Preparing for Clinical Placements and Transition to Practice with Objective Structured Clinical Examinations: A Qualitative Study of Family Nurse Practitioner Students

Sean Sibley, PhD, MSN, APRN, FNP-C[1], Kathryn Robinson, PhD, MHA/Ed, RN[1], Janet Fairman, PhD[2], Carla Nye, DNP, CPNP[3], Patricia Poirier, PhD, RN[1], Kelley Strout, PhD, RN[1]

1 - School of Nursing, University of Maine | 2 - College of Education and Human Development, University of Maine | 3 - School of Nursing, Virginia Commonwealth University

INTRODUCTION

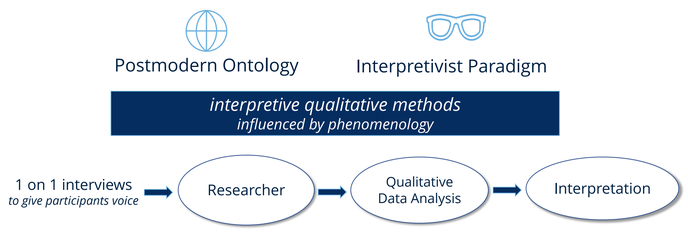
- Faculty need evidence-based methods of assessing learner progression toward competency attainment.
- Objective Structured Clinical Examinations (OSCE) are a form of high-fidelity simulation and evidence-based teaching/learning tool with actors called standardized patients (SP) often acting out specific scenarios (Lioce et al., 2020).
- OSCEs have been widely recognized as valid and reliable assessment tools in nursing education) yet have primarily been evaluated in pre-licensure and acute care nurse practitioner student populations (Navas-Ferrer et al., 2017. This leaves a gap in understanding OSCE applicability to family nurse practitioner (FNP) education.

AIM

- The overall aims of this research were to (a) explore how recent graduates from FNP programs relate formative OSCE simulation experiences to competency development and (b) how they describe related behavior change after their experience(s).

- **Research Questions**:
  1. How do recent graduates from FNP academic programs perceive their lived-experiences with OSCE simulations as a method to develop and evaluate competency behaviors in their educational program?
  2. How do recent FNP graduates relate their formative OSCE experiences to behavior change within their clinical learning experiences as students?
  3. How do recent FNP graduates anticipate applying formative OSCE simulation experiences to future clinical practice after starting their first job in the role of an FNP?

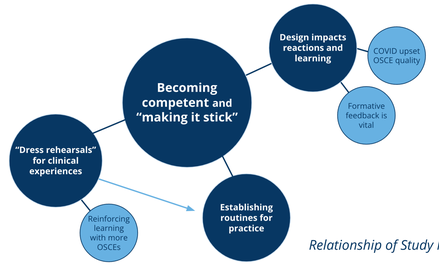
METHODS



- A constructed theoretical framework inclusive of Kolb's Experiential Learning Theory and Miller's Pyramid of Professional Competence Framework was developed.
- A key informant identified diverse U.S. FNP programs using formative OSCEs and engaged with best practices. Second-level recruitment through U.S. NP residency programs.
- Participant inclusion criteria: (a) graduated from a FNP program within the last 12 months, (b) not practiced as a licensed FNP for more than 12 months, (c) completed at least one OSCE simulation experience during their FNP program, and (d) FNP degree was the first advanced practice nursing role.
- **Data collection** via semi-structured one-on-one interviews on Zoom.
- **Data analysis** was influenced by Braun & Clarke's Thematic Analysis (2006) but with intentional integration of inductive and deductive methods to test the theoretical framework and established science. Coding and analysis completed in NVivo.

FINDINGS

- 9 participants, all female, over half (55%) were between the ages of 21 and 30.
- Represented 6 FNP programs in diverse geographic regions of the U.S. Most were at large (55%) and public (89%) institutions per Carnegie Classification®. Almost half (44%) of the programs were delivered face-to-face on campus.
- 4 broad themes and 3 sub-themes emerged.



Relationship of Study Results

Becoming Competent and "Making it Stick"

OSCEs allow application of knowledge from coursework. OSCEs addressed competencies including patient-centered care, communication, clinical judgement, and physical examination.

["It's reinforcing it and making it stick better. You always remember something better when you have to do it versus when you just have to write it down or answer a multiple choice question."]

Design Impacts Reactions and Learning

Grading OSCEs increased anxiety during performance and negatively impacted perceived learning. Pre-briefing and clear expectations allowed rehearsal for the OSCE and to develop cognitive frameworks.

["I think the training related ones [not graded] definitely helped my learning. They helped solidify things that I had only read about before."]

Sub-theme: COVID Upset OSCE Quality Modifications (e.g., OSCEs virtually) did not seem intentionally designed. Lack of in-person skill building was disappointing.

[" You haven't really had time to practice a lot of these skills in real life and then you're trying to figure out how to assess somebody virtually. It was just not ideal."]

Sub-theme: Formative Feedback is Vital Immediate feedback helped build confidence, correct thinking, and identify gaps to remediate.

["I remember hearing people say that I made them feel comfortable, even though I didn't feel like I was doing anything special, just being myself and how I would talk to any patients. [It] just clicked and gave me [the] confidence of: Oh, I can do this."]

"Dress Rehearsal" for Clinical Experiences

Particiapnts used OSCEs to organize the flow of patient encounters. Shifted thinking from a RN to an FNP and helped overcome initial nerves. Increased confidence to start precepted clinical learning experiences.

["From stepping out of the nurse role and into an advanced practice nurse role…how you're presenting yourself as a provider…the way that you're framing questions, the way you're interacting with patients and being able to speak more at that provider level…I think that the OSCEs were the beginning of being like: okay, I gotta be able to figure this out."]

Sub-theme: Reinforcing Learning with More OSCEs Participants wanted more OSCEs to reinforce or address gaps in clinical experiences.

Establishing Routines for Practice

OSCEs were largely responsible for developing frameworks for clinical reasoning and judgement and allowed participants to fully act as an FNP without preceptor support like in precepted clinical settings.

["The OSCEs provided more of a simulated time-restricted patient interaction. So it's like: ok, gotta get your ducks in a row, make sure that you're doing things in a particular order each time…solidifying that routine or pattern to make sure that you're going through each thing every time in a standardized manner."]

DISCUSSION

- **OSCEs are experiences for learning and showing**
  - Knowledge was prerequisite for OSCEs which are a concrete experience to *show* clinical competencies.
    - Pre-briefing is vital to leaner success and psychological safety, but pre-brief content was not always obvious to the participant.
- **Best practices for better outcomes**
  - Participants desired clear scenario outcomes and scaffolding.
  - Debriefing and receiving feedback demonstrate the reflection process of experiential learning and were identified as important elements of the participants' simulation experiences.
- **Progressing from *shows* to *does***
  - OSCEs resulted in cognitive frameworks for facilitating patient encounters, clinical reasoning, and communication.
    - Participants moved from demonstrating skills in the OSCE experience and applied the skills to real patients in clinical learning and early novice practice.
- **Acting as an FNP**
  - Participants acted like FNPs in OSCEs without preceptor safety nets and transferred these practiced routines to their first FNP job.

IMPLICATIONS FOR FNP EDUCATION

- **Opportunities for Faculty Development**
  - Faculty should integrate INACSL's Standards for Best Practice to improve learner reactions, outcomes, and ensure established routines are of high quality.
- **Curricular Integration and Competency Based Education (CBE)**
  - OSCEs promote readiness for clinical learning experiences and the development of cognitive frameworks for clinical reasoning and judgment for *patient-centered care* competencies. When students are prepared for clinical learning, it may reduce preceptor burden.
    - Findings support using OSCEs for time-one demonstration of AACN *patient care* competencies.
  - Learners support scaffolding simulations across the program to develop and evaluate competencies aligning with expected regular assessment of progress toward mastery in CBE.
- **Future Research**
  - This study shows promise that *behavior* is influenced by OSCEs and may be transferred to early FNP practice. Qualitative findings can inform instrument development for empirical evaluation of longitudinal behavior change.

REFERENCES

Braun, V. & Clarke, V. (2006). Using thematic analysis in psychology. Qualitative Research in Psychology, 3(2), 77-101. https://doi.org/10.1191/1478088706qp063oa

Lioce, L., Lopreiato, J., Downing, D., Chang, T.P., Robertson, J.M., Anderson, M., Diaz, D.A., & Spain, A.E. and the Terminology and Concepts Working Group (2020). Healthcare simulation dictionary (2nd ed.). Agency for Healthcare Research and Quality. https://doi.org/10.23970/simulationv2

Navas-Ferrer, C., Urcola-Pardo, F., Subirón-Valera, A. B., & Germán-Bes, C. (2017). Validity and reliability of objective structured clinical evaluation in nursing. Clinical Simulation in Nursing, 13(11), 531-543. https://doi.org/10.1016/j.ecns.2017.07.003