## Agricultural Producer Mental Health, Mental Health Literacy, and Emergency Response

Interim Report to Ontario Sheep Farmers for #R16-2

Prepared by Andria Jones-Bitton

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## **Executive Summary:**

This project addresses the long-ignored issue of mental health in the Canadian agricultural community. Our national data confirm that producers experience psychological distress at levels higher than the general population, yet have poor access to appropriate mental health supports. Regrettably, there may also exist low levels of mental health literacy and/or poor cultural attitudes towards mental health in our farming communities, which hinders discussion and help-seeking. This project engages the community to decrease stigma and promote help-seeking via development of a mental health literacy program tailored for agriculture. Rigorous qualitative interviews contribute to understanding the lived experience of mental health amongst producers, provide stakeholder input on help-seeking motivations and barriers, and inform ideal mental health programming, to maximize likelihood of uptake. A formal scoping review provides an up-to-date assessment of the resources (or lack thereof) that currently/previously exist for producer mental health, including factors that contributed to success and failure, so we can optimize development of models for producer mental health programming.

### **Objectives:**

- 1. Characterize the lived experience of occupational stresses and agricultural emergencies amongst agricultural workers,
- 2. Determine the mental health help-seeking behaviours of agricultural workers, including perceived motivations and barriers, during non-emergency and crisis,
- 3. Investigate agricultural workers' perceptions of current emergency responses and what would be ideal in mental health literacy (MHL) training and emergency response (ER),
- 4. Develop a provincial agricultural MHL training program,
- 5. Develop a provincial mental health agricultural ER model.

#### **Project Activities to date:**

# • Objectives 1-5:

- We have completed 75 one-on-one research interviews with farmers, agricultural industry staff, government, and veterinarians to address Objectives 1, 2, and 3, and to help inform Objectives 4 and 5. This was a time-intensive and logistically-demanding endeavour. Data collection is complete, verbatim transcripts have been prepared and verified, and data analyses have begun.
- We created a Stakeholder Working Group (SWG) of approximately 40 people (farmers, veterinarians, people from agricultural government, industry, mental health, social work, adult education) to provide guidance and feedback on the development of the programs for Objectives 4 and 5.

### • Objective 1:

 As noted above, data collection is complete and analyses are underway; there is a huge amount of data to be analyzed. In addition to meeting the objectives of this research agreement, we anticipate this also being a source of many other research reports/papers.

## • Objective 2:

- As per comments for Objective 1, above.

## Objective 3:

As per comments for Objective 1, above.

## Objective 4:

- At our first in-person SWG meeting (September 2017), we got feedback for the design, content, and delivery of the MHL training program. We designed a 4-hour in-person program based on that feedback, and piloted this program with the SWG at a group meeting in April 2018. We modified the program based on the group's feedback, and presented a final version of the program to the group in September 2018. The program is called, "In the Know" (ITK).
- During October and November 2018, we ran 6 pilot offerings of the 4-hour ITK program in communities across Ontario. We collected data from participants prior to and immediately after the training session (n=96); follow-up data collection will be occurring at 3- and 6-months post-training, so that we can formally evaluate the effectiveness of the training.

## • Objective 5:

- To help inform the provincial agricultural mental health model, we added a formal scoping review to the research program. This involved screening of the national and international academic and grey literature on mental health in agriculture (a large undertaking – the initial screening required reviewing approximately 5,000 papers). Data extraction is complete, data analyses are complete, and a draft of a manuscript is complete and under review with co-authors.
- In addition to the scoping review, the results from the analyses of the 75 research interviews and our networking with the SWG and agricultural communities will further inform model development.

#### Additional Undertakings:

- In addition to the above formal research work, we have also been actively engaging with
  the agricultural community to initiate dialogue around mental health in agriculture and to
  address some of the perceived stigmas towards mental health and help-seeking. The
  response has been overwhelming positive, with numerous presentations and media
  interviews (see details below).
- We have been communicating with the federal government to increase supports for farmer mental health in Canada. Provincial lobbying has started.
- We are engaging with federal government stakeholders to develop a collaborative strategy to link existing national databases to examine suicide among farmers in Canada.

# Summary of the results to date:

- We have completed the research interviews (n=75), and have had the audio recordings transcribed verbatim. Analyses are underway (**Objectives 1-3**).
- We have completed the scoping review that informs **Objectives 4 and 5**. A thorough search of the national and international scientific and grey literature on mental health in agriculture yielded 4,770 records for initial screening; 327 papers made it through to data extraction. A manuscript been drafted and is currently being reviewed. This scoping review has been/will be integral to informing the mental health literacy training program and producer mental health programming (**Objectives 4 and 5**).
- We engaged with individuals from agriculture (e.g. producers, industry staff, government) from multiple commodities (e.g. swine, poultry, sheep, crops/horticulture, dairy) and from mental health (e.g. psychologists, social workers, extension specialist) and created a Stakeholder Working Group (SWG) meetings to provide on-going input and feedback related to the project (Objectives 1-5).
- The first SWG meeting held September 2017 helped introduce the project, team-build, and begin the planning of the mental health literacy (MHL) training program (**Objective 4**). We then created a 4-hour in-person version of the training program, in conjunction with our mental health partners.
- The second SWG meeting (April 2018) involved piloting the MHL training program with our stakeholder working group. Based on stakeholder feedback, we made modifications to the program, and finalized the program at a third stakeholder meeting in September 2018. We have offered 6 pilot sessions of the training and are collecting data over the next 6 months to evaluate the program (**Objective 4**).
- We actively engaged with the agricultural community to initiate dialogue around mental health in agriculture and to address some of the perceived stigmas towards mental health and help-seeking. The response has been overwhelmingly positive. To date, we have given over 50 presentations locally, provincially, and nationally, have given 70+ media interviews, and have expanded our stakeholder working group as a result. Perhaps the most encouraging is the feedback we have received from producers expressing gratitude and relief that mental health is "finally being talked about" in agriculture.

### **Next Steps:**

- Conduct analyses of the interview transcripts; write manuscripts/reports (**Objectives 1, 2, and 3**).
- Finish data collection for In the Know pilot training sessions; analyze data; write manuscript/report (**Objective 4**).
- Summarize results from interview transcripts, stakeholder working group, and networking to formulate agricultural mental health model (**Objective 5**).

## **Departures from Original Timelines:**

- We originally intended to have completed the analyses of the interview transcripts (Objectives 1-3) by December 2018; however, we are a few months behind schedule as we expanded the project and conducted more interviews than originally intended. Analyses are now underway.
- We are 2 months behind the original timelines for the MHL program. The pilot sessions are complete, and data are being collected over the next 3 and 6 months as originally planned.
- As the other parts of the project will be used to inform the agricultural mental health model (Objective 5), and these had brief delays, we will likely be a few months behind on the timelines originally set for model development.

### Interpretation/discussion of results to date:

We have released the pilot version of the mental health literacy training program that we developed as part of this project. We have a long list of people and organizations in agriculture who have asked to participate in this training. The training is intended to build participants' knowledge of mental health, reduce stigma, and increase confidence in discussing mental health and offering support to those identified as struggling. This will likely greatly benefit people in agriculture, and beyond.

The scoping review will provide a review of the worldwide efforts made toward farmer mental health, including factors that contributed to the success or failure of programs. This knowledge will help prioritize resources and inform creation of farmer mental health resources/programs.

An unanticipated impact of this project came from the significant positive media attention it garnered. This has helped initiate a long-ignored dialogue around mental health in agriculture. As a result of this attention, more producers and industry groups are talking about mental health and the need for appropriate farmer resources. This positive attention had the added benefit of helping grow our stakeholder group with highly engaged individuals. It also signals that our project is on-point with the agricultural community's needs.

### **Knowledge Transfer:**

# Presentation, poster or abstract from a scientific or industry meeting

Below is a list of the presentations given related to this research (n > 50), including sheep-specific meetings, as well as those with other commodities and organizations. We have accepted every sheep meeting invitation that we have received. As you will note, Ontario Sheep Farmers' investment in this research has generated significant interest from other groups as well; we regularly (and publicly) thank Ontario Sheep Farmers for being an early and visionary supporter of farmer mental health research.

### International

- 1. Hagen B, O'Sullivan T, Harper S, Jones-Bitton A. (November 2018). Farmer mental health: factors associated with stress and resilience in Canadian farmers. International Society of Veterinary Epidemiology and Economics, Chiang Mai, Thailand. [Poster 1<sup>st</sup> place poster prize; International].
- 2. Jones-Bitton, A., Van den Heuvel, C., Hyndman-Moffat, K. (June 2018). *Panel on Mental Health in Agriculture*. International Society for Agricultural Health and Safety Conference, Halifax, Canada-Nova Scotia [Oral; International].
- 3. Hagen, B., O'Sullivan, T., Harper, S., & Jones-Bitton, A. (June 2018). *Identifying and characterizing factors associated with mental health and wellness among agricultural producers in Canada: a mixed-methods approach.* International Society for Agricultural Health and Safety Conference, Halifax, Canada-Nova Scotia. [Oral; International].
- 4. Jones-Bitton, A., Best, C., & Hewson, J. (September 2016). *Mental Wellness of Canadian Farmers*. Invited presentation at One Welfare Conference, Winnipeg, Canada-Manitoba. [Invited; Oral; International].

### **National**

- 5. Jones-Bitton, A. (November 2018). Farmer mental health: an important consideration in animal health and welfare systems. National Farmed Animal Health and Welfare Council Forum, Ottawa, Canada-Ontario [Invited; Oral; National].
- 6. Hagen B, Jones-Bitton A. (November 2018). *Mental health and wellness among Canadian Farmers: a scoping review.* National Farmed Animal Health and Welfare Council One Welfare Consultation, Ottawa, Ontario, Canada. [Invited; Oral; National].
- 7. Jones-Bitton, A. (April 2018). *Mental wellness on the farm*. Canadian Association of Farm Advisors, London, Canada-Ontario [Oral; National].
- 8. Nelson, T., Jones-Bitton, A. (February 2018). *Mental wellness among Canadian agriculture*. Canadian Federation of Agriculture Annual General Meeting, Ottawa, Canada-Ontario [Invited; Oral; National].
- 9. Hagen, B., Hewson, J., Best, C., & Jones-Bitton, A. (June 2017). Factors associated with stress and resilience among Canadian agricultural producers: Results from the 2016 Producer Stress

- and Resilience Survey. Canadian Association of Veterinary Epidemiology and Preventive Medicine Conference, Calgary, Canada-Alberta. [Poster; National].
- 10. Jones-Bitton, A. (September 2016). *Mental health in Canadian agricultural producers*. National Farm Animal Health and Welfare Council, Winnipeg, Canada-Manitoba [Invited; Oral; National].
- 11. Jones-Bitton, A. (September 2016). *Mental health in agricultural producers in Canada*. Canadian Animal Health Coalition, Toronto, Canada-Ontario [Invited; Oral; National].

#### **Provincial**

- 12. Hagen B, Jones-Bitton A. (December 2018). *Mental health in Canadian farmers: Where are we?*Where are we going? Potato Board of Ontario Annual Meeting, Guelph, Ontario, Canada. [Invited; Oral; Provincial].
- 13. Jones-Bitton, A. (November 2018). *The human side of farming: Mental health in Canadian Agriculture*. Nova Scotia Federation of Agriculture Annual General Meeting, Truro, Canada-Nova Scotia [Invited; Oral; Provincial].
- 14. Jones-Bitton, A. (November 2018). *Mental health in Canadian agriculture and resources for the Ontario poultry industry.* Ontario Association of Poultry Practitioners, Guelph, Canada-Ontario [Invited; Oral; Provincial].
- 15. Hagen B, Kelly J. (November 2018). *Mental health discussion for those that know, or work with farmers*. Ontario Ministry of Agriculture, Food, and Rural Affairs: Agriculture Development Branch Annual Conference, Woodstock, Ontario, Canada. [Invited; Oral; Provincial].
- 16. Jones-Bitton, A. (September 2018). *Supporting our farmers: Stress and mental wellness on-farm*. Presidents' Council Meeting, Guelph, Canada-Ontario [Invited; Oral; Local].
- 17. Jones-Bitton, A. (June 2018). *Supporting our farmers: Stress and mental wellness on farm*. Veal Farmers of Ontario Board Meeting, Guelph, Canada-Ontario [Oral; Provincial].
- 18. Hagen B. (June 2018). *Mental wellness among Canadian producers*. Ontario Livestock and Poultry Council, Guelph, Canada-Ontario [Oral; Provincial].
- 19. Hagen B. (June 2018). *Mental health in Canadian agriculture*. Ontario Ministry of Agriculture Food and Rural Affairs Branch Meeting, Woodstock, Canada-Ontario [Invited; Oral; Provincial].
- 20. Hagen, B., O'Sullivan, T., Harper, S., & Jones-Bitton, A. (May 2018). *Stress and resilience among agricultural producers in Canada: a mixed approach.* Ontario Swine Research Network Conference, Guelph, Canada-Ontario. [Oral; Provincial].
- 21. Jones-Bitton, A. (May 2018). Supporting our farmers: Stress and mental wellness on farm. Ontario Sheep Farmers Board Meeting, Guelph, Canada-Ontario [Oral; Provincial].
- 22. Jones-Bitton, A. (April 2018). *Stress, mental health, and resilience in Canadian agriculture*. Workplace Safety and Prevention Services, Agriculture & Horticulture Advisory Committee Board Meeting, Mississauga, Canada-Ontario [Invited; Oral; Provincial].
- 23. Jones-Bitton, A. (March 2018). *The Human Side: Stress and Mental Well-being on Farm.* London Swine Conference, London, Canada-Ontario [Invited; Workshop 2.5 hours; Provincial].
- 24. Jones-Bitton, A. & Hagen, B. (February 2018). *Mental health in Canadian agriculture.* Innovative Farmers Conference, London, Canada-Ontario. [Invited; Oral; Provincial].
- 25. Hagen B, Heimstra C. (February 2018). *Mental wellness in agriculture: panel discussion*. Ontario Fruit and Vegetable Conference (Provincial), Niagara Falls, Ontario, Canada. [Invited; Oral; Provincial].

- 26. Hagen B, Jones-Bitton A. (January 2018). *There's an elephant in the barn: addressing mental health and wellness in Canadian agriculture.* FarmSmart Agricultural Conference, Guelph, Ontario, Canada. [Invited; Oral presentation; Provincial].
- 27. Jones-Bitton, A. (December 2017). *Mental health in Canadian agriculture*. Ontario Federation of Agriculture, Guelph, Canada-Ontario [Invited; Oral; Provincial].
- 28. Jones-Bitton, A. (November 2017). *Mental health in Canadian agriculture*. Egg Farmers of Ontario, Toronto, Canada-Ontario [Invited; Oral; Provincial].
- 29. Jones-Bitton, A. (October 2017). *Mental wellness in agriculture and veterinary medicine: Helping Canadian farmers and vets.* Ontario Association of Swine Veterinarians Conference, Niagara-on-the-Lake, Canada-Ontario [Invited; Oral; Provincial].
- 30. Jones-Bitton, A. (October 2017). *The who, what, and who cares of mental health in Canadian agriculture*. Ontario Sheep Farmers Annual General Meeting, Alliston, Canada-Ontario [Invited; Oral; Provincial].
- 31. Jones-Bitton, A. (April 2017). *Is there an elephant in the barn? The state of mental wellness in Canadian agriculture.* Ontario Association of Bovine Practitioners (OABP) Conference, Guelph, Canada-Ontario. [Invited; Oral; Provincial].
- 32. Jones-Bitton, A. & Dam, A. (March 2017). *Mental wellness amongst our agricultural producers.* London Swine Conference, London, Canada-Ontario. [Invited; Oral; Provincial].
- 33. Jones-Bitton, A. (February 2017). *Mental wellbeing of veterinarians and producers in Canada*. Ontario Ministry of Agriculture, Food and Rural Affairs Animal Health and Welfare Branch, Guelph, Canada-Ontario [Invited; Oral; Provincial].
- 34. Jones-Bitton, A. (January 2017). *Mental wellness of agricultural producers in Canada.* FarmSmart Agricultural Conference, Guelph, Canada-Ontario [Invited; Oral; Provincial].
- 35. Jones-Bitton, A. (December 2016). *Agricultural producer stress and resilience in Canada*. Ontario Livestock and Poultry Council Presidents' Council Meeting, Guelph, Canada-Ontario [Invited; Oral; Provincial].
- 36. Jones-Bitton, A. (October 2016). *Mental wellbeing of veterinarians and producers in Canada.* Western Canadian Association of Swine Veterinarians Annual Conference, Saskatoon, Canada-Saskatchewan [Invited; Oral; Provincial].
- 37. Jones-Bitton, A. (October 2016). *Mental wellness of agricultural producers in Canada*. Ontario Association of Swine Veterinarians Conference, Toronto, Canada-Ontario [Invited; Oral; Provincial].
- 38. Jones-Bitton, A. (September 2016). *Mental health in agricultural producers in Canada*. Ontario Ministry of Agriculture Food and Rural Affairs Branch Meeting, Peterborough, Canada-Ontario [Invited; Oral; Provincial]].
- 39. Jones-Bitton, A. (June 2016). *Agricultural producer stress and resilience in Canada*. Ontario Livestock and Poultry Council, Guelph, Canada-Ontario [Invited; Oral; Provincial].
- 40. Jones-Bitton, A. (December 2015). *Exploring agricultural producer stress and resilience*. Invited presentation at Ontario Ministry of Agriculture Foods and Rural Affairs Emergency Management Research Expo, Guelph, Canada-Ontario. [Invited; Oral; Provincial].
- 41. Jones-Bitton, A. (November 2015). *Evidence-based mental health programs for Ontario agriculture*. Livestock Research Innovation Corporation, Guelph, Canada-Ontario [Invited; Oral; Provincial].

#### Local

- 42. Jones-Bitton, A. (November 2018). *Mental health in Canadian dairy farmers.* Dairy Research and Innovation Day, Guelph, Canada-Ontario [Invited; Oral; Local].
- 43. Hagen B, O'Sullivan T, Harper S, Jones-Bitton A. (November 2018). Farmer mental health: factors associated with stress and resilience in Canadian farmers. One Health Research Day, Centre for Public Health and Zoonoses, Guelph, Ontario, Canada. [Poster; Local].
- 44. Hagen, B., Albright, A., Sargeant, J., & Jones-Bitton, A. (June 2018). *A scoping review of mental health and wellness in agricultural communities*. Centre for Public Health and Zoonoses Scientific Symposium, Guelph, Canada-Ontario. [Poster; Local].
- 45. Jones-Bitton, A. (May 2018). Mental health in agriculture: The dark side of farming? Arrell Food Summit, Guelph, Canada-Ontario [Workshop 2.5 hours; Local].
- 46. Hagen B. (March 2018). *Mental health in Canadian agriculture*. North Wellington Cooperators Annual Meeting, Harriston, Canada-Ontario [Invited; Oral; Local].
- 47. Jones-Bitton, A. (January 2018). *Mental health in Canadian agriculture*. Niagara Soil and Crop Improvement Association, Grassie, Canada-Ontario [Invited; Oral; Local].
- 48. Jones-Bitton, A. (January 2018). *Mental health in Canadian agriculture*. Grand Valley Fortifiers Meeting, Cambridge, Canada-Ontario [[Invited; Oral; Local].
- 49. Hagen, B., Hewson, J., Best, C., & Jones-Bitton, A. (May 2017). Factors associated with stress and resilience among Canadian agricultural producers: Results from the 2016 Producer Stress and Resilience Survey. Centre for Public Health and Zoonoses Scientific Symposium, Guelph, Canada-Ontario. [Poster; Local].
- 50. Hagen B, Best C, Hewson J, Jones-Bitton A. (May 2017). *Factors associated with stress and resilience among Canadian agricultural producers.* Centre for Public Health and Zoonoses Research Conference, Guelph, Ontario, Canada. [Poster; Local].
- 51. Jones-Bitton, A. (March 2017). Guest panelist and moderator. *Managing Mental Health on the Farm*. Community Workshop, New Dundee, Canada-Ontario [Invited; Oral; Local].
- 52. Jones-Bitton, A. (January 2017). *Mental wellbeing of veterinarians and producers in Canada*. Department of Population Medicine (Ontario Veterinary College) Seminar Series, Guelph, Canada-Ontario [Invited; Oral; Local].
- 53. Jones-Bitton, A. (November 2016). *Mental wellness of agricultural producers and veterinarians in Canada*. University of Calgary College of Veterinary Medicine Seminar Series, Calgary, Canada-Alberta [Invited; Oral; Local].

#### Popular Press Articles and communications:

- 1. 2018-2019: The Western Producer. Online article. "Animal neglect linked to mental health", by Barb Glen. (December 13, 2018).
- 2. 2018-2019: Lloyd Longfield, online video (Twitter, Facebook). "Talking mental health on the farm with Dr. Andria Jones-Bitton" (October 4, 2018).
- 3. 2018-2019: The Western Producer. Online article. "Crop struggle can hurt mental health", by Karen Briere. (October 18, 2018).
- 4. 2018-2019: Real Agriculture. Online article and radio interview. "Farmer as identity: the heavy weight of trade deals, succession, and scrutiny". (October 16, 2018).

- 5. 2018-2019: iPolitics (National). Online article. "Nearly half Canada's farmers are highly stressed, survey finds", by Kelsey Johnson. (October 8, 2018).
- 6. 2018-2019" CBC News. Online article. "Farmer mental health focus of new University of Guelph course", by Jackie Sharkey. (August 31, 2018)
- 7. 2017-2018: University of Guelph Office of Research. Online article. "Creating mental health resources tailored for Canadian farmers", by Samantha McReavy. (August 2018).
- 8. 2017-2018: OMAFRA University of Guelph Agreement Research Magazine 2017-2018 Agri-Food Yearbook (State). Print and online article: "Mental health, psychology....and agriculture", interviewed by Owen Roberts and Liz Snyder. Volume XXXV (1), Spring 2018 (p. 34-35).
- 9. 2017-2018: Arrell Food Institute. Online article. "Mental Health in Agriculture: The Dark Side of Farming", by Corey Mintz. (May 22, 2018).
- 10. 2017-2018: Farm Credit Canada. Online article. "Ag industry steps up to support farmer mental health", by Owen Roberts. (May 17, 2018).
- 11. 2017-2018: Alberta Seed Guide (State). "We need to talk about mental health", by Marc Zienkiewicz (April 2018).
- 12. 2017-2018: Canadian Poultry magazine (National). "Mental wellness on the farm", interviewed by Lilian Schaer (February 26, 2018).
- 13. 2017-2018: Christian Farmers Federation of Ontario (State). Online article: "Farm Safety", by Marie Versteeg (March 16, 2018).
- 14. 2017-2018: RealAgriculture.com (Regional). Online article "Mental health advocate gets the picture", interviewed by Owen Roberts (November 29, 2017).
- 15. 2017-2018: Farmscape multimedia news and information (Regional). Radio interview and online article, by Bruce Cochrane: "Awareness of issue of mental health on the farm builds" (April 3, 2018).
- 16. 2017-2018: Farmscape multimedia news and information (Regional). Radio interview and online article, by Bruce Cochrane: "Farmers encouraged to be aware of the warning signs of stress" (April 17, 2018).
- 17. 2017-2018: Country Guide (National). "Farmers, take care of yourself", interviewed by Helen Lammers-Help (November 3, 2017).
- 18. 2017-2018: Farm Credit Canada FCC Express (National). "Farmers face stress, but help is available" (September 29, 2017).
- 19. 2017-2018: Ontario Grain Farmer Magazine. Online article. "More than stress: Farmers struggle with mental health", by Erin Calhoun. (August 2017).
- 20. 2016-2017: Onfloriculture. Online article. "Be a part of a conversation that matters: farmer mental health", by Sarah Jandricic. (July 17, 2017).
- 21. 2016-2017: Guelph Now (Local). "Suicide rates amongst farmers is real, growing and greatly concerning", by Rachel Keirstead, Now Media Inc. (March 1, 2017).
- 22. 2016-2017: Farms.com (National). Farmers want and need mental health help: U of G Survey from 2016 shows producers are worried about mental health", by Diego Flammini (January 25, 2017).
- 23. 2016-2017: Better Farming Magazine (National). "Improving mental health on the farm", interviewed by Lisa Mclean. Dick Beamish Award for press feature writing from the Canadian Farm Writers' Federation

- 24. 2016-2017: Farmscape multimedia news and information (Regional). Print and online audio interview with Bruce Cochrane: "Survey shows Canadian farmers face high levels of stress, anxiety, depression, burnout" (July 15, 2016).
- 25. 2016-2017: Ontario Animal Health Network (OAHN) Veterinary Podcasts (State). "Producer mental health, with Dr. Andria Jones-Bitton", interviewed by Melanie Barnham (August 15, 2016).
- 26. 2016-2017: The Ruminant Podcast (National). "The farmers aren't alright", interviewed by Jordan Marr (March 3, 2017).
- 27. 2016-2017: Ag Women's Network (National). Authored invited blog post for Ag Women's Network website: "The Elephant in the Barn? Update on mental health study of ag producers" (published November 14, 2016).
- 28. 2016-2017: Canadian Animal Health Coalition (National). Summary of my research presentation to the Canadian Animal Health Coalition (CAHC) published in the CAHC newsletter (October, 2016).
- 29. 2016-2017: The Western Producer (Regional). Online print article by Rob Arnason: "Public criticism affects farmers' mental health" (interviewed Sept. 27, 2016; article Oct. 6, 2016)
- 30. 2015-2016: St. Mary's Independent (Local). "University of Guelph study finds farmers among most vulnerable to mental health issues" (July 8, 2016).
- 31. 2015-2016: Manitoba Cooperator (State). Farmers want and need resources for mental health: survey", by Lorraine Stevenson (July 14, 2016).
- 32. 2015-2016: Arrell Food Institute website (Unknown). "Feeling down on the farm", by Paul Gallant (July 15, 2016).
- 33. 2015-2016: Farmers Forum (National). "As many as 1/3 of Ontario farmers could be depressed, study says", by Connor Lynch (August 7, 2016).
- 34. 2015-2016: Farms.com (Regional).
- 35. 2015-2016: Farmscape multimedia news and information (Regional). Radio interview and online article, by Bruce Cochrane: "Survey shows farmers anxious to address mental health issues" (July 19, 2016).
- 36. 2015-2016: The London Free Press (Regional). Print and online article, by John Miner: "Canadian farmers among the most stressed out in the world, partly because of social media attacks" (July 18, 2016).
- 37. 2015-2016: The Western Producer (National). Online article, by Rosalie Tennison: "Farmers suffering mental health issues fail to seek help" (July 21, 2016).
- 38. 2015-2016: TVO Current Affairs (Regional).
- 39. Print article by Sarah Dziedzic, "Food Links: The new network helping farmers fight mental health stigma" (July 11, 2016).
- 40. 2015-2016: The Cattle Network (Local). Print article, by Angela Bowman: "Your stress level matters" (May 27, 2016).
- 41. 2015-2016: Guelph Today (Local). Online article, by Tony Saxon: "U of G study finds farmers want and need mental health help" (June 29, 2016).
- 42. 2015-2016: CBC Canadian Broadcasting Corporation News (National). Online article, by Max Leighton: "Farmers' survey reveals high rates of mental health difficulties" (June 30, 2016).
- 43. 2015-2016: Blackburn News (Local). Online article, by Ray Banton: "Team to deal with mental health issues in Ontario agriculture" (July 4, 2016).

- 44. 2015-2016: Veterinary Practice News (International). Print article: "Zoetis, OVC partnership to study mental health issues affecting veterinarians" (March 29, 2016).
- 45. 2015-2016: JAVMA News (International). Print article, by Malinda Larkin: "Studies confirm poor well-being in veterinary professionals, students" (April 13, 2016).
- 46. 2015-2016: The Star (Regional). Print article, by Tyler Hamilton: "For normally stoic farmers, the stress of climate change can be too much to bear" (February 28, 2016).
- 47. 2015-2016: Chatham Daily News (Local). Print article, by Tyler Kula: "Farming a risking, intense business" (July 5, 2016).
- 48. 2015-2016: The Jennifer Campbell Show 570 News Radio (Regional). Radio interview with Jennifer Campbell (July 6, 2016).
- 49. 2015-2016: 570News.com (Regional). Online article, by Christine Clark: "U of G study finds farmers most vulnerable when it comes to mental health" (July 6, 2016).
- 50. 2015-2016: Canadian Meat Business (National). Online article: "Coping skills for stress can be learned" (May 13, 2016).
- 51. 2015-2016: Syngenta Canada (National). Online article: "Life on the farm full of stress, anxiety: Study" (June 28, 2016).
- 52. 2015-2016: Farmscape multimedia news and information (Regional). Radio interview and online article, by Bruce Cochrane: "Producer survey to be used to develop resources for dealing with stress" (July 28, 2016).
- 53. 2015-2016: Farmscape multimedia news and information (Regional). Radio interview and online article, by Bruce Cochrane: "Producers in western and eastern Canada encouraged to participate in a stress survey" (January 25, 2016).
- 54. 2015-2016: Farmscape multimedia news and information (Regional). Radio interview and online article, by Bruce Cochrane: "Extreme stress harmful on several levels" (April 22, 2016).
- 55. 2015-2016: Farmscape multimedia news and information (Regional). Radio interview and Online article, by Bruce Cochrane: "Coping skills for stress can be learned" (May 12, 2016).
- 56. 2015-2016: Farmscape multimedia news and information (Regional). Radio interview and Online article: "Farmers face higher levels of stress than the general population" (May 20, 2016).
- 57. 2015-2016: Farmscape multimedia news and information (Regional). Radio interview and online article, by Bruce Cochrane: "New culture needed to foster improved mental health" (May 26, 2016).
- 58. 2015-2016: The Western Producer (National). Online article, by Rebeca Kuropatwa: "Study examines farmer stress" (February 18, 2016).
- 59. 2015-2016: RealAgriculture.com (National). Online article, by Owen Roberts: "Farmers Relieved Mental Health Issues on the Table: Coordinator" (January 25, 2016).
- 60. 2015-2016: University of Guelph News Release (Local). Online News Release: "Farmers need, want mental health help: survey" (June 28, 2016).
- 61. 2015-2016: CBC Canadian Broadcasting Corporation News (National). Radio interview and Online article: "Farmers' mental health survey launched by University of Guelph researchers" (October 7, 2015).
- 62. 2015-2016: CTV Kitchener (Regional). TV interview, by Christina Marshall: "Farmers among most vulnerable regarding mental health: study from U of G" (June 28, 2016).

- 63. 2015-2016: Sudbury.com (Regional). Online article, by Tony Saxon: "Guelph study finds farmers want and need mental health help" (June 30, 2016).
- 64. 2015-2016: The Record (Regional). Print and online article, by Johanna Weidner: "Farmers vulnerable to mental distress: Guelph study" (July 3, 2016).
- 65. 2015-2016: Motherboard website (International). Online article by Kaleigh Rogers: "Farmers have an alarmingly high suicide rate, and we've known for decades" (July 5, 2016).
- 66. 2015-2016: Morning Post Exchange (National). Online article: "OVC, Zoetis Team to Study How Vets Cope With Stress" (March 30, 2016).
- 67. 2015-2016: Farmscape multimedia news and information, (Regional). Print and online audio interview with Bruce Cochrane: "Farmers invited to participate in agricultural stress survey" (November 3, 2015).
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