



An ethical leadership program for nursing unit managers

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ABSTRACT

Purpose: The aims of this study were to evaluate the effect of an ethical leadership program (ELP) on ethical leadership, organizational citizenship behavior (OCB), and job outcomes of nursing unit managers (UMs) and to examine changes in staff nurses' perception about UMs' EL, OCB, job outcomes, and ethical work environments (EWEs) post-ELP.

Design: A quasi-experimental (pre- and post-test design) study conducted six-month intervention (ELP) using self-reported UM survey ($n = 44$), and staff nurses ($n = 158$) were randomly extracted by two steps.

Methods: The Korean version of Ethical Leadership at Work for UMs' self-ethical leadership, the Ethical Leadership Scale for staff nurses' perceived ethical leadership, a 19-item OCB scale, and six dimensions of the medium-sized Copenhagen Psychosocial Questionnaire II for job outcomes and EWEs were administered at baseline and post-intervention.

Findings: UMs' ethical leadership scores differed significantly over time in people orientation ($p = 0.041$) and concern for ethical leadership sustainability ($p = 0.002$) adjusting for UM experience duration and nursing unit type. Total mean and level of power-sharing of ethical leadership among UMs with < 5 years of UM experience improved significantly over time. Of staff nurses' perception changes about UMs' ethical leadership, OCB, job outcomes, and EWEs, significant improvement over time appeared only in EWEs' work influence level ($p = 0.007$).

Conclusions: This study provides useful information for clinical ELP development and examining the program's effect on leadership skills and followers' outcomes. Program facilitation relies on practical training methods, participant motivation, and assessment outcome designs by controlling clinical confounding factors. Findings have implications as an attempt for intervention to promote competencies related to ethical leadership of nursing unit managers.

1. Introduction

Health care ethics is a globally shared concern. Traditionally, healthcare ethics focused on individual healthcare professionals, particularly patient relationships. However, the 21st-century healthcare delivery system requires ethics at all healthcare leadership levels from staff to clinicians, administrators, executives, and even policymakers (Ho and Pinney, 2016). Inducing business and market-oriented values such as efficiency and cost-effectiveness in healthcare presented modern healthcare delivery system leaders with different ethical challenges from those in the traditional system (Makaroff et al., 2014). Unethical leadership may negatively impact followers' work performance and, consequently, cause problems in patient outcomes and organizational effectiveness (Keselman, 2012).

Ethical leadership (EL) is understood with various questions rather

than one definition, e.g., “What should ethical leaders do?”, “What impact do ethical leaders have?”, and “How can EL be taught?” Brown et al. (2005) present a popular definition of EL as leaders showing “normatively appropriate conduct” and promoting followers' conduct such as honesty, trustworthiness, fairness, care, two-way communication, discipline, and decision-making. Kalshoven et al. (2011) extended this with various behavioral dimensions such as fairness, power-sharing, role clarification, people orientation, integrity, ethical guidance, and concern for sustainability. Nursing scholars have visualized EL among nurses through analyzing several studies (Makaroff et al., 2014). They reported that ethical leaders should not only be responsive and supportive to nurse staff and contextual system but also receive support from superiors. Furthermore, these scholars identified critical nurse leadership roles as building nurse staff ethical competencies and creating an ethical climate (Makaroff et al., 2014). Thornton (2013)

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explained EL with complexity including not only a people-oriented view, including personal ethical traits and organizational responsibilities, but also an environment-oriented view, including interpersonal behaviors and community, society, and future generation responsibilities. She defined EL with seven views (profit, law, character, people, communities, planet, and greater good) and 14 principles.

The importance of EL is also emphasized by its impact on follower and organizational outcomes through organizational experiences and studies. Several academic studies have explored the relationships between EL and theoretically expected outcomes including followers' organizational citizenship behavior (OCB; Kacmar et al., 2011; Lee and Song, 2011), commitment (Cheng et al., 2014; Demirtas, 2015; Kim and Brymer, 2011), job satisfaction (Kim and Brymer, 2011; Yang, 2014), justice (Demirtas, 2015), and trust (Van den Akker et al., 2009). OCB, as a discretionary behavior without formal organization system reward, is recognized as an important factor in promoting employees' high performance (Podsakoff et al., 2014). In terms of promoting social good, EL was conceptually associated with employee OCB including altruism, conscientiousness, sportsmanship, courtesy, and civic virtue, which was supported with empirical evidence (Kacmar et al., 2011). However, rare studies examined the effect of a specific EL program (ELP). Eide et al. (2015) conducted a feasibility study of a web-based ELP in Norway focusing on participant feedback rather than outcomes.

How can EL be promoted? Role-modelling is critical. For educating EL, Gallagher and Tschudin (2010) emphasized a multi-disciplinary approach for expanding professional knowledge and a role modelling process by imitating other leaders and developing virtues and good character. Based on social learning theory, Brown and Trevino (2006) explained how ethical leaders can impact followers' performance and followers can develop EL. Followers would perceive their leaders showing attractive and credible EL behavior and would emulate them following a role-modelling process. Day (2000) claimed that the key concern regarding leadership development is in intrapersonal and interpersonal competency development including understanding others, building commitments, or developing social network. For promoting those competencies related to leadership, various practices, including 360-degree feedback, coaching, mentoring, networking, job assignments, and action learning, have been suggested and implemented (Day, 2000). Eide et al. (2015) used active learning methods such as running an ethical project and reflecting on supportive coach feedback. However, few studies tested the effect on leadership development.

This study started to develop an ELP for helping university hospital nursing unit managers (UMs) to understand EL and foster ethical climates in their units and organizations. The specific purposes of this study were to evaluate ELP effect on UMs' EL, OCB, and job outcomes (e.g., commitment to workplace and job satisfaction), and to examine changes in staff nurses' perception about their UMs' EL, OCB, job outcomes (e.g., commitment to workplace, job satisfaction, and intent to leave), and ethical work environments (e.g., influence at work, horizontal and vertical trust, and justice and respect) after implementing the program.

2. Methods

This was a quasi-experimental (one group, pre- and post-test design) study evaluating the effects of six-month intervention (ELP) using a self-reported survey of UMs and staff nurses.

2.1. Sample

The participants were all UMs and 200 randomly selected staff nurses from 48 units, excluding some out-patient departments in a tertiary university hospital in Seoul, South Korea. Inclusion criteria for staff nurses were ≥ 6 months on a nursing unit whose UM had participated in the ELP. Forty-four UMs and one hundred and fifty-eight nurses of participants completed both pre- and post-test (response rates:

UMs 91.7%, nurses 79.0%).

2.2. Randomization

Staff nurses of 48 units were randomized because all UMs participated in the ELP even though some did not participate in the survey. Personal information collection and usage agreements were obtained from staff nurses before starting this study (earning rate 70.6%, 770/1091). Of those who agreed, a simple random probability sampling was conducted in two steps: 1) after random selection of 20 nursing units out of 48, and 2) 10 nurses were randomly extracted from each by computer-generated randomization.

2.3. Ethical Leadership Program

The ELP was developed as a competency development program for nursing UMs in a university hospital in Seoul, Korea. The ELP aimed to help nursing UMs understand EL and facilitate participation in creating ethical environments and cultures in their hospitals. The main content was developed based on Thornton's seven lenses and EL principles (Thornton, 2013). Thornton (2013) explained 14 principles for helping leaders ethically practice in their organizations with various business-oriented cases. For developing the ELP, a target force team was composed, studied the principles of EL, and developed several cases for adapting the principles into healthcare organizations, especially in nursing and self-evaluation checklists containing EL concepts and skills. The ELP was a six-month program with seven classes. To increase UM participation, the ELP class followed UMs' official monthly meeting.

A six-month ELP was developed with two main active learning elements: 1) practice, where participants planned and practiced EL activities for next month after each class based on self-evaluation EL skill checklists, and 2) small-group discussion, where participants actively learned from sharing experience based on reflection on their own EL activities during the last month. Each class took 2 h: one for small-group discussion and one for lecture and planning EL activities.

The first meeting included ELP orientation and the first lecture. Participants completed the self-evaluation EL skill checklist provided in each lecture, identified their own EL skill-related weaknesses, and planned EL activities to improving the weaknesses in the coming month. The ELP also used peer mentoring in terms of feedback on individual EL activity plans to facilitate participants' reciprocal learning. According to social learning theory (Bandura and Walters, 1977), people generally learn from and mimic behaviors of role models. Peer mentors can be the most relevant sources of work-related support and key developmental assistance (McManus and Russell, 2007). One month later, the next class was reopened, and a small-group discussion commenced for reflecting and sharing EL activity experiences during the last month.

2.4. Measurements

Participants were asked for personal and career information (e.g., age, education level, work experience duration as a registered nurse (RN) or as a UM, nursing unit type). For evaluating ELP effects, EL, OCB, job outcomes, and ethical work environments (EWEs) were tested. All scale items, unless otherwise stated, were answered on a five-point scale; higher scores indicated stronger agreement.

UMs' self-EL was measured using the Ethical Leadership at Work questionnaire developed by Kalshoven et al. (2011) and adapted to Korean nursing organizations and modified as a Korean version (K-ELW) by Kim and Park (2015), who tested its validity and reliability. The K-ELW included 31 items in 7 domains: people orientation, task responsibility fairness, relationship fairness, power sharing, concern for sustainability, ethical guidance, and integrity. Cronbach's α s for the original study and this study were 0.94 and 0.82, respectively. Staff nurses' perceived EL of UMs was measured using the 10-item Ethical

Leadership Scale developed by Brown et al. (2005) and translated by Kim and Chung (2008). The nurses were asked to indicate the extent of their agreement with statements about UMs' EL. Cronbach's α for the original and current study was 0.91.

For OCB, this study used the 19-item scale adapted by Kang (2008) from the original 24-item scale (Podsakoff et al., 1990) with both UMs and staff nurses. Cronbach's α s for the original study and the UMs and staff nurses in this study were 0.87, 0.87, and 0.91 respectively.

For job outcomes and EWEs, this study used six dimensions of the medium-sized Copenhagen Psychosocial Questionnaire II (COPSOQ II; Pejtersen et al., 2010) utilized in various occupations including nursing (Aust et al., 2007; Li et al., 2010). This study used the Korean version of the COPSOQII developed by June and Choi (2013). A single item about intent to leave the hospital within a year (yes or no) was added in survey. The UMs' survey included "commitment to the workplace" and "job satisfaction" for job outcomes, and the staff nurses' survey included "commitment to the workplace," "job satisfaction," and "intent to leave" for job outcomes and "influence at work," "horizontal trust (between colleagues)," "vertical trust (between UM and staff nurse)," and "justice and respect" for EWEs. In COPSOQ II, each item was answered with a four- or five-point scale and rescored from 0 to 100; five-point scales were scored as 0, 25, 50, 75, and 100, and four-point scales were scored as 0, 33.3, 66.7, and 100 (Pejtersen et al., 2010). High scores indicated higher values. Cronbach's α s of six dimensions ranged from 0.57 to 0.83.

2.5. Data Analysis

Data were analyzed using SAS version 9.4 (SAS Institute, Inc., Cary, NC). This study was to examine ELP effects and EL relationships with OCB and job outcomes (pre-post), adjusting for UM experience duration and nursing unit type. Because nurse age and career (RN, UM) experience duration were correlated over the intermediate (Spearman's correlation coefficient > 0.554 ; $p < 0.001$), only career (RN, UM) experience duration was included in further analyses.

We used the generalized estimating equation (GEE) method to consider individual and interaction confounders (with time and group interaction) and the correlation of repeated measures to obtain valid inferences about regression coefficients (Zeger and Liang, 1986); GEE-estimated models allow for better control of modelling the covariance of outcomes over time (Hedeker and Gibbons, 2006).

2.6. Ethical Consideration

This study was approved by a university Institutional Review Board. To ensure confidentiality, the survey was conducted anonymously using identification codes self-created by participants, and the questionnaires were distributed, collected, and analyzed by an independent co-investigator with no interests in participants. Furthermore, general characteristic variables that could predict participants were removed or provided as categorical types. The UMs received a questionnaire in a sealable envelope and were asked to seal their questionnaires immediately after completion. For reducing UMs' influence on staff nurse participation, a mobile survey was conducted with nurses; they received text messages and e-mails with survey instruction and unique, individually allocated URLs and were asked to create a unique ID.

3. Results

Table 1 presents participant characteristics. All UMs were female and held master's degrees or higher. About 70% of UMs were in their 40s and had been UMs more than five years; 45.4% had been RNs > 20 years.

Staff nurses were predominantly women (97.5%), and 73.4% were in their 20s. About three quarters held baccalaureate degrees, and 32.9% had been RNs less than three years.

Table 1
Characteristics of unit managers ($N = 44$) and staff nurses ($N = 158$).

Variables	Unit managers n (%)	Nurses n (%)
Age (year)	< 25	43 (27.2)
	26–30	73 (46.2)
	31–35	24 (15.2)
	36–40	10 (22.7)
	41–45	23 (52.3)
46–58	11 (25.0)	5 (3.1)
Gender: female	44 (100)	154 (97.5)
Education level	Diploma	14 (8.9)
	Baccalaureate degree	115 (72.8)
	Master's degree	29 (18.3)
	Doctoral degree	4 (9.1)
Experience as RN (year)	< 3	52 (32.9)
	3–4	31 (19.6)
	5–9	48 (30.4)
	10–14	8 (18.2) ^a
	15–19	16 (36.4)
≥ 20	20 (45.4)	27 (17.1) ^b
Experience as UM (year)	< 5	12 (27.3)
	≥ 5	32 (72.7)
Nursing unit type	General units	10 (22.7)
	Oncology units	16 (36.4)
	Intensive care units	6 (13.7)
	Others ^c	12 (27.3)
		46 (29.1)
		39 (24.7)
		36 (22.8)
		37 (23.4)

Note.

^a This number is for < 15 years worked as an RN.

^b This number is for ≥ 10 years worked as an RN.

^c Others include operating room and special care units.

3.1. Effects of an Ethical Leadership Program on Unit Managers

Table 2 presents results from GEE analysis on ELP (pre-post) effects and the mean scores and standard deviations (SDs) for EL, OCB, and job outcomes in UMs. Overall mean scores generally improved post-ELP in UMs, but pre- and post-test differences were not statistically significant. There was a statistically significant difference over time in people orientation ($p = 0.041$) and concern for sustainability ($p = 0.002$) of EL adjusting for UM experience duration and nursing unit type.

The UM experience duration/time point (pre-post) interaction was statistically significant in total mean ($p = 0.021$) and level of power-sharing ($p = 0.026$) of EL. Both levels were significantly lower for UMs with < 5 years of UM experience were significantly lower than those of UMs with ≥ 5 years of UM experience in pre-test. However, only UMs with < 5 years of UM experience significantly improved over time. The total mean scores and SDs in pre- and post-test were 3.79 ± 0.20 and 3.99 ± 0.17 for UMs with < 5 years of UM experience and 4.04 ± 0.26 and 4.06 ± 0.26 for UMs with ≥ 5 years of UM experience. Those for power-sharing were 3.65 ± 0.31 and 3.94 ± 0.34 for UMs with < 5 years of UM experience and 3.89 ± 0.28 and 3.90 ± 0.34 for UMs with ≥ 5 years of UM experience.

OCB was positively related to EL of UMs ($p < 0.001$) and job outcomes: commitment to workplace ($p < 0.001$) and job satisfaction ($p < 0.001$).

3.2. Changes in Staff Nurses' Perception of Ethical Leadership and Outcomes Post-ELP

Table 3 presents results from GEE analysis on ELP impacts and mean scores and SDs for changes in staff nurses' perception about their UMs' EL and OCB, job outcomes, and EWEs after implementing the ELP (pre-post). Overall mean scores declined significantly in staff nurses' perception about UMs' EL from pre- to post-test ($p = 0.028$).

For staff nurses' OCB, job outcomes, and EWEs, overall mean scores also almost declined, only significantly improving over time in level of influence at work of EWEs ($p = 0.007$). The level of horizontal trust

Table 2
The effects of an ethical leadership program on unit managers: parameter estimates and 95% CIs ($N = 44$).

Variables	Pre-test	Post-test	Time (vs. pre-test)	Ethical leadership	OCB
	Mean (SD)	Mean (SD)	Estimate [95% CI]	Estimate [95% CI]	Estimate [95% CI]
Ethical leadership					
People orientation	4.00 (0.35)	4.10 (0.34)	0.10 [0.00, 0.20] ^a		
Task responsibility fairness	4.34 (0.56)	4.42 (0.53)	0.08 [− 0.11, 0.28]		
Relationship fairness	4.48 (0.44)	4.40 (0.47)	− 0.08 [− 0.23, 0.06]		
Power sharing ^a	3.82 (0.31)	3.91 (0.34)	0.09 [− 0.03, 0.20]		
Concern for sustainability	3.72 (0.65)	3.98 (0.54)	0.27 [0.10, 0.43] ^{**}		
Ethical guidance	3.75 (0.46)	3.81 (0.47)	0.06 [− 0.08, 0.20]		
Integrity	4.00 (0.41)	3.97 (0.33)	− 0.03 [− 0.14, 0.09]		
Total mean ^a	3.97 (0.27)	4.04 (0.24)	0.07 [− 0.00, 0.14]		
OCB	3.93 (0.42)	4.00 (0.40)	0.02 [− 0.05, 0.09]	0.72 [0.47, 0.98] ^{***}	
Commitment to workplace	70.55 (15.86)	70.74 (15.65)	− 1.70 [− 5.78, 2.37]	5.25 [− 6.94, 17.44]	23.32 [15.81, 30.84] ^{***}
Job satisfaction	64.04 (12.04)	66.12 (12.04)	0.98 [− 2.17, 4.13]	2.51 [− 10.42, 15.44]	14.19 [6.09, 22.30] ^{***}

Note: SD: standard deviation. OCB: organizational citizenship behavior. All models were adjusted for UM experience duration and nursing unit type.

^a Interaction effect between UM experience duration and time was statistically significant in total mean ($p = 0.021$) and the level of power sharing ($p = 0.026$) of ethical leadership. Total mean: $< 5 \times$ post-test ($\beta = 0.25, p < 0.001$), $\geq 5 \times$ pre-test ($\beta = 0.19, p < 0.001$), $\geq 5 \times$ post-test ($\beta = 0.27, p < 0.001$). Power sharing: $< 5 \times$ post-test ($\beta = 0.24, p = 0.013$), $\geq 5 \times$ pre-test ($\beta = 0.29, p < 0.001$), $\geq 5 \times$ post-test ($\beta = 0.25, p = 0.015$).

^{*} $p < 0.05$.

^{**} $p < 0.01$.

^{***} $p < 0.001$.

($p = 0.326$) in EWEs and intent to leave ($p = 0.201$) in job outcomes post-ELP improved, but not significantly. RN experience duration and nursing unit type was adjusted.

Staff nurses' perceptions about their UMs' EL were positively related to their OCB ($p < 0.001$), job outcomes (job satisfaction, $p = 0.004$), and EWEs—influence at work ($p < 0.001$), horizontal trust ($p = 0.009$), vertical trust ($p < 0.001$), justice and respect ($p < 0.001$)—and OCB was also significantly positively related to all dimensions of job outcomes and EWEs except for justice and respect—commitment to workplace ($p < 0.001$), job satisfaction ($p < 0.001$), and intent to leave ($p < 0.001$)—and influence at work ($p = 0.006$), horizontal trust ($p = 0.031$), vertical trust ($p < 0.001$).

4. Discussion

This study examined ELP effects on UMs' EL, OCB, and job outcomes; changes in staff nurse perception of UMs' EL pre- and post-ELP; and the impact on staff nurses' OCB and job outcome and EWEs. UMs' self-evaluation regarding EL showed significant improvement in people orientation and concern for sustainability of EL dimensions. Although the results may be limited by self-evaluation, they can be explained as

resulting from the ELP. UMs frequently mentioned and demonstrated these topics during a small-group discussion with specific examples from their daily work. In particular, concern for sustainability scores were the lowest of EL scores in the pretest; UMs expressed that practical choices for environmental friendliness were limited because, for patient safety and efficiency, the current healthcare system prefers disposable materials. However, during the ELP, the UMs tried to find ways to practice it in their organizations and personal areas and shared with colleagues. Both peer mentoring and small-group discussion in the ELP may facilitate role modelling and active learning of EL skills among UMs, as expected in the literature (Brown and Trevino, 2006; Day, 2000; Gallagher and Tschudin, 2010). Furthermore, the ELP may be more effective for UMs with < 5 -years' UM experience than those with ≥ 5 -years' experience. Those with < 5 -years' experience may be more motivated and proactive to learn EL skills. Educational program success generally depends on participants' motivation; thus, the study suggests the ELP as more suitable for new UMs with less experience but the high motivation to influence others as a leader.

This study investigated the changes in staff nurse perception of UMs' EL pre- and post-ELP and the impact on staff nurses' outcomes because the ELP would ultimately pursue building an ethical organizational

Table 3
Changes in ethical leadership perceived by staff nurses and outcomes after the ELP: parameter estimates and 95% CIs ($N = 158$).

Variables	Pre-test	Post-test	Time (vs. pre-test)	Ethical leadership	OCB
	Mean (SD)	Mean (SD)	Estimate [95% CI]	Estimate [95% CI]	Estimate [95% CI]
UMs' ethical leadership	3.42 (0.68)	3.31 (0.70)	− 0.10 [− 0.19, − 0.01] ^a		
Staff nurses OCB	3.63 (0.40)	3.59 (0.43)	− 0.02 [− 0.06, 0.03]	0.18 [0.11, 0.24] ^{***}	
Ethical work environment					
Influence at work	40.55 (20.65)	44.62 (19.05)	4.04 [1.10, 6.98] ^{**}	6.40 [3.11, 9.68] ^{***}	8.31 [2.38, 14.23] ^{**}
Horizontal trust	63.87 (14.06)	64.13 (13.09)	0.99 [− 0.99, 2.97]	3.01 [0.76, 5.26] ^{**}	4.76 [0.43, 9.09] [*]
Vertical trust	58.66 (15.37)	57.36 (15.04)	0.67 [− 1.14, 2.49]	12.86 [10.72, 15.01] ^{***}	7.73 [3.97, 11.51] ^{***}
Justice and respect	43.20 (16.99)	41.89 (16.25)	0.67 [− 1.36, 2.69]	14.41 [12.25, 16.57] ^{***}	3.74 [− 0.69, 8.18]
Job outcomes of staff nurses					
Commitment to the workplace	50.40 (16.94)	47.82 (18.33)	− 2.00 [− 4.44, 0.43]	2.21 [− 1.46, 5.87]	16.08 [10.41, 21.75] ^{***}
Job satisfaction	50.80 (16.14)	49.37 (17.52)	− 0.62 [− 2.78, 1.55]	4.29 [1.34, 7.23] ^{**}	10.69 [5.40, 15.99] ^{***}
Intent to leave (yes), %	39.2	35.4	− 0.29 [− 0.74, 0.16]	− 0.28 [− 0.71, 0.15]	− 2.04 [− 2.85, − 1.23] ^{***}

Note: SD: standard deviation. OCB: Organizational citizenship behavior.

All models were adjusted for RN experience duration and nursing unit type.

^{*} $p < 0.05$.

^{**} $p < 0.01$.

^{***} $p < 0.001$.

climate and leading positive impacts on followers' outcomes. However, the results did not show the expected outcomes except for increasing staff nurses' influence at work. The researchers propose the following reasons for the results: at first, the expectation and perception of staff nurses about their UMs' EL might increase after pretest. Therefore, due to their high reported expectation and recognition about specific activities related to EL, staff nurses could be more disappointed without showing a quantum leap of UMs' EL. Another reason may be differences in the situation of their organization between pretest and posttest points. The pretest phase was recognized as the stable period of a year in the organization while the posttest phase was recognized as the unstable period of a year in the organization because of many new nursing and medical staffs coming into the organization and heavy workload of nursing staffs in terms of preparing for healthcare accreditation of their hospital. Therefore, at the later time, staff nurses might be eager to get support from their UMs based on EL. Even though the UMs provided support, staff nurses might feel not enough support or be more disappointed when UMs' leadership could not reach to their expectation. The results of this study suggest that the ELP can be effective for nurturing EL of participants and building ethical climates in an organization, if the needs of followers and the reality of the organization can be reflected on and integrated into the program.

Of staff nurses' outcomes investigated in this study, staff nurses' influence at work only increased at the posttest. The ELP emphasized power sharing and delegation as an EL skill. Many UMs mentioned delegation in their monthly activity plan. Their activities could increase staff nurses' influence at work in the posttest. In addition, during preparation for hospital accreditation, UMs might need to share necessary work with staff nurses to lead effective performance in their units. Therefore, the situation could make opportunities for UMs to exercise EL skills, engaging their staff nurses for high performance. However, without UM support of staff nurses and building trust between them, staff nurses can feel delegation as work loading rather than power sharing or respect (Thornton, 2013). Therefore, although staff nurses felt increased influence at work in their posttest, the result may not connect to their positive evaluation of UMs' EL. EL is a comprehensive competency more than singular ethical conduct, where an ethical leader shows moral conduct based on moral character and specifically expressed in institutional practices (Eide et al., 2015). Because the investigated staff nurses' outcome variables can also be influenced by various uncontrolled confounding factors, the causal relationship between ELP and variables cannot be assumed.

EL was associated with OCB, EWE, and job outcomes. EL is conceptually related to OCB in terms of producing social good (Brown et al., 2005; Kacmar et al., 2011). Generally, previous studies reported a relationship between EL and follower's OCB (Kacmar et al., 2011; Lee and Song, 2011). This study showed positive relationships not only between EL and staff nurses' OCB, as reported in the literature, but also between UMs' own EL and OCB. However, the ELP did not directly impact UMs' and staff nurses' OCB. The findings of this study indicated that UMs' EL may influence trust, justice, and respect among nursing unit members, and may impact staff nurses' job satisfaction, as reported in the previous studies (Demirtas, 2015; Kim and Brymer, 2011; Van den Akker et al., 2009; Yang, 2014). Staff nurses' OCB was also related to job satisfaction, commitment, and intent to leave. These results were consistent with previous studies (Podsakoff et al., 2014). Findings of this study have the implication that EL might significantly impact follower's job outcomes or EWE; thus, a well-developed ELP can play an important role to produce positive organizational outcomes and to create ethical work environment.

The researchers were challenged in terms of ELP operation. First, encouraging UMs' to participate was difficult. The ELP was developed by request of the chief nursing officer in the hospital. Therefore, early on, many UMs did not proactively participate in the ELP, because they did not think they needed it for competency development as middle managers, expecting they already knew the concepts and were

confident in their ethics. A program developed based on participants' needs or acceptability could motivate them and easily lead positive program outcomes. Second, large classes with around 50 UMs were inappropriate to provide sufficient feedback on using active learning methods and decreased participants' concentration. Third, one month between classes may not be an effective period. Although the ELP after UMs' monthly formal meeting was convenient to increase busy UM participation and was planned for practice of planned activities, one month might allow them to lose the focus on the ELP. The one-month interval between classes must be evaluated for effectiveness in facilitating participants' learning.

5. Conclusion

This study provides useful information for developing a clinical ELP and examining its effect on leadership skills and followers' outcomes. Findings suggest that facilitating the program in terms of improving EL competencies may rely on practical training methods, motivation of participants, and designs of assessment outcomes by controlling confounding factors in a clinical context. Therefore, an ELP can be suggested as a competency development program for a new leader group with high motivation. Future studies applying findings to diverse clinical settings can contribute to increasing knowledge in EL and developing an EL program for nursing leaders.

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