

NURSING STUDENTS' SELF-EFFICACY IN CARING FOR GENDER-DIVERSE PATIENTS

Doctor of Nursing Practice Project
Presented to the Faculty of MU
Graduate Studies
University of Missouri

In Partial Fulfillment
of the Requirements for the Degree
Doctor of Nursing Practice
by
KELSEY DAY MSN, RN

Miriam Butler, DNP, NP-C, FNP-BC. Committee Chair
Lea Wood, DNP, MSN, RN. Committee Member
Anne Heyen, DNP, RN, CNE. Committee Member
DECEMBER 2024

Abstract

Title

Nursing Students' Self-Efficacy in Caring for Gender-Diverse Patients

Author

Kelsey Day, MSN-RN

Background

Gender-diverse patients (GDP) face barriers in healthcare, including discrimination and limited access to preventive care. Nursing curricula often lack GDP health content, leaving students underprepared to provide equitable care. This QI project aimed to improve RN-BSN students' self-efficacy and comfort in caring for GDP by integrating an educational module into their coursework.

Methods

A literature review revealed the need for increased education on GDP healthcare needs. An evidence-based educational module including a recorded presentation and an interactive case study was developed and implemented in an online course. Thirty-three RN-BSN students completed the module and pre- and post-intervention surveys, measuring interpersonal comfort (TABS) and self-efficacy (SEST). Changes in attitudes and beliefs were analyzed.

Results

The results demonstrated statistically significant improvements in students' recognition of non-binary identities and cultural self-awareness. The median SEST score increased significantly from 9.07 to 9.38 ($p = .003$), and notable gains were observed in students' ability to appreciate and recognize cultural nuances in healthcare.

Conclusions

The QI project highlights the importance of integrating LGBTQ health education into nursing curricula to address knowledge gaps and improve attitudes toward GDP care. Despite not meeting all objectives, the intervention yielded significant insights and positive shifts in attitudes, suggesting the need for broader implementation and further refinement of educational tools.

IRB Approval

IRB approval through exempt review.

Co-Authors

Miriam Butler, DNP, NP-C, FNP-BC; Lea Wood, DNP, MSN-RN; Anne Heyen, DNP-RN, CNE; Jan Sherman, PhD, RN, NNP-BC

Learning Objective

Describe the impact of targeted education on nursing students' self-efficacy in providing culturally competent care to gender-diverse patients.

Nursing Students' Self-Efficacy in Caring for Gender-Diverse Patients

The field of healthcare is structured around a gender binary of male and female, excluding many gender-diverse people. Gender-diverse patients (GDP) often encounter barriers to care, preventive services, and health screenings (Hoy-Ellis et al., 2022), such as negative experiences, discrimination, and mistreatment (James et al., 2016). Reducing barriers can contribute to decreased health disparities, improved quality of life, and reduction in the health burden of aging GDP (Hoy-Ellis et al., 2022).

Gender minority issues are underrepresented in nursing curricula, leading students to feel unprepared to interview for sensitive information, identify resources, and understand the needs of Lesbian, Gay, Bisexual, Transgender, and Queer (LGBTQ) patients (Minturn et al., 2021). This is not surprising when nursing programs average 2.12 hours of LGBTQ content (Sherman et al., 2020). Closing this education gap could help prepare more capable students. This paper will examine the background and significance of GDP content, provide a critical review of educational interventions, and propose a quality improvement (QI) project to improve students' self-efficacy in caring for GDP.

Background and Significance

History and Prevalence. Gender outside of the binary is seen throughout history in the Greek god Hermaphroditus' representation of gender duality, Gala Priests of third millennium BC Mesopotamia's non-traditional gender roles, and the inclusion of multiple genders and "Two-Spirit" identities in pre-Columbus America (Thorne et al., 2019). The medical categorization of gender has shifted throughout history, incorporating physical characteristics, mental space, sexual orientations, and societal norms. Gender-affirming care was recognized in the 1920s (Slagstad, 2021). Even while the language of gender identity shifts from pathologic to inclusive (Kronk & Dexheimer, 2021), there is an increase in legislation targeting gender identity, with thirty-nine bills introduced in 2022 (Dhanani & Totton, 2023). An understanding of the gender-diverse population is difficult as many surveys exclude gender identity in demographics. A compounding issue is patient apprehension about disclosing gender identity (Herman et al., 2022). Using statistics from national surveys, Herman et al. (2022) estimated that over 1.6 million persons over age thirteen identify as transgender in the United States.

Evaluation of Gender-Diverse Patient Content in Nursing Education. Exploring ways to integrate content into educational structures is important (Lim et al., 2015) and can help alleviate barriers to GDP receiving quality and respectful care (McDowell & Bower, 2016). There is a missed opportunity for students to learn to manage their personal discomfort and biases (Rider et al., 2019). Without accreditation requirements, there are institutional barriers to including LGBTQ content in nursing curricula (Kellett & Finton, 2016). Due to the significance of understanding LGBTQ issues in prevention, screening, diagnosis, treatment, and health outcomes, The Institute of Medicine and the U.S. Department of Health and Human Services have made a call to integrate LGBTQ issues into health professions training (McDowell & Bower, 2016).

Implementation and Implications of Gender Minority Topics in Nursing Education. It is integral for faculty to model inclusive behaviors, normalize diversity within healthcare education (Kellett & Finton, 2016), and increase LGBTQ themes throughout the lifespan of the curriculum by using multiple strategies like case studies, simulations, and care plans (McEwing, 2020). Healthcare inequities are often attributed to a lack of knowledge of GDP issues (Click et al., 2019; García-Acosta et al., 2019; Kellett & Finton, 2016; McDowell & Bower, 2016; Rider et al., 2019; Walker et al., 2016). Ignorance surrounding gender issues can lead to discrimination and reduced access to care (Eisenberg et al., 2019). Understanding the language used to describe GDP can increase healthcare providers' abilities to give respectful care (Montes-Galdeano et al., 2020). Students who received practice-based learning related to GDP reported a better self-awareness and increased ability to provide care (Montes-Galdeano et al., 2020), and research suggests that providers' level of comfort and attitudes toward GDP improve with more education (Click et al., 2019; García-Acosta et al., 2019; Montes-Galdeano et al., 2020).

Statement of Purpose and PICOT Statement

The purpose of this QI project is to establish an educational module that will improve RN-BSN students' self-efficacy in caring for GDP. Project objectives relate to the following PICOT statement: In RN-BSN students (P), how does the use of an educational module over gender-diverse patients and their healthcare needs (I) compared to existing education (C) affect students' transcultural self-efficacy and comfort with the patient population (O) over one semester (T)? The primary objectives are RN-BSN students will achieve a 5% increase in interpersonal comfort, as evidenced by the Trans Attitudes and Beliefs Scale (TABS; Appendix C), and a 5% increase in Self-Efficacy Strength (SEST) score will be obtained after completing the module, as evidenced by the Transcultural Self-Efficacy Tool (TSET; Appendix D).

Critical Review of the Literature

A comprehensive review of the literature (Appendix E) on the topic of GDP revealed themes, including barriers to receiving education, methods to measure students' attitudes, knowledge, and competency in GDP care, and the effects of increasing knowledge through education on GDP.

Understanding Student Attitudes, Knowledge, and Cultural Competency. Four articles discussed the reliability and use of established tools to understand students' baseline knowledge and feelings surrounding caring for GDP. Brown et al. (2017) discussed the Big Five Inventory (BFI) tool (Cronbach's $\alpha = .85 - .93$) that measures appreciation for unusual ideas, varied experiences, and willingness to try original things; the Interpersonal Reactive Index (Cronbach's $\alpha = .77$) which measures empathy; and the Genderism and Transphobia Scale-Revised (Cronbach's $\alpha = .94$) which measures transphobia. Brown et al. (2017) and San et al. (2020) utilized the TSET (Cronbach's $\alpha = 0.98$). Three articles discussed new tools and collected narrative findings, showing the Knowledge Questionnaire about Transgender (KQaT) to maintain content validity (García-Acosta et al., 2019) and the reliability of the Sexual Orientation Counselor Competency Scale [Cronbach's $\alpha = .90$ (McEwing, 2020)]. Henriquez et al. (2019), Sawning et al. (2017), and Vance et al. (2018) created and implemented original tools and collected narratives. Four studies discussed innovative teaching using simulation (San et al., 2017), an LGBTQ health certificate program (Sawning et al., 2017), integrated grand rounds (Click et al., 2019), and implementation of e-learning modules (Vance et al., 2021).

Effects of Increasing Education Over Gender Diverse Patients. Nine studies demonstrated an increase in students' knowledge and self-efficacy. Brown et al. (2017) found a significant correlation (47.1%) with higher levels of transcultural self-efficacy in students who received a lecture on transgender issues. After incorporating case studies, Henriquez et al. (2019; Pre-test - $M = 1.74$, $SD = 1.35$; post-test - $M = 4.48$, $SD = 0.670$) and Click et al. (2019; pre-test $M = 2.42$, $SD = .83$; post-test $M = 3.70$, $SD = .63$, $p < .010$) demonstrated an increase in comfort. The addition of education increased knowledge from baseline (García-Acosta et al., 2019; Morris et al., 2019; Sawning et al., 2017; Sekoni et al., 2017). Vance et al. (2018) relayed an increase in self-efficacy scores from 3.5 to 7.0 ($p < 0.001$), while San et al. (2020) showed a statistically significant mean difference of 1.35 ($p < 0.05$) in TSET scores.

Barriers and Interventions to Overcome. Four articles discussed barriers to students receiving education over GDP. A lack of knowledge of LGBTQ populations was identified ($[M = 6.90, (SD) = 1.41, P < 0.001]$ Sawning et al., 2017; $[M = 0.4652, p < .05]$, García-Acosta et al., 2019, [narrative response], Sherman et al., 2020). A lack of resources and time within the academic institution made the inclusion of content difficult (García-Acosta et al., 2019; Sawning et al., 2017), and the exclusion of gender identity in LGBTQ content was a barrier (Henriquez et al., 2019; García-Acosta et al., 2019). A recurring theme within these studies was incorporating more meaningful GDP content into existing curricula. The addition of more formative style learning and increasing LGBTQ themes across the curriculum can help rectify this issue (García-Acosta et al., 2019; McEwing, 2020). The mixed method ($n=8$) and quantitative ($n=3$) study designs in this review give compelling evidence, but higher quality evidence is necessary.

Methods

This QI project involved the creation and evaluation of an educational module including a recorded presentation covering definitions and specific healthcare needs, and an interactive unfolding case study focused on caring for a patient who was gender diverse. The module was expected to take the students one hour to complete. The module was implemented as a mandatory graded assignment in an existing online course at a public nursing school in the mid-west using Canvas and Qualtrics. To evaluate the effect of this educational intervention on students' self-efficacy in caring for and attitudes toward GDP, participants were asked to complete the TABS and Affective subset of the TSET at baseline (T1) and four weeks post-intervention (T2). The target population was a purposive, convenience sample of baccalaureate, post-licensure nursing students. The inclusion criteria were RN-BSN students enrolled in N4400 during the first session of the Fall 2024 semester, and exclusion criteria consisted of anyone not enrolled in N4400. Sample size calculations were based on recommendations from G*Power 3.1 (Faul et al., 2007). To detect the effect size of Cohen's $d = 0.5$ with 80% power ($\alpha = .05$, two-tailed), G*Power suggests a minimum of 12 subjects. There were a total of 37 participants, 33 of whom completed surveys at T1 and T2. Demographic information collected included gender, education, age range, time as an RN, religion, race/ethnicity, experience with GDP, and knowledge of GDP care.

Tools/Measures

The TABS validity was demonstrated by correlating with two established tools [$(r(236) = .88, p < .001)$, $(r(236) = .95, p < .001)$] and reliability was high, with Cronbach's α of .98 (Kanamori et al., 2017). Factor analysis showed high reliability of the TSET (Cronbach's $\alpha = 0.98$), and content validity was ensured by a review of the tool by experts (Jefferys, 2000). These tools are applicable as they measure attitudes and beliefs. Descriptive statistics were utilized to summarize the demographic data of the sample. Data from the TABS was gathered at T1 and T2, and statistics were aggregated to determine the presence of a 5% increase in total interpersonal comfort score (Q1-Q14). The total Affective SEST score within the TSET was calculated at T1 and T2, and the change was computed to determine the presence of a 5% increase. Ratio-level and ordinal-level data underwent analysis using the Wilcoxon signed-rank test. Vargha and Delaney (A) determined the effect size of the Wilcoxon-signed rank test with values of small (.56), medium (.64), and large (.71). Statistical significance was defined as $p \leq .05$. IBM SPSS version 29 was used for statistical analysis.

Results

Demographics

There were 37 total student participants in this QI project. Of these 37 students, 36 completed the survey at T1, and 34 completed the survey at T2. Only the 33 who completed both surveys at T1 and T2 were included in the analysis. The sample was 81.8% female ($n = 27$) and 18.2% male ($n = 6$). The predominant age category was 25-34 years-old (45.5%, $n = 15$), followed by 18-24 years-old (27.3%, $n = 9$). Education level was almost homogenous with 97% ($n = 32$) students holding an associate's degree and 3% ($n = 1$) with a bachelor's degree. Most participants (39.4%, $n = 13$) have spent 0-2 years as an RN, closely followed by 2-5 years (33.3%, $n = 11$), then 5-10 years (18.2%, $n = 6$). The sample consisted of Caucasian (90.9%, $n = 30$) and multiracial (9.1%, $n = 3$) participants. Religious philosophies identified were Christian (69.7%, $n = 23$), Agnostic (12.1%, $n = 4$), Atheist (9.1%, $n = 3$), Muslim (3%, $n = 1$), and other (3%, $n = 1$). Participants reported their previous experience with GDPs as none (3%, $n = 1$), little (48.5%, $n = 16$), moderate (33.3%, $n = 11$), a lot (9.1%, $n = 3$), or a great deal (6.1%, $n = 2$). Similarly, participants reported their current knowledge surrounding GDP care as none (3%, $n = 1$), little (45.5%, $n = 15$), moderate (36.4%, $n = 12$), a lot (9.1%, $n = 3$), or a great deal (6.1%, $n = 2$).

Transgender Attitudes and Beliefs Scale (TABS)

Analysis of the difference in Total Interpersonal Comfort Scores at T1 and T2 with the Shapiro-Wilk's test showed the assumption of normality was violated ($p = .005$). The data was reanalyzed using Wilcoxon-signed rank testing and all assumptions, including the distributional assumptions, were met.

The results showed an increase in the median Total Interpersonal Comfort score between T1 (53) and T2 (55), but it was not statistically significant, $z = -1.62$, $p = .103$. When comparing individual survey questions at T1 and T2, the Wilcoxon signed-rank test revealed a large statistically significant positive increase in three questions: Q1.14 "If I found out my doctor was transgender, I would want to seek another doctor" ($p = .048$, $A = 2.2$), Q1.19 "Humanity is only male or female; there is nothing in between." ($p = .023$, $A = 6.8$), Q1.21 "Although most of humanity is male or female, there are also identities in between." ($p = .017$, $A = 1.5$). Kruskal-Wallis analysis showed a similar distribution of answers between all survey questions and heterogeneous demographic variables: "time as RN," "religious philosophy," "age category," "experience," and "knowledge."

Affective Subset of Transcultural Self-Efficacy Tool (TSET)

Analysis of the difference in T1 and T2 Total Affective SEST with the Shapiro-Wilk's test also showed the assumption of normality was violated ($p = .035$). The data was reanalyzed using Wilcoxon-signed rank testing, which showed there was a statistically significant median increase in the Total Affective SEST score from T1 (9.0667) to T2 (9.3833), $z = -2.94$, $p = .003$. When comparing survey questions at T1 and T2, the Wilcoxon signed-rank test revealed a large statistically significant positive increase in eight questions. Q2.5 "Among clients of different cultural backgrounds, you are AWARE OF: Differences in perceived role of the nurse" ($p = .016$, $A = 1.8$), Q2.6 "you are AWARE OF: Traditional caring behaviors" ($p = .030$, $A = 2.1$), Q2.8 "you are AWARE OF: Comfort and discomfort felt when entering a culturally different world" ($p = .027$, $A = 2.4$), Q2.9 "you are AWARE OF: Interaction between nursing, folk, and professional systems" ($p = .003$, $A = 1.4$), Q2.17 "You APPRECIATE: Client's worldview (philosophy of life)" ($p = .012$, $A = 1.8$), Q2.26 "You RECOGNIZE: Need for cultural care repatterning/restructuring" ($p = .011$, $A = 1.5$), Q2.27 "You RECOGNIZE: Need to prevent ethnocentric views" ($p = .014$, $A = 1.3$), Q2.28 "You RECOGNIZE: Need to prevent cultural imposition" ($p = .013$, $A = 1.4$). Kruskal-Wallis analysis showed a similar distribution of answers between all survey questions and demographic variables: "time as RN," "religious philosophy," "age category," "experience," and "knowledge."

Conclusions

The purpose of the QI project was to implement and evaluate the efficacy of an educational intervention over GDP to RN-BSN students. The first objective of an increase of 5% in Total Interpersonal Comfort was not met with an increase of 3.8%, and the second objective of a 5% increase in Self-Efficacy Strength scores was also not met with an increase of 3.5%. While the primary objectives were not met, there was a statistically significant improvement in the SEST score and several large statistically significant changes in individual question answers, quite notably in Q1.19 and Q1.21 relating to recognition of gender outside of the binary.

Strengths and Limitations

Strengths of this QI project include large statistically significant increases in 11 individual questions and a statistically significant increase in total SEST score. Limitations include an abbreviated project time and the use of purposive convenience sampling. There is also a risk for susceptibility to confirmation, social desirability, and cultural biases, especially with a subject that has been recently prominent in media and political landscapes.

Recommendations

Recommendations have been proposed to stakeholders regarding integrating more education over gender-diverse patient care within all nursing programs. While the increase in interpersonal comfort and self-efficacy scores did not improve the desired amount, there was significant improvement in several areas. It is suggested that this education module undergoes continued improvement using evidence-based educational recommendations. Consideration regarding the timing of presentation of the module within the nursing curriculum should be given. Furthermore, the module could be adapted to the needs of larger healthcare systems to assist in the education of established healthcare workers.

References

- Brown, C., Keller, C. J., Brownfield, J. M., & Lee, R. (2017). Predicting trans-inclusive attitudes of undergraduate nursing students. *Journal of Nursing Education, 56*(11), 660-669.
<https://doi.org/10.3928/01484834-20171020-05>
- Click, I. A., Mann, A. K., Buda, M., Rahimi-Saber, A., Schultz, A., Shelton, K. M., & Johnson, L. (2019). Transgender health education for medical students. *The Clinical Teacher 2020, 17*, 190-194.
<https://doi.org/10.1111/tct.13074>
- Dhanani, L. Y. & Totton, R. R. (2023). Have you heard the news? The effects of exposure to news about recent transgender legislation on transgender youth and young adults. *Sexuality Research and Social Policy, 2023*. <https://doi.org/10.1007/s13178-023-00810-6>
- Eisenberg, M. E., McMorris, B. J., Rider, G. N., Gower, A. L., & Coleman, E. (2019). "It's kind of hard to go to the doctor's office if you're hated there." A call for gender-affirming care from transgender and gender diverse adolescents in the United States. *Health and Social Care in the Community, 28*, 1082-1089. <https://doi.org/10.1111/hsc.12941>
- Faul, F., Erdfelder, E., Lang, A.-G., & Buchner, A. (2009). Statistical power analyses using G*Power 3.1: Tests for correlation and regression analyses. *Behavior Research Methods, 41*(4), 1149-1160.
<https://www.doi.org/10.3758/BRM.41.4.1149>
- García-Acosta, J. M., Castro-Peraza, M. E., Rodriguez, A. A., Perez-Cánovas, M. L., Sosa-Alvarez, M. I., Llabrés-Solé, R., Perdomo-Hernández, A. M., & Lorenzo-Rocha, N. D. (2019). Impact of a formative program on transgender healthcare for nursing students and health professionals. Quasi-experimental intervention study. *International Journal of Environmental Research and Public Health, 16*(17). <http://doi.org/10.3390/ijerph16173205>

Herman, J. L., Flores, A. R., & O'Neill, K. K. (2022, June). *How many adults identify as transgender in the United States?* The Williams Institute, UCLA School of Law.

<https://williamsinstitute.law.ucla.edu/wp-content/uploads/Trans-Pop-Update-Jun-2022.pdf>

Henriquez, N., Hyndman, K., & Chachula, K. (2019). It's complicated: Improving undergraduate nursing students' understanding family and care of LGBTQ older adults. *Journal of Family Nursing*, 24(4), 506-532. <http://doi.org/10.1177/1074840719864099>

Hoy-Ellis, C. P., Fredriksen-Goldsen, K. I., & Kim, H.-J. (2022). Utilization of recommended preventive health screenings between transgender and cisgender older adults in sexual and gender minority communities. *Journal of Aging and Health*, 34(6-8), 844-857.

<https://doi.org/10.1177/08982643211068557>

James, S. E., Herman, J. L., Rankin, S., Keisling, M., Mottet, L., & Anafi, M. (2016). *The report of the 2015 U.S. Transgender Survey*. National Center for Transgender Equality.

<https://www.ustranssurvey.org/reports/#2015report>

Kanamori, Y., Cornelius-White, J. F., Pegors, T. K., Daniel, T., & Hulgus, J. (2017). Development and validation of the Transgender Attitudes and Beliefs Scale. *Archives of Sexual Behavior*, 46, 1503-1515. <https://doi.org/10.1007/s10508-016-0840-1>

Kellett, P., & Fitton, C. (2016). Supporting transvisibility and gender diversity in nursing practice and education: Embracing cultural safety. *Nursing Inquiry*, 24(1). <http://doi.org/10.1111/nin.12146>

Kronk, C. A., & Dexheimer, J. W. (2021). An ontology-based review of transgender literature: Revealing a history of medicalization and pathologization. *International Journal of Medical Informatics*, 156(2021), 104601. <https://doi.org/10.1016/j.ijmedinf.2021.104601>

Lim, F., Johnson, M., & Eliason, M. (2015). A national survey of faculty knowledge, experience, and readiness for teaching lesbian, gay, bisexual, and transgender health in Baccalaureate nursing programs. *Nursing Education Perspectives*, 36(3), 144-152. <https://doi.org/10.5480/14-1355>

- McDowell, A., & Bower, K. M. (2016). Transgender health care for nurses: An innovative approach to diversifying nursing curricula to address health inequities. *Journal of Nursing Education, 55*(8), 476-479. <http://doi.org/10.3928/01484834-20160715-11>
- McEwing, E. (2020). Delivering culturally competent care to the lesbian, gay, bisexual, and transgender (LGBT) population: Education for nursing students. *Nurse Education Today, 94*, 104573. <http://doi.org/10.1016/j.nedt.2020.104573>
- Minturn, M. S., Martinez, E. I., Le, T., Nokoff, N., Fitch, L., Little, C. E., & Lee, R. S. (2021). Early intervention for LGBTQ health: A 10-hour curriculum for preclinical health professions students. *MedEdPortal: The AAMC Journal of Teaching and Learning Resources, 17*, 11072. https://doi.org/10.15766/mep_2374-8265.11072
- Montes-Galdeano, F., Roman, P., Ropero-Padilla, C., Romero-López, A., Ruiz-González, C., & Rodríguez-Arrastia, M. (2020). Improving the care management of trans patients: Focus groups of nursing students' perceptions. *Journal of Nursing Management/Early View, 00*, 1-10. <http://doi.org/10.1111/jonm.13160>
- Morris, M., Cooper, R. L., Ramesh, A., Tabatabai, M., Arcury, T. A., Shinn, M., Im, W., Juarez, P., & Matthews-Juarez, P. (2019). Training to reduce LGBTQ-related bias among medical, nursing, and dental students and providers: A systematic review. *BCM Medical Education, 19*, 325. <https://doi.org/10.1186/s12909-019-1727-3>
- Rider, G. N., McMorris, B. J., Gower, A. L., Coleman, E., Brown, C., & Eisenberg M. E. (2019). Perspectives from nurses and physicians on training needs and comfort working with transgender and gender diverse youth. *Journal of Pediatric Health Care, 33*(4), 379-385. <http://doi.org/10.1016/j.pedhc.2018.11.003>
- Sekoni, A. O., Gale, N. K., Manga-Atangana, B., Bhadhuri, A., & Jolly, K. (2017). The effects of educational curricula and training on LGBT-specific health issues for healthcare students and professionals: A

mixed-method systematic review. *Journal of the International AIDS Society*, 20, 21624.

<http://dx.doi.org/10.7448/IAS.20.1.21624>

Sherman, A. D., McDowell, A., Clark, K. D., Balthazar, M., Klepper, M., & Bower, K. (2020). Transgender and gender diverse health education for future nurses: Students' knowledge and attitudes. *Nurse Education Today*, 97, 104690.

<https://www.doi.org/10.1016/j.nedt.2020.104690>

Slagstad, K. (2021). The political nature of sex – Transgender in the history of medicine. *The New England Journal of Medicine*, 384(11), 1070 – 1074. <http://doi.org/10.1056/NEJMms2029814>

Vance, S. R., Lasofsky, B., Ozer, E., & Buckelew, S. M. (2018). Teaching paediatric transgender care. *The Clinical Teacher*, 15(3), 214-250. <http://doi.org/10.1111/tct.12780>

Walker, K., Arbour, M., & Waryold, J. (2016). Educational strategies to help students provide respectful sexual and reproductive health care for lesbian, gay, bisexual, and transgender persons. *Journal of Midwifery & Women's Health*, 61, 737-743. <http://doi.org/10.1111/jmwh.12506>

Appendix A

DNP D1 Form



DNP Residential Project Committee Appointment Request

Student's Name: Kelsey Day

Student's Number: 08341005

Date Submitted: 11/3/2023

I request that the faculty members listed below be appointed to serve as my Residential Project committee.

Dr Miriam Butler

Name of Chair*

Miriam D. Butler, DNP, NP-C, FNP-BC
Digitally signed by Miriam D. Butler, DNP, NP-C, FNP-BC
Date: 2023.11.30 14:06:35 -06'00'

Signature, Chair of Committee

Dr. Lea Woods

Member*

Signature, Member

Dr. Anne Heyen

Member*

Signature, Member

Member*

Signature of Student

*Please type or print

Miriam D. Butler, DNP, NP-C, FNP-BC
Digitally signed by Miriam D. Butler, DNP, NP-C, FNP-BC
Date: 2023.11.30 14:06:18 -06'00'

Signature of Director of DNP Program, School of Nursing

To be completed during the semester enrolled in: N9080 Section 1 DNP Residency Project

Appendix B

DNP D-3 Form



Approval of DNP Residency Project Proposal and the Institutional Review Board Protocol

Candidate's name: Day, Kelsey Mizzou ID number: 08341005
(Last Name, First Name)

Project Title: Nursing Students' Self-Efficacy in Caring for Gender-Diverse Patients

Signatures of review members
 (Please sign full names legibly)

| | | Acceptable | Unacceptable |
|---------------------------------|---|--|--|
| Chair: <u>Dr. Miriam Butler</u> | Miriam D. Butler, DNP, NP-C, FNP-BC <small>print & sign</small> | Digitally signed by Miriam D. Butler, DNP, NP-C, FNP-BC Date: 2024.07.22 17:22:12 -05'00' | <input checked="" type="checkbox"/> <input type="checkbox"/> |
| Member: <u>Dr. Lea Wood</u> | <u>Lea Wood</u> <small>print & sign</small> | <input checked="" type="checkbox"/> | <input type="checkbox"/> |
| Member: <u>Dr. Anne Heyen</u> | <u>Anne K Heyen DNP, RN, CNE</u> <small>print & sign</small> | <input checked="" type="checkbox"/> | <input type="checkbox"/> |
| Member: _____ | <small>print & sign</small> | <input type="checkbox"/> | <input type="checkbox"/> |

The clinical project is:

The Program Committee has explained the decision regarding the acceptability of my project proposal.

Kelsey Day, MSN-RN
 Student Signature

7/26/24
 Date

Miriam D. Butler, DNP, NP-C, FNP-BC
 Director, DNP Program in Nursing

Digitally signed by Miriam D. Butler, DNP, NP-C, FNP-BC
 Date: 2024.07.22 17:22:27 -05'00'

Date

Appendix C

Transgender Attitudes and Beliefs Scale (TABS)

This questionnaire is designed to measure your beliefs and attitudes toward transgender persons. It is not a test, so there are no right or wrong answers. Please answer each question as carefully and honestly as you can, using the 7-point scale described below. For this questionnaire, a transgender person is defined as a person whose biological sex at birth does not match their felt sense of self as male or female.

| | | | | | | |
|----------------------|----------|----------------------|-------------------------------|-------------------|-------|-------------------|
| Strongly Disagree | Disagree | Somewhat Disagree | Neither Agree nor Disagree | Somewhat Agree | Agree | Strongly Agree |
| 1 | 2 | 3 | 4 | 5 | 6 | 7 |

FACTOR 1 (Interpersonal Comfort)

- Q1.1 I would feel comfortable having a transgender person into my home for a meal.
 Q1.2 I would be comfortable being in a group of transgender individuals.
 Q1.3 I would be uncomfortable if my boss was transgender.
 Q1.4 I would feel uncomfortable working closely with a transgender person in my workplace.
 Q1.5 If I knew someone was transgender, I would still be open to forming a friendship with that person.
 Q1.6 I would feel comfortable if my next-door neighbor was transgender.
 Q1.7 If my child brought home a transgender friend, I would be comfortable having that person into my home.
 Q1.8 I would be upset if someone I'd known for a long time revealed that they used to be another gender.
 Q1.9 If I knew someone was transgender, I would tend to avoid that person.
 Q1.10 If a transgender person asked to be my housemate, I would want to decline.
 Q1.11 I would feel uncomfortable finding out that I was alone with a transgender person.
 Q1.12 I would be comfortable working for a company that welcomes transgender individuals.
 Q1.13 If someone I knew revealed to me that they were transgender, I would probably no longer be as close to that person.
 Q1.14 If I found out my doctor was transgender, I would want to seek another doctor.

FACTOR 2 (Sex/Gender Beliefs)

- Q2.1 A person who is not sure about being male or female is mentally ill.
 Q2.2 Whether a person is male or female depends upon whether they feel male or female.
 Q2.3 If you are born male, nothing you do will change that.
 Q2.4 Whether a person is male or female depends strictly on their external sex-parts.
 Q2.5 Humanity is only male or female; there is nothing in between.
 Q2.6 If a transgender person identifies as female, she should have the right to marry a man.
 Q2.7 Although most of humanity is male or female, there are also identities in between.
 Q2.8 All adults should identify as either male or female.
 Q2.9 A child born with ambiguous sex-parts should be assigned to be either male or female.
 Q2.10 A person does not have to be clearly male or female to be normal and healthy.

FACTOR 3 (Human Value)

- Q3.1 Transgender individuals are valuable human beings regardless of how I feel about transgenderism.
 Q3.2 Transgender individuals should be treated with the same respect and dignity as any other person.
 Q3.3 I would find it highly objectionable to see a transgender person being teased or mistreated.
 Q3.4 Transgender individuals are human beings with their own struggles, just like the rest of us.
 Q3.5 Transgender individuals should have the same access to housing as any other person.

Appendix E

Figure 1: The PRISMA Flow Diagram of the Review of Literature: detailing the databases searched, abstracts screened, and full text articles included.

