RCSI UNIVERSITY OF MEDICINE AND HEALTH SCIENCES

The interface between clinical research delivery and nurse led research in critical care

Dr. Natalie L. McEvoy

PhD, MSc, BSc, PgDip, RGN

StAR Research Lecturer

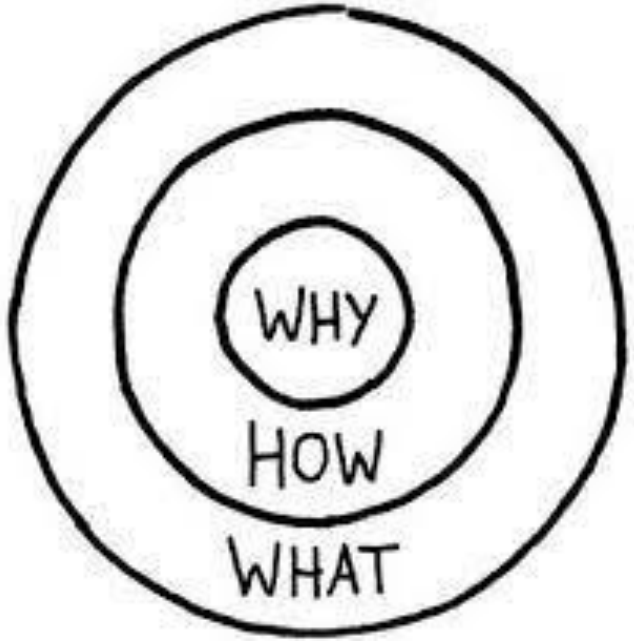
Fulbright 2023-2024 Scholar

RCSI University of Medicine and Health Sciences

Natalie_mcevoy

Introduction

- **What** is clinical research?
- **Why** do we need nurses leading clinical research?
- **How** can we facilitate, encourage and empower nurses to undertake research?

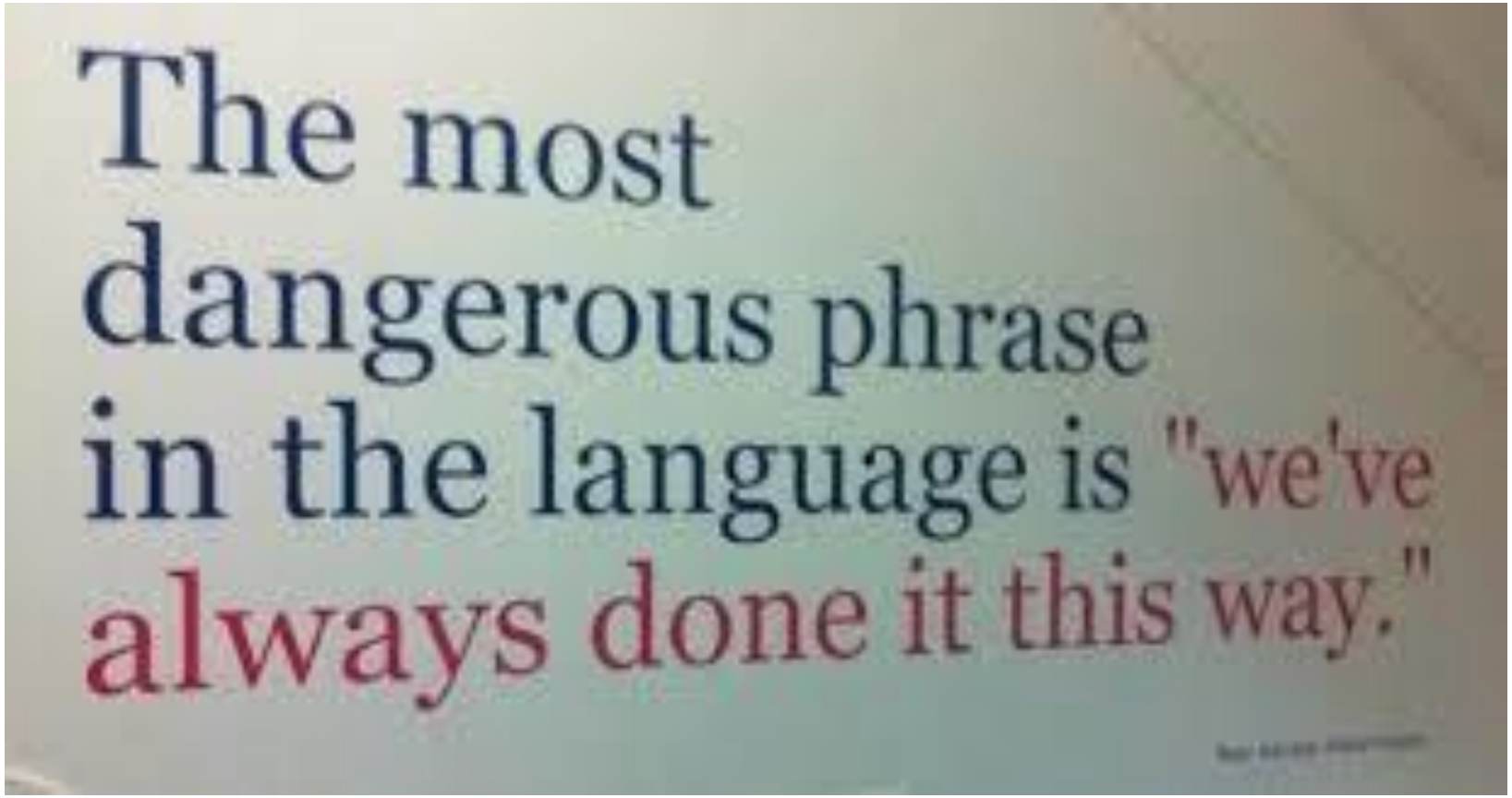


RCSI
UNIVERSITY
OF MEDICINE
AND HEALTH
SCIENCES

What is clinical research?

- **Research is designed and conducted to generate new generalisable or transferable knowledge**
- **Includes both quantitative and qualitative studies that aim to generate new hypotheses as well as studies that aim to test existing or new hypotheses**
- **<u>Process of enquiry</u>**

RCSI UNIVERSITY OF MEDICINE AND HEALTH SCIENCES



RCSI
UNIVERSITY
OF MEDICINE
AND HEALTH
SCIENCES

Why do we need research in ICU?

RCSI
UNIVERSITY
OF MEDICINE
AND HEALTH
SCIENCES

Nurse sensitive outcomes

- **Patient outcomes that are *relevant* based on nurses' scope and domain of practice and that are *influenced* by nursing inputs and interventions [1]**
- **Patient outcomes that can be linked to the quality of nursing care [2]**
- **Differences between hospitals and countries?**
- **Nurse-sensitive outcomes will vary depending on clinical setting (ICU vs oncology)**
- **If we don't measure, we can't improve**

References: 1. Veldhuizen JD, van den Bulck AOE, Elissen AMJ, Mikkers MC, Schuurmans MJ, Bleijenberg N. Nurse-sensitive outcomes in district nursing care: A Delphi study. PLoS One. 2021 May 13;16(5):e0251546. doi: 10.1371/journal.pone.0251546. PMID: 33984030; PMCID: PMC8118269.
2. TWIGGD.E.,GELDERL.&MYERSH.(2015)The impact of understaffed shifts on nurse-sensitive outcomes. JournalofAdvancedNursing71(7),1564–1572. doi:10.1111/jan.12616

Join at menti.com | use code 3742 6604

Ment

NM

Account

Content

Design

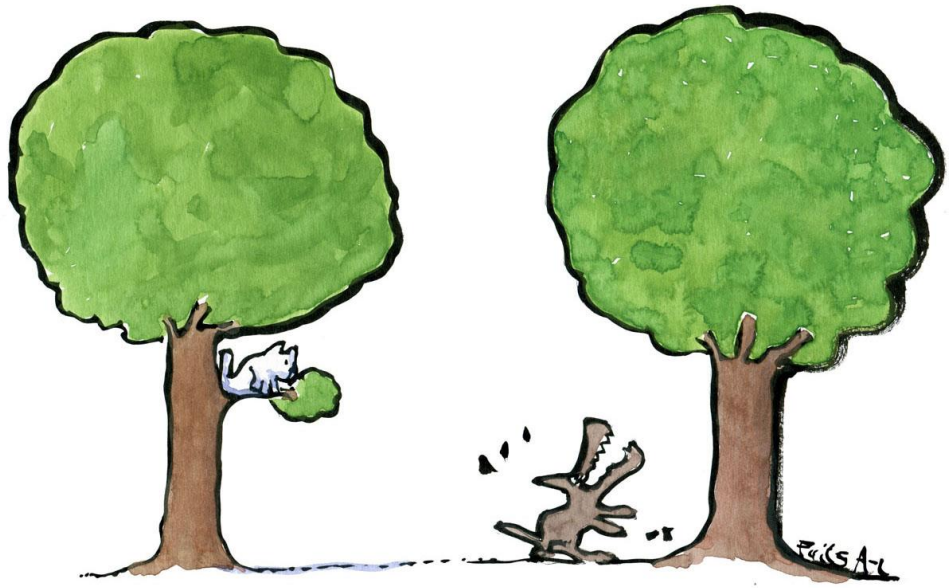
Settings

Let's list some nurse sensitive outcomes

Help & Feedback

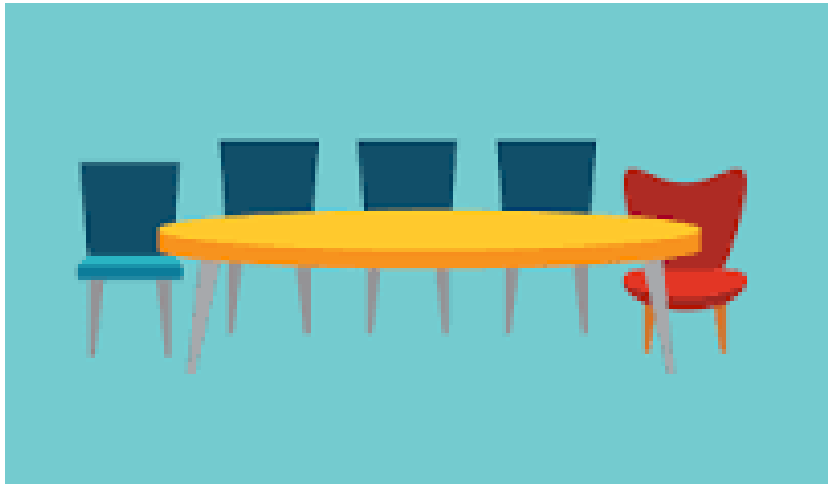
Nurse sensitive outcomes should guide nursing research priorities

- Our research priorities should be guided by NSOs
- Important to ensure we are not “barking up the wrong tree”
- Clear set of outcome measures, operational definitions, benchmark, scope of practice
- Looking at things we do, and focusing on what we can change



Nurses exploring nurse sensitive outcomes

- **If nurses do not study the things they do, then either others will, or the evidence base for these aspects of our nursing care will be lacking[1]**
- **Nurses must be at the forefront of generating evidence and answering important research questions as they arise**
- **Nurses need to have a seat at the table**



Tume, L.N., McEvoy, N.L. and Vollam, S. (2022), Randomized controlled trials in critical care nursing: Essential to move practice forward. Nurs Crit Care, 27: 477-479. https://doi.org/10.1111/nicc.12773

Nursing Outlook 72 (2024) 102271

Contents lists available at ScienceDirect

Nursing Outlook

journal homepage: www.nursingoutlook.org

Call to action: Blueprint for change in acute and critical care nursing

Martha A.Q. Curley, PhD, RN, FAAN [a,*], Margarete L. Zalon, PhD, RN, FAAN [b], Maureen A. Seckel, MSN, RN, FAAN [c], Anne W. Alexandrov, PhD, RN, FAAN [d], Lauren R. Sorce, PhD, RN, FAAN [e], Laura Beth Kalvas, PhD, RN [a], Vallire D. Hooper, PhD, RN, FAAN [f], Michele C. Balas, PhD, RN, FAAN [g], Kathleen M. Vollman, MSN, RN, FAAN [h], Devin S. Carr, DNP, RN, ACNS-BC [i], Vicki S. Good, DNP, RN, CENP [j], Christine L. Latham, DNSc, RN, FAAN [k], Jane M. Carrington, PhD, RN, FAAN [l], Sonya R. Hardin, PhD, RN, FAAN [m], Jan Odom-Forren, PhD, RN, FAAN [n]

[a] University of Pennsylvania School of Nursing, Department of Family and Community Health, Philadelphia, PA
[b] The University of Scranton, Department of Nursing, Scranton, PA
[c] Critical Care and Sepsis Consultant, Newark, DE
[d] University of Tennessee Health Science Center, College of Nursing, Department of Acute and Tertiary Care, Memphis, TN
[e] Ann & Robert H. Lurie Children's Hospital of Chicago, Department of Nursing, Chicago, IL
[f] Ascension, Nursing and Evidence-Based Practice, St. Louis, MO
[g] University of Nebraska Medical Center, College of Nursing, Omaha, NE
[h] Advancing Nursing LLC, Critical Care Consultant, Northville, MI
[i] Maine Medical Center, Nursing and Patient Care Services, Portland, ME
[j] American Association of Critical-Care Nurses, Chief Clinical Officer, Aliso Viejo, CA
[k] California State University, Fullerton School of Nursing, Fullerton, CA
[l] University of Florida, College of Nursing, Department of Family, Community, Health Systems Science, Gainesville, FL
[m] University of Texas Health Science Center at San Antonio, School of Nursing, San Antonio, TX
[n] University of Kentucky, College of Nursing, Louisville, KY

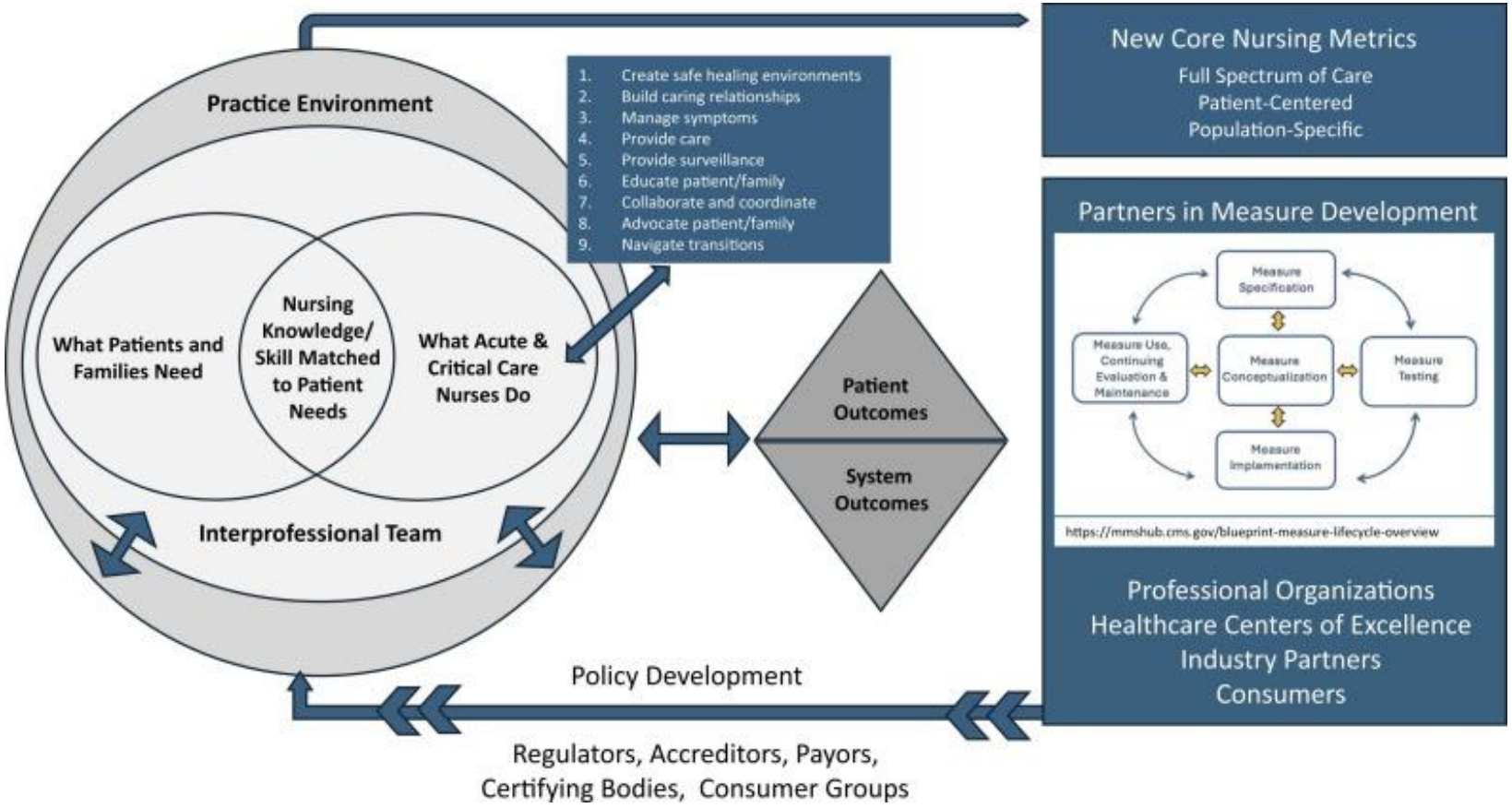
Capturing the true work of nurses

- Precision-based outcomes that call attention to the presence, not the absence, of nursing care
- 9 domains of practice and core elements of hospital environments that support nurses' capacity to provide optimal care
- Flipping the narrative

Curley, M. A. Q., Zalon, M. L., Seckel, M. A., Alexandrov, A. W., Sorce, L. R., Kalvas, L. B., Hooper, V. D., Balas, M. C., Vollman, K. M., Carr, D. S., Good, V. S., Latham, C. L., Carrington, J. M., Hardin, S. R., & Odom-Forren, J. (2024). Call to action: Blueprint for change in acute and critical care nursing. *Nursing Outlook*, *72*(6). https://doi.org/10.1016/j.outlook.2024.102271

RCSI UNIVERSITY OF MEDICINE AND HEALTH SCIENCES

Capturing the true work of nurses: a framework



Curley, M. A. Q., Zalon, M. L., Seckel, M. A., Alexandrov, A. W., Sorce, L. R., Kalvas, L. B., Hooper, V. D., Balas, M. C., Vollman, K. M., Carr, D. S., Good, V. S., Latham, C. L., Carrington, J. M., Hardin, S. R., & Odom-Forren, J. (2024). Call to action: Blueprint for change in acute and critical care nursing. *Nursing Outlook*, *72*(6). https://doi.org/10.1016/j.outlook.2024.102271

RCSI UNIVERSITY OF MEDICINE AND HEALTH SCIENCES

FULBRIGHT
Ireland-USA

RCSI
UNIVERSITY
OF MEDICINE
AND HEALTH
SCIENCES

De-implementation

BACCN Nursing in Critical Care

GUEST EDITORIAL | Free Access

De-implementation of low value clinical practices is essential for critical care nurses

Lyvonne N. Tume RN, PhD, Leanne M. Aitken RN, PhD

First published: 20 February 2024 | https://doi.org/10.1111/nicc.13028 | Citations: 4

Please note that the views expressed in this critical commentary are those of the authors and may not necessarily reflect the opinion of the *Nursing in Critical Care* editorial board, the *British Association of Critical Care Nurses* or Wiley.

RCSI UNIVERSITY OF MEDICINE AND HEALTH SCIENCES

We must ask ourselves…

1. Why am I doing this?
2. What is the evidence base?
3. Is it going to help?

RCSI
UNIVERSITY
OF MEDICINE
AND HEALTH
SCIENCES

The Emergence of Nurse-Led Research

- Research initiated, led, and managed by nurses
- Nurses lead in the design, conduct, and dissemination of findings
- Focus on patient-centered care, improving nursing practices, and health outcomes
- Common research areas: patient safety, symptom management, and health promotion

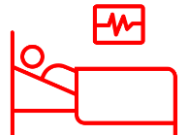
RCSI
UNIVERSITY
OF MEDICINE
AND HEALTH
SCIENCES

The impact of nurse led research

Impact on healthcare practice and policy

Increased visibility and recognition of the nursing profession in research

Improved patient outcomes



RCSI
UNIVERSITY OF MEDICINE AND HEALTH SCIENCES

Nurse led RCTs

BACCN Nursing in Critical Care

EDITORIAL | Free Access

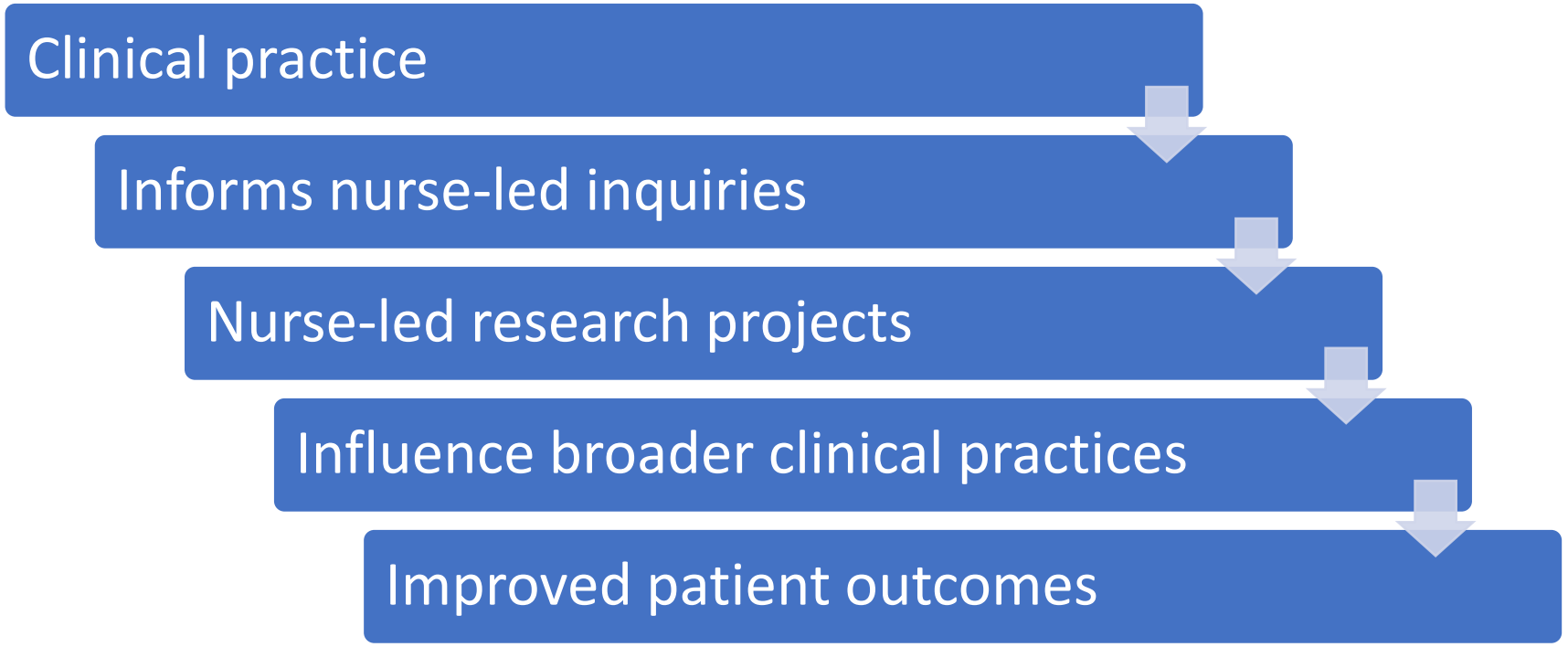
Randomized controlled trials in critical care nursing: Essential to move practice forward

Lyvonne N. Tume, Natalie L. McEvoy, Sarah Vollam

First published: 12 May 2022 | https://doi.org/10.1111/nicc.12773 | Citations: 2

RCSI UNIVERSITY OF MEDICINE AND HEALTH SCIENCES

Interface Between Clinical Research Delivery and Nurse-Led Research



RCSI
UNIVERSITY
OF MEDICINE
AND HEALTH
SCIENCES

Research journey

Dream **vs** **Reality**

RCSI
UNIVERSITY
OF MEDICINE
AND HEALTH
SCIENCES

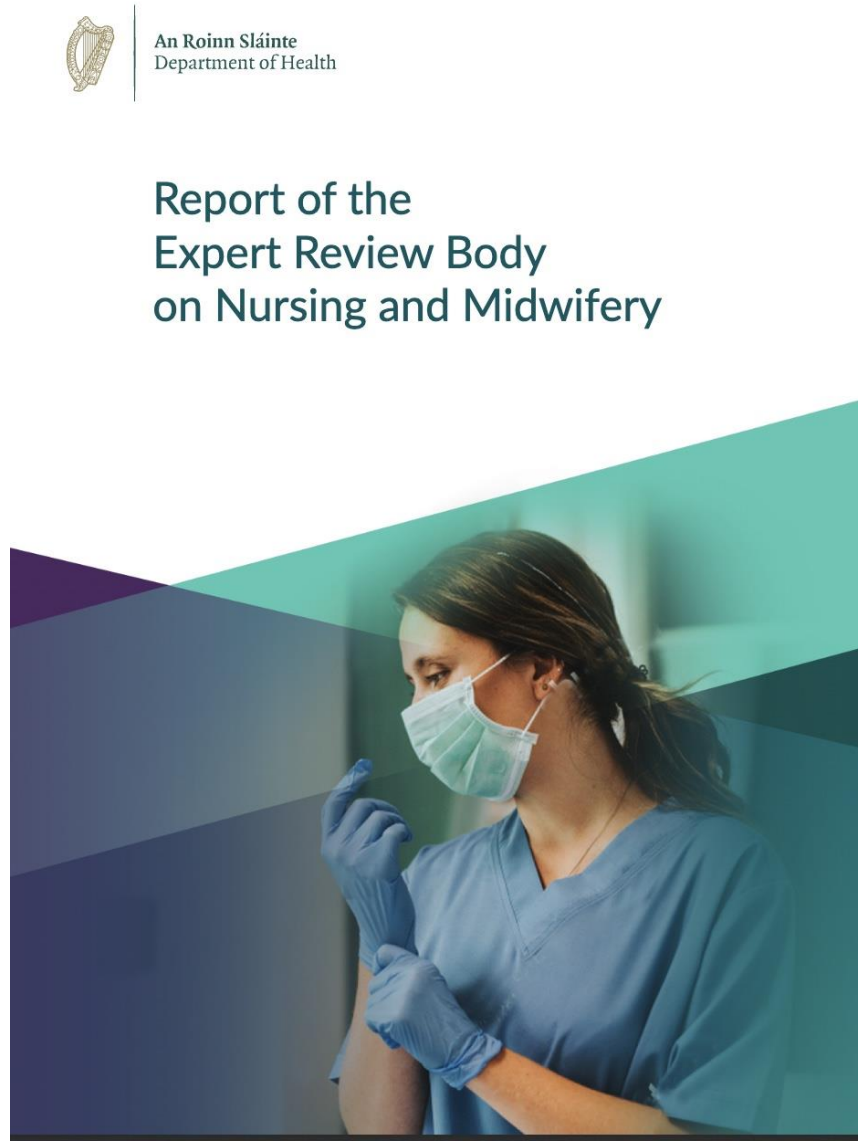
Challenges at the interface

- Balancing research responsibilities with patient care duties
- Time constraints
- Navigating hierarchical structures in research/clinical environments

RCSI
UNIVERSITY
OF MEDICINE
AND HEALTH
SCIENCES

Clinical academic roles in nursing are key

- In Ireland, published in 2021 by Minister for Health
- 46 recommendations
- Need to integrate clinical, academic and research roles of nurses for the advancement of patient care
- Such integration will help advance innovation and enhance the rapid translation of evidence into practice within health services.



Question

How many of you work in an institution where there are clinical academic nurses?

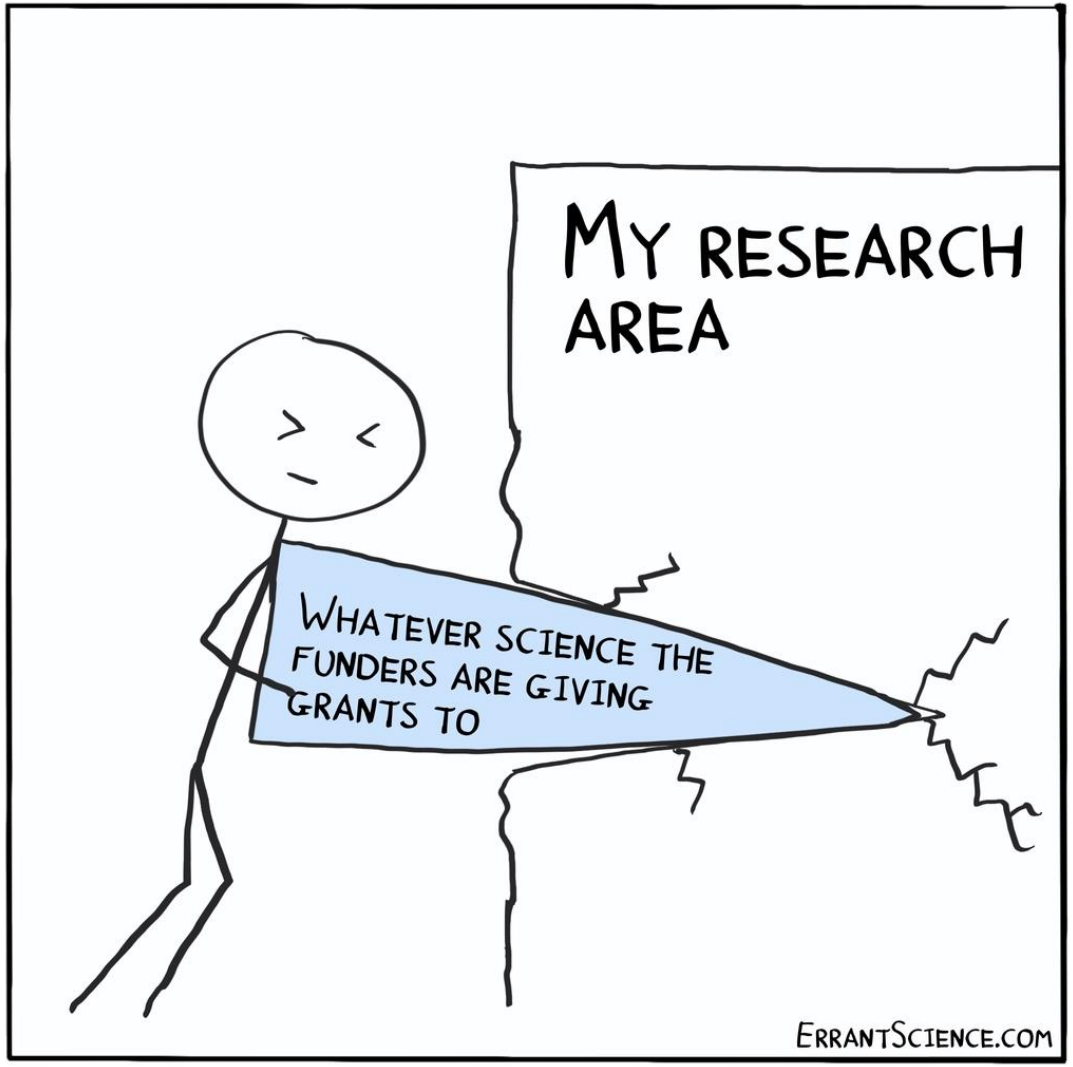
Raise your hand if you are unsure if these roles exist at your institution

RCSI
UNIVERSITY OF MEDICINE AND HEALTH SCIENCES

Funding

RCSI
UNIVERSITY OF MEDICINE AND HEALTH SCIENCES

Funding: finding the right grants



RCSI
UNIVERSITY OF MEDICINE AND HEALTH SCIENCES

Navigating the funding landscape

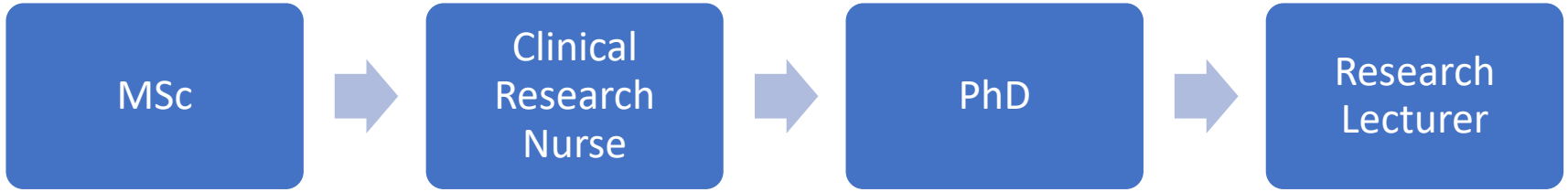
- Career stage (early, mid, late)
- Discipline (nursing)
- Type of research (clinical, translational)
- Affiliation: university/hospital
- Location: country

RCSI
UNIVERSITY OF MEDICINE AND HEALTH SCIENCES

Many different paths

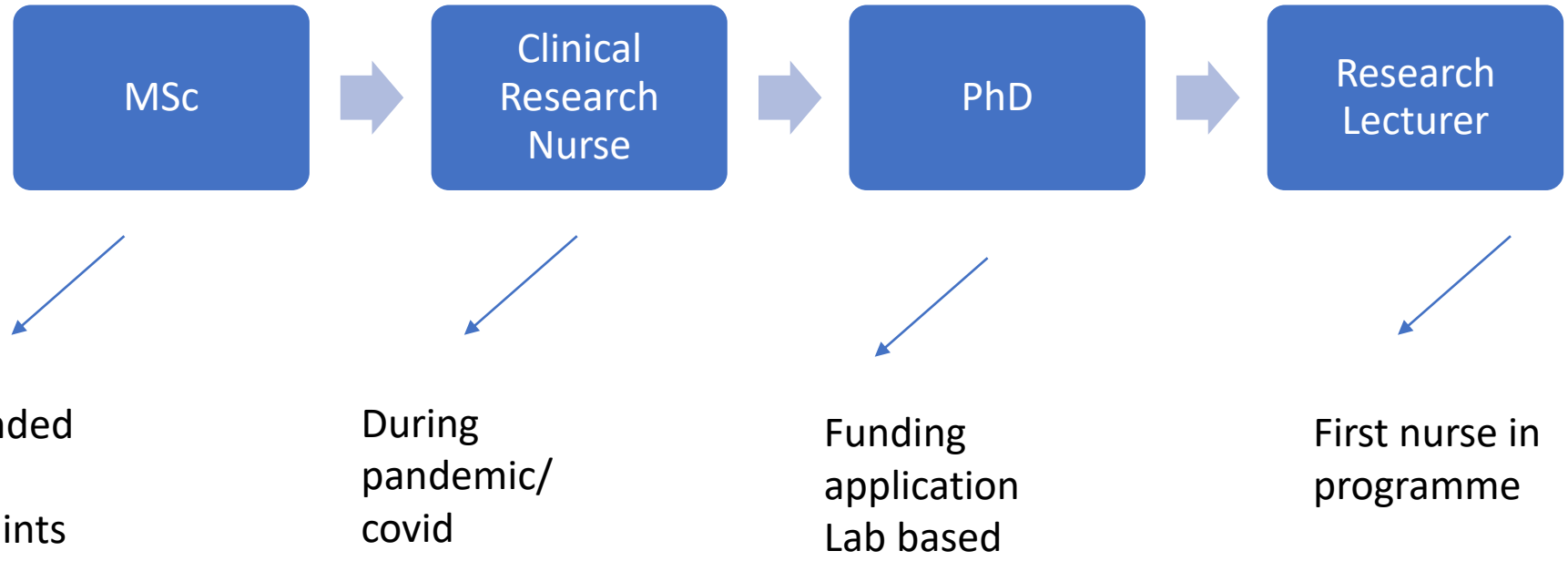
RCSI
UNIVERSITY
OF MEDICINE
AND HEALTH
SCIENCES

My research journey



RCSI
UNIVERSITY OF MEDICINE AND HEALTH SCIENCES

My research journey



RCSI
UNIVERSITY OF MEDICINE AND HEALTH SCIENCES

Tip of the iceberg

RCSI
UNIVERSITY OF MEDICINE AND HEALTH SCIENCES

IMAGES.COM/CORBIS

COLUMN

A CV of failures

Keeping a visible record of your rejected applications can help others to deal with setbacks, says **Melanie Stefan**.

RCSI
UNIVERSITY
OF MEDICINE
AND HEALTH
SCIENCES

Nurses at the interface

- Nurses exploring the things they do and evaluating the impact of nursing care
- Needed at patient, process and systems level
- Generate the evidence
- Bridge the evidence gap
- Challenge low value care practices (de-implementation)
- Integral to practice- not an added bonus!

RCSI
UNIVERSITY
OF MEDICINE
AND HEALTH
SCIENCES

How to get involved in research

- Postgraduate education programmes
- Scholarships
- QI/service evaluation
- Peer review
- Network beyond your immediate networks
- Read research!
- Submit abstracts
- Attend conferences

RCSI
UNIVERSITY
OF MEDICINE
AND HEALTH
SCIENCES

Have confidence in your ideas

- Funding
- Ideas for studies
- Practical suggestions- borrow from prior experiences
- Innovative solutions to clinical problems

RCSI UNIVERSITY OF MEDICINE AND HEALTH SCIENCES

Mentorship

- Mentors can be other nurses, but also from other health disciplines (medicine, HSCP)
- Outside your field of interest
- How to find a mentor can be a difficult first step
- Tip: SEND THE EMAIL!

RCSI
UNIVERSITY OF MEDICINE AND HEALTH SCIENCES

The need to identify research priorities

Received: 23 August 2022 | Revised: 1 February 2023 | Accepted: 14 February 2023

DOI: 10.1111/jnu.12884

JOURNAL OF NURSING SCHOLARSHIP

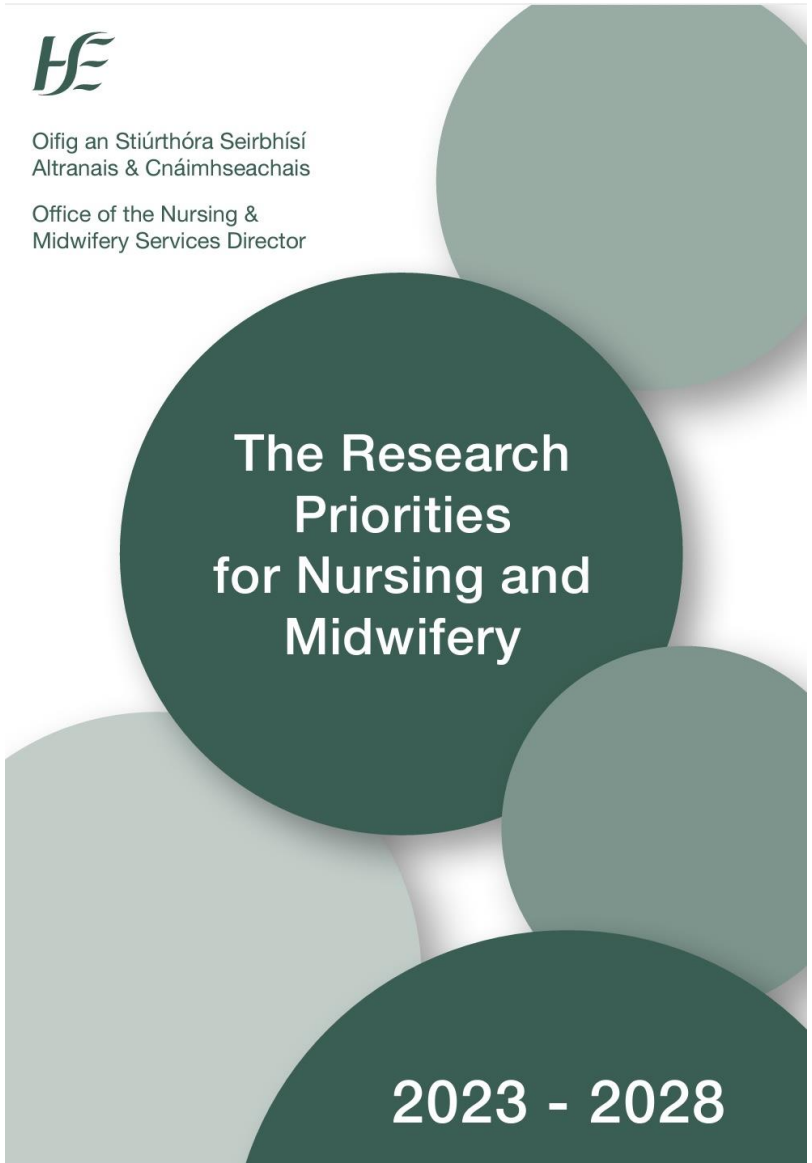
PROFESSION AND SOCIETY

Critical care nursing policy, practice, and research priorities: An international cross-sectional study

Ged Williams RN, Crit. Care Cert., LLM, MHA, FACN, FACHSM, FAAN[1,2] |
Paul Fulbrook RN, PhD, MSc, Post. Grad. Dip. Educ., BSc (Hons)[3,4,5] |
Laura Alberto RN, BN, Esp. Ed., Master Ed., Dip. Com. Sc., PhD[6] |
Ruth Kleinpell RN, PhD, FAAN, FCCM[7,8] | Mathilde Christensen RN, CCN, MSc[9] |
Kabita Sitoula RN, CCN[10] | Ntogwiachu Daniel Kobuh RN, HND, BScN, ACCRN, MScN(st)[11,12]

RCSI UNIVERSITY OF MEDICINE AND HEALTH SCIENCES

Research priorities: an Irish perspective



RESEARCH PRIORITIES IDENTIFIED

Following a meeting with the nominal group who reviewed the categories and sub-categories from phase one of the scoping exercise, consensus was reached on the final research statements that will form the research priorities for nursing and midwifery 2023-2028 (see Table 3). In total there are 20 research statements under 10 research categories.

Workforce Planning

1. Recruitment and retention of nurses and midwives
2. Workload volume, skill mix and safe staffing
3. Health and wellbeing to support nurses and midwives in their role

Access to Services / Service User Involvement

4. The need to enable and empower meaningful and authentic service user engagement that includes minority and vulnerable groups to inform service design, development and evaluation
5. Barriers and enablers to implementing national nursing and midwifery policies/ strategies and empirical evidence that support service user involvement and access to care
6. How the development of nursing and midwifery roles can support access to care

Service Delivery

7. Looking at and learning from existing models of service delivery
8. Enhancing access and provision of services
9. Enabling the integration of acute services with community services
10. Barriers and enablers to effective communication between sectors

Role of Nurses and Midwives

11. Assessing the contribution and impact of nurses and midwives in an evolving healthcare system to deliver on population health needs
12. Understanding the support needs and impact of advanced and specialist nursing or midwifery roles, for effective care delivery

Clinical Practice and Expertise

13. Supporting the implementation and impact of high-quality person centred, evidence- based nursing or midwifery practice

Digital Health / Service Change and Transformation

14. Identifying and understanding the purposes, benefits and risks of data and information in nursing and midwifery care delivery
15. Impact of digital technology on service users outcomes and clinicians (nursing and midwifery) care delivery experience
16. The nursing and midwifery professions adapting to a digital future

Education and Development

17. Clinical and academic education – exploration of roles /who is involved and what they do, how they interact
18. From CPD to PhD - links to retention of nurses and midwives and patient outcomes
19. Education into the future: where is nursing and midwifery in inter-professional learning and simulation?

Governance and Leadership

20. Roles and support structures influencing nursing and midwifery in leadership and management

RCSI UNIVERSITY OF MEDICINE AND HEALTH SCIENCES

Future Directions and Recommendations

- Mentorship- formal or informal
- Organizational support structures
- Collaboration- Interdisciplinary research is key
- Funding streams
- Be aware of research priorities
- Ultimately = more nurses leading clinical research

RCSI
UNIVERSITY
OF MEDICINE
AND HEALTH
SCIENCES

RCSI UNIVERSITY OF MEDICINE AND HEALTH SCIENCES

Thank you- Questions?

email: natalielmcevoy@rcsi.ie

Dr. Natalie L. McEvoy

PhD, MSc, BSc, PgDip, RGN

StAR Lecturer

Fulbright 2023-2024 Scholar

RCSI University of Medicine and Health Sciences.