DOI: https://doi.org/10.5393/JAMCH.2022.47.3.143

農村醫學・地域保健學會誌:第47券 第3號(2022年 9月) J Agric Med Community Health 2022;47(3):143~153

일차진료 의사들의 환자중심성 및 노인환자 대상 전환기 돌봄서비스 인식

드로니나 율리아, 김수경, 조희숙* 강원대학교 의과대학 의료관리학교실*

Awareness of Patient-Centeredness and Transitional Care Services for Older Patients Among Primary Care Physicians in Korea

Yuliya Dronina, Su Kyoung Kim, Heui Sug Jo* Department of Health Policy and Management, Kangwon National University School of Medicine*

= 초록 =

목적: 병원에서 재가 및 시설로 퇴원한 환자가 지역사회에서 건강을 유지하기 위해서는 전환기 돌봄 서비스(Transitional care services)가 필요하다. 이를 위해 지역사회 내 의료서비스와 자원을 연계하는 주치의의 역할이 중요시된다. 본 연구에서는 선행연구를 바탕으로 일차진료 의사들의 환자중심성에 대한 인식을 파악하여 환자중심 기반의 서비스 제공을 위해 필요한 정책을 제시하였다. 또한 Transitional Care Service에 대한 일차진료 의사들의 인식을 확인하고 인구사회학적 요인과의 관계를 확인함으로써 서비스 우선순위를 도출하고자 하였다.

방법: 본 연구는 전국의 가정의학과, 내과, 신경과 등 노인 질환과 관련 있는 과의 전문의 자격증이 있으며 자발적으로 온라인 설문조사에 참여할 의사를 표현한 일차진료 의사 259명을 대상으로 수행 되었다. 환자중심성 및 전환기 돌봄서비스에 대한 인식을 살펴보기 위해 구조화된 설문지를 개발하였 으며, 조사전문업체를 통해 2019년 10월 28일부터 2019년 11월 22일까지 온라인으로 설문조사를 수행 하였다.

결과: 본 연구에 대한 주요 결과는 다음과 같다. 첫째, 일차진료 의사들을 대상으로 9가지 전환기 돌봄서비스 인식에 대해 살펴본 결과 "입원 시 진단, 건강상태, 치료계획 및 결과 에 대한 설명 (4.4)"과 "퇴원 후 자가 건강관리를 위한 정보 및 훈련 (4.2)" 에 대한 필요성이 높게 나타났다. 둘째, 35세 이상 일차진료 의사가 34세 이하 일차진료 의사보다 전환기 돌봄서비스에 대한 인식이 높게 나타 났다(F=7.3, p<0.01). 또한, 환자중심성에 대한 인식이 높을수록, 연령이 높을수록, 서울 외 지역에서 근무할수록 전환기 돌봄서비스에 대한 인식이 높게 나타났다.

결론: 본 연구에서는 일차의료를 제공하는 의료진들을 위한 교육프로그램과 지역사회에서 일차의료 의사들을 중심으로 하는 지역 연계 방안을 제시하였다는 점에서 의의가 있다.

주요단어: 일차진료 의사, 전환기 돌봄서비스, 환자중심성, 지역사회 건강 서비스

^{*} Received September 3, 2022; Revised September 20, 2022; Accepted September 21, 2022.

^{*} Corresponding author: 조희숙, 강원도 춘천시 강원대학길 1 강원대학교 의과대학 의료관리학교실(우. 24341) Heui Sug Jo, Department of Health Policy and Management, Kangwon National University College of Medicine, 1 Kangwondaehak-gil, Chuncheon, 24341, Republic of Korea

Tel: +82-33-250-8872, Fax: +82-33-259-5635, E-mail: joheuisug@gmail.com

^{*} This research was supported by a grant of Patient-Centered Clinical Research Coordinating Center (PACEN) funded by the Ministry of Health & Welfare, Republic of Korea (grant number : HC21C0171)

2 Patient-Centeredness and Awareness TCS

INTRODUCTION

A. Patient-centeredness and Transitional Care Services

Since the 2000s, the paradigm of medical care has become patient-centered. Patient-centeredness is defined as respecting the patient; providing treatment that is commensurate with the patient's individual preferences, needs, and values; and ensuring patient value in all clinical decisions[1]. Scholl et al[2] presented eight main concepts through a systematic review of patient-centered integrated models. The main concepts are as follows: 1) integration of medical and non-medical care; 2) coordination and continuity of care; 3) teamwork and team building; 4) access to care; 5) clinician-patient communication; 6) essential characteristics of the clinician; 7) patient as a unique person; and 8) clinician patient relationship. Considering such concepts, post-discharge patient care is an essential service in patient-centered care, including ensuring patient preferences and continuity of care. Patients discharged from acute hospitals undergo a transition period of moving to a home or nursing facility. This is an important recovery period, and the integration of medical and non-medical care is required. Coordinated care and teamwork between local primary care physicians and healthcare providers are needed through smooth communication between clinicians and patients[3,4]. According to Scholl et al^[2] clinicians' characteristics are important in patient-centered care concepts. This is because in practice, performance is affected by whether primary care physicians who receive and treat discharged patients recognize the importance of medical services in the transition period and make efforts to provide comprehensive services based on patientcenteredness. In a randomized controlled trial study among physicians, Bürmann et al[5] reported improving patient-centered communication behavior after 3 months of intervention.

Often, transitional care services (TCS) for discharged patients can be considered services provided by hospitals, but the role of primary care physicians who take care of patients discharged in the community is important[6]. This is because primary care physicians play an important role in forming a team to provide necessary services to patients, such as linking visiting nursing and social welfare services in communities. However, despite its importance, few studies have examined the effectiveness of providing TCS by primary care physicians[7,8], and there have been no studies examining the degree of awareness and influencing factors on patient-centeredness and TCS.

Therefore, this study, attempted to identify the Primary Care Physicians's Awareness of patient-centeredness and suggest policies necessary for providing patient-centered services, and to derive service priorities by identifying the primary care doctor's perception of transitional care services and relationships with Sociodemographic factors.

METHODS

A. Ethics Statements

The Institutional Review Board approved the study protocol of K University (KNUIRB-2019-05-006-005). Written informed consent was obtained from study participants through online confirmation to taking part in this research study.

B. Study Design

A structured questionnaire was developed to analyze primary care physicians' understanding of the importance of patient-centered approaches and their influence on TCS implementation. To secure the reliability and validity of the questionnaire, factor analysis and reliability analysis(Cronbach a) were performed. The questionnaire was developed based on previous studies and consists of three parts: general information, priority in post-discharge patient care services, and awareness of patient-centeredness. The original questionnaire was developed in Korean and was translated into English.

C. Participants

An online survey was conducted among primary care physicians by a research company called the Korea Data Network (KDN). The survey was conducted between October 28, 2019 and November 22, 2019. The data were collected using convenience sampling. The criteria for the selection of study participants were medical staff in Korea who voluntarily expressed their intention to participate in the online survey, with qualifications as specialists in departments related to geriatric diseases such as family medicine, internal medicine, and neurology. Those who did not meet these criteria or had no intention to participate were excluded from the study. The first invitation to participate in the survey was sent to 642 primary care physicians who were members of the Korean Medical Practitioner Association. 259 primary care physicians who met the criteria for selection of the subjects and had no missing values for all variables used in this study were selected as the subjects for final analysis.

D. Instruments

Measurement instruments were developed for the current study and based on a review of previous research on TCS and the awareness of patient-centeredness.

a. Sociodemographic data

The survey participants' sociodemographic data, including sex, age, specialization, and workplace location, were collected. Sex was categorized as male or female and coded as 0 for male or 1 for female[9]. Age was measured as the actual age of the participant. Previous studies confirmed that 28%(1/3) of primary care Physician in their 30s open a hospital in less than 5 years and that doctors' prescribing practices and perceptions change at the age of 35 and 44. Based on this, this study categorizes primary care physicians as under 34 years old, 35–44 years old, and 45 years old or older[10–12].

Physicians' specializations were self-reported and diverse, and were divided into three categories: internal medicine, family medicine, and others (e.g., neurology, dermatology, ophthalmology, small surgery, etc.). The workplace locations of the physicians were divided into three categories: Seoul Metropolitan City, other cities, and rural areas[13].

b. Awareness of TCS

Awareness of TCS is based on Naylor's 9 core components of TCS (Screening, Maintaining Relationships, etc.), which emphasized the importance of providing continuous care to patients from hospitalization to post-discharge, and modified by this research team to suit the Korean situation to use[14]. In our study, Awareness of TCS was used to measure primary care physicians' understanding of the importance of providing post-discharge services for older adult patients[15,16]. A 5-point Likert scale questionnaire was prepared to evaluate this. The set of services includes providing information on the diagnosis, current condition, treatment plan, and outcome; data of expected discharging; information on institution-provided follow-up services; information on medical facilities available in living areas; and information on social welfare institutions; considering the patient's opinion on treatment; involving the patient and patient's caregivers in decision-making; providing training on self-management; and providing counseling for the patient[9,17]. Awareness of TCS was evaluated using nine questions, and a mean score was calculated.

c. Patient-centeredness

We used the term awareness of patient-centeredness to disclose primary care physicians' familiarity with the qualities necessary for interacting with patients, such as being respectful, empathic, tolerant, honest, committed to the patient, etc.[2]. Awareness of patient-centeredness was measured as recognition of patient-oriented services. The authors generated the measurements for primary care physicians' recognition of the patient-centeredness concept, and the answers were coded as "have no awareness" for those who answered "I have never heard about it" and "I have heard about it, but I have no idea what it is," and as "have some awareness" for those whose responses were "I have heard about it, and I think it is necessary" or "I know it and think it is very helpful."

E. Data analysis

First, the sociodemographic characteristics of the study participants were analyzed. Second, an ANOVA test and post-hoc test were performed to compare the differences in the demand for awareness of the TCS provided. The internal consistency of the research tools was checked by calculating the Cronbach a for awareness of TCS. Third, an analysis of variance (ANOVA) test, t-test, and chi-square test were performed to identify the primary care physicians' awareness of TCS and patient-centeredness based on the sociodemographic characteristics.

Variable		Ν	%/Mean (±SD)
Age		259	42.3 (±11.0)
Sex	Male	199	76.8
Physicians' specialization	Female	60	23.2
	Internal medicine	117	45.2
	Family medicine	59	22.8
Workplace	Others	83	32.0
	Seoul metropolitan city	128	49.4
	Urban area	95	36.7
Awareness of patient-centeredness	Rural area	36	13.9
	I have no awareness	203	78.4
	I have some awareness	56	21.6

Table 1. Physicians' Sociodemographic Characteristics



Figure 1. Data Analysis Model

Finally, Hierarchical regression analysis was performed to identify the relationship between TCS and the awareness of patient-centeredness. The sociodemographic characteristics of the participants were used as correction variables. Figure 1 presents the data analysis model used to explore the factors influencing primary care physicians' awareness of TCS. Data analysis was performed using IBM SPSS Statistics 24.0(IBM Corp.) and a p-value <.05 was considered statistically significant.

RESULTS

A. Descriptive statistics

The average age of the primary care physicians who participated in this study was 42.3 years. The number of male physicians was higher than that of female physicians (76.8% versus 23.2%). Nearly half (45.2%) of the participants were considered internal medicine 22.8% were physicians, family medicine physicians, and 32% qualified as "others." Approximately (49.4%) of the respondents provided services in health facilities located in Seoul Metropolitan City, 36.7% in an urban area, and only 13.9% in rural health facilities. Most participants (78.4%) had no awareness of patient-centeredness.

The results of the internal consistency of the variables are presented in Table 2 and show the acceptability of the questions' internal consistency. The Cronbach a for TCS was 0.8, and the loading factor was 3.9.

B. Priority of TCS by primary care physicians

The ANOVA test showed significant differences in primary care physicians' awareness of the nine services provided by TCS (F=31.4, P<0.01). Table 2 shows the mean distribution of primary care physicians' awarenesses of the most necessary patient services during hospital admission and discharge. The most important services were indicated "description of the diagnosis, current as condition, treatment plan, and outcome at the time of admission" and "information and training on self-management of health status after discharge." The less necessary services were "information on the medical treatment provided near the patient's living area" and "information on the social welfare services available near the patient's living area."

C. Awareness of TCS and awareness of patient-centeredness

Table 3 presents the awareness of TCS and patient-centeredness according to the physicians' sociodemographic characteristics. The results showed differences between age groups in awareness (F=7.3, P<0.01). However, the other variables did not show significant differences in the awareness of TCS awareness and patient-centeredness.

Table 2.	Result	of the	e Reliability	Analysis*
rabie D.	ressure	01 0110	rechasting	1 mary 515

Factor	Question		(SD)	Cronbach
			Factor	Alpha
Transitional Care Services	Providing a description of diagnosis, current condition, treatment plan, and outcome at the time of admission	4.4 (0.8)		
	Providing information and training on self-management of health after discharge	4.2 (0.7)		
	Providing information on the expected date of discharge from the hospital	4.0 (0.8)		
	Considering patient participation and alternative treatments, as well as expression of their opinion Psycho-psychological counseling support to relieve stress on disease and treatment Providing information about the institution provided after discharging services			
			3.9 (0.8)	0.8
	Involvement of the patient's family members in treatment decision-making, considering alternative treatments and expressing their opinion	3.7 (0.7)		
	Providing information on the medical treatment near the patient's living area	3.6 (0.9)		
	Providing information on the social welfare (life support) services available near the patient's living area	3.6 (0.9)		

* Analysis of variance test results on the difference in the mean between the nine services: F=31.4, P<0.01.

 Table 3. Statistics of Transitional Care Services and Awareness of Patient-centeredness by the

 Sociodemographic Characteristics of Primary Care Physicians

		Awareness of TCS*		Awareness of patient-centeredness (%)				
	Variable	Mean	t/F	<i>P</i> -	Have no	Have some	Chi-square	P-
		Wican	U/T	value	awareness	awareness	test result	value
Sex	Male	3.8	0.2	0.16	77.4	22.6	05	0.92
	Female	3.9	0.0	0.5 0.10	81.7	18.3	0.0	0.20
Age Specialization	34 years and younger	3.6		<0.01	77.0	23.0	2.5	0.08
	35 - 44 years	3.8	7.3		83.7	16.3		
	45 years and older	3.9			74.2	25.8		
	Internal medicine	3.8			77.8	22.2		
	Family medicine	3.9	2.4	2.4 0.07	74.6	25.4	1.1	0.15
	Other	3.7			81.9	18.1		
Workplace location	Seoul Metropolitan City	3.8			82.0	18.0	3.9	0.06
	Urban areas other than Seoul	3.8	1.9	0.09	77.9	22.1		
	Rural area	3.7			66.7	33.3		

* Awareness of TCS : Measure primary care physicians' understanding of the importance of providing post-discharge services for older adult patients(Response range : 1=Not at all necessary~5=Very necessary)

D. Factors related to awareness of TCS

Hierarchical regression analysis revealed that the awareness of patient-centeredness, age, and workplace location affected the awareness of TCS (Table 4). In other words, primary care physicians with higher priority in patient-centeredness (β =0.16, P=0.01), physicians aged 35 years (β =.08, P=0.04) and those older (β =0.08, P=0.02), and physicians working outside Seoul (β =0.07, P=0.02) had a higher awareness of TCS value.

DISCUSSION

This study was conducted to identify the Primary Care Physicians' Awareness of patient-centeredness and suggest policies necessary to provide patient-centered services, and derive service priorities by identifying care physicians' perception primary of transitional care services and relationships with Sociodemographic factors. As a result of comparing the average scores for each item on TCS priority for primary care physicians, we found that the scores on "description of the diagnosis, current condition, treatment plan, and outcome at the time of admission" and "information and training on self-management of health after discharge" were high. These results are consistent with those in Dronina et al[16] study, which examined the priorities for TCS in the elderly population. In other words, the most important consideration for the patient and primary care physician in providing TCS is to provide training and information for the patient to manage their health and treatment for diseases.

Based on this study's results, we suggest the following implications. First, it is necessary to develop an evidence-based education program for primary care physicians and nurses to improve their awareness of patient-centeredness. According to previous studies that conducted patient-centered education. education on patient-centeredness is performed by participating related medical providers, patients, and families, helps patients actively participate in the treatment and treatment process and facilitates communication with medical staff based on patient-centeredness[19-24].

Table 4. Analysis of Factors Related to Awareness of Transitional Care Services

Variable		Awareness of transitional care services					
		Standardized beta	P-value	Standardized beta	P-value		
Awareness of patient-centeredness (ref=no)		0.15	0.01	0.16	0.01		
Sex (ref=male)	Female			0.08	0.26		
Age	35 - 44 years			0.08	0.04		
(ref=34 years and younger)	45 years and older			0.08	0.02		
Specialization (ref=internal medicine)	Family medicine			0.09	0.34		
	Other			0.07	0.76		
Workplace location	Urban areas other than Seoul			0.07	0.02		
(ref=Seoul Metropolitan City)	Rural			0.11	0.07		
R-square		0.09	< 0.01	0.16	0.01		
R-square change				0.06			

Additionally, it improves patient compliance with treatment. reduces the risk of misdiagnosis due to communication failure, and reduces medical costs by reducing unnecessary diagnostic tests and referrals[19]. To be more specific, Sauers-Ford et al[25] conducted focus group interviews with parents and family members of hospitalized patients to identify the difficulties they face during the transition period after discharge. The result of interview, combined with addressing the problems with medical service providers (doctors, nurses, family nurses, etc.) through their home visits, helped provide a model for reducing the burden experienced by patients and their families during the transitional al[26] period. Allen et examined the effectiveness of patient-centeredness TCS for elderly patients with chronic diseases and derived quality indicators. As a major indicator of patient-centeredness, it was confirmed that evaluating the satisfaction of patients and caregivers and the burden of caregivers on TCS were important factors in improving the quality of medical services. However, according to the results of this study, most(about 80%) of primary care physicians in Korea have never heard of patient-centeredness. The primary care physicians who were the subjects of this study specialized in departments related to geriatric diseases (family medicine, internal medicine, etc.) and were providing medical services at the closest location to patients in the community. Therefore, it is necessary to prepare and distribute guidelines for education to improve patient-centeredness for primary care physicians, and an empirical approach needs to be taken together by designating patient-centered hospitals and promoting best practices.

Second, to provide an efficient and effective TCS program, professional education for medical staff should be conducted. Looking at previous studies that verified the effectiveness of TCS, many studies conducted programs by doctors and nurses who received specialized training[20 - 22]. Buchanan and Besdine[22] conducted a systematic literature review on the development of TCS education programs for physicians, and as a result, the main content was about improved communication skills (53.0%), introduction of TCS, and effective establishment of discharge plans (32.0%). Bowles et al[23] and Burns[24] argued that communication and collaboration skills with community organizations, such as coordinating drug pharmacies, are necessary when developing TCS education programs. Lack of knowledge and experience of TCS was pointed out as a factor hindering the efficiency of providing TCS[23,24]. The interventions should cover four areas: collaboration between healthcare facilities to obtain access to patient discharge information, workflow and protocol for staff training on the significance of TCS for patients and practice, technology team collaboration on the availability of TCS documentation, and the education of the patient (or their caregivers) on the importance of TCS and long-term benefits.

Third, the awareness of TCS is expected to differ depending on the experience and proficiency of primary care physicians. In other words, primary care physicians with more experience may recognize TCS as important, but primary care physicians with less experience may have less awareness of TCS. Therefore, it is necessary to provide

education on TCS in undergraduate education and in the major education process of medical schools. Moreover, to provide education, TCS should be offered as a continuous service, and not only the patient's diagnosis, patient information, and self-management needs in the treatment area but also community resource information and welfare services in of patient-centeredness should terms be considered. Previous studies have shown an improvement in patient-centered communication behavior after receiving training[5]. Schoenborn Christmas^[27] and proposed 2-week а transitional care training program to facilitate a better understanding of the different care settings and systems outside an acute hospital, improve knowledge of collaboration between facilities, and identify and overcome common challenges.

Finally, there was a high demand for TCS among primary care physicians working outside Seoul, where there are few tertiary general hospitals. These results are consistent with those of previous studies. Burdick et al[7] confirmed that the readmission rate of the control group was 11.9%, whereas that of the experimental group was 5% because TCS was provided to patients through primary care physicians in rural areas. Additionally, Baldwin et al^[8] provided services such as current health status evaluation, education, medication adjustment, monitoring, and referring to community resources to patients over the phone through primary care physicians and nurses in rural areas and found that the rehospitalization rate decreased and medical costs were reduced by approximately 43.5%. Therefore, based on these results, it is necessary to develop a system that can cooperate with primary and home medical

care in the currently implemented public healthcare cooperation system project. In other words, when patients return to their being after community discharged from hospitals, it is necessary to check the system so that discharge information can be actively shared with primary care and welfare institutions in communities through public health networks. The financial and institutional environment must be prepared to establish a regional medical cooperation network and foster primary medical professionals.

This study has several limitations. The main limitation of this research is selection bias. resulting from using convenience sampling and a study sample comprising only primary care physicians, thus not covering all care physicians primarv representatively. Second, this study may display a volunteer bias as its processes of conducting a self-report questionnaire subjecting primary care physicians include study participants who have an active attitude toward patient-centeredness and transitional medical services. Third, the sample size was small and did not present practitioners' opinions in the country. Further research should include a complex investigation that includes different (e.g., nurses, stakeholders patients. and caregivers). Furthermore, it is necessary to draw practical improvement plans bv identifying the limitations and obstacles in providing TCS using qualitative methodologies, e.g., interviews with practitioners.

CONCLUSIONS

This study is significant in that it confirmed that most of the primary care physicians in Korea had a low awareness of patient-centeredness, and educational implications were drawn to improve it. In addition, in the provision of TCS, policy and practical implications for efficiently linking primary care were drawn.

REFERENCES

- Institute of Medicine. Crossing the Quality Chasm: A New Health System for the 21st Century. Washington, D.C: National Academy Press 2001;(323):1192.
- Scholl I., Zill JM, Härter M, Dirmaier J. An integrative model of patient-centeredness - a systematic review and concept analysis. PloS one 2014;9(9):e107828. https://doi.org/ 10.1371/journal.pone.0107828
- Coleman EA, Boult C. Improving the quality of transitional care for persons with complex care needs. Journal of the American Geriatrics Society 2003;51:556 - 557. https://doi.org/10.1046/j.1532-5415.2003.51186.x
- The Joint Commission. Hot topics in health care, issue #2. Transitions of care: the need for collaboration across entire care continuum. The Joint Commission [Internet]. 2013. [cited 2022 Aug 02]: Available from: https://wiki.hl7.org/w/images/wiki.hl7.org/6/ 6d/CareTransition-JointCommission-Hot-To pic2_2013-02.pdf
- Maatouk-Bürmann B, Ringel N, Spang J, Weiss C, Möltner A, Riemann U, et al. Improving patient-centered communication: results of a randomized controlled trial. Patient Education and Counseling 2016;99(1): 117–24. https://doi.org/10.1016/j.pec.2015.08.012
- Lee KS. Why is the role of doctors important in community care? Medical Policy Forum 2019;16(4):27–35.

- 7. Burdick TE., Moran DS, Oliver BJ, Eilertsen A, Raymond J, Hort S, et al. Transitional care management quality improvement methods that reduced readmissions in a rural, primary care system. The Journal of the American Board of Family Medicine 2022;35(3):537–547. https://doi.org/10.3122/ jabfm.2022.03.190435
- Baldwin KM, Black D, Hammond S. Developing a rural transitional care community case management program using clinical nurse specialists. Clinical Nurse Specialist 2014;28(3):147–155. https://doi.org/10.1097/NUR.00000000000044
- Counsell SR, Callahan CM, Buttar AB, Clark DO, Frank KI. Geriatric Resources for Assessment and Care of Elders (GRACE): A new model of primary care for low income seniors. Journal of the American Geriatrics Society 2006;54(7): 1136–1141. https://doi.org/10.1111/j.1532–5415. 2006.00791.x
- Lee JH. Job satisfaction of family medicine specialists. The Journal of the Korean Academy of Family Medicine. 1999;20(12): 1697–1708.
- Research Institute For Healthcare Police.
 2020 Korean Physician Servey. Research Institute For Healthcare Police 2021:1–375
- Korea Institute for Health and Social Affairs. Effect on the Health Promotion of the Separation of Prescribing and Description. Ministry of Health and Welfare of South Korea 2002:1–188
- LaNoue MD, Roter DL. Exploring patientcenteredness: The relationship between self-reported empathy and patient-centered communication in medical trainees. Patient Educ and Couns 2018;101(6):1143-1146. https://doi.org/10.1016/j.pec.2018.01.016

- Hirschman KB, Shaid E, McCauley K, Pauly MV, Naylor MD. Continuity of Care: The Transitional Care Model. Online J Issues Nurs. 2015;20(3):1.
- Hur Y, Cho AR, Choi CJ. Medical students' and patients' perceptions of patient-centred attitude. Korean Journal of Medical Education 2017;29(1):33–39. https://doi.org/ 10.3946/kjme.2017.51
- van Melle MA, van Stel HF, Poldervaart JM, de Wit NJ, Zwart DL. Measurement tools and outcome measures used in transitional patient safety; a systematic review. PloS one 2018;13(6): 1–18. https://doi.org/10.1371/journal.pone.0197312.
- Hanrahan NP, Solomon P, Hurford MO. A pilot randomized control trial: testing a transitional care model for acute psychiatric conditions 2014;20(5):315–27. https://doi.org/ 10.1177/1078390314552190
- Dronina Y, Kim SK, Jo HS. Predictors of the need for post-discharge transitional care services in older adults: a cross-sectional analysis. Journal of the Korean Gerontological Society 2022;42(4): 787-803. https://doi.org/10.31888/JKGS.2022.42.4.787
- Agency for Healthcare Research and Quality.
 2012 National Healthcare Quality Report. AHRQ[Internet]. 2013 [cited 2022 Aug 02]. Available from:https://www.ahrq.gov/sites/ default/files/publications/files/2012nhqr.pdf
- Akosah KO, Schaper AM, Havlik P, Barnhart S, Devine S. Improving care for patients with chronic HF in the community: the importance of a disease management programs. Chest 2002;122(2): 906–912. https://doi.org/10.1378/chest.122.3.906
- Naylor MD, Brooten D, Campbel R, Jacobse BS, Mezey MD, Pauly MV, et al. Comprehensive discharge planning and

home follow-up of hospitalized elders: a randomized clinical trial. Journal of American Medical Association 1999;281(7): 613-620. https://doi.org/10.1001/jama.281.7.613

- 22. Buchanan IM, Besdine RW. A systematic review of curricular interventions teaching transitional care to physicians-in-training and physicians. Academic Medicine 2011;86(5):628-639. https://doi.org/10.1097/ ACM.0b013e318212e36c
- 23. Bowles KH, Foust JB, Naylor MD, Hospital Discharge Referral Decisions Making: A Multidisciplinary Perspective. Applied Nursing Research 2003;16(3):134–143. https://doi.org/ 10.1016/S0897–1897(03)00048–X
- 24. Burns A. Medication therapy management in pharmacy practice: core elements of an MTM service model (version 2.0). Journal of the American Pharmacists Association 2008;48(3):341–353. https://doi.org/10.1331/ JAPhA.2008.08514
- 25. Sauers-Ford H, Statile AM, Auger KA, Wade-Murphy S, Gold JM., Simmons JM, et al. Short-term focused feedback: a model to enhance patient engagement in research and intervention delivery. Medical Care 2021;59:S364.
- 26. Allen J, Hutchinson AM, Brown R, Livingston PM. Quality care outcomes followingtransitional care interventions for older people from hospital to home: a systematic review. BMC healthservices research 2014;14(1):1–18. https://doi.org/ 10.1186/1472-6963-14-346
- Schoenborn NL, Christmas C. Getting out of silos: an innovative transitional care curriculum for internal medicine residents through experiential interdisciplinary learning. Journal of Graduate Medical Education 2013;5(4):681-685. https://doi.org/10.4300/ JGME-D-12-00316.1