The challenges of evidence implementation in the global healthcare arena—its all about the context

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Good morning

Dobré ráno!

Bore da
JBI Model of Evidence Informed Healthcare

Overarching principles
Culture - Capacity - Communication - Collaboration
JBI Model
EBHC

“The conscientious, explicit and judicious use of current best evidence in making decisions about the care of the individual patient. It means integrating individual clinical expertise with the best available external clinical evidence from systematic research.” (Sackett et al, 1996 p.72)

Decision-making that considers the feasibility, appropriateness, meaningfulness and effectiveness of healthcare practices. The best available evidence, the context in which care is delivered, the individual patient and the professional judgement and expertise of the health professional inform this process.’

(Jordan et al, 2016)
Types of Systematic Reviews

1. Effectiveness Reviews
2. Qualitative Reviews
3. Costs/Economics Reviews
4. Prevalence or Incidence Reviews
5. Diagnostic Test Accuracy Reviews
6. Etiology and Risk Reviews
7. Textual Synthesis Reviews
8. Mixed Methods Reviews
9. Umbrella Reviews
10. Scoping Reviews

So how do we implement recommendations, and ensure these are contextually relevant?
What do we mean by Context?

case noun [C] (CAUSE OF EVENT)

the **situation** within which something **exists** or **happens**, and that can **help explain** it

(Definition of “context” from the [Cambridge Advanced Learner's Dictionary & Thesaurus](https://dictionary.cambridge.org) © Cambridge University Press)
Some further definitions

If an intervention is a ‘seed’ then the context is the ‘soil’

The interaction between three elements is what makes any improvement initiative successful:

• What you do (intervention)
• How you do it (implementation)
• The environment or context that you do it in

(The Health Foundation 2014)
It’s a bit like chemistry

Chemical reaction—a process in which substances (reactants) are converted to different substances (products), these happen at a given temperature and chemical concentration (context).
But a bit more complex!

Recognised weak relationship between strength of evidence base and behaviour change


To understand context you need to understand external and internal influences
Further reading

Perspectives on context

A selection of essays considering the role of context in successful quality improvement

Original research
March 2014
‘...the notion of context as it is used in the social sciences is not a strictly theoretical concept, but rather a more or less fuzzy notion denoting a situational, historical, geographical, social or cultural environment of a phenomenon being studied.’

(Teun van Dijk in Bale 2014 Health Foundation)
Some potential influences on context

(Health Foundation 2014)


External influences

• Local and national health policy
• Resources
• Professional influences
• Availability of necessary equipment

Internal influences

• Culture and leadership
• Size and scope
• Staff skills
• Group psychology
• Ownership
• Patient and public involvement
Implementation frameworks

However these frameworks have proved difficult to test where SI=successful implementation, E=evidence, C=context, F=facilitation and f=function of.

\[ SI = f (E, C, F) \]

Many consider context e.g. PARiHS (Promoting Action on Research Implementation)

However these frameworks have proved difficult to test
Surely evidence is evidence isn’t it? 
Or is it? 
Let’s think of some scenarios
Treatment of Measles

Measles-a highly infectious virus infection of the respiratory system
The majority of children can be managed at home with simple remedies such as paracetamol to reduce fever

However children at high risk of complications (severe malnutrition or HIV/AIDS) may require broad spectrum antibiotics at the outset to prevent almost inevitable complication of bacterial infections
Physical Therapy and Exercise Interventions in Huntington’s Disease: A Mixed Methods Systematic Review

Nora E. Fritz, Ashwini K. Rawal, Deb Kegelmeyer, Anne Klooze, Monica Busse, Lynda Hartel, Judith Carrer, and Loz Quinlan.

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The Effectiveness of Community-Based Nutrition Education on the Nutrition Status of Under-five Children in Developing Countries. A Systematic Review

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What worked?

It is evident from this review that protected mealtimes alone (the intervention) cannot improve nutritional intake in older people in hospital.

Only two studies of moderate quality were finally included in the review, these were not able to demonstrate any improvements in energy or protein intake for older hospitalized patients.

Protected mealtimes appear to be most beneficial when all healthcare staff work together to make nutritional intake a priority, as demonstrated in one of the included studies which showed that assistance by food service staff, as part of a protected mealtimes initiative, to set up trays and ensure that patients had their meals within reach were important strategies in improving the amount of nutrient dense food and drink consumed.
The Effectiveness of Community-Based Nutrition Education on the Nutrition Status of Under-five Children in Developing Countries. A Systematic Review

Nutritional status of children in all studies improved

However, this review found varied results regarding the effects of the intervention on the nutrition status of children.

Possible reasons for the difference were: different intervention strategy and intensity, difference in age of the children at enrolment, pre-existing children’s growth and nutritional status.
The effectiveness of strategies and interventions that aim to assist the transition from student to newly qualified nurse.

33 studies included

Difficult to report firm conclusions due to range of outcomes

Implications for practice:

• The overall impact of intervention programmes appears positive no matter what the intervention; this may suggest that it is the organisation’s focus on new graduate nurses that is important, rather than simply leaving them to acclimatise to their new role themselves.

• A combination of approaches including didactic and clinical elements appears to be helpful in facilitating the journey from graduate student to competent qualified nurse.

• Several studies mentioned the importance of support from colleagues, as well as the organisation, and mentors/preceptors need to be adequately prepared for the role.
The influence of context

Context is influential in a number of ways:
Culturally
Financially
Politically
Individually
Mindlines: making sense of evidence in practice

- Mindlines, knowledge-in-practice-in-context, collective sensemaking, communities of practice, contextual adroitness, and knowledge transformation may all play an inescapable role in developing good clinical care.
- Rather than consider barriers, need to consider what works and use education and training to facilitate this (Gabbay and le May 2004, 2016)
The Way Forward?

REALIST METHODOLOGY
(REALIST EVALUATION AND REALIST SYNTHESIS)
UNDERPINNED BY THE PHILOSOPHY OF CRITICAL REALISM

“WHAT WORKS, FOR WHOM, IN WHAT RESPECTS, TO WHAT EXTENT, IN WHAT CONTEXTS, AND HOW?”
(PAWSON AND TILLEY 1997)
Děkuji!