

A Study of Curriculum for a Dual Bachelor's Degree Including a Teaching Certificate

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Abstract—In the age of globalization, higher education institutions attempt to equip students with global competence. In response, most universities have been developing and running various international programs. However, teacher education has been a neglected area in this trend. Therefore, in this study, we suggest a program that offers a dual bachelor's degree from both universities located on different countries, focusing on teacher education institutions with different policies and regulations of teacher education programs that may become obstacles to designing a dual degree program. We discuss a possible way to get a dual degree including a teaching certificate at a specialized college, college of secondary education. To be specific, this research presents a way to attain two diplomas from Jeju National University (JNU) in Korea and Boise State University (BSU) in the U.S. It attempts to build an effective plan for students to declare simultaneous degrees at both universities. From the study, we find that it takes about 5 years to fulfill requirements for the dual degree at the undergraduate level.

Keywords—Dual degree, curriculum, teaching certificate, college of secondary education, international program.

I. INTRODUCTION

IN the era of “globalization”, the world is changing day by day due to the rapid development of technologies. Korea is also going through the process of globalization, which can be shown in many ways.

The first sign of globalization in Korea can be explained by the statistics shown in Fig. 1. According to the data, the population of multi-racial families in Korea is 272,613 in 2009 and is expected to grow up to 740,000 by 2020, and 2.16 million by 2050. This indicates that the number of foreigners in Korea will increase [1]. The second example of globalization in Korea is the construction of international organizations such as Green Climate Fund (GCF) and International Vaccine Institute

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(IVI). Consequently, there will be more active exchanges of academic and human resources at the national and international levels. The third example, looking at the specific case in Jeju Special Self-Governing Province, is evidenced by the federal government's (active) support of Jeju's Global Education City project and other local policy projects. Such institutional and environmental factors are accelerating the process of globalization in Korea.

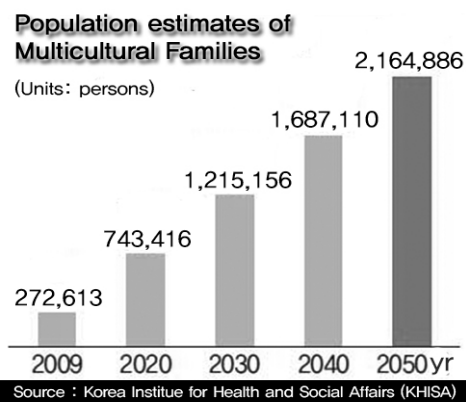


Fig. 1 Population estimates of multicultural families [1]

In light of globalization, the institutions of higher education in Korea attempt to equip students with global competence. Nonetheless, there are not enough programs that develop students' global competence at colleges of education. In addition to the lack of such programs, the imbalance in supply and demand of teachers is becoming an issue.

There has been a decrease in the number of pupils due to the decline in birthrate in Korea. The anticipated drop in the number of high school students also has become real; consequently, the demand of secondary school teachers is likely to decrease. Moreover, the reduction in the number of students, starting in 2015, may lead to a severe oversupply of teachers [2].

Teacher education programs in Korea have been supplying a certain number of teachers every year, but the demand for teachers has been declining. Therefore, new measures need to be devised in response to the imbalance between supply and demand of teachers. To sum up, teachers for only Korean students are less in demand and teachers for multinational students are increasingly sought out. In addition, educational collaboration across borders may be explored in this era of globalization to address challenges in educational conditions in different countries. In order to respond to the changes, there are some colleges of primary and secondary education that train

their students to teach abroad or at international schools in Korea. As a solution to the aforementioned issues, we have conducted a comparative study between the curricula of the undergraduate to provide simultaneous degrees based on the BSU undergraduate catalog [3].

II. INTERDISCIPLINARY COMPARATIVE ANALYSIS AND CURRICULUM OF BOTH UNIVERSITIES

There has been research on dual master’s degree programs [4]-[8] and bachelor’s degree program [9]. However, the research has been limited to obtaining two diplomas without a teacher certificate at the undergraduate level.

Before starting the study, we analyzed the systems of the two

universities. As indicated in Table I, the term required for the bachelor’s degree is four years at BSU and JNU. For the tuition, there could be some slight differences depending on the colleges at JNU, but the tuition is about \$2,000(about 2 million won). At BSU, the tuition fees differ depending on the number of credits, but they (17 credit basis) are approximately \$4,000 (about 4.3 million won). The maximum number of credits allowed per semester at JNU is 24 credits, and BSU requires recommendations to be acquired in another school year as noted in the table. The number of weeks per regular semester is 15 weeks at JNU and 13-15 weeks at BSU. In between regular semesters (intersession programs) courses are also open at BSU and JNU.

A. Semester and Tuition

TABLE I
COMPARISON OF BOTH UNIVERSITIES (SEMESTER AND TUITION)

Division	Contents			
	JNU	BSU		
Year	4-years (8 semesters)	4-years (8 semesters)		
Week per Semester	15 weeks	13~15 weeks		
Fee	Approximately 2,000,000\ (There is no relationship between the number of credits taken and tuition Up to 24 units can be taken. Sectoral tuition is slightly different.)	Tuition and Fees	Resident	Nonresident
		Tuition	\$1,995.30	\$7,715.30
		Institutional Fees	\$946.70*	\$946.70*
		Total (for up to 17 credits)	\$2,942.00*	\$8,662.00*
		Overload Fee**	per credit hour	per credit hour
Credit	24 credits / semester	Freshman	0 ~ 25 credits	
		Sophomore	26 ~ 57 credits	
		Junior	58 ~ 89 credits	
		Senior	90 or more credits	
		Summer & Winter and Intersession Programs	Summer / Winter intersession	Summer & Winter and Intersession Programs (Intersession offers 3-week, condensed courses held between the fall and spring terms.)

B. Credits Required for a Bachelor's Degree

The overall credits required for a bachelor’s degree of each university are summarized in the following table.

TABLE II
REQUIREMENTS FOR A BACHELOR’S DEGREE

Division	JNU	BSU
Major	more than 75 credits	more than 58 credits
Liberal Arts	24~48 credits	62 credits
Teaching Pedagogy	more than 22 credits	None (included in Major)
Total	more than 150 credits	more than 120 credits

First, according to Table II, more than 150 credits are required at JNU (more than major 75 credits, liberal arts 24~48 credits, teaching pedagogy 22~24 credits – more than 11 subjects/more than theory 9 subjects and practice 2 subjects). More than 120 credits are required at BSU (major 58 credits, liberal arts 62 credits). In terms of number of units to be taken for the Bachelor’s degree, teaching courses are added in JNU

curriculum. Thus, the students at JNU must take more credits than BSU. More transferable are credits at both institutes, the easier are double majors at either institute. For the transferable courses, a detailed comparison and analysis should be performed. As a result, both institutes should admit credits for the transferable courses so that the students can reduce the amount of time to obtain the dual degree.

C. Required Courses for the Bachelor's Degree

1. Liberal Arts

TABLE III
REQUIRED COURSES FOR THE BACHELOR'S DEGREE
– Liberal Arts (JNU) –

JNU		
Division	Courses required	Credits
Core Liberal Arts	· Field of Communication: 1 course (2 credits) · Field of Foreign Language: 2 courses (The same field –4 credits total) · Field of Logical Thinking: 1 course (2 credits)	8 credits
Common Liberal Arts	· Students should complete a total of 12 units or more that include at least one course respectively in 1,3,4 areas. According to the needs of students, each subject and credits follow the dictate of applicants in 2009-2010	more than 6 credits
Total	· Core Liberal Arts: 4 courses, 8 credits · Common Liberal Arts: more than 3 courses, 6 credits · Etc. : 4~24credits required	total 14~48credits required

TABLE IV
REQUIRED COURSES FOR THE BACHELOR'S DEGREE
– LIBERAL ARTS (BSU) –

BSU		
Division	Courses required	Credits
Communication	· Introduction to College Writing (3 credits) · Introduction to College Writing and Research (3 credits)	6
Foundations	· Intellectual Foundations (3 credits) · Civic and Ethical Foundations (3 credits)	6
Disciplinary Lens	· Mathematics (DLM, 3-4 credits) · Natural, Physical, and Applied Sciences & LAB (DLN, 7-8 credits) · Lab Science (4-5 credits) · DLV (3 credits) · DLL (3~4 credits) · Social Sciences (DLS, 6credits) · Required Mathematics Courses (18~20 credits)	44~50
Total	· Communication: 2 courses 6 credits · Foundations: 2 courses 6 credits · Disciplinary Lens: 16 courses 44~50 credits 56-62	

According to Table III, JNU requires 8 credits from 4 courses in common general education and more than 12 credits from 4 courses in core general education. Then, 4 to 24 credits of general education courses are additionally required. As shown in Table IV, BSU requires a greater number of detailed courses than JNU. BSU requires a total of 56 to 62 credits that are composed of 6 credits in 2 different courses, 6 credits in 2 courses of foundations, 44 to 50 credits from 16 different courses in disciplinary lens.

2. Teaching Courses

TABLE V
REQUIRED COURSES FOR THE BACHELOR'S DEGREE
– TEACHING (JNU) –

JNU			
Division	Course	Required course	Credits
	Sociology of Education		2
	Philosophy and History of Education		2
	Foundation of Education	○	3
	Theory of Teacher		2
Theory of Teaching	Educational Psychology		2
	Teaching and Learning Methods		2
	Education Curriculum		2
	Evaluation of Education		2
	Management of School & Classroom		2
	Life Guidance and Counseling		2
Teaching Literacy	Understanding Children with Special Needs	○	2
	Teaching Experience	○	2
Teaching Practice	Education Services	○	2
	Teaching Practice	○	2
Total	· Theory of teaching: 7 courses (total 10 courses), more than 15credits · Teaching literacy: 2 courses 4 credits · Teaching practice: 2 courses 4 credits total more than 24 credits required		

At BSU, there are no teaching courses because teaching-related courses are included in the major subjects of each major. However, at JNU, students are required to take more than 15 credits from 7 courses among 10 teaching theory courses, 4 credits from 2 literary teaching courses, 4 credits from 2 field experience courses and then making a total of 24 additional.

3. Major Courses

JNU has three categories: Basic curriculum of the major area, Basic curriculum of teaching area, and Selective major subject area. In major area of basic curriculum, 39 credits in 13 courses should be obtained and in teaching area of basic curriculum 5 subjects with 15 credits are required. Then, each student chooses elective courses according to their number of credits. On the contrary, BSU has major courses and elective courses. Students are required to take total 58 credits that are composed of 49 credits of 19 courses in the major courses and 9 credits of 3 courses in the elective courses.

4. Field Professional Education Courses

The students have two choices for their practicum. One is to take it abroad and the other one is to have it at an international school. The period for the practicum at JNU is the first semester of senior year at the college of secondary education. However, BSU requires taking more than 6 credits of field professional education courses during one semester depending on major.

5. Graduation Exam

Both JNU and BSU require a graduation exam depending on the student's major. The graduation exam could be replaced by a project-based major course depending on the major.

III. CONCLUSION

This study suggests how students can attain simultaneous degrees from the two universities in different countries in order to develop their global competence in the globalized world and to raise global educators who can respond to the rise of multicultural families and establishment of the Global Education City and the Free International City in Jeju. The analyses of the research can be summarized as follows.

First, it takes five years to fulfill all the requirements from both universities for the degrees. Five years refers to two and a half years at JNU, two years at BSU, and half a year for student teaching. When the two institutions' curricula are compared, many of the general education courses do not match each other's even if most of the credits get mutually accepted. This means that students have to take all the general education courses. As far as the major courses are concerned, however, except for the 'Curriculum and Teaching' course from JNU, each major program does match each other's requirements. Based on the presupposition that the credits from JNU's major courses can be mutually accepted, taking the major courses can be less time-consuming.

Second, if there is no practicum in winter session, the years required for the degrees can be cut down from 5 years to 4.5 years. All the required courses except practicum can be completed in 9 semesters by fall semester. JNU students at the college of secondary education normally complete the practicum in the first semester (spring in Korea) of their senior year and the students are dispatched to schools abroad to complete the practicum during the winter before the fourth year starts. However, winter breaks of BSU are too short for these students to complete. It is also inefficient for the students to return to Jeju for their practicum in the middle of the semester. Therefore, students have to take practicum at schools in the Global Education City in Jeju or at schools abroad in the winter.

Consequently, students will have to wait half a year and complete their practicum in winter. Since this may burden students with time and finance, it has to be further discussed and solved.

The kind of research can help institutions such as colleges of education that try to increase their students' global competence. More research about training global teachers should be continually conducted.

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REFERENCES

- [1] Population Estimates of Multicultural Families, Korea Institute for Health and Social Affairs (KHISA), 2009
- [2] J. H. Choi, "2009-2030 Elementary and Middle School Teachers' Labor Supply and Demand of Korea" - Ministry of Education (Korea), 2009
- [3] Boise State University Undergraduate Catalog (2013-2014), Boise State University, 2013
- [4] R. J. Ramirez Martagón, "Critical Success Factors in the Master Dual Degree Program at UPAEP University and Oklahoma State University," US-China Education Review A, ISSN 2161-623X Jul. 2013, vol. 3, no. 7, pp. 546-552
- [5] J. S. Lee, "The MS/MBA Dual Degree Program: An Examination of U.S. Schools and Analysis of Implementation in Korean Schools," KBR, 2008, vol. 12, no. 1, pp. 161-179
- [6] S. M. Kim, "The MD/MBA Dual Degree Program: Analysis of the Global Cases, and Possibility of its Implementation in Korea," KBR, 2008, vol. 12, no. 1, pp. 145-160
- [7] J. Barnes, M. Kuder, "Engineering Technology Concurrent (Dual) Master's Degree: an Irish, Spanish and American Collaboration across the Atlantic: Innovations, Issues & Insights," <http://www.weef2012.edu.ar/archivos/.../James-Barnes.ppt>
- [8] A. Nader "A Cost-Benefit Analysis of an International Dual Degree Programme," Journal of Higher Education Policy and Management, vol. 32, no. 3, 2010
- [9] S. L. Senft, "Dual Degree Programs at the University of Kentucky College of Pharmacy," *Am J Pharm Educ.* Feb. 15, 2008