soft (global) power and hard (national) power simultaneously influence behaviours of individual HEIs. As argued above, the world-class image, which generates soft power over states and HEIs globally, is the basis upon which the global paradigm is developed. Then, drawing on the concept of multilateral governance that further specifies the changing role of states in globalised settings (Castells 2000), it is argued that the system-level impact of paradigm formulation is to foster the notion of the world-class university and lead to the promulgation of related policy initiatives. At an organisational level, on the one hand, individual HEIs are attempting to change their governance and organisational culture and behaviours so as to respond to global dynamics. On the other, organisational change is under the control and influence of the hard power exercised by the regulatory agencies at a national level.

7.2 The Bright Side and Dark Side of the Ranking Phenomenon

The analysis of university rankings as institutions has illustrated that the interaction between global-level discourses and national-level policies can be described in terms of power. This section examines the role and influence of ranking systems in the transformation of global higher education in the theoretical context of post-colonialism (Dill 2009; Marginson 2009). It is argued that there are two sides of the ranking phenomenon—the bright side, which refers to the possible influences of openness/diversity brought by university rankings, and the dark side, which presents the closedness convergence of ranking systems.

7.2.1 Openness: The Bright Side

7.2.1.1 Using Rankings to Build World-class Universities

The soft-power perspective on global higher education shows that the goal of building world-class universities is a powerful force driving the development of higher

education in peripheral countries. In fact, the findings of ongoing research on the strategies of global research universities in East Asia show that governments in the region play a crucial role in nurturing the growth of world-class universities through upgrading and merging existing universities or creating new universities (Salmi and Liu 2011, p. xi). From the national perspective, the global research university is “a central institution of the 21st century”, being “at the nexus of science, scholarship, and the knowledge economies” (Altbach 2007, p. 1). This statement gives an indication of how elite universities, or world-class universities in a global context, are essential in promoting national interests in the knowledge economy.

Sustaining the competitiveness of a nation in the knowledge economy requires a critical mass of a few better-funded institutions that act as global players, while there is a subsector of less research-active HEIs for mass higher education within the national higher education system (Palfreyman and Tapper 2009). In this sense, building and remaining a world-class university, according to Watson (2007), is a way of sustaining the comprehensiveness of a higher education system. On the one hand, as discussed in Chap. 4, this rationalises the policy of role differentiation. On the other hand, it figures out the importance of defining the notion of the world-class university. This is because a world-class university seems essential in today’s higher education development and therefore every country wants to have one (Altbach 2004).²

University rankings then are considered as an effective and efficient way of projecting a world-class image for HEIs to guide their development. As Salmi and Liu (2011) noted, the proliferation of ranking systems provides more systematic ways to identify and classify world-class universities. Indeed, the data reveals that many respondents believed that there is a close connection between the position in ranking exercises and world-class university status. For example, a faculty member from University A accepted that reaching the world’s top 100 is an effective indicator of achieving world-class status. She specified the criteria of a world-class university:

When we talk about the concept of the world-class university, we should look at both hardware and software. A world-class university should have a campus with good facilities... We should also consider the performance of students and teachers. Only a good university can attract good teachers and students... Lastly, world-class universities are normally comprehensive universities with sufficient budgets.
(Head of Department, Health Studies, University A)

She believed that many of these criteria are included or reflected in different ranking systems, and that the pursuit of better performance in league tables is correct in terms of moving toward world-class status.

A dean from University B held a similar view and opinion on this issue. He assumed that there is “an obvious relationship between the world’s top 100 and world-class university status, as many ranking systems can reflect the research capacity and performance of HEIs effectively”. He believed that while some existing ranking systems overstress publishing articles in international publication outlets and over-

² Altbach (2004) made his own definition of world-class university by listing several criteria, including excellence in research, academic freedom and an intellectually stimulating environment, internal self-governance by academics and stable and substantial funding.

look the importance of local dimensions, “there is a consensus on the worldwide higher education landscape and development in academia”. This is because “the level of academic research is an indicator of national power”. Hence, in his view, it is normal and reasonable that universities from strong countries would perform better in league tables. Based on this, he believed that:

Universities in Taiwan are able to do better in rankings because the island-state is not weak in knowledge production. Its universities are considered inferior to their counterparts in the West owing to the dominance of English and their low level of internationalisation. (Dean, Social Sciences, University B)

He hence noted that if HEIs in Taiwan could further internationalise themselves, their performance in the rankings would be much better, thereby reflecting Taiwan’s strength and competitiveness more precisely. This viewpoint substantially shows the importance of internationalisation in the transformation of higher education.

7.2.1.2 Using Rankings to Promote Internationalisation of Higher Education

The policies of climbing league tables and building a world-class university play an important role in enhancing Taiwan’s visibility in the global higher education market. Internationalisation has a strong link with the pursuit of a higher rank in global league tables because, on the one hand, the degree of internationalisation is a criterion used in THEWUR and QSWUR; on the other, the trend toward internationalisation means an active participation in the global academic community, therefore involving the pursuit of a validation of international stature (Lo 2009).

Therefore, in recent years, the island has attempted to extend its role in international education (CEPD 2000; 2005; 2009). In 2003, the Taiwanese government put the task of increasing the population of international students in its National Development Plan. In 2004, the MOE launched the Programme for Expanding Overseas Student Population, a subsidy scheme providing financial incentives for universities to encourage them to recruit more international students. The scheme’s target was to increase the number of foreign students admitted to degree programmes to 12,830 by 2011. The amount of the subsidies granted thus depends on the number and the status of international students. Generally speaking, the subsidies brought by students studying in degree programmes would be more than those brought by students admitted to exchange and Chinese language programmes (MOE 2007). In addition to subsidising universities, the MOE incorporated the number of international students as an indicator to assess public universities. For private institutions, the number of foreign students also affects the funds they obtain from the government, since the figure is taken as a consideration in the government’s review of its policies on private education.

Furthermore, the government also offers scholarships to attract international students. For instance, four governmental agencies, namely, the Ministry of Education, the Ministry of Foreign Affairs, the Ministry of Economic Affairs and the National

Science Council, jointly launched the Taiwan Scholarship Programme, which grants foreign students at both undergraduate and postgraduate levels with a monthly stipend of NT\$25,000–30,000. Meanwhile, the MOE has also provided scholarships to international students studying Mandarin in Taiwan since 2005 (MOE 2008). Moreover, many higher education institutions have established their international student offices to provide support to overseas students on various matters such as visa application and extension so as to formulate a friendly learning environment (MOE 2008). To promote Taiwan's education abroad, the MOE has also organised Higher Education Fairs in Vietnam, Thailand, Malaysia, Canada and the US since 2004 (Song and Tai 2007).

To cultivate a friendly learning environment that welcomes international students, the MOE also tries to internationalise the curriculum by promoting English as the medium of instruction. A number of universities such as National Taiwan University, National Chengchi University and Yuan Ze University are encouraged to offer English-taught courses. In 2005, around 115 courses at 30 colleges and universities at both undergraduate and postgraduate levels had foreign languages (mostly English) as the medium of instruction. At the same time, some institutions have started to provide twinning programmes in collaboration with overseas institutions from English-speaking countries, such as the US, the UK and Australia (Song and Tai 2007). With the government's initiatives, the number of foreign students has grown significantly in recent years. Before the launch of the programme, there were 7,331 foreigners studying in Taiwan in the 2002–03 academic year. The number grew to 19,376 in 2009–10, over a twofold increase. As shown in Fig. 7.3, there was a significant increase of international students in Taiwan over the course of a decade (MOE various years).

While these policy changes reflect the fact that Taiwan is trying to strengthen its international links with the global academic community and to advertise its higher education system globally, university ranking is considered to be a crucial factor fostering the trend toward internationalisation (Cantwell and Maldonado-Maldonado 2009; Lo 2009). A respondent rightly pointed out that internationalisation and rankings may mutually influence each other because good performance in rankings can help draw the attention of the overseas students and academics, and consequently may attract more international students and faculty staff to study and work in Taiwan's HEIs. In return, achieving a high degree of internationalisation is a way to climb some league tables, such as the THEWUR and QSWUR (Assistant Professor, Social Sciences, University B). Moreover, in the process of internationalisation, university ranking is useful to identify Taiwan's role in the global higher education system. As a respondent remarked, the "five-year-fifty-billion" programme and internationalisation are important policies that have caused Taiwan to become less isolated. He said:

Taiwan is not the best, but also not the worst. We are in the middle. Our students need to go to the West to learn the advanced technologies and ideas, and bring them back to Taiwan. Meanwhile, Taiwan can play a role of cultivating students from Southeast Asia... These students can learn useful techniques and knowledge from Taiwan to build their countries. At the same time, Taiwan's influence can increase in these places.
(Dean, Social Sciences, University D)

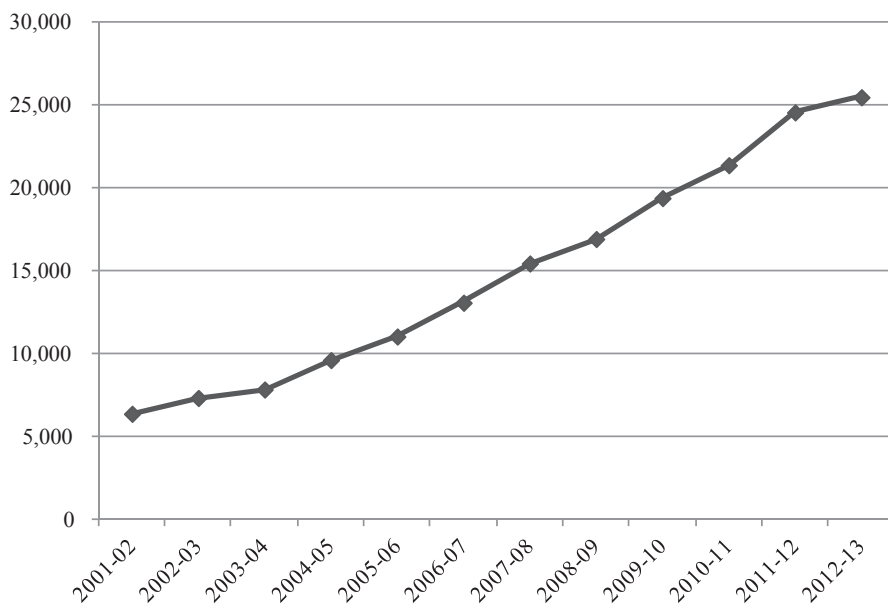


Fig. 7.3 The number of international students in Taiwan, 2001/02–2012/13. (Source: MOE various years)

7.2.1.3 The Narrative: World-class Worldwide

The policies and viewpoints above represent the view that Taiwan needs to participate in the global academic community more actively, by adopting the global standards and paradigms and using university ranking as a tool to govern its higher education system and pursue world-class status, because, as argued by Altbach (2007, p. 16), “involvement in world science means, in general, adherence to established research paradigms and themes”. He noted that it is not practical to “build an infrastructure that permits research on local or regional themes if a university wishes to join the ‘big leagues’”. He therefore stressed the importance of the global academic network in terms of facilitating worldwide exchange of personnel, technologies and knowledge. Mohrman et al. (2008) also advocated the promotion of a global vision among research universities. They proposed the Emerging Global Model (EGM) that allows these elite institutions and their staff and students to join the global competition actively. These EGM universities are characterised by several features that focus on promoting a high level of internationalisation (see Mohrman et al. 2008 for details). They suggested that:

These top universities look beyond the boundaries of the countries in which they are located to define their scope as trans-national in nature. Their peers span the globe... there may be only a few dozen fully developed EGM universities but they are the institutions that head virtually every list of leading universities worldwide (Mohrman et al. 2008, p. 6).

These perspectives reflect a logic that elite HEIs should be disembedded from their national systems, be assigned the role of global players and become a business which produces global public goods, because this perspective sees national interests laying mainly in obtaining intangible benefits through prestige-building. It is expected that global prestige will bring talents, knowledge and technologies in the long run, thereby enhancing the research capacity of the university sector as well as the industrial sector. This would in turn benefit the country in terms of enhancing its competitiveness in the knowledge economy (Marginson 2007; Mathews and Hu 2007; Palfreyman and Tapper 2009). Thus, despite the direct benefits brought by a world-class university being rather unobvious, different nations and territories, including Taiwan, are keen to build one or more.

To sum up, a suite of developments in higher education writes a story that stresses that higher education is important to national development, especially in the age of knowledge, and that to sustain their competitiveness the peripheral states need to be actively involved in the global academic community through establishing world-class universities and internationalising their HEIs. University ranking here is useful and essential in terms of navigating the way to achieve these goals. This narrative asserts that in the long run, developing countries would be able to establish their own world-class universities, thereby altering the conventional centre-periphery landscape of higher education and enabling them to compete with the core states. This narrative exactly fits the future mission of the university proposed by Scott. As he put it, “Today, rapid globalization and postmodern society point toward a future *internationalisation* mission for the university as a service to the body of worldwide nation-states” (Scott 2006, p. 33, emphasis in the original). All these arguments project a way toward a world of post-modernity, post-coloniality and multi-polarity.

7.2.2 *Closedness: The Dark Side*

7.2.2.1 **Questions about the Notions of Building World-class Universities and Internationalisation**

The arguments in the previous section are developed based on a belief that there is a “neutral” notion of the world-class university, which does not favour any specific higher education paradigm. Different authors focus on three major aspects in their definitions of a world-class university, namely talent, resources and governance (Altbach 2004; Niland 2000; 2007; Salmi and Liu 2011). They do not see a specific higher education paradigm in the “core nations” as a role model. However, as mentioned in the previous chapters, academic circles from the peripheral countries have heavily blamed the call for building world-class universities for the paradigm shift in higher education: the Anglo-American paradigm has dominated the discourse on the world-class university concept and the process of internationalisation, thereby resulting in the emergence of “a new dependence culture” (Deem et al. 2008).

In light of this analysis, global university rankings have become an institution upholding “hegemony” in the international order. The data suggested that these questions about the quest for building a world-class university on the basis of global university rankings are echoed by faculty members in Taiwan, despite the fact that, as reported earlier, several respondents agreed that ranking is useful to guide the development of Taiwan’s higher education system. Some respondents mentioned that being ranked high in league tables cannot truly reflect the notion of the world-class university. For example, a department head from University A remarked that:

Those indicators (used in rankings) have their meanings. But, they should not be considered equal to world-class status. There are reflections on this issue in our society. People, including officials from the MOE, might have different views toward ranking. They have to think about what the essence of education is.

(Head of Department, Social Sciences, University A)

He believed that “the essence of education is to provide opportunity for everyone to develop themselves”, rather than being the world’s best. In this regard, he noted that the purpose of good education is not only to conduct research and produce papers, but also to provide opportunities for different social classes in order to improve people’s lives. He further questioned the value and relevance of the world-class university to the development of Taiwanese society:

If so [focusing on doing research and producing publications only], the true basis of social concern will be lost. This is what I am worried about. If we look at Taiwan’s history, we know that Taiwan did not have a top university. But it could still develop from a poor society into a relatively well-off one. Based on this historical evidence, despite the fact that we are facing many challenges, we should question the importance of being the world’s top... Although Taiwan’s higher education system did not enter the world’s top 100, it had cultivated many talents for economic development. This fostered the economic growth of Taiwan in the post-war period. This fact leads to a question: What is the significance of building a world-class university for our society?

(Head of Department, Social Sciences, University A)

Several comments from the respondents about the quest for a world-class university also capture the importance of local vision and social accountability to higher education in the process of internationalisation:

A world-class university should be evaluated based on the contributions of its faculty members and alumni to national development. This is not only about technological or knowledge innovation, but also about how much of a contribution the institution and its people make to the nation and society. Such contributions can be about fostering changes in technology or the social system. If the impact on society can be reflected in university rankings such as the ARWU, then ranking should be much more influential. In this scenario, ranking is no longer merely about academic output. It may include alumni’s participation and influence in social movements, their contributions to economic planning and development, their participation in political reforms and democratic progress, their contributions to enterprise development and innovation and their contributions to the public, private and third sectors. All of these are related to national and social development.

(Dean, Social Sciences, University A)

I think a real world-class university is not based on the research performance of its faculty members, but on the students’ enjoyment of the teaching. If every teacher can teach seriously, the competence and competitiveness of the students will be good. They therefore can

find good jobs and perform well. They will then be recognised by society and employers. This will bring a good reputation to the university, and will likely help its performance in rankings as well... In addition to job performance, [a world-class university] needs to nurture the right moral values in the students, in order to tell them what appropriate behaviours are in society. In general, from my point of view, the essence is to teach the students to be good citizens. This is more important than being ranked in the world's top 100.
(Associate Professor, Management, University C)

World-class university status is determined by whether or not it can cultivate influential people who can contribute to society or as human beings... I think the contributions [of an institution] to its community or local economy should be considered when universities are ranked. When I was a student, National Taiwan University, followed by National Tsing Hua University, National Chiao Tung University and National Chengchi University, were the major institutions that had very good reputations in society. But in recent years, National Cheng Kung University has gained a good reputation as well because its graduates have done very well in society and are welcomed by employers. I think this reflects how reputation is relevant to the performance of a HEI.
(Assistant Professor, Natural Sciences, University C)

These views represent a confrontation with the phenomenon of phasing the local dimensions out (Lo 2009). This phenomenon in some ways reflects the fact that the trend toward internationalisation and output-oriented culture brought by university rankings can become a threat to the quality of teaching. However, for some, it also means a corruption of traditional scholarship and indigenous culture. In fact, some of the respondents expressed their concern over the declining role of elite universities in nation-building and national development (see Chap. 4). This leads to the challenge of how to balance the global and local dimensions in the global age that is faced by many societies, including Taiwan (see Jones 2008; Lo 2009; Marginson and Rhoades 2002 for possible solutions).

More importantly, these views also reflect a resistance to a dimension of globalisation in which “‘the global’ is conceptualised as external, universally transcendent, and beyond whereas ‘the local’ is understood as particular and subordinate to the global” (Cantwell and Maldonado-Maldonado 2009, p. 303). As opposed to the discourse on ranking in which the developing world is attracted by the image of the world-class university manifested in the Western discourse and therefore proactively pursues internationalisation and world-class university status, this view of ranking sees the nature of the global and the call for world-class status as oppressive and the developing countries as being in a passive position (Lo 2011).

7.2.2.2 The Positional Competition

Prestige building plays an essential part in the global competition of higher education. As mentioned in previous chapters, university prestige may have more influence over students' choice than the quality of the institution because higher education is in some ways a positional good (see Adnett and Davies 2002; Hirsch 1976; Hollis 1982). In this regard, it is important to consider the positional characteristics of higher education when discussing global hegemony in higher education.

According to Hirsch (1976), higher education is a producer of positional goods that provide access to social status and income earning. Moreover, such positional advantages are conferred only on some by denying them to others. This means that to a large extent the positional competition is a zero-sum game because “what winners win, losers lose” (Hirsch 1976, p. 52). The zero-sum nature of positional competition highlights the significance and usefulness of university ranking in promoting status and prestige in both national and institutional competition. As pointed out by Geiger:

Prestige ought to reflect quality, but far more is involved. As a function of consumer awareness, prestige is affected by the entire manner in which selective institutions market themselves and how they are treated in the media. Specifically, rankings advance their own definition of prestige, creating a “positional market”... The positional markers in this competition... are measures of selectivity, costs, or rank (Geiger 2004, p. 167–168).

In addition, there is a circular effect that leads to the reproduction of status and reputation in a positional market where:

Producer universities compete for the custom of preferred “customers”; students with the highest entry scores. Student “customers” compete for entry to preferred institutions. Prestige sustains high student scores, competition drives them higher, and scarcity reproduces the prestige of the elite universities (Marginson 2006, p. 5).

It is argued that the logic of positional good can be applied in international competition in higher education. Students from peripheral countries are attracted by the prestigious status of the education systems of the core states, because this status is considered to be scarce in their countries. Thus, for many international students, the value of study abroad is relative rather than absolute. The brain drain to the West then has in some ways caused the circular effect above. In this regard, the international competition in higher education is a zero-sum game. The emergence of global university ranking systems has also fostered positional competition between different higher education systems, thereby creating winners and losers. According to this view, the global North–South inequalities, as argued by Badat (2010), are reinforced by global ranking systems. Consequently, the global South is the loser in this positional competition, as the gold standard promoted by these ranking systems has driven the public scrutiny of HEIs to a particular direction. This results in the North Atlantic domination, which has led to the rise of Americocentrism and Eurocentrism within non-English speaking contexts (Keim 2010).

Following this logic of positional competition, the pursuit of a leading role in global educational discourse is important for developing countries to change their inferior position in the global higher education system. As observed by Robertson (2010), enabling Europe to play a more advanced role in global higher education through promoting a European normative framework and normative power is one of the major goals of Europeanisation, thereby counterbalancing its alternative, the US norm. In this sense, the Taiwanese use of university rankings can be understood as a way of institutionalising Taiwan’s discursive power, thereby competing for normative leadership in the academic world. We might read this process of institutionalisation of discourse as a counter-hegemonic practice against Western hegemony. Nevertheless, “the end of the Western hegemony in higher educa-

tion may not mean the end of dominance, but the emergence of a new hegemony” (Lo 2011, p. 218–219). This is particularly true if we take the positional character of educational goods into consideration. The one important question which then remains is whether the counter-hegemonic perspective on global rankings can guide us to achieve a more equal and diverse academic world.

7.2.2.3 The Narrative: Global Hegemony

Undoubtedly, globalisation has had a significant influence on higher education worldwide. The bright side above looks at the opportunities for facilitating active participation of academics, students and HEIs in the global academic community through intensified cross-border activities. The dark side, however, focuses on the hegemonic nature of these global practices and standards. With regard to league tables, it is argued that world university ranking is a form of imperialism and plays a role in institutionalising and enacting these global models (Deem et al. 2008; Teichler 2011).

By using Gramsci’s concept of hegemony, Marginson (2008) noted that there is a global hegemony in global higher education. The concept of the new imperialism further illustrates the attributes of hegemony in higher education. “Empire” in the post-colonial era refers to “the ways that economic power flows across and through continuous space, towards or away from territorial entities (such as states or regional power blocks)” (Harvey 2003, p. 26). In the context of proliferating neo-liberal ideology and its policy adaptations, the “form of power is associated with the actions and interests of transnational corporations (TNCs), the workings of global financial markets, the development of new forms of production based on new technologies and the globalisation of the labour market” (Tikly 2004, p. 174).

This transnational characteristic of new imperialism distinguishes it from classical colonialism characterised by country-to-country occupation. On the one hand, the term new imperialism reflects the continuing legacy of European imperialism and colonialism in the global age. Though the political and cultural predominance of the West is now exercised in a rather circuitous way, the new world order is premised on Western hegemony (Tikly 2004). This characteristic of deterritorialisation makes the two terms, global and Western, equivalent in the global context. On the other hand, the concept vividly addresses the changing role of the nation-state in a post-national geography (Appadurai 1996; 2003). As Tikly specified (2004, p. 176), “dominant global economic interests are to a lesser extent identified with nation states, or even with elites within nation states, but are increasingly transnational in their composition”. This analysis illustrates that the domination of the global or the West in the global age is based on discursive terrain instead of territorial terrain.

The increased importance of publishing in English is empirical evidence for supporting this argument of emerging Western hegemony in the form of discursive terrain because, as reiterated in this book, “Asian social science scholars are motivated to publish in the English language, to communicate with a wider audience and to build strong publication records for internal evaluation or to improve university standings in the rankings” (Ishikawa 2009, p. 170). However, as argued by van Raan (2010, p. 237), national orientation arguably plays a more important role than

international orientation in social sciences because the meaning of citations in social sciences may be different to that in medical and natural science, given the fact that publication practices in social sciences are less standardised. In this regard, international peer-reviewed journals can be less important in some disciplines of social sciences. The structure of the written scholarly communication does not necessarily appear in a core-periphery pattern. Multilingual journals are more common as English is not always a dominant language. Kratoska (2007) expressed the same view on the issue in his essay on the expansion of Asian tertiary education during the post-war period. He noted that there is a correlation between the rapid growth of Asian higher education and the increase in the quantity of academic material published in Asian languages. In his view, this represents the fact that “Asian languages and first-hand knowledge of local societies became an essential feature of research” and that “social science research on Asia shifted from the activities of the West in Asia to the activities of the people of Asia” (Kratoska 2007, p. 6). Therefore, the pressure to publish in English caused by the prevalence of global university rankings would probably smother the nascent scholarship in non-Western, especially developing, societies (Ishikawa 2009; Kratoska 2007).

In the case of Taiwan, as shown in the quotes above and in previous chapters, many of the Taiwanese academics interviewed expressed similar concerns. As pointed out by Ku (2005), social studies should remain open to the society so as to uphold public accountability. Yet, using research outputs in English journals as the core indicators of research productivity has narrowed the vision of social scientists. They hence prevent the acceptance of new ideas and become less critical. Consequently, the connection between social science research and Taiwanese society as well as the openness and publicness of social sciences in Taiwan have been undermined (Ku 2005; Lin 2013).

In a deeper sense, it is argued that the discourse about development is a means of promoting Western hegemony in the post-colonial, global age. Tikly’s (2004) analysis is instructive for understanding the forms of hegemony in post-independence settings. He used the rationalities and programmes of the World Bank as an example to illustrate that the West is extending its control and dominance through the translational governance framework of development agencies. Using Foucault’s concept of governmentality, he argued that the nature of Western hegemony has disciplinary rather than political rationales (also see Cantwell and Maldonado-Maldonado 2009). More importantly, Tikly reviewed the key organizing concepts in relation to development, and pointed out that the terms and ideas about development are principally Western-based (also see Rist 1997; Tucker 1999). His analysis shows the discursive basis of the new imperialism, on which the West is able to forcefully influence or even control other nations and societies through defining “developed” and “underdeveloped”, and through classifying places as developed or underdeveloped ones. In such a development discourse, becoming more developed means becoming more Westernised. According to Tikly:

“development” is ... a central organising principle of the entire Western *episteme* including the discourses of anti-colonial activists who have, given the hegemonic nature of the development discourse, largely been obliged to struggle within its discursive boundaries...

whereas development had in the past been a “natural” phenomenon, in the new hegemonic worldview, development took on a transitive meaning, that is, it became something that could be performed by one actor or region over another actor or region (Tikly 2004, p. 181, emphasis in the original).

As a consequence, the non-West is controlled by the discipline of development, and therefore by the West.

This argument challenges the foundation of the bright side, that is, the facilitating and nurturing role of higher education in national development. From the anti-colonial perspective, the bright side of global university rankings is still hegemonic and imperial in nature. Although it might guide the non-West to depart from the old forms of European colonialism, it has brought the new imperialism that consolidates the inequality between developed and underdeveloped manifested in the Western discourse. This is the dark side of university rankings.

7.3 Conclusion

Inclusive as it was within, Rome drew its potent unity also from Othering the barbarian outside. There is no Outside in a world society. We have reached the planet’s edge. Moreover, inside its perimeter, Rome’s dominance of mental and social forms was complete. Plural as it was, there was only one civilization in the Empire. That is not the world we now inhabit (Murphy et al. 2010, p. 242).

On the one hand, this illustrates the foundation of the dark side above; on the other, makes a standpoint against it. From this perspective, any dichotomous approach to understanding world society is fundamentally colonial and imperial in nature, no matter what pair of terms such as *superior* and *inferior*, *core* and *periphery*, or *developed* and *developing/underdeveloped* are used in the discourse.

There is no doubt that global university rankings provide practical ways to reform or even transform the higher education sector of the non-West. Nevertheless, “Interpretations of Rome differ according to where one sits” (Murphy et al. 2010, p. 242). The openness to outsiders (or being included in the Empire), for some, is a move toward a better future. While we appreciate the borderless opportunity brought by globalisation, we might want to query the basis of cosmopolitan identification and globally oriented subjectivity (Matthews and Sidhu 2005). In other words, before we embrace the development discourse embedded in the bright side, we might need to ask whether it is a non-biased, undistorted version of development or it is just a way of bringing the Outside in.

This highlights the relevance and importance of rethinking the self and rebuilding a critical subjectivity (see Chap. 6). We use Taiwan as a reference point here since the university sector in the island-state has been significantly influenced by the debate and discussion on world-class status. It is believed that this challenge appears in many other middle/high-income, non-Western countries where universities have subscribed to the world-class university paradigm.

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Chapter 8

Conclusion

8.1 Implications of the Ranking Phenomenon

University rankings have become a focus in the study of higher education among practitioners, policy makers and scholars since the prevalence of global league tables in the mid 2000s. Given the fact that it is a relatively new academic research topic, this book uses Taiwan as a case for examining the implications of the emergence of global ranking systems for higher education sectors in East Asia in general and in the island in particular. This book is thus aimed at providing a systematic and detailed description of the implications of the ranking phenomenon for Taiwan's higher education system. Three objectives were set out at the outset: how university rankings have had an impact on Taiwan's higher education system, how the prevalence of university rankings influence Taiwan's position in the global higher education landscape and how the ranking phenomenon can be read and explained through theoretical lenses.

We have reviewed a plethora of evidence relating to the ranking phenomenon and its implications for Taiwan's higher education system. The data presented in the preceding chapters situates the three research questions in the context of both ecology and geography of higher education. From an ecological perspective, we have learnt that while university rankings have had an effect on government policies as well as organisational and individual behaviours in the Taiwanese higher education sector, the extent of these ranking effects on policies and behaviours are in some ways determined by the academic hierarchy, which is a prestige structure. From a geographical perspective, we have recognised that global university rankings are related to national competitiveness and higher education development in the world of globalisation. We are aware of the opportunities brought by university rankings and the imposition of imperialism through ranking exercises. Listed below (Table 8.1) is an index of the four dimensions and corresponding issues discussed in the preceding chapters. To exemplify the finding of this four-dimensional analysis of university rankings, it is useful to see the four dimensions as making up two clusters in which the two ecological dimensions (Dimensions 1 and 2) are on one side and the two geographical dimensions (Dimensions 3 and 4) are on the other.

Table 8.1 Index of dimensions and corresponding issues

	Technological	Conceptual
<i>Ecological</i>	Dimension 1	Dimension 2
	Responses at:	Seen in terms of a faculty
	Policy level	Member's degree of acceptance:
	Organisational level	"love"—embrace
	Individual level	"hate"—resistance
<i>Geographical</i>	Dimension 3	Dimension 4
	Using rankings as:	Seen in terms of implications for global higher education:
	A governance tool	Openness—diversity
	A zoning technology	closedness—homogeneity
	A mechanism of agenda setting	

8.1.1 Ecological Implications: Power and Politics in University Governance

Dimension 1 mainly corresponded to the first research question asked in Chap. 1: "What are the effects of university rankings on Taiwan's higher education system?" Hence, this dimension is concerned with how university rankings have influenced stakeholders in the higher education sector of Taiwan at policy, organisational and individual levels. In regard to systemic responses, we have seen that financial resources are concentrated on twelve universities through the launch of the "five-year-fifty-billion" programme. In fact, the Taiwanese government clearly stated its goal of building world-class universities through promoting research excellence and internationalisation in the selected universities. Its aim for this programme was to have at least one Taiwanese university join the world's top 100. From the government perspective, this policy of building skyscrapers is an effective way of enhancing the prestige as well as the overall quality of the higher education system. Nevertheless, the policy has also resulted in a steep stratification and differentiation in Taiwan's higher education system. The data suggests that the prevalence of the ranking phenomenon in Taiwan has bred a research- and output-oriented culture that has substantially intensified competition among HEIs. Most of the respondents believed that this is a zero-sum game that causes unhealthy competition and inequality in higher education. In fact, in the climate of competition, some respondents reported that their teaching duties have been significantly affected. This "academic drift" (Zhao 2007) was considered as an unintended but harmful impact of university rankings.

Nevertheless, in light of Bourdieu's work, it was also argued that the hierarchical structure of the higher education system is a determining factor affecting the degree of penetration of normative power. Indeed, the third research question, "How can the ranking phenomenon be theoretically framed?" formulates Dimension 2, which conceptualises university rankings as a form of normative power in higher education in light of Foucault's conception of discipline. Based on this conceptualisation, the significance of the impact of league tables on Taiwan's higher education system

is interpreted as the extent of the normative power of rankings. Thus, the findings from fieldwork revealed that faculty members' attitudes toward university rankings largely depended on their positions and the positioning of their affiliations in the academic hierarchy. To be specific, young faculty members from prestigious universities were keener to embrace the competitive game imposed by rankings, while senior faculty members, especially those from non-prestigious universities, tended to show stronger resistance to the ranking movement. This analytical approach to university rankings clearly demonstrated the connection between ranking systems and power relations in higher education. It illustrated the ubiquitous but uneven capillary effect of the normative power of ranking in Taiwan's stratified and differentiated higher education system.

8.1.2 Geographical Implications: Navigating the Global Higher Education Landscape

Dimension 3 attempted to answer the second research question, "How does the emergence of rankings influence Taiwan's position in the global higher education landscape?" It intended to explain how global university rankings are understood as a mechanism holding Taiwan's interests within the context of the emergence of an international higher education market and the prospect of regionalisation in East Asia. To illustrate Taiwan's interests in university ranking systems, it was argued that league tables can be used to promote Taiwan's interests in three ways. Firstly, it pointed out that university rankings have been taken by the Taiwanese government as a metric system to indicate standards for universities, thereby reflecting their distance from world-class university status. In this sense, rankings are used as a governing tool to align the architecture of Taiwan's higher education system, thereby advancing its competitiveness. Secondly, university rankings are seen as a zoning technology promoting the growing trends toward the regionalisation of higher education in East Asia. Thirdly, university rankings are considered as a mechanism of agenda-setting, promoting the discourses of Chineseness in global higher education. These two anticipations are developed based on the context of China's rise and the emergence of the idea of Greater China in higher education (see Neubauer 2010). These anticipations are involved in Taiwan's interests, as it is possible for the Taiwanese higher education sector to extend its influence in this process of regionalisation.

Dimension 4 then continued to explore how the ranking phenomenon at the international level can be theoretically framed. Therefore, this dimension looked into power relations in global higher education. By using Nye's classification of power, rankings are conceptualised as a type of institution in the geopolitics of higher education. This conceptualisation illustrated the theoretical link between the notion of a world-class university and ranking systems (cf. Sadlak and Liu 2007). On this basis, it was argued that rankings have two distinct sides generating opposite effects on the global landscape of higher education. The bright side of rankings stressed the

motivations for internationalising higher education and pursuing research excellence imposed by rankings. It presumed that the concept of a world-class university did not favour any specific higher education paradigm, and hence viewed the ranking movement as an opportunity of promoting world-class excellence in higher education. In contrast, the dark side of rankings revealed that the Anglo-American paradigm has dominated the discourse on the notion of a world-class university. Thus, the prevalence of global university rankings means the predominance of the West in higher education. In the light of Gramsci's work, global university rankings are interpreted as an institutionalised form of global hegemony or imperialism in higher education in the post-colonial era.

8.2 Theoretical Reflections: From Tool to Power

The primary purpose of this study is to reveal the connection between technology and power. In fact, during the time of writing this book, I have seen that this approach has been an emerging direction in research on university rankings. While some authors attempted to use sociological approaches to deconstruct the normative power of rankings (for example Bastedo and Bowman 2010, 2011; Bowman and Bastedo 2009, 2011; Espeland and Sauder 2007; Sauder and Espeland 2009), those from the field of international education studies stressed the influence of international rankings on the global higher education landscape from a perspective of the geopolitics of higher education (for example Deem et al. 2009; Deem et al. 2008; Ishikawa 2009; Kehm and Stensaker 2009; Lo 2011; Marginson 2009a, b). On this basis, this book theorised university rankings so as to explore their effects on higher education and developed a four-dimensional framework to examine the ranking phenomenon in Taiwan. The following parts return to the two clusters of dimensions outlined in the previous section to illustrate the theoretical value of this four-dimensional framework of the ranking phenomenon.

With regard to Dimensions 1 and 2, the distinction between structuralism and post-structuralism is a reference point to indicate the difference between the two dimensions in terms of their theoretical approaches. As structuralism views the truth as the articulation of system with event, structuralists claim that there are deep structures of languages which allow people to attach ultimate meanings to words (Rust 1991). Therefore, for structuralists, understanding social phenomena is a matter of capturing the synchronic view of the system by rightly addressing the relevant events within a particular period (Sturrock 2003). This structuralist claim justifies an archaeological mode of analysis. In Foucault's words, this archaeological approach is "the intrinsic description of the monument" that focuses on describing the "general system of the formation and the transformation of the statements" (cited in Dean 1994, p. 16).

This structuralist account demonstrates the positivist approach taken by studies of Dimension 1 that views university rankings as a variable formatting and transforming the rules and discourse under which higher education stakeholders and

HEIs are implicated. In fact, as specified in Foucault's notion of discourse, discourses or discursive practices, which are understood to be fundamentally self-referential, are the powers that are crucial in determining human behaviours. Knowledge, which refers to the power to define the terms of debate or the way a problem is to be understood, is therefore the key (Watson 2000, p. 70–71). Thus, in light of the structuralist approach, the emergence of university ranking can be seen as the formation of a discursive practice, and the related debates can be considered as the competition between approaches to transforming the statements. From this perspective, the intrinsic nature of power/knowledge projects a way of looking at league tables in which the ranking exercise is considered as a “top-down” design of power that influences people and institutions in higher education.

It is suggested that the conceptual dimension of the ranking phenomenon (Dimension 2) provides a post-structural approach to the understanding of university rankings. The point here is to take the post-structuralists' query about the basic assumption in structuralism, i.e. the systematic interconnections within language formed by stable relationships between its units (Hughes and Sharrock 2007). As Rust (1991, p. 611) pointed out, post-structuralism emphasises “the contingency of meaning and the slipperiness of language”. This assumption of variable relationships between units of language implies that language, power and knowledge rely on extrinsic factors to lead to a systematic completion. The philosophical implication of this account of post-structuralism is that the positivist approach which explores a definitive theoretical representation of reality is fundamentally flawed. For post-structuralists, this is an important theoretical standpoint against positivism. Furthermore, this demonstrates a different way of reading and presenting truth. From the Foucauldian perspective, this represents a shift from archaeology to genealogy (Ninnes and Burnett 2003; Watson 2000).

Foucault's notion of disciplinary power is useful for explaining the distinction between structuralist and post-structuralist methods. He used surveillance to explain that human behaviours can be controlled and regulated without using force. As he explained, automatic responses to stimuli are created and reproduced without awareness if there is sufficient repetition (Foucault 1977). Based on this notion of disciplinary power, truth can be thought of as the cumulative effect of one group of items against another group (Prado 1995). Prado (1995) called this understanding of truth “power-constructed truth”. Facts therefore are viewed as a sort of experience produced by power, in contrast with “discourse-relative truth”, which projects the structuralist assumption in which there is no fact to be articulated but only interpretation. This experiential notion of truth provides another way of capturing “the truth”. Instead of exploring a chain of demonstrative reasoning, experiential truth focuses on the pattern and process in which things come together. In the light of this, the purpose of studying university rankings is to illustrate how organisational culture and individual behaviours in universities are transformed by incorporating and weighing the effects of university rankings. Therefore, the investigation in Dimension 2 is to reconstruct the views and experiences of the stakeholders of higher education with special reference to their power relations with university rankings.

As for Dimensions 3 and 4, while the geographical account of ranking and higher education transformation primarily aims to examine the relevance of dependency and world-systems theory (Hayhoe 2000), this aspect of analyses is also closely linked to the debate between modernity and post-modernity. One of the major tensions between modernism and post-modernism lies in the perspectives on understanding the changes brought by globalisation. Indeed, the past three decades have witnessed fundamental changes in which nation-states have profoundly altered both their internal structures and their external strategies in order to thrive or just survive in a new, highly competitive world order (Mouzelis 2008). From the post-modern perspective, these changes mean that modern society was built on Eurocentric conceptions and features and has now been replaced by a post-modern one, in which “the belief systems and the collective certainties of early modernity have evaporated” (Mouzelis 2008, p. 1). However, for some social theorists, “the post-modern does not simply replace the modern, but rather performs a continual rereading and critique of modern values and projects” (Malpas 2005, p. 44). This argument considers that the post-modern is not distinct from modern. Instead, “there are strong continuities between the old and the new” and “the logic of modernity has not been interrupted or transcended, it has merely been accelerated” (Mouzelis 2008, p. 1–2). They therefore believed that the present-day world is in the late-modern period rather than the post-modern (Cowen 1996; Malpas 2005; Mouzelis 2008).

The debate between modernity and post-modernity provides a reference point to illustrate the focus of discussion in Dimension 3. In the light of both the modern and post-modern agendas, the bright side can be seen as a way of leading global higher education into a post-Eurocentric world where international development lies on the specification of difference (Cowen 1996), and the dark side of ranking as a form of neo-colonialism and an instance of neo-imperialism being considered a force pulling global higher education back into a Eurocentric framework in which development is guided by the principles of generalisation and of universal facts and values (Altbach and Kelly 1984; Tikly 2001, 2004).¹

This theoretical approach has led this study to a methodological framework in which nations are the primary unit of analysis because global university rankings, in this aspect of analysis, are taken as the technology to be used to preserve or break the features and forms of the Eurocentric conception, and nations to a large extent still play a determining role in developing the infrastructure and initiatives of higher education (Green 2007). As pointed out by Cowen (1996), old structures can be assigned to perform in new ways, while new structures can also work in old ways. This is largely determined by nations themselves. In this sense, the focus of the analysis in Dimension 3 is on the description of educational structure with

¹ This analytical approach in dealing with the bright and dark sides of university rankings is based on a dichotomy between modernity and post-modernity, in which modernisation largely projects Westernisation and post-modernity stands for a de-Eurocentric perspective. Yet, for Mouzelis (2008), modernity does not equal Westernisation, and therefore structural features initiated in Europe can be still relevant in the post-Eurocentric era.

special reference to the role of the state in the transition between modernity and post-modernity.

Dimension 4 then extends the post-modern analysis from a structural one to that of consciousness and identity. For some social theorists, post-modern thought is inclusive of post-colonialism and other relevant concepts, such as neo-imperialism (see Hughes and Sharrock 2007; Nannes and Burnett 2003 for example). Welch (2003, 2007), however, argued that there are significant differences between post-modern and post colonial discourse. As he explained, post-colonial discourse has a strong ethical stance that rejects the ignorance of colonial structures and ideologies in the measurement and analysis of social development. From his viewpoint, this ethical stance distinguishes post-colonialism “rather sharply from many of the more modish, contemporary forms of post-modern discourse, that often celebrate an undifferentiated culture of sign and symbol, a semiotic of free-floating signifiers” (Welch 2003, p. 305).

This clarification of the distinction between postmodern and post-colonial discourses illustrates the connection between the study of the technological dimension of ranking and that of the conceptual dimension of ranking in the geographical aspect. While the former commences with a value-free assumption that nations, including those in peripheries, are free to react to externally generated requirements (here, global university rankings), the latter begins with an assumption in which peripheral nations are viewed as followers of core nations. This neo-colonial conception is important because it underlines the fact that the new world order is premised on Western hegemony. Furthermore, according to the idea of post-national geography, the political and cultural predominance of Western societies is upheld in indirect forms featured by transnational components (Appadurai 1996, 2003). This account of neo-colonialism not only implies a process of theoretical shift in which territorial terrain is replaced by discursive terrain (Tikly 2004), but also methodologically projects a positional perspective from which “the specification of the position of minorities within the modernity project that needed reordering to stress emancipation” (Cowen 1996, p. 154). Cowen (1996) used the term “emancipatory project” to describe this methodological approach, in which the primary unit of analysis shifts from nations to the features of global flow and the formation of consciousness and identity (cf. Dale 2006).

Nevertheless, as Dale (2006) argues, it is quite impossible to shake off nationalist and statist assumptions in conducting system-wide analysis. Indeed, national sovereignty over education is still effective in disguising the forms and locations of “power” over education in globalisation. In this regard, though discussion in Dimension 4 is primarily concerned with the specification of the forms and contents and styles of positional cultural identity, it views positional cultural identity as being created by both local structures and global flows.

8.3 Methodological Reflections: The Perceptions of the Changing Academic Field

In this book, I used the methods of qualitative research to study my reflective awareness of the ranking phenomenon in the Taiwanese academic system. In this regard, the focus of this book is on providing a reflective investigation on university rankings or tools of evaluation in general within the Taiwanese context rather than offering a detailed assessment of the impacts of university rankings on Taiwan's higher education sector.

The reflective stance of the qualitative approaches to understanding the ranking movement in this study is that the ranking phenomenon occurs in the field in which I was in some ways an agent (Packer 2011; also see Bourdieu 1988). Because I did not work or study in the Taiwanese higher education system, I did not see that there was a distinctive gap between my primary social field and the Taiwanese one. This probably is because I am from Hong Kong, a Chinese society which shares many common social foundations with the Taiwanese society. More importantly, I viewed academic systems in East Asia as a collectivity of peripheries, in which the Taiwanese system is an instance. In this sense, I considered the ranking movement as a transnational phenomenon impacting most academic systems in East Asia and directing these peripheral nations towards the standards of the centres. I sought to investigate university rankings' influence on how people, institutions and systems compete for better positions and acquire reputational status.

The reflective nature of the methodological approach is important, as it rescues this observational work from "the pitfalls of mere description" (Silverman 2011, p. 5). The reflective nature classifies this book as an examination of how ranking plays a role in changing the power relations in higher education at different levels of competition. This methodological approach is strong in terms of offering a theoretical understanding of the ranking phenomenon by revealing that the ranking phenomenon is attached to the academic game in which participants in the field must struggle for position and prestige, despite the fact that they are not equal in terms of status and power (Altbach 1987; Bourdieu 1988). Based on this, the backgrounds, views, perceptions, practices, satisfactions and anxieties of the respondents are seen as a narrative account of some subjective experiences of the participants in the academic game (Miller and Glasser 2011). From the positivistic perspective, the sampling methods used and the qualitative data collected in the fieldwork for this study may not fulfil the requirements of scientific objectivity. However, they are still useful and essential in terms of producing an authentic account of the ranking phenomenon, despite the fact that some of the interviewees' responses were rather expected. Indeed, as Charmaz (1995, p. 54) noted:

We start with the experiencing person and try to share his or her subjective view. Our task is objective in the sense that we try to describe it with depth and detail. In doing so, we try to present the person's view fairly and to portray it as consistent with his or her meanings.

From this perspective, my task in the data analysis is to combine these authentic accounts of subjective experience with the concepts related as well as the contexts

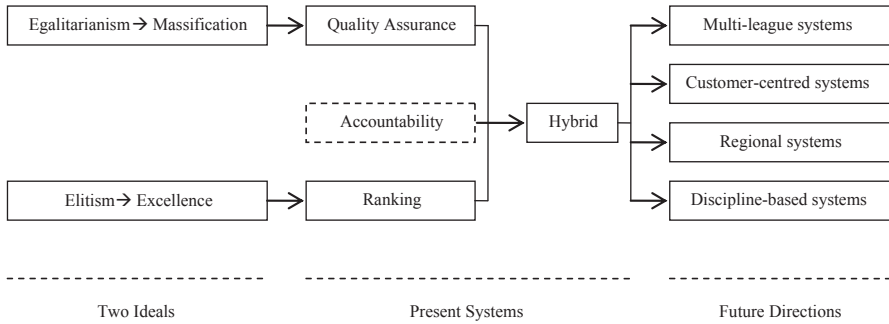


Fig. 8.1 Future directions for university rankings. (Source: Shin and Toutkoushian (2011, p. 14))

and situations in which the experience emerged in order to provide theoretical understandings and contextual specifications of the ranking phenomenon (Miller and Glasser 2011). In short, this book illuminates the ranking phenomenon within the Taiwanese context with the goal of providing a reflective stance on competition in academic circles.

8.4 The Future of University Rankings and Broad Policy Implications

After reviewing the many positive and negative effects of rankings on higher education, commentators have started to think about the future of university rankings. Usher, for example, advocated a new way of comparing institutions, which he called “University Ranking 2.0” (Usher 2008, 2009). In his view, we should be aware of the positive effects of enhancing transparency brought by rankings. This is particularly important for students, as they need effective and efficient information tools to ensure that they gain an educational experience that meets their primary interests in a market-driven higher education system. However, we also need to be sensitive to the tendency of homogenisation imposed by rankings, which is seen as a negative effect on higher education. In fact, as reported in previous chapters, Taiwan has terminated the research-oriented PRSPWU and established the personalised CNT (Hou 2009). These developments can be seen as corrections to the homogenising practices adopted. To find a balance, we need a way that, on the one hand, allows customers to select indicators and apply different weightings based on their preferences, and, on the other hand, allows higher education systems and HEIs to retain their uniqueness. According to Shin and Toutkoushian (2011), this balance can be made through developing rankings towards four directions: multidimensional, customer-centred, regional and discipline-based (Fig. 8.1). This prospect is based on a principle that “the real value of ‘ranking’ is not ranking, but matching” (van der Wende and Westerheijden 2009, p. 78). Therefore, there is a goal of toning down the

competitive elements and underlining the collaborative ones in ranking exercises in such a prospect. The “U-Multirank” project funded by the European Commission was developed based on this mission as an attempt to test the feasibility of a multi-dimensional global university ranking (CHERPA-Network 2010a, b).

The concerns about diversity in higher education have been well addressed by rankers (Baty 2013; Liu 2013; Sowter 2013). Therefore, continuing to observe and examine the development of rankings (i. e. whether there is a trend toward multipolarity in various levels and aspects and how that trend manifests itself) should be an important direction for future research in this arena. Along the line of investigation set in this book, the hope of diversity and fear of homogeneity would be focuses of investigation. This scenario essentially involves the politics of higher education, in which various stakeholders will continue to struggle with each other for defining the primary mission of higher education and productivity of faculty and HEIs (Shin and Toutkoushian 2011). Here national policy plays a key role in determining whether university rankings will reinforce the inequality described in Chap. 4, or will become an equalizer that sustains a diverse portfolio containing both globally and regionally focused institutions, thereby promoting a system-wide vision of pursuing excellence (Hazelkorn 2013).

Apart from the possible directions rankings may take in the future, the geographical dimensions of the ranking phenomenon remind us that we are witnessing a transformation of the global higher education landscape. Indeed, we have been experiencing the impact of globalisation on higher education in the last few decades. During this process, we have seen that the notions of research excellence, quality assurance, internationalisation and world-class university have entered the discourse in both academic and non-academic circles, and gradually dominated our understanding of quality in higher education. As argued in this book, the prevalence of global league systems represents a process of institutionalisation of this global trend and the many related transformations. In this sense, the criticisms and resistance to global rankings, especially those viewing league tables as a form of post-colonialism or imperialism, are a kind of reflection on pressures for development. As discussed in Chap. 7, the foundation for this understanding of rankings is a belief in a predominant Western discourse on the concept of “development” (Tikly 2001, 2004).

This conceptual context points to a direction for future research in which researchers need to explore possible alternative models of higher education. Indeed, globalisation and its associated impact on higher education have brought the intensification of competition among higher education systems. To respond to this global trend, there is an emerging trend of regionalisation of higher education in Asia. This trend is important because it does not continue and intensify collaborations and partnership within the existing policy framework only, but also initiates the possibility of regional integration in the arena of higher education in the form of regulatory regionalism (Mok 2012). While Taiwan has been well aware of the importance of responding to global trends, it needs to pay attention to the challenges and opportunities in the process of regionalisation and Taiwan’s positioning strategy, especially in the postindustrial and post-massification contexts (Wang 2009).

Lastly, the process of higher education regionalisation will further change the global landscape of higher education, and hence that the regional dimension of higher education in the context of the rise of Asia is becoming increasingly important. It is thus essential to explore the conceptual framework underpinning the notion of regionalisation within the Asian context. In this regard, the possibility and feasibility of developing East Asia or Greater China as a “region” in global higher education (Hawkins et al. 2012), the role and function of university rankings in this process (Lo 2011, in press), as well as the implications of such a process for higher education policy, university governance and behaviours of higher education stakeholders are important topics for future research on international higher education.

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Appendix I

Interview Protocol

This interview is about the implications of global university rankings for Taiwan's universities and for your own university. The researcher wants to know how global university rankings affect academic life in Taiwan. In this interview, the questions focus on your understanding of university rankings, issues related to university rankings and ways to respond to the emergence of university rankings. The researcher also looks at the concepts of accountability, transparency, competition, commercialisation and world-class university in relation to the emergence of global university rankings.

Background information

1. Do you currently occupy management position?
2. When was your first academic appointment?
3. How long have you been employed at your university?
4. Have you worked in other university in Taiwan?
5. Have you worked in a university overseas?

Your understanding of university rankings

6. University rankings have been highlighted in the media and by some academics. Could you name any ranking system that you have heard?
7. How important are university rankings?
8. In regard to the impact of rankings on higher education, what is the extent of change over the last five years?
9. Which of the following indicators are usually used to compare universities in the ranking system(s) you know?
 - The research performance of institutions
 - The teaching performance of institutions

- The performance of students and alumni
- The performance of academic staff
- The reputation of institutions
- The size of institutions
- The internationalisation level of institutions
- The finance of institutions

10. Which indicators do you think most important?
11. Would you say that the ranking system(s) you know is a fair mechanism to reflect the performance of your own university? If not, why not?
12. What about universities in Taiwan in general?

Issues related to university rankings

13. “Ranking provides useful information to the stakeholders (e.g. students and funders)”. Do you agree?
14. Do you think that rankings are accessible to all stakeholders?
15. How do they use the information?
16. Do different categories of stakeholders use the information in different ways?
17. Do you think that the stakeholders can interpret the data correctly? Is this a case of cognitive dissonance?
18. Do you think ranking has influenced any of these practices:
 - Accountability (has it increased?)
 - Transparency (has it increased?)
 - Competition (has it increased?)
 - Commercialisation (has it increased?)
19. There are criticisms that many ranking exercises are far from systemic and scientific. Do you agree with these criticisms?
20. Who would benefit from what sorts of ranking system?
21. University rankings are related to the call for building world-class university in East Asia. What does world-class university mean to you?
22. Do you think that the world’s top 100 places mean world-class excellence?
23. What is the benefit of achieving world-class excellence?
24. There is an argument that criteria used in leading university rankings show favour to universities from English speaking countries (e.g. the US and the UK). Do you agree with this argument?
25. Is there any impact of these criteria on your daily work (e.g. teaching and research) and on the development of your own university (and/or Taiwan’s universities)?
26. Do you think teaching has been overshadowed by research? Does this phenomenon affect your university? How does it affect your university?

Responses to university rankings

27. How concerned are you or your university with the performance of your university in the league table(s) you named?
28. In what ways have you university or Taiwan’s universities tried to improve their performance in the ranking(s)? Any success?

29. Role differentiation and funding concentration are common practices adopted by governments to build research-intensive universities; to improve the performance of selected universities in global rankings. Do you think the Taiwan government adopts such a policy? How does this policy affect your university?
30. If so, do you see it as facilitative the enhancement of the overall quality of Taiwan's higher education?
31. Do you have any other comments about university rankings and their impacts on your university or on Taiwan's universities in general?

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