Ontario knowledge user perspectives on OHS research use

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Presentation overview

- Why are we interested in research use?

- What did we set out to do?

- How did we ask about research use?

- What did we find?

- What are the key messages?

- What are some next steps?

- Do you have Questions/ Feedback/ Advice?

Why are we interested in research use? (1)

<u>Definition:</u> Research utilization (research use) is the use of research to guide practice, planning, and policy (decision-making)

Seems straightforward…**BUT:**

Weiss (1979,1981) argued that research utilization is fluid and diffuse and requires multiple processes, such as:

> "understanding, accepting, reorienting, adapting, and applying" the research results to practice (Weiss,1981)

Why are we interested in research use? (2)

Overall, the literature about research use from various perspectives (policy: Amara, 2004; healthcare: Estabrooks 2003; Rycroft-Malone 2004; organizational psychology Hemsley-Brown 2004) reveals consistency across the barriers and facilitators

There appear to be five categories of barriers or facilitators:
- nature of the evidence
- individuals involved
- organization or context
- communication (or knowledge transfer approach)
- resources (including time)

Why are we interested in research use? (3)

Evidence-based decision-making (practice) in Occupational Health and Safety (OHS):

…is the conscientious, explicit, and judicious use of current best evidence in making decisions…The practice of evidence based decision-making means integrating individual expertise with the best available external evidence from systematic research.

Adapted from Sackett DL, Rosenberg W, Gray JA, et al. Evidence based medicine: what is it and what it isn't. BMJ. 1996; 312:71-2.

What did we set out to do?

Our objective was to examine the experiences and perspectives of OHS knowledge users in Ontario regarding research use

Knowledge Users (KU) are:
- Stakeholders who could use relevant research evidence to inform OHS practice and/or policy

Selection criteria from IWH contact relations database:

- agreed to be contacted for IWH studies
- job title, responsibilities included OHS or disability prevention
- excluding non-Ontario residents, MPPs and retirees

How did we ask about research use?

- Online survey (n=690) adapted from CFHI self assessment tool
    - 40 items related to **acquiring**, **assessing**, **adapting**, and **applying** research evidence
    - 5 point Likert scale – disagree to agree

- Interviews (n=6): 1 hour semi-structured
    - Guided by CFHI self assessment tool

- Focus groups (n=7): 90 minutes, 2 groups
    - Guided by CFHI self assessment tool

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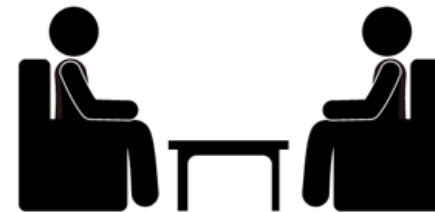
1. ACQUIRE

1.1 Are we able to acquire research? (5Q)

1.2 Are we looking for research in the right places? (7Q)

2. ASSESS

2.1 Can we tell if the research is valid and of high quality? (3Q)

2.2 Can we tell if the research is relevant and applicable? (2Q)

3. ADAPT

3.1 Can we summarize results in a user-friendly way? (8Q)

4. APPLY

4.1 Do we lead by example and show how we value research use? (6Q)

4.2 Do our decision-making processes has a place for research? (9Q)

Who were the respondents?

- 236 (of 690, 34%) KU responses
- 196 (28%) provided responses to at least 40% of the items

Sector Type	%
Public Services and Administration, Education	39.3
Health Care, Social Assistance	21.9
Professional, Scientific, Financial, Technical, Insurance Services	12.8
Manufacturing	9.2
Other	16.8

Roles	%
OHS prevention services/consulting	65.3
Disability management/RTW services	41.8
Manager/supervisor	16.8
Health-care professional	12.8
Training/education	11.2
Administration	8.7
Rehabilitation services	8.2
Human resources	4.6
Organized labour staff/steward	4.1
Other	13.9

ACQUIRE

ASSESS

ADAPT

APPLY

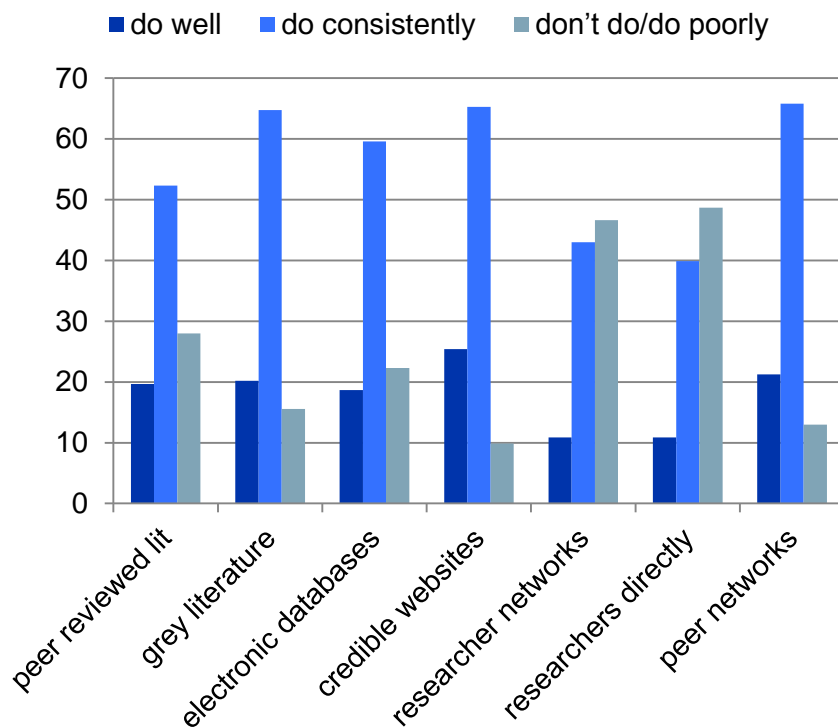# What did we find? Acquiring evidence (1)

■ agree ■ disagree ■ neither
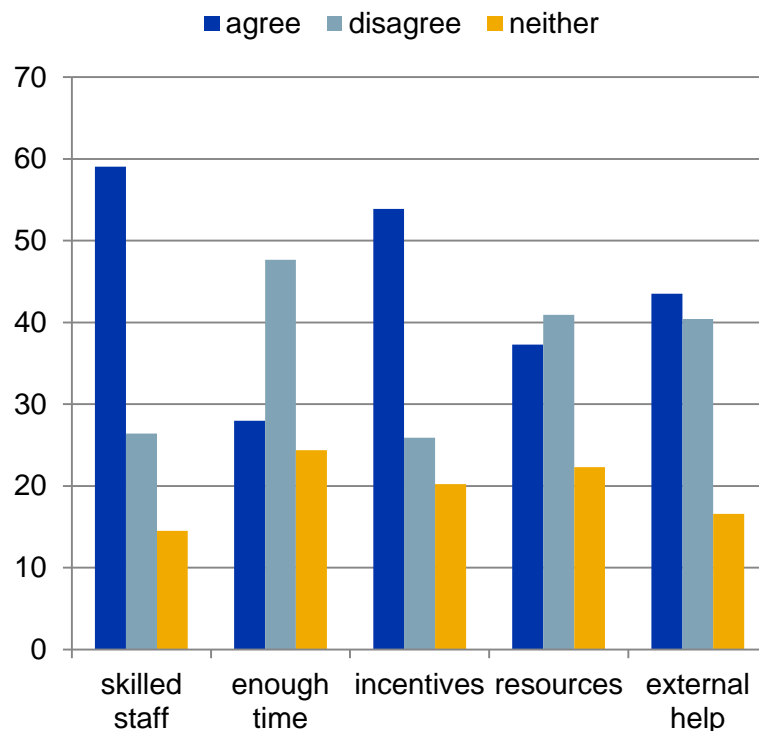
We have _____ to use research.

KU report:

• having skills and incentives to use research

• not having enough **time**

What did we find? Acquiring evidence (2)

■ do well   ■ do consistently   ■ don't do/do poorly

We search/contact _____ for research use.

KU report:

- consistently searching
  - peer-reviewed literature
  - grey literature
  - electronic databases
  - credible websites
  - peer networks

What did we find? Acquiring Evidence (3)

Acquiring research themes include:

- Using multiple sources (including colleagues)
- Research from different disciplines helpful
- Need to look frequently (keeping current)
- Willing to collaborate with researchers
- Willing to share with others

Barrier to research use:

- **Time** it takes to search and acquire
- Lack of a single location (one-stop-shop)
- Difficulty accessing research evidence

I don't have a lot of time ... I find that I end up dealing with a lot of the emergencies that come my way, and my stuff that I want to do gets off to the side.
-Krista, workplace practitioner

What did we find? Acquiring Evidence (4)

Acquiring research themes include:

- Using multiple sources (including colleagues)
- Research from different disciplines helpful
- Need to look frequently (keeping current)
- Willing to collaborate with researchers
- Willing to share with others

I might reach out to my colleagues in other 'workplaces' since we're all the doing the same thing.
-Abigail, workplace practitioner

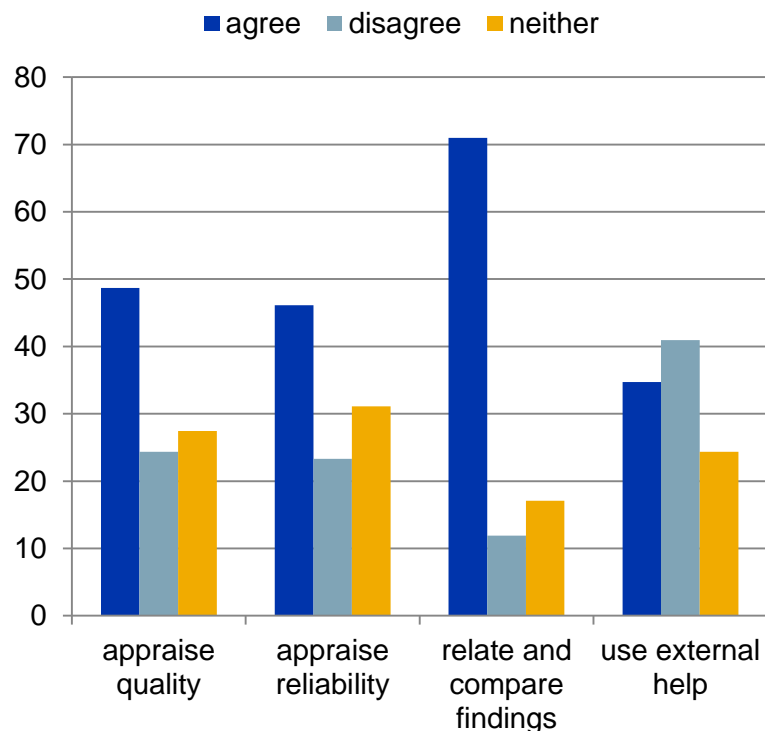Barrier to research use:

- **Time** it takes to search and acquire
- Lack of a single location (one-stop-shop)
- Difficulty accessing research evidence

ACQUIRE

ASSESS

ADAPT

APPLY

What did we find? Assessing evidence (1)

agree ■ disagree ■ neither

We can _____ of/for research.

KU report:

• they can appraise the quality and reliability of research

• having the ability to relate and compare research findings

What did we find? Assessing evidence (2)

Assessing research themes include:

- Self-directed when assessing evidence
- Notions of **credibility** were important and the ability to assess it
- Recent evidence (newest research)
- Have skills to appraise quality
- Assessment skills important when using research to support decisions

Barrier to research use:

- Difficult to draw conclusions
- Time required for assessment

I think everything needs to be evidence based now. A lot of people who talk from the top of their hat, there's no credence to what they say.
 - Krista, workplace practitioner

What did we find? Assessing evidence (3)

Assessing research themes include:

- Self-directed when assessing evidence
- Notions of **credibility** were important and the ability to assess it
- Recent evidence (newest research)
- Have skills to appraise quality
- Assessment skills important when using research to support decisions

Barrier to research use:

- Difficult to draw conclusions
- Time required for assessment

I sort of take that information and, I guess, match that with my own knowledge and ability and that sort of thing
-Derek, workplace practitioner

ACQUIRE

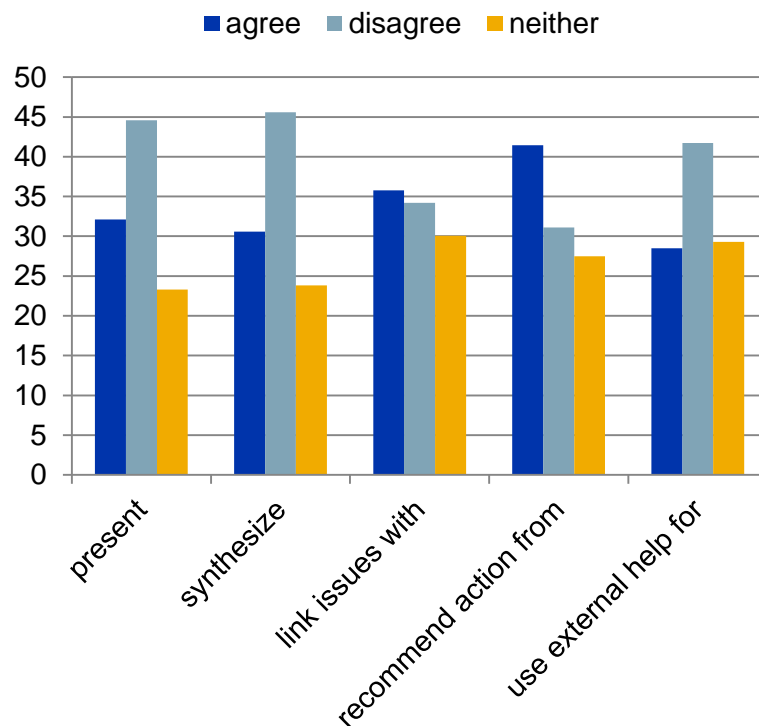ASSESS

ADAPT

APPLY

What did we find? Adapting evidence (1)

KU report:

• not having skills/time/incentives to present or synthesize research results

• having skills/time/incentives to recommend action from research

We have skilled staff/time/incentives to _____ research results.

What did we find? Adapting evidence (2)

Adapting research use themes include:

•Need to adapt research to audience characteristics (literacy, language skills)
•Need for short and concise communications

Barrier for research use:

•Time needed to adapt research to specific needs
•Require evidence that is relevant and specific to needs

We have to tailor the research that we use and the way we present it based on our audience.
–Melody, independent consultant

What did we find? Adapting evidence (3)

Adapting research use themes include:

- Need to adapt research to audience characteristics (literacy, language skills)
- Need for short and concise communications

Barrier for research use:

- Time needed to adapt research to specific needs
- Require evidence that is relevant and specific to needs

People know that this high level research isn't quite useful to everybody but it still has to be done and it's still important. It's just finding the resources and getting them in place to have, you know, whether it's somebody or an organization there to actually do that work that's required to kind of translate it into a way that is actually useful. –Stella, end-user with KT role
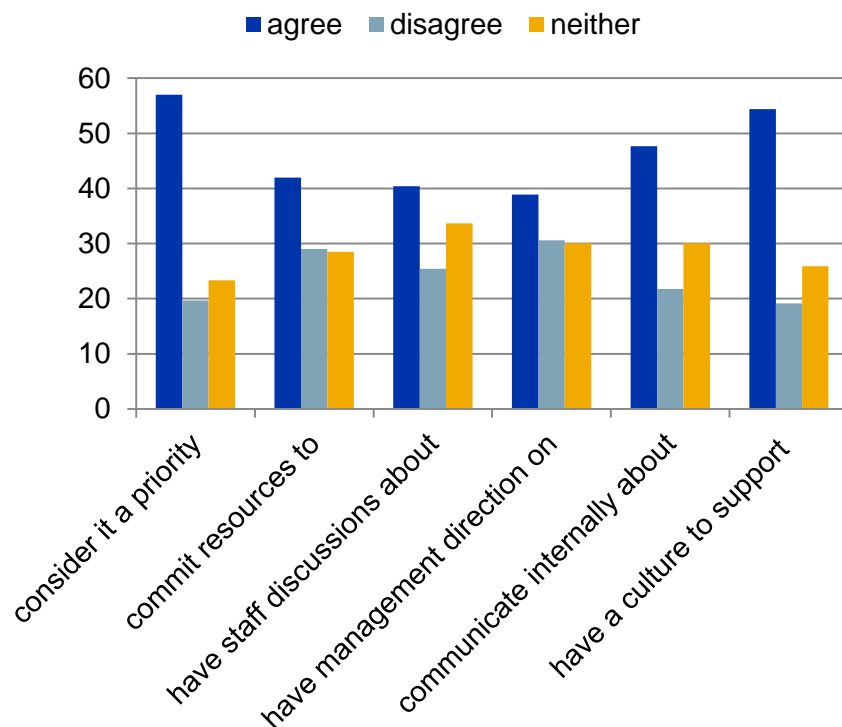
ACQUIRE

ASSESS

ADAPT

APPLY

What did we find? Applying evidence (1)

Chart legend: agree (dark blue), disagree (grey), neither (orange)

Categories:
- consider it a priority
- commit resources to
- have staff discussions about
- have management direction on
- communicate internally about
- have a culture to support

We _____ (research use).

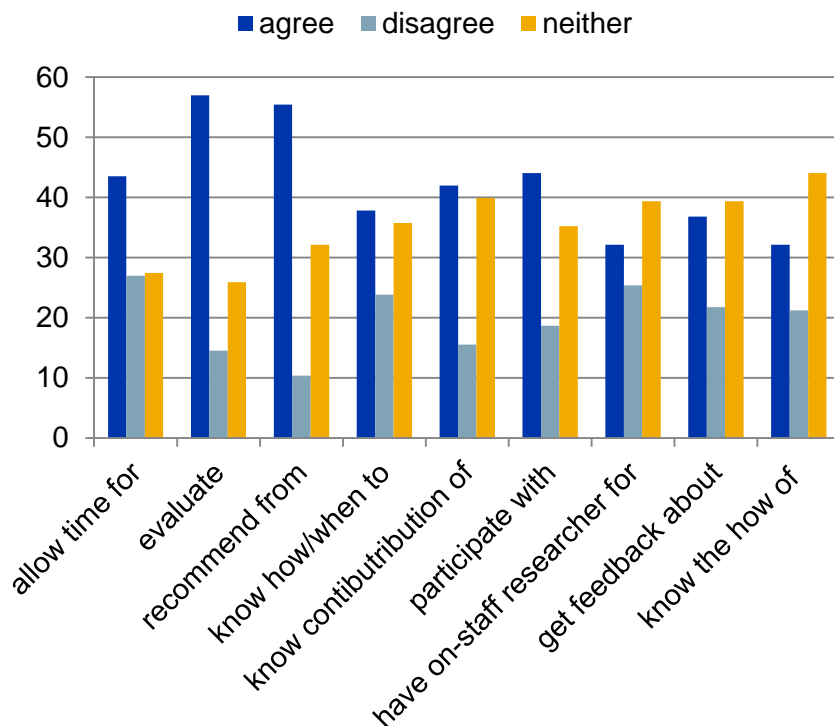KU report:

• **that research use is a priority!**

• they commit resources, communicate internally and have the culture to support research use

What did we find? Applying evidence (2)

agree **disagree** **neither**

Chart y-axis: 60, 50, 40, 30, 20, 10, 0

Categories: allow time for, evaluate, recommend from, know how/when to, know contibrution of, participate with, have on-staff researcher for, get feedback about, know the how of

In decision making, we _____ research use.

KU report:

• allowing time for, evaluating, and recommending from research for decision-making, participating in decision-making

• neither having researcher on staff, getting feedback, or knowing how research impacted on decisions

What did we find? Applying evidence (3)

Applying research use themes include:

- Understanding the context
- Engage audience (know the audience!)
- Using multiple formats (adult education principles)
- Practical application

Barrier for research use:

- Finding/creating relatable stories
- Using multiple learning methods
- Time, time, time

The second they can relate to it, they will retain it.
-Amanda, end-user with KT role

What did we find? Applying evidence (4)

Applying research use themes include:

> •Understanding the context
> •Engage audience (know the audience!)
> •Using multiple formats (adult education principles)
> •Practical application

Barrier for research use:

> •Finding/creating relatable stories
> •Using multiple learning methods
> •Time, time, time

… giving them (audience) the tools and the resources that they can then use. Yeah, so we actually have a full-time department that their job is to engage with these communities and constantly be providing them the support that they need –Elise, OHS consultant

What are the key messages?

Research use is important

- KU report having the skills and motivation to find and evaluate research

- KU find, use, and share credible research

- KU lack **time** to acquire, assess, adapt and apply research

Note: This was a select group of KU available from our contacts database – plus they took the time to respond to the survey

What are some next steps?

- Adapt survey tool for further research

- Development of tools and products to help KU with research use

- Ongoing evaluation of researcher perspectives on the use of evidence

Acknowledgement

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