

Provincial Addiction & Mental Health

Knowledge Translation Strategies for Different Target Audiences

August 2022

Table of contents

Project team.....	3
Introduction.....	4
Summary of KT Strategies.....	5
Decision Makers.....	6
Healthcare Practitioners.....	7
Patients and Family Members.....	8
The Public.....	10
Researchers.....	11
References.....	12

Project team

Project sponsor

Rachel Carr, Acting Manager
Knowledge Exchange, Provincial Addiction and Mental Health

Prepared by

Cassandra Churchill, Knowledge Management Coordinator
Knowledge Exchange, Provincial Addiction and Mental Health

Jason Mumme, Research Officer I
Knowledge Exchange, Provincial Addiction and Mental Health

Contact

Knowledge Exchange, Provincial Addiction and Mental Health
Alberta Health Services
amh.knowledgeexchange@ahs.ca

© 2022 Alberta Health Services, Provincial Addiction & Mental Health – Knowledge Exchange.



This work is licensed under the [Creative Commons Attribution-NonCommercial-NoDerivative 4.0 International licence](https://creativecommons.org/licenses/by-nc-nd/4.0/). You are free to copy and distribute the work (including in other media and formats) for non-commercial purposes, as long as you attribute the work to Alberta Health Services, do not adapt the work, and abide by the other licence terms. To view a copy of this licence, see <https://creativecommons.org/licenses/by-nc-nd/4.0/>. The licence does not apply to Alberta Health Services trademarks, logos or content for which Alberta Health Services is not the copyright owner.

This material is intended for general information only and is provided on an "as is", "where is" basis. Although reasonable efforts were made to confirm the accuracy of the information, Alberta Health Services does not make any representation or warranty, express, implied or statutory, as to the accuracy, reliability, completeness, applicability or fitness for a particular purpose of such information. This material is not a substitute for the advice of a qualified health professional. Alberta Health Services expressly disclaims all liability for the use of these materials, and for any claims, actions, demands or suits arising from such use.)

For citation purposes, use the following format:

Alberta Health Services. (2022). *Knowledge translation strategies for different audiences*.
Edmonton, AB.

Introduction

Knowledge translation (KT) is the production, exchange, and application of research with the goal of improving health systems and the wellbeing of Canadians (Canadian Institutes of Health Research [CIHR], 2020). KT strategies help communicate research findings to ensure that evidence is used in practice. When considering which KT strategies to use, it is important to consider the needs of stakeholders involved (CIHR, 2020). For example, healthcare researchers may create briefing notes or one-page take-home messages for decision makers because they are quick and easy to read.

This document provides strategies that may be used to target different audiences involved in the KT process. It may be useful for internal and external Alberta Health Services (AHS) stakeholders (such as AHS clinicians and researchers, academia, not for profit organizations) to help translate research into practice and inform health initiatives at AHS.

Target audiences discussed include:

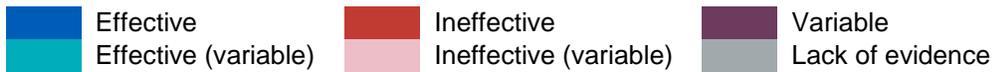
- Decision makers
- Healthcare practitioners
- Patients and family members
- The public
- Researchers

The effectiveness of the KT strategies discussed in this document were determined by the evidence levels in the available literature.

Effective	<i>Successful</i>
Effective, variable	<i>Generally successful, but large variations may occur depending on the details of the approach</i>
Ineffective	<i>Unsuccessful</i>
Ineffective, variable	<i>Generally unsuccessful, but large variations may occur depending on the details of the approach</i>
Variable	<i>Findings ranged from successful to unsuccessful</i>
Lack of evidence	<i>The strategy was investigated for the given target audience, but insufficient evidence was found to indicate level of success</i>

Summary of KT Strategies

	Decision Makers	Healthcare Practitioners	Patients & Family	Public	Researchers
Audit & feedback		Effective			
Distribution or dissemination	Ineffective	Ineffective			
Education (interactive)		Effective	Effective		Effective (variable)
Education (online)		Effective	Effective	Effective	
Education (outreach)		Effective			
Education (traditional)		Ineffective (variable)			Variable
Educational materials		Effective (variable)	Effective (variable)		
Guidelines for media professionals				Lack of evidence	
Incentivization		Ineffective (variable)		Effective	
Information package	Effective				
Local opinion leaders		Ineffective (variable)			
Mass media	Lack of evidence	Lack of evidence	Lack of evidence	Lack of evidence	
One-on-one meetings	Effective				
Peer-reviewed publication					Effective
Reminder system		Effective (variable)			
Self-management			Lack of evidence		
Serious digital games			Effective		
Simulation				Ineffective	
Social media		Variable	Variable	Effective (variable)	Lack of evidence
Tailored summaries	Effective				
Toolkits		Effective	Effective		



Decision Makers

This includes policy makers, healthcare leadership, and healthcare managers. This may also include patient advocates and community groups advising on policy. [2-15]

KT Strategy	Effectiveness
Distribution or dissemination Passive dissemination of systematic reviews.	Ineffective
Information package Summary of problems and related research evidence following a graded entry format (e.g., 1-page take-home messages, 3-page executive summary, and 25-page report).	Effective
Mass media Organized and deliberate activities using a variety of traditional media channels (e.g., television, radio, newspapers, billboards, posters) to inform, persuade, or motivate populations. May highlight issues that are newsworthy, influence how decision makers think about an issue, or shape public opinion that influences decision makers.	Lack of evidence
One-on-one meetings Face-to-face meeting with leadership, elected officials, or staffers.	Effective
Tailored summaries Summary of a problem and related research evidence (e.g., policy briefs, fact sheets).	Effective

Tips for targeting decision makers

- Use an integrated approach where decision makers can help inform research questions at the beginning of the research process.
- Build links between decision makers and researchers to increase trust and foster a culture of evidence-informed decision making.
- Frame evidence in terms of policy application, implications of implementation, and potential outcomes.
- Highlight information relevant to decisions makers, including:
 - Contextual factors that affect the local applicability of research(e.g., incorporate local data)
 - Information about the benefits, harms, risks, and costs of interventions
- Ensure timely responses to decision maker queries.
- One-on-one meetings may be more memorable for decision makers.
- Use plain language rather than jargon.
- Increase use of white space with bullet points, simple tables, and infographics where appropriate.

Healthcare Practitioners

This includes doctors, nurses, pharmacists, and allied health professionals. [3,10,16-34]

KT Strategy	Effectiveness
Audit & feedback An individual's performance is compared to targets and the results are shared with the individual.	Effective
Distribution or dissemination Passive dissemination of systematic reviews.	Ineffective
Education (interactive) Meetings, workshops, and practical sessions.	Effective
Education (online) Online learning programs (e.g., webinars, online training modules).	Effective
Education (outreach) Trained educators meet with healthcare professionals at the place of practice to provide training, feedback, materials, reminders, and follow-ups. Also known as academic detailing.	Effective
Education (traditional) Conferences, courses, and lectures. May lack active participation.	Ineffective (variable)
Educational materials Basic educational materials with recommendations for clinical care (e.g., clinical practice guidelines, audio-visual materials, electronic publications).	Effective (variable)
Incentivization Financial incentives to encourage implementation.	Ineffective (variable)
Local opinion leaders Individuals in an organization who have substantial influence on the rest of the community use this influence to persuade healthcare providers to adopt a new intervention.	Ineffective (variable)
Mass media Organized and deliberate activities using a variety of traditional media channels (e.g., television, radio, newspapers, billboards, posters) to inform, persuade, or motivate populations.	Lack of evidence
Reminder system Checklists, notices, electronic reminders.	Effective (variable)
Social media Use of web-based technology such as wikis, blogs, podcasts, social media networks, vlogs.	Variable
Toolkits A packaged grouping of multiple KT tools and strategies, where users select the KT strategies depending on their resources or context. For example, a toolkit may include handout sheets, posters, pocket guides, presentation slides, and educational modules.	Effective

Tips for targeting healthcare practitioners

- Avoid overloading practitioners with too much information at once and be mindful of their busy schedules.
- Be clear about how the evidence being discussed will impact practitioners' day-to-day work.
- Build linkages and relationships with practitioners to increase trust.
- Use existing communities of practice and other professional networks to expand the scope and reach of KT strategies.
- Enlist the help of library and information science (LIS) professionals when possible.
- Use plain language rather than jargon.
- When developing toolkits, consider that:
 - Additional efforts are required to ensure knowledge users actively engage with toolkit material development, and move away from passive diffusion of information.
 - There is no evidence on the ideal combination or number of KT strategies and tools to be included in toolkits.

Patients and Family Members

This includes patients and their family members, and may also include patient advocates.
[3,10,19,27,35-41]

Note: In many studies referenced, patients and family members were generally recruited from treatment programs. This may have made them more engaged and receptive to these strategies.

KT Strategy	Effectiveness
Education (interactive) Meetings, workshops, and practical sessions. May be effective for reducing stigma.	Effective
Education (online) Online learning programs (e.g., webinars, online training modules).	Effective
Educational materials Basic educational materials (e.g., pamphlets).	Effective (variable)
Mass media Organized and deliberate activities using a variety of traditional media channels (e.g., television, radio, newspapers, billboards, posters) to inform, persuade, or motivate populations.	Lack of evidence
Self-management Promote various strategies for people to take an active approach to managing their health. People may use tools themselves or with the support of healthcare providers.	Lack of evidence

Knowledge Translation Strategies

Serious digital games Computer-delivered strategy using games to educate or promote behaviour change.	Effective
Social media Use of web-based technology such as wikis, blogs, podcasts, social media networks, vlogs.	Variable
Toolkits A packaged grouping of multiple KT tools and strategies, where users select the KT strategies depending on their resources or context. For example, a toolkit may include handout sheets, guideline summaries, posters, pocket guides, and educational modules.	Effective

Tips for targeting patients and family members

- Use strategies that are tailored to the individual and involve learning skills and competencies.
- Collaborate with healthcare providers. Patients are more likely to trust in health information if it's coming directly from their healthcare provider.
- Collaborate with community organizations. This may be particularly effective with older adults or individuals living in rural areas.
- Use plain language rather than jargon.
- Be cognizant of cultural differences and sensitivities.
- For patient-targeted toolkits, toolkit content can be tailored by someone with knowledge of the patient (e.g., their nurse).

The Public

This includes members of the public and media. [3,10,21,38,42-54]

KT Strategy	Effectiveness
Education (online) Online learning programs (e.g., webinars, online training modules).	Effective
Guidelines for mass media professionals Reporting guidelines for journalists.	Lack of evidence
Incentivization Financial incentives or disincentives, such as bonuses, exceptions, taxes, or pricing burdens to change health-related behaviour.	Effective
Mass media Organized and deliberate activities using a variety of traditional media channels (e.g., television, radio, newspapers, billboards, posters) to inform, persuade, or motivate populations.	Lack of evidence
Simulation Causing someone to experience simulated effects of an illness. May increase stigma.	Ineffective
Social media Use of web-based technology such as wikis, blogs, podcasts, social media networks, vlogs.	Effective (variable)

Tips for targeting the public

- Successful mass media campaigns:
 - Are usually longer and more intense (more contact time)
 - Use repetitive media messages delivered by multiple channels
- When using mass media for stigma reduction messaging, consider that:
 - Mass media interventions may reduce prejudice, but there is insufficient evidence to determine their effects on discrimination.
 - Messaging with first-person narratives and promoting social inclusion or human rights messages may be more effective in reducing prejudice.
 - Strategies that add a social contact element are more effective; however, social contact alone is not effective.
 - Messaging showing acute symptoms or biomedical messages may increase prejudice.
- Tips for using social media:
 - Social media content should be monitored for quality and reliability.
 - Trustworthiness of information is a barrier to use, but may be addressed by using brief messages obtained from a reputable source and linking to full sources.
 - Using images or videos can significantly improve engagement compared to using text only.

Researchers

Although knowledge translation usually flows from researchers to users, certain scenarios require communicating findings with researchers (for example, during an integrated knowledge translation approach or after identifying research gaps). ^[55-57]

KT Strategy	Effectiveness
Education (interactive) Meetings, workshops, and practical sessions.	Effective (variable)
Education (traditional) Conferences, courses, or lectures.	Variable
Peer-reviewed publication Publication of research results in peer-reviewed journal articles, which may be open access or restricted access.	Effective
Social media Use of web-based technology such as wikis, blogs, podcasts, social media networks, vlogs.	Lack of evidence

References

1. Canadian Institutes of Health Research. (2020). Knowledge translation. <https://cihr-irsc.gc.ca/e/29529.html>
2. Zhao, N., Koch-Weser, S., Lischko, A., & Chung, M. (2020). Knowledge translation strategies designed for public health decision-making settings: A scoping review. *International Journal of Public Health*, 65(9), 1571-1580. <https://doi.org/10.1007/s00038-020-01506-z>
3. Brown, A., Barnes, C., Byaruhanga, J., McLaughlin, M., Hodder, R. K., Booth, D., ... Wolfenden, L. (2020). Effectiveness of technology-enabled knowledge translation strategies in improving the use of research in public health: Systematic review. *Journal of Medical Internet Research*, 22(7), e17274. <https://doi.org/10.2196/17274>
4. Mojiri, S., Sahebzadeh, M., Ahmadzadeh, K., Daei, A., Ashrafi-Rizi, H., Demneh, M. T., ... Soleymani, M. R. (2021). Effective factors on establishment of knowledge translation in the health system policy-making: A protocol for systematic review. *Journal of Education & Health Promotion*, 10, 394. https://doi.org/10.4103/jehp.jehp_1298_20
5. LaRocca, R., Yost, J., Dobbins, M., Ciliska, D., & Butt, M. (2012). The effectiveness of knowledge translation strategies used in public health: A systematic review. *BMC Public Health*, 12(1), 1. <http://dx.doi.org/10.1186/1471-2458-12-751>
6. Marquez, C., Johnson, A. M., Jassemi, S., Park, J., Moore, J. E., Blaine, C., ... Straus, S. E. (2018). Enhancing the uptake of systematic reviews of effects: What is the best format for health care managers and policy-makers? A mixed-methods study. *Implementation Science*, 13(1), 1–14. <http://dx.doi.org/10.1186/s13012-018-0779-9>
7. Perrier, L., Mrklas, K., Lavis, J. N., & Straus, S. E. (2011). Interventions encouraging the use of systematic reviews by health policymakers and managers: A systematic review. *Implementation Science*, 6(43), 1–8. <http://dx.doi.org/10.1186/1748-5908-6-43>
8. Tripathy, J., Bhatnagar, A., Shewade, H., Kumar, A., Zachariah, R., & Harries, A. (2014). Ten tips to improve the visibility and dissemination of research for policy makers and practitioners. *Public Health Action*, 7(1), 75–78. <http://dx.doi.org/10.5588/pha.13.0025>
9. Bou-Karroum, L., El-Jardali, F., Hemadi, N., Faraj, Y., Ojha, U., Shahrour, M., ... Akl, E. A. (2017). Using media to impact health policy-making: An integrative systematic review. *Implementation Science*, 12(1), 1–14. <http://dx.doi.org/10.1186/s13012-017-0581-0>
10. Goldner, E. M., Jenkins, E. K., & Fischer, B. (2014). A narrative review of recent developments in knowledge translation and implications for mental health care providers. *Canadian Journal of Psychiatry*, 59(3), 160–169. <http://dx.doi.org/10.1177/070674371405900308>
11. Oliver, K., Innvar, S., Lorenc, T., Woodman, J., & Thomas, J. (2014). A systematic review of barriers to and facilitators of the use of evidence by policymakers. *BMC Health Services Research*, 14(2), 1–12. <http://dx.doi.org/10.1186/1472-6963-14-2>
12. Orton, L., Lloyd-Williams, F., Taylor-Robinson, D., O'Flaherty, M., & Capewell, S. (2011). The use of research evidence in public health decision making processes: Systematic review. *PLoS ONE*,

6(7), e21704. <http://dx.doi.org/10.1371/journal.pone.0021704>

13. Sarkies, M. N., Bowles, K.-A., Skinner, E. H., Haas, R., Lane, H., & Haines, T. P. (2017). The effectiveness of research implementation strategies for promoting evidence-informed policy and management decisions in healthcare: A systematic review. *Implementation Science*, 12(132), 1–20. <http://dx.doi.org/10.1186/s13012-017-0662-0>
14. Woolf, S., Purnell, J. Q., Simon, S., Camberos, G., Haley, A., & Fields, R. (2015). Translating evidence into population health improvement: Strategies and barriers. *Annual Review of Public Health*, 36, 463–482. <http://dx.doi.org/10.1146/annurev-publhealth-082214-110901>
15. Haynes, A., Rowbotham, S. J., Redman, S., Brennan, S., Williamson, A., & Moore, G. (2018). What can we learn from interventions that aim to increase policy-makers' capacity to use research? A realist scoping review. *Health Research Policy and Systems*, 16(1), 1–27. <http://dx.doi.org/10.1186/s12961-018-0277-1>.
16. O'Brien, M., Rogers, S., Jamtvedt, G., Oxman, A., Odgaard-Jensen, J., Kristoffersen, D., ... Harvey, E. (2007). Educational outreach visits: Effects on professional practice and health care outcomes (Review). *Cochrane Database of Systematic Reviews*, 2007(4), 1–80. <http://dx.doi.org/10.1002/14651858.CD000409.pub2>
17. Szekeres, M., & MacDermid, J. C. (2021). Online learning versus workshops: A rank minimized trial comparing the effect of two knowledge translation strategies designed to alter knowledge, readiness to change, and self-efficacy with respect to rehabilitation outcome measures. *Disability & Rehabilitation*. Advance online publication. <https://doi.org/10.1080/09638288.2021.1965227>
18. Chan, T. M., Dzara, K., Dimeo, S. P., Bhalerao, A., & Maggio, L. A. (2020). Social media in knowledge translation and education for physicians and trainees: A scoping review. *Perspectives on Medical Education*, 9(1), 20-30. <https://doi.org/10.1007/s40037-019-00542-7>
19. Curran, J. A., Gallant, A. J., Wong, H., Shin, H. D., Urquhart, R., Kontak, J., ... Langlois, E. V. (2022). Knowledge translation strategies for policy and action focused on sexual, reproductive, maternal, newborn, child and adolescent health and well-being: A rapid scoping review. *BMJ Open*, 12(1), e053919. <http://dx.doi.org/10.1136/bmjopen-2021-053919>
20. Prior, M., Guerin, M., & Grimmer-Somers, K. (2008). The effectiveness of clinical guideline implementation strategies – A synthesis of systematic review findings. *Journal of Evaluation in Clinical Practice*, 14, 888–897. <http://dx.doi.org/10.1111/j.1365-2753.2008.01014.x>
21. Grilli, R., Ramsay, C., & Minozzi, S. (2009). Mass media interventions: Effects on health services utilisation. *Cochrane Database of Systematic Reviews*, 2009(1), 1–35. <http://dx.doi.org/10.1002/14651858.CD000389>
22. Flodgren, G., Parmelli, E., Doumit, G., Gattellari, M., O'Brien, M. A., Grimshaw, J., & Eccles, M. P. (2011). Local opinion leaders: Effects on professional practice and health care outcomes. *Cochrane Database of Systematic Reviews*, 2011(8), 1–69. <http://dx.doi.org/10.1002/14651858.CD000125.pub4>
23. Scott, A., Sivey, P., Ouakrim, D. A., Willenberg, L., Naccarella, L., Furler, J., & Young, D. (2011). The effect of financial incentives on the quality of health care provided by primary care physicians (Review). *Cochrane Database of Systematic Reviews*, 2011(1), 1–59. <http://dx.doi.org/10.1002/14651858.CD008451.pub2>

24. Forsetlund, L., Bjørndal, A., Rashidian, A., Jamtvedt, G., O'Brien, M. A., Wolf, F., ... Oxman, A. D. (2012). Continuing education meetings and workshops: Effects on professional practice and health care outcomes. *Cochrane Database of Systematic Reviews*, 2012(11), 1–97. <http://dx.doi.org/10.1002/14651858.CD003030.pub2>
25. Ivers, N., Jamtvedt, G., Flottorp, S., Young, J. M., Odgaard-Jensen, J., French, S. D., ... Oxman, A. D. (2012). Audit and feedback: Effects on professional practice and healthcare outcomes (Review). *Cochrane Database of Systematic Reviews*, 2012(6), 1–227. <http://dx.doi.org/10.1002/14651858.CD000259.pub3>
26. Sinclair, P., Kable, A., Levett-Jones, T., & Booth, D. (2016). The effectiveness of internet-based e-learning on clinician behavior and patient outcomes: A systematic review. *International Journal of Nursing Studies*, 57, 70–81. <https://doi.org/10.1016/j.ijnurstu.2016.01.011>
27. Yamada, J., Shorkey, A., Barwick, M., Widger, K., & Stevens, B. J. (2015). The effectiveness of toolkits as knowledge translation strategies for integrating evidence into clinical care: A systematic review. *BMJ Open*, 5(4), e006808. <http://dx.doi.org/10.1136/bmjopen-2014-006808>
28. Ndumbe-Eyoh, S., & Mazzucco, A. (2016). Social media, knowledge translation, and action on the social determinants of health and health equity: A survey of public health practices. *Journal of Public Health Policy*, 37(2), S249–S259. <http://dx.doi.org/10.1057/s41271-016-0042-z>
29. Chan, W. V., Pearson, T. A., Bennett, G. C., Cushman, W. C., Gaziano, T. A., Gorman, P. N., ... Wells, B. L. (2017). ACC/AHA special report: Clinical practice guideline implementation strategies: A summary of systematic reviews by the NHLBI implementation science work group. *Journal of the American College of Cardiology*, 69(8), 1076–1092. <http://dx.doi.org/10.1016/j.jacc.2016.11.004>
30. Chauhan, B. F., Jeyaraman, M., Mann, A. S., Lys, J., Skidmore, B., Sibley, K. M., ... Zarychanski, R. (2017). Behavior change interventions and policies influencing primary healthcare professionals' practice - An overview of reviews. *Implementation Science*, 12(3), 1–16. <http://dx.doi.org/10.1186/s13012-016-0538-8>
31. Pantoja, T., Opiyo, N., Lewin, S., Paulsen, E., Ciapponi, A., Wiysonge, C. S., ... Oxman, A. D. (2017). Implementation strategies for health systems in low-income countries: An overview of systematic reviews. *Cochrane Database of Systematic Reviews*, 2017(9), 1–133. <http://dx.doi.org/10.1002/14651858.CD011086.pub2>
32. Chan, W. S. Y., & Leung, A. Y. M. (2018). Use of social network sites for communication among health professionals: Systematic review. *Journal of Medical Internet Research*, 20(3), 1–12. <http://dx.doi.org/10.2196/jmir.8382>
33. Vaona, A., Banzi, R., Kh, K., Rigon, G., Cereda, D., Pecoraro, V., ... Moja, L. (2018). E-learning for health professionals (Review). *Cochrane Database of Systematic Reviews*, 2018(1), 1–87. <http://dx.doi.org/10.1002/14651858.CD011736.pub2>
34. Powell, B. J., McMillen, J. C., Proctor, E. K., Carpenter, C. R., Griffey, R. T., Bunger, A. C., ... York, J. L. (2012). A compilation of strategies for implementing clinical innovations in health and mental health. *Medical Care Research and Review*, 69(2), 123–157. <http://dx.doi.org/10.1177/1077558711430690>

35. Wiggers, J., Jauncey, M., Considine, R., Daly, J., Kingsland, M., Purss, K., ... Waites, R. J. (2004). Strategies and outcomes in translating alcohol harm reduction research into practice: The Alcohol Linking Program. *Drug and Alcohol Review*, 23(3), 355–364. <http://dx.doi.org/10.1080/09595230412331289518>
36. DeSmet, A., Van Ryckeghem, D., Compernelle, S., Baranowski, T., Thompson, D., Crombez, G., ... De Bourdeaudhuij, I. (2014). A meta-analysis of serious digital games for healthy lifestyle promotion. *Preventive Medicine*, 69, 95–107. <http://dx.doi.org/10.1016/J.YPMED.2014.08.026>
37. Campbell, A., Louie-Poon, S., Slater, L., & Scott, S. D. (2019). Knowledge translation strategies used by healthcare professionals in child health settings: An updated systematic review. *Journal of Pediatric Nursing*, 47, 114-120. <https://doi.org/10.1016/j.pedn.2019.04.026>
38. Chapman, E., Haby, M. M., Toma, T. S., de Bortoli, M. C., Illanes, E., Oliveros, M. J., & Barreto, J. O. M. (2020). Knowledge translation strategies for dissemination with a focus on healthcare recipients: An overview of systematic reviews. *Implementation Science*, 15(1), 14. <https://doi.org/10.1186/s13012-020-0974-3>
39. Williams, A. V., Marsden, J., & Strang, J. (2014). Training family members to manage heroin overdose and administer naloxone: Randomized trial of effects on knowledge and attitudes. *Addiction*, 109(2), 250–259. <http://dx.doi.org/10.1111/add.12360>
40. Bagley, S. M., Peterson, J., Cheng, D. M., Jose, C., Quinn, E., Oconnor, P. G., & Walley, A. Y. (2015). Overdose education and naloxone rescue kits for family members of individuals who use opioids: Characteristics, motivations, and naloxone use. *Substance Abuse*, 36(2), 149–154. <http://dx.doi.org/10.1080/08897077.2014.989352>
41. DeSmet, A., Shegog, R., Van Ryckeghem, D., Crombez, G., & De Bourdeaudhuij, I. (2015). A systematic review and meta-analysis of interventions for sexual health promotion involving serious digital games. *Games for Health Journal*, 4(2), 78–90. <http://dx.doi.org/10.1089/g4h.2014.0110>
42. Wolfenden, L., Mooney, K., Gonzalez, S., Hall, A., Hodder, R., Nathan, N., ... McCrabb, S. (2022). Increased use of knowledge translation strategies is associated with greater research impact on public health policy and practice: An analysis of trials of nutrition, physical activity, sexual health, tobacco, alcohol and substance use interventions. *Health Research Policy & Systems*, 20(1), 15. <https://doi.org/10.1186/s12961-022-00817-2>
43. Yonker, L. M., Zan, S., Scirica, C. V., Jethwani, K., & Kinane, T. B. (2015). “Friending” teens: Systematic review of social media in adolescent and young adult health care. *Journal of Medical Internet Research*, 17(1), e4. <http://dx.doi.org/10.2196/jmir.3692>
44. Cao, B., Gupta, S., Wang, J., Hightow-Weidman, L. B., Muessig, K. E., Tang, W., ... Tucker, J. D. (2017). Social media interventions to promote HIV testing, linkage, adherence, and retention: Systematic review and meta-analysis. *Journal of Medical Internet Research*, 19(11), e394. <http://dx.doi.org/10.2196/jmir.7997>
45. Carson-Chahhoud, K., Ameer, F., Sayehmiri, K., Hnin, K., Jem, V. A., Sayehmiri, F., ... Smith, B. (2017). Mass media interventions for preventing smoking in young people (Review). *Cochrane Database of Systematic Reviews*, 2017(6), 1–72. <http://dx.doi.org/10.1002/14651858.CD001006.pub3>

46. Janouskova, M., Tuskova, E., Weisssova, A., Trancik, P., Pasz, J., & Evans-Lacko, S. (2017). Can video interventions be used to effectively destigmatize mental illness among young people? A systematic review. *European Psychiatry, 41*, 1–9. <http://dx.doi.org/10.1016/j.eurpsy.2016.09.008>
47. Maiorano, A., Lasalvia, A., Sampogna, G., Poci, B., Ruggeri, M., & Henderson, C. (2017). Reducing stigma in media professionals: Is there room for improvement? Results from a systematic review. *Canadian Journal of Psychiatry, 62*(10), 702–715. <http://dx.doi.org/10.1177/0706743717711172>
48. Tunnecliff, J., Weiner, J., Gaida, J. E., Keating, J. L., Morgan, P., Ilic, D., ... Maloney, S. (2017). Translating evidence to practice in the health professions: A randomized trial of Twitter vs Facebook. *Journal of the American Medical Informatics Association, 24*(2), 403–408. <http://dx.doi.org/10.1093/jamia/ocw085>
49. Giustini, D., Ali, S. M., Fraser, M., & Boulos, M. N. K. (2018). Effective uses of social media in health care: A systematic review of systematic reviews. *Online Journal of Public Health Informatics, 10*(2), e215. <http://dx.doi.org/10.5210/ojphi.v10i2.8270>
50. Huhn, A. S., Garcia-Romeu, A. P., & Dunn, K. E. (2018). Opioid overdose education for individuals prescribed opioids for pain management: Randomized comparison of two computer-based interventions. *Frontiers in Psychiatry, 9*, 1–7. <http://dx.doi.org/10.3389/fpsy.2018.00034>
51. Naslund, J. A., Kim, S. J., Aschbrenner, K. A., Mcculloch, L. J., Brunette, M. F., Dallery, J., ... Marsch, L. A. (2018). Systematic review of social media interventions for smoking cessation. *Addictive Behaviors, 73*, 81–93. <http://dx.doi.org/10.1016/j.addbeh.2017.05.002>. Systematic
52. Clement, S., Lassman, F., Barley, E., Williams, P., Yamaguchi, S., Slade, M., & Rüsck, N. (2013). Mass media interventions for reducing mental health-related stigma (Review). *Cochrane Database of Systematic Reviews, 2013*(7), 1–144. <http://dx.doi.org/10.1002/14651858.CD009453.pub2>
53. Moorhead, S. A., Hazlett, D. E., Harrison, L., Carroll, J. K., Irwin, A., & Hoving, C. (2013). A new dimension of health care: Systematic review of the uses, benefits, and limitations of social media for health communication. *Journal of Medical Internet Research, 15*(4), e85. <http://dx.doi.org/10.2196/jmir.1933>
54. Griffiths, K. M., Carron-Arthur, B., Parsons, A., & Reid, R. (2014). Effectiveness of programs for reducing the stigma associated with mental disorders: A meta-analysis of randomized controlled trials. *World Psychiatry, 13*(2), 161–75. <http://dx.doi.org/10.1002/wps.20129>
55. Gagliardi, A. R., Kothari, A., & Graham, I. D. (2017). Research agenda for integrated knowledge translation (IKT) in healthcare: What we know and do not yet know. *Journal of Epidemiology and Community Health, 71*(2), 105–106. <http://dx.doi.org/10.1136/jech-2016-207743>
56. Iskander, J. K., Wolicki, S. B., Leeb, R. T., & Siegel, P. Z. (2018). Successful scientific writing and publishing: A step-by-step approach. *Preventing Chronic Disease, 15*, 180085. <http://dx.doi.org/10.5888/pcd15.180085>
57. Mclsaac, J.-L. D., Penney, T. L., Storey, K. E., Sigfridson, L., Cunningham, J., Kuhle, S., & Kirk, S. F. L. (2018). Integrated knowledge translation in population health intervention research: A case study of implementation and outcomes from a school-based project. *Health Research Policy and Systems, 16*(72), 1–10. <http://dx.doi.org/10.1186/s12961-018-0351-8>