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# Major Policies to Enhance the Competitive Strength of Korean Higher Education

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Indisputably, higher education institutions are the very places where new knowledge required by the 21<sup>st</sup> century is created. The Korean Government, having early recognized higher education as a major building block for national development, has been taking continuous steps to raise competitiveness in the sector. This comes in line with the recent growth of demands for higher education institutions to match their quantitative developments with qualitative improvement, so as to better meet the challenges of today's globalized knowledge-based era and the practical needs of students, parents and industries. In response, new Korean Government, launched in early 2008, has laid out innovative schemes to ease or abolish regulations so that higher education institutions may secure expanded autonomy in administration. Tailored government subsidy plans for students and institutions are also in place to boost their competence and equip them with the capacity to effectively address new changes. In addition, higher education institutions are being encouraged and supported to take up a stronger national role in human resources development and R&D.

The current Korean Government's policy objective in higher education is largely composed of three aspects. The first task is to reinforce the educational capacity of higher education institutions. With aim to improving teaching/learning environments and bringing more efficiency into institutional management, steps are being taken to expand financial investment and spur restructuring procedures. Indices indicative of educational capacity are being applied in evaluation procedures that result in performance-based funding for institutions. This is to create an atmosphere of competition among institutions and give a boost to their competitive strength. At the same time, institutions are being encouraged to assume a stronger role as regional centers of new knowledge production and application. As in the case of Stanford

University and the Silicon Valley, Korean higher education institutions are being called to provide education tailored to industrial and local needs, thus spearheading technological and regional development.

Second, the Government sets it a core strategy to raise the autonomy and accountability of higher education institutions. In implementation, the Government is working to abolish a major part of regulations imposed on institutions, by introducing new schemes such as the admissions officer system, higher education information disclosure system and evaluation & accreditation system. In return, institutions are being required to strengthen accountability and build infrastructure for self-development.

Third, much efforts and support are being poured into raising the research capacity of higher education institutions. The Government seeks to nurture research-oriented institutions of global competence with the World Class University project and other national funding projects. Support has been expanded for individual scientists and small-scaled research groups, as a way of fostering creativity in research. Through the Brain Korea 21 project and others, the Government is also continuing assistance for the development of highly qualified research professionals at the Master's and Doctoral level.

# <Major Policy Initiatives>

#### 1. Restructuring the Higher Education Sector

As a result of the Government's focused endeavors to expand access to universities and junior colleges, Korea's higher education enrollment rate reached 83.8 percent as of 2008. The quantitative growth, however, has not been sufficiently met by qualitative improvements, resulting in a gap of what is taught at higher education institutions and what is actually needed in social career life.

Institutions are also expected to face increasing difficulty in academic management, as the university-aged population is foreseen to grow only till 2012(690,000 persons) and then make a downward turn. This is anticipated to create a situation where the higher education admission quota outnumbers the actual number of high school graduates, possibly starting 2016. In particular, the lack of freshmen will likely become a major

challenge for private universities. Financial difficulties rising from the situation are apt to bring about a deterioration of educational quality, again leading to an insufficient fulfillment of students' basic rights to quality education.

Meanwhile, in the face of the decreasing number of primary school-aged youngsters, Teacher's Colleges may cut their admission quota in order to balance the demand and supply of primary school teachers. In which case, there exists high possibility that the Teacher's Colleges, which are currently operated as independent higher education institutions, will lose their administrative effectiveness.

In recognition of such potential challenges, the Government is pushing forth with the restructuring of higher education institutions, as a way of maintaining effectiveness in institutional management and preventing the increase of under-qualifying institutions. Building on the reform efforts that started in 2004, this year, the Government plans to induce the practical M&A of national universities through bidding processes.

The merger of institutions will be particularly encouraged for universities of education. For this, the Government will lead publicity works to point out their inevitable need for admission quota reduction, as well as distribute cases of best practice such as the successful merger of Jeju National University and the Jeju National University of Education.

At the same time, the corporatization of national universities will be pursued in continuity, starting with those that possess suitable capacity for change. In order to help small-sized national universities in local areas switch to corporate bodies as well, the Government will introduce a system that allows a single corporation to operate several universities.

As for private higher education institutions, the Government will provide management consulting services for institutions that experience managerial difficulties, in order to help raise their operational effectiveness. For institutions that fail to self-sustain themselves even after consultation and improvement measures, the Government plans to present various methods of school closure such as M&A, voluntary closing down and transformation into a public corporation. In such ways, the Government intends to facilitate the autonomous reform efforts of private institutions.

# 2. More Financial Investment in Higher Education

Recognizing that low investment <sup>1</sup> in higher education deteriorates educational environments and weakens the education/research capacity of higher education institutions, consequently lowering their level of international competitiveness, <sup>2</sup> the Government is working to increase the allocation of national budgets for higher education. Aware that increased finance will help improve educational environments at institutions and ease the tuition burden of students and parents, the Government plans to secure a total higher education budget that exceeds that of the previous year, in continued consultation with related budget offices.

The current plan is to allocate 5.2393 trillion Korean won for higher education funding in 2009, up 14.2 percent as compared to the 2008 budget of 4.5912 won. Legislative steps will be taken alongside to stabilize sufficient amounts of budget allocation in the sector. Together with experts, the Government also plans to set up mid- to long-term strategies for increased university funding and selection of investment areas<sup>3</sup>, and spread public awareness on the need for expanded higher education finance.

# 3. Formula Grants for Enhanced Higher Education Capacity

One of the major problems identified in the sector is that higher education yet falls short of meeting industrial demands for high quality workforce. Neither does it suffice the diversifying demands of various learners. On the other hand, there exists criticism that the Government's concentrated subsidy for research works has induced a majority of institutions to develop themselves into research-oriented universities, bringing about an overall deterioration of the fundamental function of education.

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<sup>&</sup>lt;sup>1</sup> Korea's public educational finance as of GDP is 3.4 percent at the primary and secondary level, not much different from the OECD average of 3.5 percent. The ratio yet falls to 0.6 percent at the higher education level, marking approximately half the OECD average of 1.1 percent.

<sup>&</sup>lt;sup>2</sup> In a 2008 IMD report, Korea ranked 53rd out of 55 countries surveyed in terms of university education meeting the needs of a competitive economy.

<sup>&</sup>lt;sup>3</sup> Examples of investment areas: recruiting full-time faculty for educational quality assurance; subsidizing higher education institutions/students and reducing their tuition burden; revising curricula so as to better reflect industrial needs; facilitating the internationalization of higher education

The 'Educational Capacity Enhancement Project' comes as a means of addressing such problems. Launched in 2008, this new formula-block grant scheme introduces the element of competition, in a bid to increase the administrative autonomy of universities and enhance their financial efficiency.

In implementation, the Government assesses and awards the best performing higher education institutions based on a non-competitive evaluation formula. Pre-determined quantitative indices are used to evaluate each higher education institution's educational achievement level and environmental status. Criteria include the graduate employment rate, ratio of student enrollment as of total quota, full-time faculty rate, ratio of foreign faculty, ratio of foreign students, educational expenses per student and scholarship provision rates. For selected institutions, the Government provides block grants to the presidents of universities/junior colleges, which ensures that they invest diversely and creatively in upgrading their quality of education.

In 2008, 64 institutions were awarded with a gross subsidy of 50 billion won. In 2009, a sharply increased budget of 264.9 billion won has been set aside for the project, which will benefit a larger number of institutions. Beneficiaries will be able to flexibly devise new strategies for reinforced competence, such as developing various curricular programs, providing excellent faculty with incentives and establishing teaching/learning centers. The Government will set up a permanent consultation office composed of experts to provide beneficiary institutions with consulting in their planning of grant usage, actual fund execution and performance evaluation. Upon termination of the grant period, the Government will evaluate how well the institutions have reached their self-proposed performance goals, and how creatively they have planned, operated and managed grant usage.

# 4. Continued Efforts to Expand Higher Education Autonomy

In an on-going effort, the Government is working to abolish or ease unnecessary regulations so that higher education institutions may voluntarily and creatively maximize their development capacity. The key idea is to free institutions from uniform restrictions imposed on their administration, and help them break away from student admission systems that rely heavily on standardized test scores. By building in

a more advanced admission system that identifies and nurtures the potential of young students, the Government seeks to enable students to enter higher education institutions without being burdened by unnecessary study requirements.

Over the years, the Government has been developing tasks and agendas for expanded autonomy upon conducting surveys on the demands of higher education associations. Unnecessary regulations have been abolished or improved accordingly, and related laws have been set up alongside. Such infrastructure is proved to have enabled a boost of autonomy in terms of faculty appointment, student quota, academic administration, organizational management and financial management.

In another major step towards deregulation, the Government has allowed institutions to administer admission screening according to their own regulations, especially in terms of deciding how extensively they will reflect students' high school records and scores on the standardized College Scholastic Ability Test in the course of screening. The Government has also allowed major higher education associations to approve general matters related to student admission, agreed among universities and junior colleges through their own consultation.

In future higher procedures, higher education associations will set up educational cooperation committees composed of Superintendents of Metropolitan City/Provincial/Offices of Education, university presidents and educational experts. The committees will be responsible for promoting better mutual understanding and close policy coordination between the sectors of higher education and primary/secondary education. In addition, the Government has authorized higher education associations with the right to order the correction of or place disciplinary measures against universities/junior colleges that violate agreed decisions, as a way of ensuring accountability alongside the expansion of administrative autonomy.

# 5. Expanding the Admissions Officer System

Until only recently, Korean higher education institutions have relied on academic scores as a major criterion for student selection, such as high school records, scores on the Standardized College Scholastic Ability Test and scores on self-administered tests. The weight on such criteria has however served as a major cause of excessive

competition among students at the secondary, and even the primary level. It has also posed difficulty for higher education institutions in selecting students equipped with the very potential and ability required for specific recruitment units.

The Admissions Officer system was introduced in 2007 as a means of tackling the situation. Under the system, higher education institutions employ, nurture and utilize experts on university admission, who screen and select freshmen on the basis of a comprehensive review of students' academic performance, personal circumstances, potential, aptitude and skills, etc. By taking such various criteria into consideration in addition to exam scores and other academic attainments, institutions will be increasingly able to recruit students well tuned to their strengths and specialization, and nurture them into highly qualified human resources. The decreased weight on admission exam scores is also expected to ease unnecessary competition and thus normalize primary/secondary school education.

The system was launched with a budget of 2 billion won in its first year of operation, which grew to 15.7 billion won in 2008. The Government plans on a yearly budget increase to stabilize the adoption of the system at institutions, with the 2009 budget allocated at 23.6 billion won.

#### 6. Higher Education Information Disclosure; Evaluation & Accreditation

#### (1) Information Disclosure System

Under an aim to ensure enhanced transparency in higher education administration and suffice the rights of citizens to educational information access, the Government launched a higher education information disclosure system on December 1, 2008, pursuant to which institutions are disclosing details about their school operation via the Internet. All 414 universities and junior colleges in Korea are required to regularly display key information updates on their own home pages and a shared portal site at <a href="https://www.academyinfo.go.kr">www.academyinfo.go.kr</a>.

Information is being disclosed according to a classification of 55 items under 13 categories including the graduate employment rate, student admission results, tuition level, scholarship provision, faculty research achievements, number of enrolled students

and educational environment. The disclosure system is expected to help students and parents make informed choices, while enabling institutions to identify their own strengths and weaknesses. By means of the system, the Government thus looks forward to bringing more sound competition into the higher education sector, and lead institutions to voluntarily reform themselves towards stronger competitiveness.

# (2) Higher Education Evaluation & Accreditation System

Following the revision of the Higher Education Act, the Government initiated a higher education evaluation and accreditation system on January 1, 2009, in a bid to reinforce the autonomy and accountability of higher education institutions and refurbish the sector with a quality assurance framework of international standards. The system works in a way for institutions to first conduct self-review and self-evaluation, results of which are assessed and accredited by Government-recognized outside recognized accreditation agencies.

The self-evaluation process will enable institutions to monitor their education and research status in detail, and formulate strategies for institutional development and performance management according to evaluation outcomes. This is apt to lead to a promotion of educational environment and quality, as well as provide students, parents and industries with a means of making better informed choices.

# 7. Nurturing World Class Research-oriented Universities(WCU Project)

Under the national World Class University project, launched in 2008, the Government is providing concentrated financial support for universities to recruit top-notch researchers from abroad, who will collaborate with Korean scholars to activate researches in key growth-generating fields and contribute to enhancing the competence of Korean universities.

The Government places emphasis on fostering research in key technologies that have potential to spearhead national development, as well as nurturing highly qualified human resources in inter-disciplinary studies that promote knowledge-based services and new industries. By recruiting and retaining international scholars who possess advanced research capacity, the Government intends to bring innovation to the

education and research environment of Korean universities, thus transforming them into research-oriented institutions of globally competitive standards.

For selected universities, the Government offers full wages for foreign scholars, fees for their joint research with Korean scholars, and lab establishment expenses. A total subsidy of 825 billion Korean won has been allocated for the project during the years 2008 to 2012, which is being funded according to three project types<sup>4</sup>. In its second-round call for project participation in 2009, the Government intends to recruit approximately 280 prominent scholars from foreign countries.

# 8. Intensive Support for Graduate-level Research(BK21 Project)

The Brain Korea 21 Project refers to an intensive human resources development program initiated in 1999 by the Korean Government in an effort to upgrade the research infrastructure and graduate-level training of higher education institutions. The Government sets target specialty areas that have high growth potential, and through open competition selects excellent graduate schools in these areas to provide substantial financial support for Master's, Doctoral and Post-doctoral research.

The first-phase BK21 invested a total budget of 1.3 trillion won for 564 project teams during a seven-year period of 1999 to 2005. The initial project is evaluated as having raised the overall research capacity of Korean universities a step higher<sup>5</sup>.

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<sup>&</sup>lt;sup>4</sup> WCU project types:

<sup>-</sup> Type 1(Establishing new academic departments or specialized majors): Support is given to universities that employ renowned scholars from abroad on a full-time basis, who will compose a 4~6-person research unit in collaboration with Korean faculty members to establish and operate new departments at the undergraduate or graduate level in new growth-generating and consolidated technologies.

<sup>-</sup> Type 2(Employing foreign scholars in existing academic programs): Universities are asked to employ 1~2 foreign academics as full-time professors at their existing departments or research institutes, who will engage in providing lectures and conducting joint research with Korean counterparts.

Type 3(Inviting distinguished world-class scholars): Funding is provided to universities that invite Nobel Prize laureates and world-class academics, and renowned scientists who possess key high-tech skills, to conduct joint research with Korean scholars and offer lectures in the position of a visiting professor.

<sup>&</sup>lt;sup>5</sup> The number of dissertations published in SCI-level scientific journals by BK21 participants grew from 1,600 in 1999 to 4,200 in 2005; in terms of the number of SCI-level publications, Korea's ranking climbed from the world's 18th in 1998 to the 12th in 2005.

The second-phase BK21, which started in 2006 to last till 2012, is being implemented under a gross budget of 2 trillion won. The second phase focuses on developing three major areas — fostering a stabilized national system of research-oriented universities, nurturing top-class personnel in key areas that will lead national development including fundamental/new growth-generating technologies, and expanding financial support for highly qualified next-generation scientists at the graduate level. As of 2009, 565 project teams at 71 universities are currently benefiting from a budget of 265.9 billion won. Compared to the first phase, the second-phase BK21 requires universities to allocate minimum 70~80 percent of project funds in directly supporting graduate students and new research personnel. The current subsidy covers over 20,000 graduate students, accounting for 17 percent of all general graduate students, as well as 3,000 new research personnel.

All project teams are subject to annual evaluations, resulting in a withdrawal or reduction of subsidy for projects that record the lowest evaluation scores, and a redirection of curtailed budgets as incentives for those that mark top evaluation results. The Government has established a BK21 Project Management Committee to assess projects with revised evaluation indices that place more weight on qualitative performance. The rigorous assessment procedure, intended as a means of systematic quality control and management, is expected to promote competition among participating project teams which will serve as a basis for the overall advancement of Korean higher education and research.

# <Appendix> Related Statistics

1. Number of higher education institutions, students and faculty(as of April 1, 2008)

(unit: No. of institutions, persons)

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		No. of	No. of	No. of faculty		
		institutions	students	•		
	4-year universities	174	1,943,437	54,331		
	Universities of education	10	24,116	812		
	Industrial universities	13	161,876	2,137		
	Air & correspondence universities	1	272,550	137		
Universities	2~3-year junior colleges	147	771,854	12,100		
	Distance learning universities	17	85,984	427		
	Intra-company universities	2	165	8		
	Technical universities	1	171	-		
	Various universities	3	1,279	23		
	Sub-total	368	3,261,432	69,975		
Graduate schools	Graduate schools	37	5,804	561		
	Graduate schools attached to universities	(1,018)	295,608	1,975		
	Sub-total	37	301,412	2,536		

		(1,018)		
Total		405	2 5 ( 2 9 4 4	72,511
		(1,018)	3,562,844	

# 2. Rate of enrollment in higher education institutions

(unit: %)

	1970s	1980s	1990s	2000s	2005	2006	2007	2008
Enrollment rate	5.4	11.4	23.6	52.5	65.2	67.8	69.4	70.5

# 3. Employment rate of higher education graduates

(unit: %)

	Total employment rate					
	2008	2007	2006	2005	2004	
2~3-year junior colleges	85.6	85.2	84.2	83.5	77.2	
4-year universities	68.9	68.0	67.3	65.0	56.4	
Universities of education	72.3	70.6	89.2	87.8	92.0	
Industrial universities	79.8	77.8	76.9	75.3	70.8	
Various universities	73.0	45.2	46.7	47.1	39.6	
Total	76.7	76.1	75.4	74.1	66.8	
General graduate schools	81.6	81.7	81.9	-	-	