Objective: To examine the relations between satisfaction in major, academic achievement and five personality factors of physical therapy students.

Design: Questionnaire study.

Methods: In order for a complete enumeration when selecting study subjects, we selected five representative schools through raffles. For about three weeks from May 21st to June 16th 2012, we distributed self-administered questionnaires comprised of questions related to five personality factor characteristics, satisfaction in major and academic achievement. Total of 510 questionnaires were distributed and 442 questionnaires were returned. Except the castle is not answered or unanswered call 73 questionnaire collected data from the 369 call. And 369 questionnaires were used for analysis. The frequency analysis was conducted to examine general characteristics of subjects.

Results: In the analysis of differences in personality factors for each individual variable in accordance with sex, women had higher degree of neuroticism than men (p<0.05). Also men showed higher openness than women (p<0.05). In the analysis of differences in personality factors for each individual variable in accordance with age, the lower the age was, the higher the degree of neuroticism was (p<0.05). For satisfaction in major, “Satisfaction in school life” and “Motive for selecting the major” were significant factors (p<0.05). Academic achievement, “School type” and “Motive for selecting the major” were significant factors (p<0.05).

Conclusions: In regards to the satisfaction in major and academic achievement, "Motive for selecting the major" was the major significant factor. Students who had high interest in their majors expressed higher satisfaction, which in turn correlated with higher academic achievement.

Key Words: Academic achievement, Five personality factors, Physical therapy, Satisfaction

Introduction

As stable and professional jobs have been preferred since IMF in 1997 [1], the physical therapy course became one of the popular departments. Contrary to the rapid increase of fixed number of university students due to thoughtless foundation of universities with unclear education philosophies depending on the temporary excessive demands of higher education, universities failed to show innovative attempts to have their own differentiated competitiveness, which caused the accelerated change to health affiliation which has advantages in recruiting an entrance quota [2]. And recently, the unemployment problem got serious with an economic recession so that the popularity of a health area in which find-
ing a job is relatively easier was more increased. Thus universities also competitively started expanding departments related to a health area.

According to recommendations of World Confederation for Physical Therapy, however, the school system of physical therapy pursues 3-4 year system [3]. Also the government carries out a policy to reform the structure of universities by selecting insolvent universities every year since 2011. According to the valuation standard based on the index of low-rank universities in 2012, the employment rate (20%) and the reinforcement rate of enrolled students (30%) occupy 50% of the total items [4]. In the openness of markets and globalized competition, however, schools that create qualitative great results can survive, instead of schools that simply recruit students to just show more employment statistics [5]. Such a long-term evaluation is the matter of producing graduates who build up professional experiences as leading roles by viably exploring careers after graduation [6]. Universities feel pressured to satisfy not only academic values traditionally pursued, but also practical demands in accordance with social/economic changes [7]. Students also experience discordance between their personality and majors or tend to be maladjusted to majors due to dim employment prospect after focusing on success or failure, rather than considering their own ability, aptitude or interest [8]. The starting point or the attitude toward major between students following their aptitude and talent, and students selecting majors unrelated to themselves can be different [9]. Therefore, the degree of achievement can be shown differently in dependent on individual personality characteristics or environment despite of the same factors [10]. In such reasons, the personality characteristics, satisfaction in major and major achievement of physical therapy students become more essential.

Thus this study aims to examine the relations between personality types, satisfaction in major and academic achievement based on five personality factors of physical therapy students.

Methods

Subjects

This study was conducted with total 369 physical therapy students (2nd year: 146, 3rd year: 161, 4th year: 62) in five universities (college and university), located in Seoul, Daejeon, Jinju, Pohang and Gunsan.

In order for a complete enumeration when selecting study subjects, we selected five representative schools through raffles. For about three weeks from May 21st to June 16th 2012, we distributed self-administered questionnaires comprised of questions related to five personality factor characteristics, satisfaction in major and academic achievement. Out of 510 questionnaires distributed, total 442 questionnaires were collected. Excluding 73 questionnaires with insincere or no answers, 369 questionnaires were used for analysis.

Research tools and data collecting process

Five personality factors

This study is based on the questionnaires about five personality factors, satisfaction in major and academic achievement. The questionnaires used the adaptation (by Yoo et al. [11]) of International Personality Item Pool produced by Goldberg [12-16].

This scale can be measured by five factors of individual personality like neuroticism, extroversion, openness, agreeableness, conscientiousness, and it is comprised of total 50 questions (10 questions per each factor).

In the advanced research by Mun [17], the Cronbach’s $\alpha$ was 0.78. The reliability coefficients of five personality factors shown in this study are like below (Table 1).

Satisfaction in major

We used the course evaluation survey form developed by Illinois University, Braskamp, Wise and the course evaluation survey form used by Hengstler (1979) to measure university students’ satisfaction in major [18].

| Table 1. Reliability coefficients of five personality factors |
|-----------------|----------------|----------------|----------------|
| Factor          | Question no.   | No. of question | Cronbach's coefficient $\alpha$ |
| Neuroticism     | 1, 3, 4, 12, 21, 28, 31, 37, 38, 41 | 10 | 0.8652 |
| Extroversion    | 2, 8, 13, 17, 22, 26, 32, 36, 44, 49 | 10 | 0.8625 |
| Openness        | 5, 9, 14, 18, 23, 27, 33, 39, 43, 47 | 10 | 0.7853 |
| Agreeableness  | 6, 10, 15, 19, 24, 29, 34, 40, 46, 48 | 10 | 0.7532 |
| Conscientiousness | 7, 11, 16, 20, 25, 30, 35, 42, 45, 50 | 10 | 0.7515 |
| Total           |                | 50 | 0.8925 |