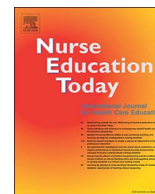




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Health professions faculty beliefs, confidence, use, and perceptions of organizational culture and readiness for EBP: A cross-sectional, descriptive survey[☆]

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ABSTRACT

Background: Evidence-based practice (EBP) is an essential skill and ethical obligation for all practicing health professions clinicians because of its strong association with improved health outcomes. Emerging evidence suggests that faculty who prepare these clinicians lack proficiency to teach EBP.

Objectives: The purpose of this study was to describe; 1) health profession faculty beliefs about and confidence in their ability to teach and implement EBP, 2) use of EBP for education, 3) organizational culture and readiness for EBP; and to determine whether relationships exist among these variables.

Design: This study used a cross-sectional, descriptive survey design.

Setting and Participants: College of Nursing (CON) and College of Health Professions (CHP) faculty from a university located in the Northeast, United States. Faculty were defined as anyone teaching a course for the CON or CHP during the fall of 2016.

Methods: Faculty were invited to complete an electronic survey measuring EBP beliefs, EBP use, and EBP organizational culture and readiness. The survey was comprised of three tools developed specifically for health professions educators in 2010 by Fineout-Overholt & Melnyk.

Results: Sixty-nine faculty returned usable surveys (25.5% response rate). Mean EBP beliefs score was 89.49 (SD = 10.94) indicating respondents had a firm belief in and confidence in their ability to implement and teach EBP. Mean EBP use was 32.02 (SD = 20.59) indicating that respondents taught and implemented EBP between 1 and 3 times in the last 8-weeks. Mean EBP culture and readiness score was 90.20 (SD = 15.23) indicating essential movement toward a sustainable culture of college-wide integration of EBP. Mean scores for beliefs/confidence were higher for full-time clinical faculty compared to other groups [$F_{(2, 55)} = 0.075, p = 0.928; \eta^2 = 0.003$]. Adjunct faculty reported higher EBP behaviors expected by health profession educators in the last 8-weeks compared to other groups [$F_{(2, 55)} = 0.251, p = 0.779; \eta^2 = 0.009$].

Adjunct faculty had the highest mean scores on OCRSIEP-E followed by full-time clinical faculty. These group differences in OCRSIEP-E were statistically significant [$F_{(2, 49)} = 7.92, p = 0.001; \eta^2 = 0.244$]. OCRSIEP-E was significantly different between full-time tenure/tenure track faculty (M = 78.0, SD = 12.58) and full-time clinical faculty (M = 91.37, SD = 14.79, $p = 0.027$) and between full-time tenure/tenure track faculty and adjunct faculty (M = 97.19, SD = 12.39, $p = 0.001$).

Conclusions: Faculty adoption of EBP as a foundational pillar of teaching is essential. Research is needed to define the scope of the problem internationally. Organizations need to set standards for faculty teaching in the health professions to be EBP proficient. Programs preparing faculty to teach in nursing and other health professions must include educator EBP competencies.

1. Background

Evidence based practice (EBP) is a problem-solving approach to how healthcare is delivered that integrates best available evidence with a

clinicians' expertise and patient values and preferences (Melnyk and Fineout-Overholt, 2015). EBP is the gold standard for clinical practice for health professions disciplines and has been endorsed as a core competency by the Institute of Medicine (IOM) since 2003 (Institute of

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Medicine, 2003). The EBP process has been associated with improved healthcare quality, reliability, patient care outcomes, and reductions in variation of care and costs (Melnyk et al., 2014). Faculty as role models for EBP across didactic and clinical courses is essential for supporting the paradigm shift from tradition based care to evidence based care (Melnyk et al., 2008). Creating a culture that uses evidence to inform clinical practice starts with faculty who use the EBP process in their teaching and academic practice (Kalb et al., 2015).

Adoption of the EBP process in nursing education has been slow because of several factors (Al Hadid et al., 2011; Patterson and Klein, 2012). The majority of nurse educators are aged 46 to 60 years (63%) with 30% aged 60 and older; in contrast to the 6.7% of educators who are < 46 (Kauffman, 2010). EBP competencies were not introduced to nursing education until after 2003 (Stevens, 2013) so many of today's nurse educators did not have EBP content in their nursing or post-professional degree education and may lack knowledge or understanding of the EBP process (Mick, 2017). Other barriers include lack of knowledge and confidence in teaching EBP, weak information and literacy skills, no framework for curricula (Stichler et al., 2011), no time for EBP, minimal resources and support (e.g. having accessible, relevant evidence) (Stichler et al., 2011; Upton et al., 2015), and lack of cohesion between academic and clinical teaching contexts (Upton et al., 2015). These barriers are not unique to nursing and exist in other health professions disciplines (Harding et al., 2014; Manspeaker and Van Lunen, 2011).

EBP is an expectation in clinical practice so health professions educators must recognize the ethical obligation to be proficient in EBP for teaching (Orta et al., 2016). An emerging body of evidence suggests that faculty proficiency in EBP is mixed. Nursing faculty in one university were found to have EBP knowledge and competence similar to that of undergraduate nursing students (Orta et al., 2016). A survey of faculty in the United States and United Kingdom revealed positive attitudes toward EBP but faculty lacked confidence in knowledge and skills (Upton et al., 2015). A survey of nurse practitioner faculty demonstrated fairly high self-reported knowledge of EBP however there were gaps in knowledge (Bernadette Mazurek Melnyk et al., 2008).

1.1. Statement of Problem

With the IOM 2020 goal that 90% of clinical decisions be evidenced-based, there is a need to foster faculty use of EBP in their academic practice, to prepare graduates at all levels to use EBP effectively in all practice settings (Kalb et al., 2015), and to prepare faculty to be EBP mentors in complex healthcare systems (Jeffers et al., 2008). To meet this mandate, faculty in higher education must examine their own EBP knowledge, beliefs, and skills in order to achieve sustained EBP culture in academia that translates to practice (Fineout-Overholt et al., 2010).

1.2. Purpose

The primary purpose of this study was to describe; 1) health professions educator's beliefs about and confidence in their ability to teach and implement EBP, 2) use of EBP for education, 3) the organizational culture and readiness for EBP; and 4) to determine whether relationships exist among these variables.

1.3. Ethical Considerations

The University Institution Review Board approved this study. An introductory email with a link to the survey explained the voluntary nature of the study and confidentiality of data. Consent was implied by participant completion of survey. Permission to use the EBP tools for educators was obtained (Fineout-Overholt and Melnyk, 2010a, 2010b, 2010c).

2. Methods

2.1. Design and Participants

Using a cross-sectional, descriptive survey design, all College of Nursing (CON) and College of Health Professions (CHP) faculty from a university in the Northeast, United States were invited to complete an electronic survey measuring EBP beliefs, EBP use, and EBP organizational culture and readiness. Faculty were defined as anyone teaching a course for the CON or CHP during the fall of 2016.

2.2. Measures

The survey was comprised of the following tools developed specifically for health professions educators in 2010 by Fineout-Overholt and Melnyk (2010a). There were also 10 demographic questions included in the survey.

The EBP Beliefs Scale for Educators (EBPB-E) is a 21 item, 5-point Likert scale (1 = Strongly Disagree to 5 = Strongly Agree) that measures health profession educators' beliefs about and confidence in their ability to teach and implement EBP. There are two reverse scored items ("I believe that EBP takes too much time." "I believe EBP is difficult."). Scores range from 21 to 105 with higher scores indicating stronger EBP beliefs about and confidence in educators' ability to teach and implement EBP. Scores ≥ 84 indicate a firm belief in and commitment about implementing EBP (E. Fineout-Overholt, personal communication, June 2, 2017).

The EBP Implementation Scale for Educators (EBPI-E) was designed by Fineout-Overholt and Melnyk (2010b) to measure health profession educators' actual implementation of EBP through self-report of engagement in expected behaviors of evidenced-based educators. There are 18 items scored with a 5-point frequency scale where respondents select the number that best describes how often each item applied to them in the past 8 weeks (0 times, 1–3 times, 4–5 times, 6–8 times, > 8 times). The range of scores is 18 to 90. Higher scores indicate more times implementing EBP in the last 8 weeks. For example, a score between 36 and 53 would indicate that respondents have implemented EBP between 4 and 5 times but < 6 times in the last 8 weeks (E. Fineout-Overholt, personal communication, June 2, 2017).

The Organizational Culture and Readiness for School-wide integration of EBP Scale (OCRSIEP-E) was designed by Fineout-Overholt and Melnyk (2010c) to measure cultural factors that influence the implementation of EBP within an academic environment and the perceived readiness for school-wide integration of EBP. The OCRSIEP-E is a 25 item, 5-point Likert scale with varying response categories (1 = "none at all" to 5 = "very much"). Scores range from 25 to 125 with scores > 75 indicating moderate movement toward a culture of EBP, but not yet sustainable; scores < 75 indicate an opportunity for growth within the academic organization toward a culture of EBP; and scores < 100 and > 75 indicate an essential movement toward a sustainable culture of school-wide EBP. Validity of all the tools described in this section has been established and consistently performs reliability with internal consistency > 0.85 (E. Fineout-Overholt, personal communication, June 2, 2017).

2.3. Procedures

Study authors collaborated with tool authors to create an electronic survey to collect data for this study. A list of faculty teaching in the fall of 2016 was obtained from each program in the CON and CHP. Faculty were sent an email describing the study that included a URL to take study participants to the electronic survey. Time to complete the survey was approximately 25 min. In order to increase the response rate program chairs and directors in the CON and CHP were asked to announce the study at their faculty meeting. The initial survey was sent October 2016 and monthly follow up emails were sent through December 2016.

2.4. Data Analysis

Data were exported into an Excel file. Data analysis was done using IBM Statistical Package for the Social Sciences for Windows Version 23 (Armonk, NY). Descriptive statistics were used to describe frequencies and distribution of survey answers. Bivariate comparisons were performed using *t*-test and correlation.

3. Results

Seventy surveys were returned of which 69 were complete for a response rate of 25.5%. Eighty-eight percent of the respondents were female (*n* = 60). Respondents' ages ranged from 24 to 90 years (*M* = 48.56); years practicing in profession ranged from 3 to 50 years (*M* = 23.90); and years in higher education ranged from 1 to 40 years (*M* = 9.36). Forty-two percent (*n* = 27) of respondents were adjunct faculty, 36% (*n* = 24) were full-time clinical faculty, and 20% (*n* = 13) were full-time tenure track or tenured faculty. There were slightly more respondents from the CON (*n* = 39, 56.51%) then CHP (*n* = 30, 43.49%). Highest level of education was evenly distributed among respondents with 34.33% (*n* = 23) held a master's degree, 34.33% (*n* = 23) held a practice doctorate, and 31.34% (*n* = 21) held a PhD. Nearly half the respondents graduated from their last degree program within the last 5 years (*n* = 36), 31.88% (*n* = 22) within 6–15 years and 15.95% (*n* = 11) > 15 years ago. Three-quarters of respondents held a national certification (*n* = 50). The majority of respondents reported having formal education or training in use of EBP (86.76%, *n* = 59). Eighty-three percent (*n* = 49) of respondents reported having EBP as part of the curriculum in their degree program and 50% (*n* = 29) reported having EBP continuing education courses.

3.1. The EBPB-E Scale

The overall EBPB-E mean score was 89.49 (SD = 10.94) indicating respondents had a firm belief in and confidence in their ability to teach and implement EBP. The individual mean scores for the 21 statements of the scale are reported in rank order in Table 1. All mean scores for the positive statements were > 3.5 indicating strong beliefs in and confidence about EBP implementation. Mean scores for the reverse scored items indicated that respondents believed EBP did not take too much time nor was it difficult.

Table 1
Mean scores on the EBPB-E Scale (*n* = 65).

	Mean(SD)	Strongly agree/agree (%)	Neither disagree nor agree (%)
I believe that EBP results in the best clinical care for patients.	4.71(0.45)	91.4	0
I believe that critically appraising evidence is an important step in EBP process.	4.67(0.51)	90	1.4
I am sure that implementing EBP will improve the care that my students deliver to patients.	4.61(0.52)	90	1.4
I am sure that integrating EBP into the curriculum will improve the care that students deliver to their patients.	4.61(0.49)	91.4	0
I am sure that evidence-based guidelines can improve clinical care.	4.55(0.50)	91.4	0
I am clear about the steps of EBP.	4.43(0.81)	81.4	5.7
I am sure that I can implement EBP.	4.35(0.91)	82.9	1.4
I believe the care that I deliver is evidence-based.	4.34(0.70)	82.8	7.1
I am sure I can teach EBP.	4.30(0.85)	78.6	5.7
I know how to teach EBP sufficiently enough to impact students' practice.	4.27(0.85)	77.1	5.7
I am sure that I can teach how to develop a PICOT questions.	4.19(0.94)	71.5	15.7
I am confident about my ability to implement EBP where I work.	4.17(0.85)	77.1	8.6
I am sure that I can teach how to search for the best evidence.	4.14(0.97)	77.1	7.1
I am sure about how to measure outcomes of clinical care.	4.14(0.89)	75.7	8.6
I am sure that I can access the best resources in order to integrate EBP in the curriculum.	4.09(0.79)	72.9	15.7
I believe that I can search for best evidence to answer clinical questions in a time efficient way.	4.06(0.94)	71.4	11.4
I am sure that I can implement EBP in a time efficient way.	4.03(0.84)	72.8	12.9
I know how to implement EBP sufficiently enough to make curricular changes.	3.98(0.86)	71.4	12.9
I believe that I can overcome barriers in implementing EBP.	3.97(0.80)	70	17.1
I believe that EBP takes too much time.	2.06(0.85) ^a	4.3	18.6
I believe EBP is difficult.	2.42(0.88) ^a	12.8	20

^a These are reverse scored items and therefore are expected to have low responses.

3.2. The EBPI-E Scale

The overall EBPI-E mean score was 32.02 (SD = 20.59). Respondent's actual engagement in expected EBP behaviors was low averaging 1–3 times in the last 8-weeks. The individual mean scores for the 18 statements are reported in rank order in Table 2. The majority of the mean scores fell below 2.5 indicating an opportunity for intervention and building of engagement in expected behaviors of evidence-based educators.

3.3. The OCRSIEP-E Scale

The overall OCRSIEP-E mean score was 90.20 (SD = 15.23) indicating essential movement toward a sustainable culture of college-wide integration of EBP. The individual mean scores for the 25 items are reported in rank order in Table 3. Item mean scores of < 3.5 indicating “somewhat” and demonstrate areas for improvement were in the availability of scientists for evidence generation, librarians used for searches, movement toward EBP in last 6-months, EBP mentors/champions at various levels, and decision-making at the faculty/college level. Only 16 (22.9%) respondents answered moderately or very much to the existence of fiscal resources to support EBP.

3.4. Associations between EBP Beliefs, Implementation and Organizational Culture

There was a statistically significant positive linear relationship between the beliefs scale (EBPB-E) and implementation scale (EBPI-E) (*r* = 0.556, *p* < 0.001) among health professions educators. There was a statistically significant positive linear relationship between the beliefs scale (EBPB-E) and organizational culture and readiness for school-wide integration of EBP scale (OCRSIEP-E) (*r* = 0.366, *p* = 0.008) among health professions educators. There was a weak positive linear relationship between EBPI-E and OCRSIEP-E scales (*r* = 0.148, *p* = 0.281).

3.5. EBP Beliefs, Implementation and Organizational Culture by Faculty Status

Table 4 displays the mean scores for each scale by faculty status. There were no statistically significant differences in mean baseline

Table 2
Mean scores on the EBPI-E Scale (n = 61).

	Mean(SD)	6–8 times or > 8 times (%)	4–5 times (%)
Shared evidence from a research study with a student	3.0(1.32)	57.1	10
Critically appraised evidence from a research study	2.72(1.43)	54.3	8.6
Read and critically appraised a clinical research study.	2.51(1.44)	44.3	14.3
Informally discussed evidence from a research study with a colleague.	2.48(1.48)	42.8	12.9
Used evidence to change my educational practice	2.10(1.43)	31.4	12.9
Collected data on a clinical/educational issue.	1.93(1.57)	31.4	12.9
Promoted the use of EBP to my colleagues.	1.93(1.52)	31.5	14.3
Accessed the Cochrane Database of Systematic Reviews.	1.80(1.66)	32.4	5.7
Shared evidence from a research study with a multi-disciplinary team member.	1.72(1.57)	27.2	10
Shared evidence from a study or studies in the form of a report or presentation to > 2 colleagues.	1.67(1.50)	24.3	12.9
Shared an EBP guideline with a colleague.	1.41(1.44)	21.4	7.1
Evaluated the outcomes of an educational change.	1.36(1.47)	20	11.4
Accessed the National Guidelines Clearinghouse.	1.31(1.63)	24.3	2.9
Used an EBP guideline or systematic review to change educational strategies where I work.	1.33(1.46)	18.6	11.4
Generated a PICOT question about my educational practice specialty.	1.26(1.45)	20	10
Shared the outcome data collected with colleagues.	1.23(1.42)	17.2	8.6
Evaluated an educational initiative by collecting outcomes.	1.16(1.39)	15.8	5.7
Changed curricular policies/materials based on outcome data.	1.07(1.28)	12.9	8.6

Table 3
Mean scores on the OCRSIEP-E Scale (n = 55).

	Mean(SD)	Moderately/very much (%)	Somewhat (%)
To what extent do faculty have access to quality computers and access to electronic databases for searching for best evidence?	4.42(0.92)	67.1	5.7
To what extent do faculty have proficient computer skills?	4.25(0.70)	70	7.1
To what extent is faculty with whom you work committed to EBP?	4.25(0.84)	61.5	15.7
To what extent do librarians within your organization have EBP knowledge and skills?	4.24(0.90)	65.7	7.1
To what extent do you believe that EBP is practiced in your organization?	3.98(0.97)	52.9	20
To what extent are there EBP champions in the environment among senior faculty?	3.98(0.91)	51.5	24.3
To what extent is EBP clearly described as central to the mission and philosophy of your institution?	3.96(1.17)	51.4	20
To what extent are there administrators within your organization committed to EBP (e.g. have planned for resources and support [e.g. times] to initiate EBP)?	3.73(1.06)	44.3	22.9
In your organization, to what extent is there a critical mass of faculty who have strong EBP knowledge and skills?	3.91(0.93)	50	24.3
To what extent do faculty model EBP in their educational and clinical settings?	3.8(1.08)	47.1	20
To what extent is the measurement and sharing of outcomes part of the culture of the organization in which you work?	3.73(0.93)	58.19	32.73
To what extent are there EBP champions in the environment among clinical faculty?	3.65(1.09)	47.1	17.1
Overall how would you rate your institution for readiness for EBP?	3.64(1.16)	44.3	15.7
To what extent are the community partners with whom you work committed to EBP?	3.58(0.96)	41.4	28.6
To what extent are there EBP champions in the environment among junior faculty?	3.55(1.03)	41.4	24.3
To what extent are there scientists (doctorally prepared researchers) in your organization to assist in generation of evidence when it does not exist?	3.49(1.02)	38.6	27.1
To what extent are the librarians used to search for evidence?	3.45(1.07)	38.6	21.4
Compared to 6 months ago, how much movement in your organization has there been toward an EBP culture?	3.42(0.99)	32.9	35.7
In your organization, to what extent are there faculty who are EBP mentors?	3.29(1.01)	35.7	22.9
To what extent are decisions generated from university administrators?	3.09(1.25)	28.6	17.1
To what extent are there EBP champions in the environment among administrators?	3.07(1.10)	22.8	31.4
To what extent are there EBP champions in the environment among community partners?	3.04(0.90)	21.5	41.4
To what extent are decisions generated from college administrators?	3.00(1.05)	22.9	27.1
To what extent are fiscal resources used to support EBP (e.g. education-attending EBP conferences/workshops, computers, paid time for the EBP process, mentors)?	2.93(1.12)	22.9	24.3
To what extent are decisions generated from faculty?	2.75(0.93)	17.2	24.3

Table 4
Mean scale scores by faculty status.

	EBPB-E	EBPI-E	OCRSIEP-E
Sample size full-time tenure or tenure track/full-time clinical faculty/adjunct faculty	12/22/24	12/23/23	12/19/21
	Mean(SD)		
Full-time tenure or tenure track faculty	88.75(11.69)	29.67(20.40)	78.0(12.58)
Full-time clinical track faculty	90.27(11.22)	29.83(22.23)	91.37(14.79)
Adjunct faculty	89.54(10.67)	33.78(20.23)	97.19(12.39)

characteristics (age, years in practice, years teaching in higher education) among the three groups. Mean scores for beliefs and confidence in implementing EBP were slightly higher for full-time clinical faculty compared to the other groups [$F_{(2, 55)} = 0.075, p = 0.928$; partial eta squared = 0.003]. Adjunct faculty respondents reported higher EBP behaviors expected by health profession educators in the last 8-weeks compared to other groups [$F_{(2, 55)} = 0.251, p = 0.779$; partial eta squared = 0.009]. Adjunct faculty respondents had the highest mean scores on the OCRSIEP-E followed by full-time clinical faculty. These group differences in OCRSIEP-E were statistically significant [$F_{(2, 49)} = 7.92, p = 0.001$; partial eta squared = 0.244]. OCRSIEP-E was significantly different between full-time tenure/tenure track faculty ($M = 78.0, SD = 12.58$) and full-time clinical faculty ($M = 91.37, SD = 14.79, p = 0.027$) and between full-time tenure/tenure track

faculty and adjunct faculty ($M = 97.19$, $SD = 12.39$, $p = 0.001$).

4. Discussion

If clinical decision making is to be wholly based on evidence, the faculty who train healthcare professionals should have strong beliefs in and confidence to use EBP in their daily academic practice. Moreover, academic settings should foster a teaching practice based on the EBP process and create a college-wide culture that supports EBP. In this descriptive survey study, health professions faculty had strong beliefs and confidence in their ability to teach and implement EBP however, regular use of EBP in their teaching was low. There are a few studies where researchers used other tools to measure EBP knowledge, beliefs, confidence, and use among nursing faculty (Orta et al., 2016; Stichler et al., 2011; Upton et al., 2015). Using a small single group intervention design, researchers found RN to BSN faculty reported strong confidence and ability to use EBP however self-reported knowledge post-intervention did not change and faculty answered only 51% of EBP knowledge questions correctly (Orta et al., 2016). Although researchers did not measure EBP knowledge in the current study, study findings for confidence and ability to use EBP were strong.

The overall EBPI-E scores found in this study demonstrate a need for intervention and building of engagement in expected behaviors of evidence-based educators. Findings from two studies suggest that nurses working in academia are not fully engaged in the EBP process (Malik et al., 2016) nor is the EBP process part of their teaching philosophy (Felicilda-Reynaldo and Utley, 2015). In the latter study, only 16% of respondents specifically mentioned EBP as part of their personal teaching philosophy. The authors of the current study reviewed the CON and CHP mission and philosophy and EBP was not included. This conflicts with the over 50% of health professions faculty who answered “moderately/very much” to the question, ‘*To what extent is EBP clearly described as central to the mission and philosophy of your institution*’. Recognizing EBP in the college mission and philosophy and health professions educators’ personal teaching philosophy may facilitate the accountability of EBP use in teaching.

The overall OCSIEP-E scores found in this study showed an essential movement toward a sustainable culture of college-wide integration of EBP. Barriers to EBP use included lack of doctorally prepared scientists, lack of EBP champions, limited resources to support EBP, and limited faculty generated decisions. Other studies of nursing educators have identified similar barriers to EBP use (Stichler et al., 2011; Upton et al., 2015). In a study of athletic training educators, lack of time and knowledge, role strain, and a gap between clinical and educational practices were barriers to EBP use (Manspeaker and Van Lunen, 2011). These results suggest that the barriers to EBP use in academic practice may be similar across health professions.

Study findings revealed positive relationships between EBP beliefs, use and organizational culture. This link has been observed in other studies that sampled nurses in academia (Malik et al., 2016; Stichler et al., 2011; Upton et al., 2015). Strong belief in EBP and an organizational culture that supports EBP is important for EBP uptake and sustainability.

Nursing faculty differences in knowledge/skills and the practice of EBP based on academic degree have been reported (Stichler et al., 2011; Upton et al., 2015). In this study, full-time tenure or tenure track faculty reported the lowest mean scores on all measures and these faculty were doctorally prepared based on university requirements. In a survey of 40 nursing faculty at two schools of nursing in the United States with baccalaureate and master’s level programs, doctorally prepared faculty had significantly lower mean scores in the practice of EBP as compared with master’s prepared faculty (Stichler et al., 2011). These findings may in part be explained by doctoral faculty having more knowledge, skill and use of the scientific method than the EBP process and training as researchers. In contrast, academic faculty from two United States and United Kingdom universities reported higher EBP

beliefs or use as compared to clinical faculty and scored significantly higher on self-reported knowledge of EBP (Upton et al., 2015). Academic and clinical faculty were defined based on the setting the nurse works in and this may explain the divergent findings.

5. Limitations

These results should be viewed within the context of the following limitations. This study used a single setting and convenience sampling. The response rate was 25.5% and to increase participation, CON and CHP program directors were asked to announce the study at their faculty meeting, as well as intermittent email reminders to participate in this study. Another email survey study was going on at the same time and survey fatigue (Olson, 2014) may in part explain the lower response rate. Faculty who did not respond to the email survey may have different EBP beliefs, use, and perception of the organizational culture. Data were self-reported so faculty responses may be subject to social desirability bias.

6. Conclusion

This study represents a small segment of health professions faculty perceptions of EBP related to their academic practice therefore, a national study is needed to further define the scope of the problem in higher education. There is a need to identify effective interventions for building EBP behaviors and organizational culture in academia. For starters, colleges and universities dedicated to training health professionals need to examine their mission and philosophy and add EBP if missing. Health professions educators should add EBP to their personal teaching philosophy and weave it into the curriculum. Policy organizations need to set standards for faculty teaching in the health professions to be EBP proficient. Organizations should provide resources to support faculty adopting an EBP culture in their teaching and academic practice. Organizations may also want to explore an EBP national certification which would add to the level of expertise for faculty. Lastly, programs preparing faculty to teach must include EBP competencies for the educator.

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