# Importance and Adequacy of Practice Competencies for Care Professionals in Aging-related Fields: The Chinese Administrator's Perspective

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#### Abstract

The rapid growth of the older population has increased the need for care professionals with training in gerontology or geriatrics. This study analyzes the perceived importance and adequacy of practice competencies for entry-level care professionals in aging-related fields in Hong Kong. The administrators of non-government organizations that provide aging-related services were surveyed. The most important competencies, those underperformed, and some that were cross-culturally relevant were identified. Potential areas and new directions for the development of competencies for care professionals were also examined. The methods used in this study could serve as a reference for further studies in gerontology and geriatrics education.

**Key Words**: Aging-related fields, Care Professionals, Chinese Administrators, Gerontology and Geriatrics curricula, Practice Competencies.

#### Introduction

The older population in Hong Kong has grown very rapidly in recent years, and will rise to an estimated 15% of the total in 2019 from 11% in 2001 (Census and Statistics Department, 2001a & 2001b). This growth is creating a significant demand for human services for older adults. From 1998 to 2001 there was a remarkable increase in older service-users in residential care homes, community support, and related elderly services (Census and Statistics Department, 2001c), which generated the need for more care professionals with training in gerontology or geriatrics.

Despite this scenario, the seven institutions of higher education in Hong Kong offer only two Master's programs in gerontology and one postgraduate diploma program in community geriatrics, along with some elective undergraduate gerontology courses. Although the Hong Kong Association of Gerontology and some community colleges have conducted short-term or certificate courses for care professionals and paraprofessionals, most of them have lacked comprehensive planning. Until recently, no core practice competencies in gerontology and geriatrics had been identified for the development of formal gerontology and geriatrics curricula for health and social care practitioners (Working Group on Gerontological Care, 2001; Working Group on Gerontology Training for Social Work Students, 2003). Furthermore, there is a lack of valid and reliable information about the adequacy and appropriateness of curricula in related fields. Hence, this study examines the practice competencies that entry-level care professionals need, as perceived by the administrators of aging-related organizations in Hong Kong, and investigates potential areas for development of professional programs to meet the needs of aging-related fields.

#### **Previous Studies**

To facilitate the development of gerontology and geriatrics curricula, educators have identified core practice competencies for care professionals. These competencies are generally divided into six categories: interpersonal intervention, program accountability, program/service evaluation, program planning/development, personnel management, and financial management (American Geriatrics Society, 1991; Association for Gerontology in High Education, 1994; Bennett & Sneed, 1999). Based on these competencies, at least 20 topics can be developed into courses in a comprehensive gerontology or geriatrics curriculum (Henderson, Eleazer, & Olderdick, 1998; Moseley, Shumaker, Hillegass, Dunton, & Swager, 1996).

The improvement of curricula and training programs is one of the goals that gerontology and geriatrics educators wish to address. Despite the cumulative studies that have been conducted to identify the most important practice competencies and the areas of curricula that need to be strengthened, no conclusive findings have been obtained. Primary care physicians have stressed a need for geriatric training in areas in which they feel least prepared or face the most challenging problems (Grilly, Ellett, Chung, & Kulatilaka, 1996; Henderson et al., 1998). Other physicians have emphasized the importance of interpersonal intervention and program accountability for entry-level professionals (Bennett & Sneed, 1999). Allied health professionals and paraprofessionals have identified a need for case management and nutrition education in gerontology curricula (Mosely et al., 1996).

The practice competencies that are perceived to be important by gerontology students and graduates vary from those of physicians and allied health professionals. The alumni of gerontology programs want to acquire more knowledge and skills in management, communication, policy issues, and various dimensions of the aging process (Association for Gerontology in High Education, 1994; Peterson, 1995; Usita, Blisezner, & Roberto, 1998). They

consider interdisciplinarity, multidisciplinary opportunities for learning, and practicum experience to be the most valuable components of a gerontology program (Euster & Reaves, 1995; Usita et al., 1998).

The employers of graduates from gerontology and geriatrics programs are also a reliable source of feedback for improving curricula. However, information on the opinions of employers about the performance of graduates has been sparse. A recent study found that employers were not satisfied with the writing skills of employees who graduated from gerontology programs (Roberto, Usita, Weeks, & Wacker, 1997), which suggests the need for improvement in this area of the curriculum.

Most of the studies described on core practice competencies tended to examine the education needs of human service practitioners or gerontology alumni, and only a few investigated the opinions of employers. Also, these studies generally focused on a single discipline without reference to related professions. The present study addresses these issues by analyzing the perceptions of the administrators of organizations that provide human services for older adults, comparing the practice competencies for their entry-level medical, nursing, and social work staff. These administrators were surveyed because they hire university/college graduates and their expectations should provide insights into what is needed to improve aging-related curricula and enhance the practice quality and employability of graduates.

#### Method

This study is based on a recent survey conducted by teaching staff from the departments of Medicine, Nursing Studies, and Social Work and Social Administration at The University of Hong Kong. The survey gathered the opinions of alumni, other teaching staff, and administrators

of aging-related organizations from the three fields. Three separate sets of questionnaires were used to collect information from respondents. Only the research method and findings of the subsurvey of the agency administrators are reported in this paper.

# Target Population and Sample

The target population of this study was the administrators of organizations that provide aging-related services, including hospitals, clinics, homes, and social centers. The list of hospitals and clinics that served older adults was available on the website of the Hong Kong Hospital Authority, while that of homes and social centers for older adults was obtained from the Hong Kong Social Welfare Department. These two lists together constituted a comprehensive sampling frame of administrators who were familiar with the current situation and the practice competencies required to care for older adults.

#### Measures

The major variables were the *importance of practice competencies*, *practice performance*, and *potential areas for development*. The *importance of practice competencies* referred to the importance of the listed practice competencies for the three groups of professional staff. *Practice performance* denoted how adequately these professional staff performed in each of the listed competencies. These two variables were measured by the perceptions of the surveyed administrators, with a 4-point rating scale ranging from 0 = not important to 3 = very important. This scale was adopted based on the suggestions of the key informants and the findings of a pilot test, as well as a review of the related literature (Bennett & Sneed, 1999). The listed competencies were grouped into interpersonal intervention and administration/management. The *potential areas for development* were indicated by the discrepancy between the perceived importance and rated practice performance of each type of competency.

#### **Procedure**

The main instrument for collecting data was a self-administered questionnaire, which was developed based on the concepts of practice competencies and the question styles used in previous studies (Bennett & Sneed, 1999; Henderson et al., 1998; Mosely et al., 1996; Roberto et al., 1997; Usita et al., 1998), and the opinions of nine agency administrators who represented the fields of medicine, nursing, and social work. In a pilot test, four to five potential respondents from each of the three fields who were not included in the sample were asked to answer the questionnaire. Modifications were made according to their feedback. The finalized questionnaire contained seven sections, including socio-demographic background, size and discipline of professional staff, work information, the importance of practice competency, the practice performance of professional staff, type of organisation, and suggestions for development.

The finalized questionnaires were mailed to the administrators in August 2002, and the non-respondents were sent reminder letters with a second set of questionnaires around four weeks afterwards. Of the 783 sets of delivered questionnaires, 202 were completed and returned for a response rate of 25.8%, which is comparable to previous similar studies (Henderson et al., 1998; Grilly et al., 1996). Of the returned questionnaires, four sets were invalid due to missing data. Hence, the sample size was 198, which was still sufficient to carry out descriptive statistical analyses.

#### **Results**

### Characteristics of Administrators and Professional Staff

The characteristics of the administrators surveyed and their professional staff are summarized in Table 1. Most of the administrators were social workers who worked in either

community-based service centers or residential facilities. A small number of administrators were physicians or nurses who worked mostly in hospitals. In general, the hospital administrators surveyed were older and had more work experience in the field than their counterparts in residential facilities or community-based service centers. However, the gender ratio of the hospital administrators who tended to be male was much lower than those working in the other two types of organizations.

Among the professional staff, nurses worked most commonly in hospitals and residential facilities, while social workers were predominantly employed in community-based centers. Regarding the educational background of the participants, physicians had the highest qualifications, as between 60% and 88% of them had at least a Bachelor's degree. Over 60% of the nurses and social workers were diploma holders. Regardless of their educational background, all of these care professionals were trained to be generalists. Although a small number of the physicians and some of the nurses and social workers had received postgraduate training, they had not specialized in gerontology or geriatrics.

## Perceived Importance of Practice Competencies

The rankings of the practice competencies for entry-level care professionals as perceived by the administrators surveyed are presented in Table 2. As shown in the first column of the table, the administrators considered most of the practice competencies to be important (mean ratings  $\geq 2$ ). Among the ten most highly rated competencies (mean ratings  $\geq 2.41$ ), almost all involved interpersonal intervention knowledge, skills, or values, with the exception of interdisciplinary team building, which was identified as an administration/management skill. This preponderance of interpersonal competencies was probably due to the fact that the social workers usually carried out administrative duties.

The separate analyses carried out for the various professional staff are provided in the second to fourth columns of Table 2. Of the ten most highly rated competencies for the physicians and nurses, seven were identical—professional ethics and values, communication skills, teamwork skills, assessment skills, clinical skills, an understanding of the psychological aspect of aging, and knowledge of special problems in aging. Although a few of the competencies rated highly for social workers were also rated as important for health care professionals, most were unique to this group. The competencies felt to be important for social workers were counseling skills, an understanding of the social aspect of aging, knowledge of community resources, ability to implement and/or deliver services, case management skills, service planning skills, and interdisciplinary team building skills. Three of the competencies investigated (professional ethics and values, communication skills, and teamwork skills) can be viewed as fundamental practice competencies and incorporated into the curriculum for interdisciplinary training because the administrators perceived them to be the most important for all three groups of professionals.

# Practice Performance of Professional Staff

As shown in the first column of Table 3, the administrators surveyed were satisfied with the performance of the professionals on their staff in all of the practice competencies, but none of these competencies were rated highly (mean ratings  $\leq 1.9$ ). The interpersonal intervention competencies of physicians and nurses were rated better than their administration/management competencies (p < .05), whereas the social workers were seen as performing both categories of competencies fairly well (p > .1). This could be due to the focus of the training that the professional staff received. Using The University of Hong Kong as an example, no administration/management course is offered to medical and nursing students. In contrast, social

work students are encouraged to take at least one management course as an elective because resource and staff management are two of the core competencies for social work practitioners as stipulated by the Social Welfare Department of the Hong Kong government.

The findings also reveal differential patterns of competencies among the professional staff. The physicians' clinical skills were rated highly (mean rating = 1.91), but their performance in funding proposal writing and research and evaluation were viewed as the least satisfactory (mean ratings = 1.12 and 1.16, respectively) among all the competencies. Similar to the physicians, the nurses were perceived to have good performance in clinical skills (mean rating = 1.81), but were not performing satisfactorily in funding proposal writing (mean rating = .95) and research and evaluation (mean rating = .99), and their performance in policy issues and policy development process was felt to be marginally satisfactory (mean rating = 1.02). Although the social workers were seen as displaying good performance in professional ethics and values (mean rating = 2.01), their performance in medical decision making and research and evaluation was considered to be modest (mean ratings = 1.02 and 1.10, respectively). In essence, research and evaluation and funding proposal writing were rated as the lowest competencies of practice performance for the three professionals.

#### Potential Areas for Development

The potential areas for the development of practice competencies for entry-level care professionals are listed in Table 4. Each of these areas was measured by the discrepancy between the performance by the professional staff as rated by the administrators and the perceived importance of the practice competencies. The discrepancy was calculated by subtracting the rating of importance from that of performance. A negative sign indicates the need for development, and a positive sign indicates outperformance of expectations.

Surprisingly, each of the listed practice competencies had a negative sign, which suggested a comprehensive need for development in all competencies. Those competencies with higher ratings were in greater need of development, but the overall need was moderate because all of the ratings were under 1, ranging from -.39 to -.98. Nevertheless, it was evident that the professional staff underperformed in all of the listed competencies. These discrepancies could be attributed to either the excessively high expectations of the administrators or the under-training of the professional staff.

The different groups of professional staff exhibited different levels of deficiency in each area. The physicians appeared to perform better in more of the competencies than did the nurses and social workers, to the extent that the necessity to develop the physicians' competencies was lower than those of the other groups. Yet, the results of ANOVA show that the need of the physicians and nurses for further training in interpersonal intervention competencies was higher than that in administration/management competencies (p < .1). This suggests that, as perceived by the administrators surveyed, interpersonal intervention skills are more important than administration/management skills for health care practitioners. The need to develop the interpersonal intervention competencies of the social workers was similar to that of the nurses (mean ratings = -.79 and -.78, respectively). However, the social workers were perceived to need increased or more effective training in their administration/management competencies, simply because the administrators expected that the social workers should undertake more administrative/managerial duties than the physicians and nurses.

The specific competencies that were perceived to need improvement varied with the discipline of the professional staff. For the physicians, these competencies included knowledge of the principles of rehabilitation, an understanding of the psychological aspect of aging,

awareness of concepts in the holistic approach, counseling skills, and communication skills. In comparison, the competencies for the nurses were knowledge of the psychological aspect of aging, communication skills, teamwork skills, assessment skills, case management skills, and interdisciplinary team building skills. In comparison, there were slightly more such competencies identified for the social workers, namely assessment skills, supervision skills, knowledge of special problems in aging, an understanding of the psychological aspect of aging, funding proposal writing, case management skills, counseling skills, and interdisciplinary team building skills. Many of these competencies were common to two or even all of these professionals. For instance, communication skills were common to physicians and nurses, while assessment skills were common to nurses and social workers, and knowledge of the psychological aspects of aging were common to all three professionals. Thus, the development of these competencies within the groups would help to improve the curricula of interdisciplinary education and training for gerontological/geriatric care professionals in various aging-related fields.

#### **Discussion**

This study examined the importance and adequacy of the practice competencies of entry-level professional staff as perceived by the administrators of aging-related organizations in Hong Kong. The findings indicate that a great majority of the identified practice competencies were considered to be important. Almost all of the most highly rated competencies involved interpersonal intervention knowledge, skills, or values. Many of the most highly rated competencies for the physicians and nurses were identical, while the other most highly rated competencies were unique to the social workers. Among these competencies, professional ethics and values, communication skills, and team work skills were rated as the most important across

the three groups of professional staff, which suggests that they should be fundamental components in curricula for the interdisciplinary training of gerontological and geriatric care practitioners.

Of the identified important practice competencies, more than 50% were compatible to those discussed in previous studies (Bennett & Sneed, 1999; Grilly et al, 1996; Henderson et al., 1998; Moseley et al., 1996; Roberto et al., 1997; Usita et al., 1998). These competencies included those of intervention knowledge (e.g., various aspects of aging process, medical decision making and health promotion and education), intervention skills (e.g., counseling, case management, and research and evaluation), intervention ethics (e.g., biomedical/social ethics), administration skills (e.g., service planning and funding proposal writing) and management skills (e.g., financial management and management of LTC facilities). Their compatibility indicates that they are highly suitable to various aging-related fields, regardless of the cultural background of the gerontological/geriatric care personnel and the social environment. Other competencies such as theories on aging, knowledge about other professions, awareness of concept in the holistic approach, community care practices and teamwork skills were not compatible to those reported in previous studies (Bennett & Sneed, 1999; Grilly et al, 1996; Henderson et al., 1998; Moseley et al., 1996; Roberto et al., 1997; Usita et al., 1998).. The incompatibility could be because the respondents, setting, and research methods were different from those of past related This suggests that when selecting the most appropriate practice competencies to be research. incorporated into the curriculum, educators should consider the opinions of all accessible informants and evaluate the reliability and validity of the information gathered.

The surveyed administrators were generally satisfied with the practice performance of their professional staff. However, the physicians and nurses tended to perform interpersonal intervention competencies better than administration/management competencies. Similar to the findings reported by Roberto et al. (1997), the professional staff were viewed to be least competent in funding proposal writing and research/evaluation. In recent years, human services in many developed societies such as Hong Kong have faced serious fiscal constraints. To secure sufficient funding for aging-related services, human service practitioners need to strengthen their skills in funding proposal writing. They should also sharpen their evaluation research skills to prove the cost-effectiveness and cost-efficiency of their services.

Despite the satisfactory practice performance, there was a comprehensive need to develop all of the competencies listed because the importance of the competencies perceived by the administrators was higher than the work performance of the professional staff. The health care staff were viewed to need more effective training in their interpersonal intervention competencies than in those of administration/management, whereas the social care staff needed to strengthen their administration/management knowledge and skills. However, the specific competencies that needed improvement varied with the staff discipline. The findings show that the importance of practice competencies per se is not necessarily an effective indicator of the need for improvement. It is a relative concept that results from the discrepancy between the expectations of the raters and the adequacy of the performers. The results of comparison between perceived importance of competencies and practice performance could be an alternative measurement of the need for improvement in practice competencies. Furthermore, the need for improvement in the practice competencies changes with social conditions, the aging of the population, and the development of related curricula. Thus, a periodic review of gerontology and geriatrics curricula and training programs is necessary for quality care to be provided to the rapidly growing older population.

The specific needs of the various staff disciplines for the improvement of competencies indicate that gerontology and geriatrics educators should tailor their curricula to meet the requirements of specific disciplines. However, the problems of older persons are becoming more complex, and no single discipline is equipped with all of the knowledge and skills that are needed to deal with them. In addition to the multidisciplinary approach, interdisciplinary teamwork could be an effective and efficient alternative to solving these problems (Richardson, Montemuro, Mohide, Cripps, & Macpherson, 1999; Skinner, 2001). Health and social care practitioners would be more competent in tackling the problems of older persons if the gerontology and geriatric curricula strengthened the practice competencies that are fundamental and essential to most of the disciplines concerned.

## References

- American Geriatrics Society (1991). Curriculum guidelines on the care of the elderly for internal medicine residency training programs. *American Journal of Medicine*, 9, 449-452.
- Association for Gerontology in High Education (1994). *National directory of education* programs in gerontology and geriatrics, 6<sup>th</sup> Ed., Washington, DC: Author.
- Bennett, J. M. & Sneed, J. (1999). Practice competencies for entry-level professionals in the field of aging. *Educational Gerontology*, 25, 305-316.
- Census and Statistics Department (2001a). 2001 Population census Summary results. Hong Kong: Government of Hong Kong Special Administrative Region, People's Republic of China, p. 24.
- Census and Statistics Department (2001b). *Hong Kong population projections 2000–2029*.

  Hong Kong: Government of Hong Kong Special Administrative Region, People's Republic of China, pp. 60-61.
- Census and Statistics Department (2001c). *Hong Kong annual digest of statistics 2001*. Hong Kong: Government of Hong Kong Special Administrative Region, People's Republic of China, p. 309.
- Euster, G. L. & Reaves, E. W. (1995). Reassessment of the quality of a gerontology certificate program: A second follow-up survey of graduates. *Educational Gerontology*, 21, 191-207.
- Grilly, R. G. Ellett, F. K., Chung, A. M., & Kulatilaka, H. (1996). Survey of physician needs in geriatric education in Southern Ontario. Gerontology & Geriatrics Education, 16(4), 53-65.

- Henderson, D., Eleazer, G. P., & Olderdick, R. (1998). Adequacy of preparation and importance of geriatrics in a sample of primary care physicians. *Gerontology & Geriatrics Education*, 19(2), 57-65.
- Moseley, C. B., Shumaker, N. S., Hillegass, B. E., Dunton, J., & Swager, P. A. (1996). A community survey approach to gerontology curriculum development. *Gerontology & Geriatrics Education*, 16(3), 73-84.
- Peterson, D.A. (1995). Professionals in the field of aging should be credentialed. *Generations*, 19, 28-30.
- Richardson, J., Montemuro, M., Mohide, E. A., Cripps, D., & Macpherson, A. S. (1999).

  Training for interprofessional teamwork Evaluation of an undergraduate experience.

  Educational Gerontology, 25, 411-434.
- Roberto, K., Usita, P., Weeks, L., & Wacker, R. (1997). Comparison of Bachelor's and Master's degree gerontology programs: Alumni characteristics, employment and employer assessment. *Gerontology & Geriatrics Education*, 18(1), 77-89.
- Skinner, John H. (2001). Transitioning from multidisciplinary to interdisciplinary education in gerontology and geriatrics. *Gerontology & Geriatrics Education*, 21(3), 73-85.
- Usita, P. M., Blisezner, R., & Roberto, K. A. (1998). Alumni perspectives of a graduate certificate in gerontology program. *Gerontology & Geriatrics Education*, 19(1), 65-77.
- Working Group on Gerontological Care (2001). Guidelines for special nursing services:

  Gerontological care, Hong Kong, pp. 21-29.
- Working Group on Gerontology Training for Social Work Students (2003). Report on gerontology training for social work students, Hong Kong. Appendices IV and V.

 Table 1

 Background Characteristics of Administrators and Professional Staff

	Type of Organization							
Background Characteristic	Hospital with Geriatric Ward/ Special Hospital for Older Patient	Residential Facility for Older Adult	Community-based Center for Older Adult					
	Administ	ator						
Field	(n = 30)	(n = 63)	( <i>n</i> = 102)					
Medicine	63.33%	6.45%	3.92%					
Nursing	30.00%	4.84%	5.88%					
Social Work	6.67%	88.71%	90.20%					
Age								
Mean	44.00	36.50	32.00					
Standard Deviation	9.13	8.12	7.97					
ANOVA	F = 23.18 $df = 2$	2, 186 <i>p</i> ≦ .001						
Gender								
Male	56.00%	27.40%	24.50%					
Female	44.00%	72.60%	75.50%					
Years in the Field								
Mean	17.78	12.00	10.52					
Standard Deviation	10.48	6.23	6.84					
ANOVA	F = 9.83 df=	= 2, 184  p ≦ .001						
	Professiona	al Staff						
Education Level	(n = 7,975)	(n = 590)	(n = 382)					
Physician	12.05°	2.88	4.18					
Bachelor	87.30%	58.68%	68.90%					
Post-graduate	12.70%	41.32%	31.10%					
Nurse	86.55°	76.11	12.31					
Diploma	62.88%	67.48%	19.17%					
Bachelor	31.60%	18.71%	61.66%					
Post-graduate	5.52%	13.81%	19.17%					
Social Worker	1.40°	21.01	83.51					
Diploma	3.57%	65.35%	65.82%					
Bachelor	85.00%	26.61%	25.71%					
Post-graduate	11.43%	8.04%	8.47%					

<sup>&</sup>lt;sup>a</sup> Percentage within the specific type of organization

Table 2 Importance of Practice Competencies for Entry-level Care Professionals in Aging-related Fields as Perceived by Administrators

	Sample ( <i>N</i> = 198)		Staff Physician (n = 47)		Staff Nurse (n = 109)		Staff Soc Wkr (n = 151)	
Competency	M M	S.D.	M	S.D.	(// = M	S.D.	( <i>n</i> = M	S.D
Interpersonal Intervention								
Professional ethics and values	2.64 <sup>a</sup>	.35	2.49	.55	2.56	.55	2.75	.47
Communication skills	2.60	.34	2.45	.54	2.62	.49	2.64	.50
Teamwork skills	2.52	.34	2.23	.52	2.60	.51	2.57	.55
Assessment skills	2.50	.40	2.53	.50	2.63	.54	2.40	.59
Service implementation/delivery	2.49	.38	2.17	.57	2.49	.52	2.59	.53
Counseling skills	2.46	.27	2.18	.59	2.25	.67	2.70	.49
Clinical skills	2.44	.38	2.57	.50	2.71	.48	2.20	.68
Social aspect of aging	2.43	.43	2.09	.58	2.34	.55	2.60	.51
Special problems in aging	2.41	.41	2.43	.54	2.46	.60	2.38	.60
Case management	2.40	.36	2.19	.54	2.34	.63	2.51	.60
Psychological aspect of aging	2.39	.38	2.38	.57	2.47	.52	2.58	.50
Theories on aging	2.39	.48	2.23	.63	2.42	.53	2.42	.57
Community resources	2.37	.49	2.19	.58	2.15	.64	2.59	.57
Biological aspect of aging	2.35	.35	2.30	.59	2.52	.54	2.25	.52
Group work skills	2.34	.44	2.15	.63	2.24	.65	2.48	.58
Concept in the holistic approach	2.32	.32	2.32	.56	2.34	.64	2.30	.62
Health promotion and education	2.24	.43	2.19	.54	2.33	.53	2.19	.6
Principles of disease prevention	2.15	.35	2.23	.52	2.39	.51	1.95	.6
Principles of rehabilitation	2.14	.35	2.26	.53	2.34	.61	1.95	.60
Biomedical/social ethics	2.13	.41	1.96	.62	2.10	.64	2.20	.6
Community care practices	2.12	.47	1.93	.61	2.06	.64	2.22	.6:
Medical decision making	1.97	.42	2.40	.54	2.36	.70	1.55	.70
Knowledge about other professions	1.93	.25	1.78	.52	1.88	.62	2.02	.6
Social demography	1.86	.23 .41	1.81	.61	1.73	.68	1.97	.6
Policy issues/policy development process	1.84	.46	1.51	.80	1.73	.69	2.03	.6
Research and evaluation	1.77	.45	1.57	.74	1.68	.73	1.90	.6.
Overall mean rating	2.28	.43	2.17	.74	2.30	.73	2.31	.0
<del></del>	2.20		2.17		2.30		2.31	
Administration and Management Interdisciplinary team building	2.42	.40	2.22	.73	2.43	.67	2.49	.64
Supervision skills	2.30	.42	1.85	.67	2.30	.67	2.43	.6
Service planning	2.24	.49	1.73	.92	2.10	.76	2.49	.5
Personnel management	2.19	.44	1.69	.73	2.18	.70	2.35	.5
Program development	2.15	.43	1.78	.73	1.95	.67	2.42	.6
Networking	2.10	.32	1.64	.79	1.83	.73	2.42	.5
Financial management	2.10	.52 .52	1.44	.79	1.74	.73 .85	2.44	.6.
Management of LTC facilities	1.95	.52 .51	1.70	.89 .87	2.04	.65 .69	2.33 1.97	.7
Funding proposal writing	1.80	.47	1.70	.93	1.46	.84	2.22	.7
Overall mean rating	2.13	.41	1.70	.53	2.00	.04	2.22	.73
<del></del>								
ANOVA <sup>b</sup> F:	2.7	-	20.27		6.84		0.18	
df:	1, 3		,	33	,	33	1, 3	
<i>p</i> :	≦ .′	10	≦ .	.001	≦	.05	> .1	0

 $<sup>^</sup>a$ 0 = Not Important 1 = Somewhat Important 2 = Important 3 = Very Important  $^b$  Comparison between Interpersonal Intervention and Administration and Management

Table 3 Practice Performance of Professional Staff as Rated by Administrators

Competency	Sample ( <i>N</i> = 198) M S.D.		Staff Physician (n = 47) M S.D.		Staff Nurse ( <i>n</i> = 109) M S.D.		Staff Soc Wkr (n = 151) M S.D.	
Interpersonal Intervention Professional ethics and values	1.93ª	.47	1.82	.65	1.86	.65	2.01	.69
Communication skills	1.79	.33	1.76	.65	1.68	.70	1.88	.70
Service implementation/delivery	1.79	.43	1.75	.72	1.70	.64	1.83	.60
Teamwork skills	1.77	.43	1.73	.60	1.70	.63	1.78	.72
	_		_		_		_	
Social aspect of aging	1.72	.43	1.60	.75	1.50	.61	1.92	.59
Counseling skills	1.66	.30	1.55	.61	1.49	.70	1.81	.76
Theories on aging	1.64	.48	1.67	.74	1.62	.64	1.65	.63
Group work skills	1.63	.49	1.56	.79	1.44	.75	1.78	.69
Health promotion and education	1.63	.51	1.71	.59	1.72	.62	1.53	.84
Psychological aspect of aging	1.62	.45	1.62	.75	1.51	.61	1.70	.64
Clinical skills	1.61	.41	1.91	.60	1.87	.63	1.33	.72
Community resources	1.61	.53	1.47	.79	1.36	.72	1.83	.69
Assessment skills	1.59	.38	1.84	.74	1.73	.67	1.42	.70
Biological aspect of aging	1.57	.46	1.89	.68	1.73	.60	1.36	.63
Special problems in aging	1.57	.48	1.80	.73	1.63	.64	1.45	.71
Case management	1.55	.41	1.62	.81	1.47	.68	1.59	.74
Concept in the holistic approach	1.49	.45	1.56	.76	1.48	.65	1.47	.75
Principles of disease prevention	1.49	.48	1.71	.66	1.71	.66	1.26	.71
Community care practices	1.41	.56	1.40	.76	1.33	.76	1.48	.70
Medical decision making	1.41	.47	1.80	.66	1.73	.61	1.02	.70
Biomedical/social ethics	1.39	.52	1.33	.67	1.38	.63	1.42	.71
Principles of rehabilitation	1.38	.46	1.47	.73	1.66	.57	1.14	.71
Social demography	1.26	.49	1.38	.68	1.15	.67	1.30	.70
Knowledge about other professions	1.25	.49	1.37	.69	1.15	.65	1.22	.68
Policy issues/policy development process	1.13	.44 .57	1.37	.76	1.02	.63	1.19	.70
	-	.57 .60		-	-	.73 .68	-	.70
Research and evaluation	1.07	.60	1.16	.84	0.99	.08	1.10	.74
Overall mean rating	1.54		1.60		1.53		1.52	
Administration and Management								
Interdisciplinary team building	1.59	.48	1.55	.74	1.57	.61	1.62	.73
Program development	1.59	.43	1.39	.67	1.38	.65	1.78	.67
Service planning	1.50	.48	1.21	.62	1.37	.72	1.68	.68
Networking	1.49	.27	1.38	.50	1.30	.65	1.64	.60
Financial management	1.48	.36	1.29	.62	1.23	.75	1.59	.77
Supervision skills	1.48	.31	1.44	.63	1.48	.70	1.49	.71
Personnel management	1.44	.41	1.25	.71	1.38	.69	1.54	.71
Management of LTC facilities	1.37	.34	1.27	.71	1.47	.73	1.32	.71
Funding proposal writing	1.16	.46	1.12	.82	0.95	.73	1.31	.73
Overall mean rating	1.46		1.32		1.35	5	1.55	0
<del></del>								
ANOVA $^{b}$ $F$ :		19	14.0		4.2			12
df:	,	33		33	1,			33
<b>p</b> :	> .	.10	≦ .0	001	≤ .	.05	> .	.10

<sup>&</sup>lt;sup>a</sup> 0 = Poor 1 = Satisfactory 2 = Good 3 = Very Good <sup>b</sup> Comparison between Interpersonal Intervention and Administration and Management

Table 4 Potential Areas for Development of Practice Competencies for Entry-level Care Professionals

Competency	Sample ( <i>N</i> = 198) M S.D.		Staff Physician (n = 47) M S.D.		Staff Nurse ( <i>n</i> = 109) M S.D.		Staff Soc Wkr ( <i>n</i> = 151) M S.D.		
Interpersonal Intervention									
Assessment skills	90 <sup>a</sup>	.63	67	.77	90	.77	98	.83	
Psychological aspect of aging	88	.50	76	.77	96	.78	87	.68	
Special problems in aging	85	.57	62	.81	85	.83	92	.80	
Case management	85	.32	56	.81	89	.84	92	.80	
Counseling skills	83	.30	70	.57	79	.74	89	.81	
Concept in the holistic approach	83	.59	78	.85	85	.80	83	.87	
Clinical skills	82	.54	64	.71	84	.75	87	.81	
Communication skills	81	.42	69	.76	94	.82	76	.77	
Teamwork skills	79	.42	49	.70	91	.73	79	.77	
Biological aspect of aging	77	.46	40	.65	80	.72	87	.73	
Theories on aging	77	.56	58	.72	83	.79	78	.71	
Community resources	76	.64	76	1.00	82	.90	77	.82	
Policy issues/policy development process	76	.49	48	.92	74	.85	85	.84	
Research and evaluation	75	.59	49	.91	74	.82	83	.81	
Group work skills	73	.56	62	.83	82	.78	70	.74	
Biomedical/social ethics	73	.68	64	.88	71	.83	78	.82	
Principles of rehabilitation	73	.49	78	.90	67	.75	79	.81	
Service implementation/delivery	72	.53	43	.85	80	.79	76	.69	
Professional ethics and values	72	.55	67	.64	69	.75	75	.67	
Social aspect of aging	72	.52	51	.90	85	.80	68	.63	
Community care practices	70	.67	56	.98	75	.83	73	.77	
Knowledge about other professions	69	.47	42	.70	64	.74	81	.80	
Principles of disease prevention	66	.61	51	.84	68	.77	69	.83	
Social demography	64	.51	47	.73	62	.82	70	.81	
Health promotion and education	63	.59	51	.66	62	.74	68	.83	
Medical decision making	62	.45	60	.72	64	.71	64	.80	
Overall mean rating	76	10	59	., _	78	., .	79	.00	
	70		00		70		73		
Administration and Management Interdisciplinary team building	85	.57	69	.87	88	.80	87	.83	
Supervision skills	85	.34	51	.78	86	.77	95	.75	
Personnel management	78	.57	53	.88	83	.78	81	.78	
Service planning	78	.67	64	.93	78	.79	82	.78	
Funding proposal writing	76	.49	39	1.14	63	.95	92	.90	
Financial management	70	.48	40	.95	69	.84	78	.82	
Networking	69	.25	44	.63	53	.76	81	.74	
Management of LTC facilities	65	.26	46	1.03	64	.73	71	.80	
Program development	61	.53	49	.84	61	.75	65	.70	
Overall mean rating	74	.00	43	.04	72	.70	81	., 0	
<del>-</del>						_			
ANOVA F :		32		3.80		2.53		.32	
<i>df</i> :		1, 33		1, 33		1, 33		1, 33	
<i>p</i> :	>	.10	≦	.10	> .1	U	> .1	IU	

 $<sup>^</sup>a$  0 = not at all 1 = somewhat necessary 2 = necessary 3 = very necessary  $^b$  Comparison between Interpersonal Intervention and Administration and Management