

# Health Evidence™

Helping public health use best evidence in practice since 2005

## Effectiveness of web-based dissemination and implementation knowledge translation interventions in cancer prevention

9th International Conference of Evidence-Based Health Care Teachers & Developers,  
8th Conference of the International Society for Evidence-Based Health Care  
November 9, 2019

Jennifer Yost, RN, PhD, Emily Belita, RN, MN, Olivia Marquez, MSc,  
Noori Akhtar-Danesh, PhD, Anthony Levinson, MD, Cory Neudorf,  
MD, Maureen Dobbins, RN, PhD



Winnipeg Regional  
Health Authority

*Caring for Health*

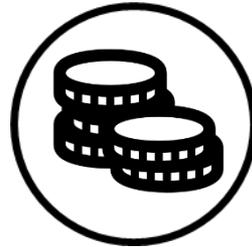
Office régional de la  
santé de Winnipeg

*À l'écoute de notre santé*

# Background



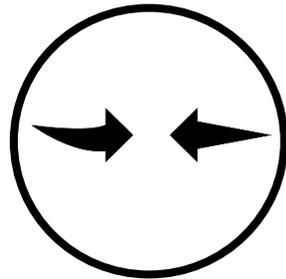
**Pervasiveness  
of cancer**



**Cost  
of cancer**



**Existing  
research evidence**



**Gap in knowledge  
translation (KT)**



**Emerging online KT  
strategies**

# Aims

With the implementation of three KT strategies (tailored email messages, Twitter™, webinars):

1. Determine if there is a **change in the awareness** and/or **use of high quality cancer prevention research** evidence in public health.
2. Assess participant **satisfaction** with the online KT strategies received.

# Methods

## Design

- Prospective cohort before and after

## Sample

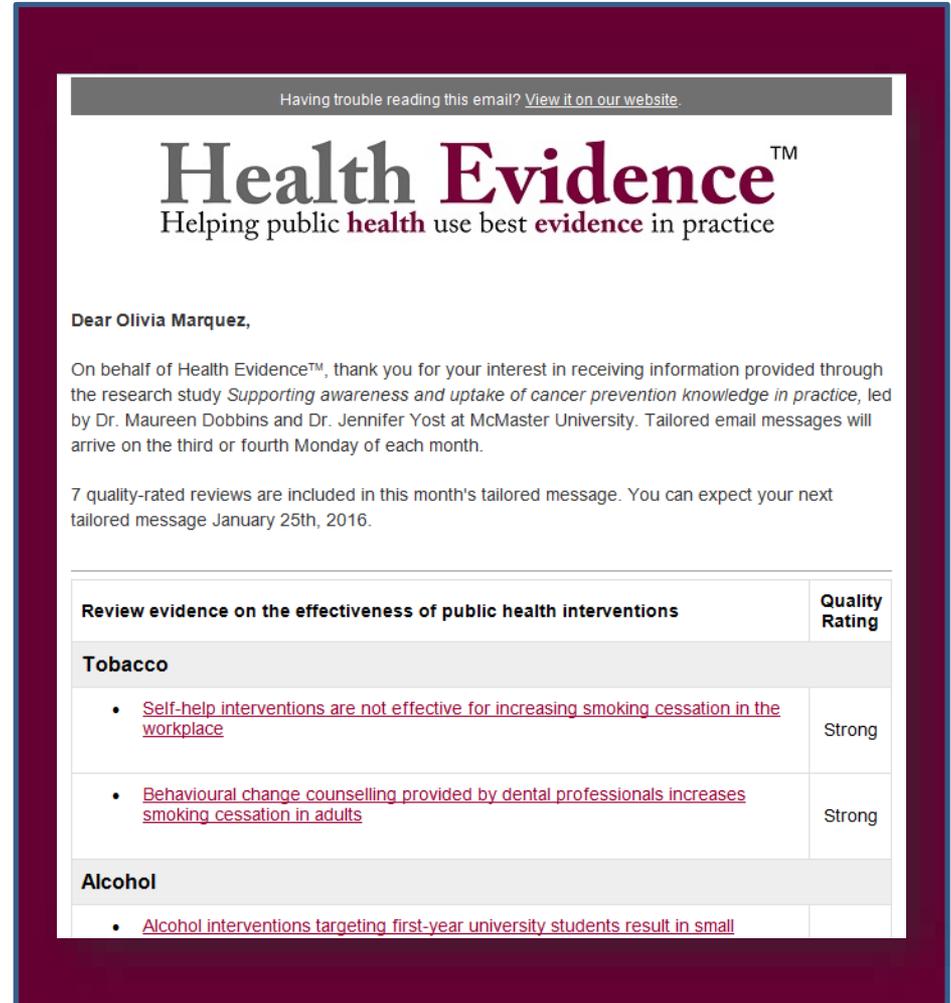
- Public health professionals in Canada
- Cancer prevention

## Intervention

- 18 months
- tailored email messages, Twitter™, webinars

# Tailored email messages

- Summarized findings and links to systematic reviews from Health Evidence™
- Monthly



The screenshot shows the Health Evidence website interface. At the top, there is a navigation bar with 'Search', 'Products', 'Tools', and 'Consultation'. The main heading is 'Vitamin D supplementation for prevention of mortality in adults'. Below this, a 'Review Quality Rating' is shown as a green bar with a score of 10 (strong), accompanied by a 'View Quality Assessment' link and a lightning bolt icon. A citation is provided: 'Bjelakovic, G., Gluud, L. L., Nikolova, D., Whitfield, K., Wetterslev, J., Simonetti, R. G., Bjelakovic, M., Gluud, C. (2014). Vitamin D supplementation for prevention of mortality in adults. Cochrane Database of Systematic Reviews, 2014(1), Art. No.: CD007470.' The 'Abstract' section begins with 'BACKGROUND: The evidence on whether vitamin D supplementation is effective in decreasing cancers is'.

**Health Evidence** @HealthEvidence · Mar 28  
No effect of Vit D supplementation on cancer occurrence in adults with Vit D insufficiency #KTA\_HE [ow.ly/ZCkET](https://ow.ly/ZCkET)

**Health Evidence** @HealthEvidence · Mar 30  
Vit D only supplements have no sig. effect on secondary adverse events in adults; low confidence in findings #KTA\_HE [ow.ly/ZC11X](https://ow.ly/ZC11X)

**Health Evidence** @HealthEvidence · Apr 1  
Vit D supplements may decrease all-cause and cancer mortality in adults; low confidence in the findings #KTA\_HE [ow.ly/ZC193](https://ow.ly/ZC193)

- Tweets sent from @HealthEvidence
- Actionable messages from high quality reviews on Health Evidence™
- Three times per week

# Webinars

Health Evidence™  
Helping public health use best evidence in practice

## Welcome!

Health-related effects of government tobacco control policies: **What's the evidence?**

*You will be placed on hold until the webinar begins.  
The webinar will begin shortly, please remain on the line.*

Health related effects of government tobacco control policies: What's the evidence?

Health Evidence  
10 years  
Subscribed 73

71 views

+ Add to Share ... More

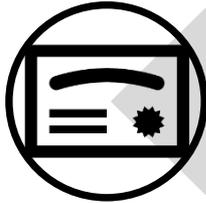
0 0

- Quarterly
- 60-90 minutes
- WebEx software
- Polling questions
- Recordings and slides posted on Health Evidence™

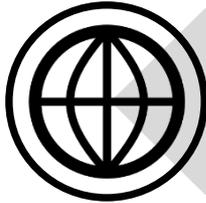
# Methods: Data Collection

Question	Description	Example
<b>Awareness of research evidence</b>	<ul style="list-style-type: none"> <li>• Nine knowledge statements</li> <li>• 'yes' or 'no' responses regarding effectiveness</li> <li>• Total score summed out of 9</li> </ul>	Sun-safety programmes in the working environment foster sun-protection habits among people working outdoors.
<b>Use of research evidence</b>	<ul style="list-style-type: none"> <li>• 'yes' or 'no' responses</li> </ul>	Did findings from a systematic review influence a decision in your health unit in the last 12-18 months?
<b>Satisfaction</b>	<ul style="list-style-type: none"> <li>• Six satisfaction statements per KT strategy</li> <li>• 7-point Likert scale</li> <li>• 1 = strongly disagree to 7 = strongly agree</li> </ul>	I was satisfied with how often I received the tailored messages (i.e. monthly) as part of this study.

# Results: Sample Demographics



**34% Nurse; 19% Dietitian; 28% Other**



**54.5% from Ontario; 18% Eastern;  
17% Central-West and Northern**



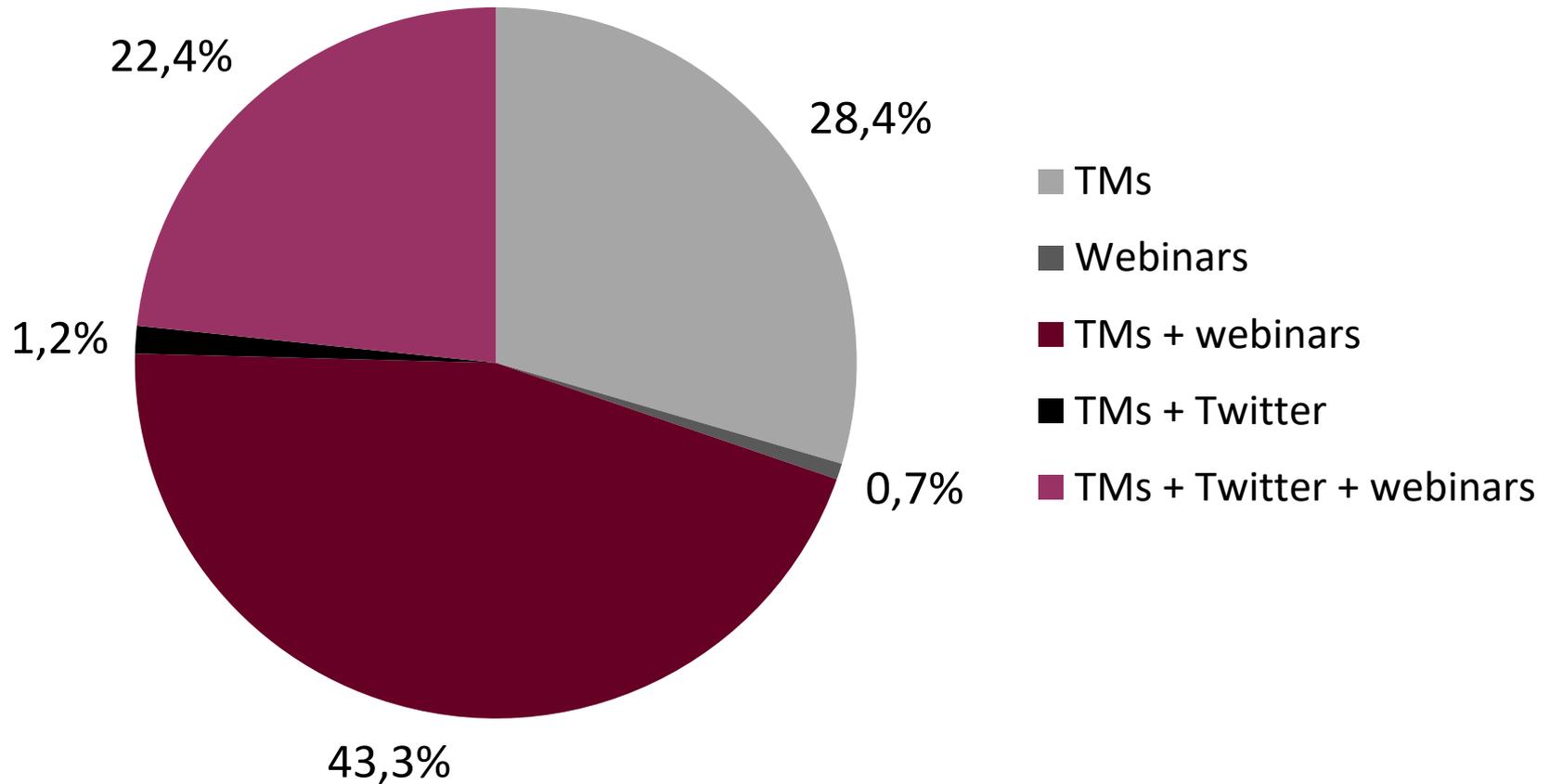
**54% Bachelor's degree  
32% Master's degree**



**10.4 years in PH**

**n = 134**

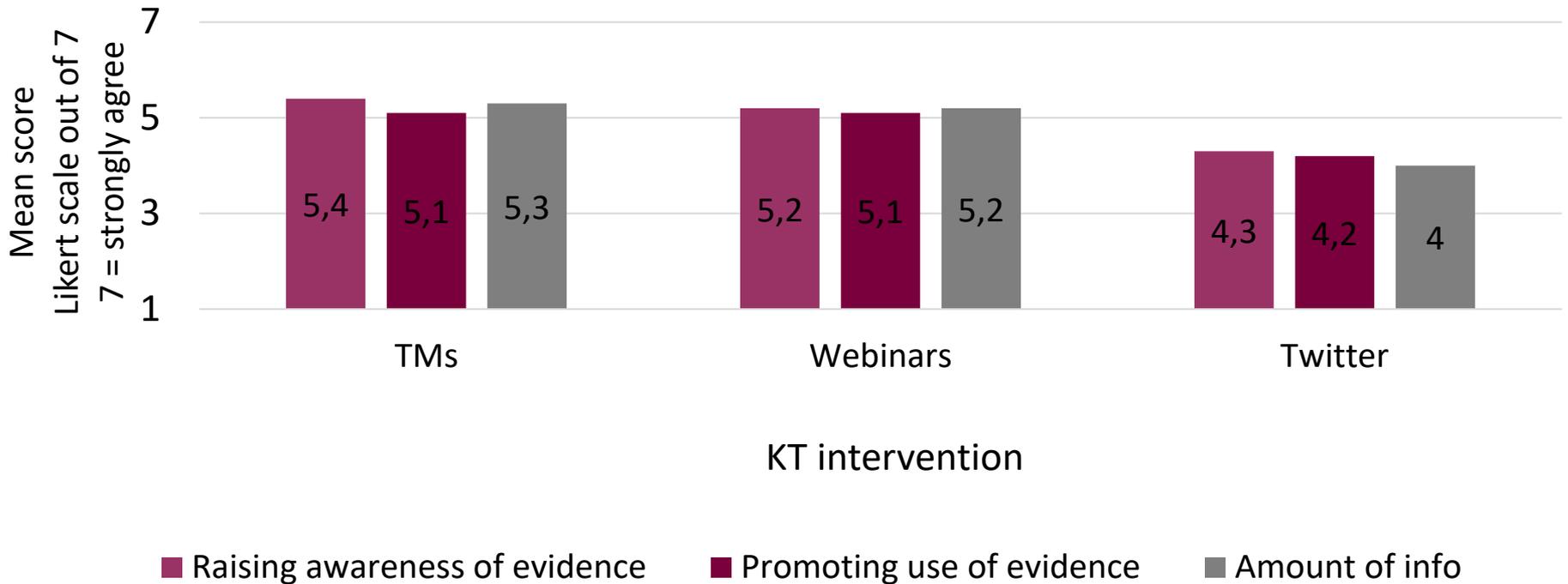
# Results: Selected Interventions



# Results: Awareness & Research Use

- Awareness
  - No statistically significant increases in awareness of research evidence from baseline to follow-up
- Research Use
  - No statistically significant increases from baseline to follow-up

# Results: Satisfaction



# Conclusions and Implications

- No increases in use of research evidence and awareness
  - Consider:
    - Length of intervention
    - Dissemination of tailored, topic-specific, relevant research evidence
- Favored online KT strategies:
  - TMs and webinars
- High levels of satisfaction for:
  - raising awareness of research
- Use of social media (e.g., Twitter™) as KT strategy needs further consideration
- Consider preference of public health professionals for online KT interventions