

**AgriSafe's *FarmResponse*[®] Training Program
Evaluation Report, 2022**



Prepared for:

**AgriSafe Network, Inc.
8342 NICC Drive
Peosta IA 52068
<https://agrisafe.org>**

Prepared by:

**Cheryl Beseler, PhD
Evaluator, Central States Center for Agricultural Safety and Health
Department of Environmental, Agricultural and Occupational Health
College of Public Health
University of Nebraska Medical Center
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Table of Contents

Executive Summary	3
Outcome Evaluation	
1. Changes in Participant Knowledge	4
2. Pretest Question Analysis	5
Figure 1. Measure of goodness-of-fit of multidimension scaling analysis (MDS).....	5
Table 1. Percentage of correct responses and domain values from MDS.....	6
3. Test Question Quality	7
Figure 2. Difficulty and discrimination of pretest questions	7
4. Conclusion of Test Performance Outcomes	7
5. Participant Perceptions of Program Benefits and Challenges	8
A. Quantitative Data	8
B. Qualitative Data	8
Table 2. Frequency of responses to training satisfaction	9
Figure 3. Graph of reasons for recommendations	10
Table 3. Themes and codes for reasons for recommendations	12
Table 4. Examples of participant statements for reasons to recommend...	13
Table 5. Themes and codes related to benefits and barriers to use	15
Figure 4. Graph of benefits and barriers to using program materials	15
Table 6. Example of participant statements related to benefits and barriers for applying program materials in their work	16
6. Conclusion of Participant Training Experience	17

Executive Summary

Participants completing the FarmResponse training to enhance their understanding of the challenges agricultural operators experience were overwhelmingly satisfied with the knowledge they gained. Designed to educate healthcare providers about the agrarian cultural perspective, the curriculum is divided into 18 modules tackling all aspects of farm life that impacts behavioral and mental health in the agricultural community.

This is a more extensive evaluation of FarmResponse with a much larger sample size following the national release of the program. Participants from the initial pilot study were not included in this evaluation. This evaluation report has four objectives. The first is to address the knowledge gained from the training itself, the second examines participant knowledge prior to initiation of the course, the third assesses the quality of the test questions, and the fourth involves measuring the participants' perceived benefits and challenges in applying the principles of the program after completion. A paired t-tests was used to assess changes in test scores from pretest to posttest. Multidimensional scaling was used to assess how the correct and incorrect responses clustered together to assess what participants knew about the topics before the training and what material was not as well understood. The second aspect of assessing the test questions was to examine the discrimination and difficulty of each question using classical test theory calculations. Discrimination measures how well a test question distinguishes someone with a higher level of knowledge of a topic from someone with less knowledge. Difficulty is simply the proportion of correct test responses compared to the total number of test takers. Ideally, the discrimination and difficulty values should cover a broad range of the test questions so that the range of knowledge of participants can be ascertained prior to the initiation of the training course. Measuring change requires that there is space to see change. Lastly, qualitative data analysis was used to analyze participant responses to open-ended questions using themes and codes.

Specific findings from the evaluation are:

1. In 520 responses, the pretest score increased 5.05 points (95% confidence interval 4.81, 5.29; p-value <0.0001). The pretest mean score was 12.3 (standard deviation (SD) = 2.73) and the posttest mean score was 17.3 (SD=1.22) out of a possible score of 20.
2. Four questions were answered incorrectly more often than others at pretest and were different than the remaining 16 questions. These questions indicated the type of information that participants did not have before taking the FarmResponse course.
3. The difficulty of the test questions at pretest showed more variability than the ability of test questions to discriminate between levels of knowledge. Difficulty is the primary property of interest because it aids in assessing the effectiveness of the training when assessing change in test scores. If the questions are all too easy or too hard, then measuring effectiveness is not possible.
4. Participants agreed to strongly agreed that the activities helped them achieve the stated objectives of the course.
5. Greater than three-fourths (77.1%) reported that implementing changes to their practice would be easy or very easy.
6. Participants' primary reasons for recommending the training program was that it was informative and beneficial for rural providers.

7. Barriers mentioned by participants were primarily gaining access to farmers because they do not seek help, receptivity of farmers to opening up about behavioral health issues, and the willingness of the farming population to change, as well as the ability of providers to make changes.

Outcome Evaluation

The FarmResponse curriculum was designed to educate and inform healthcare and other professionals working in agricultural communities about the cultural influences and challenges that rural communities endure. It is composed of 18 modules of related agricultural topics. A pretest is completed before the training begins and a posttest is administered afterwards. The posttest can be taken numerous times to achieve a desired score with review of the material where needed.

1. Changes in Participant Knowledge

Methods. Pretest FarmResponse scores were matched to posttest FarmResponse scores. There were 623 pretests and 674 posttests in the 2022 FarmResponse dataset. Duplicate posttests were removed and the first posttest was extracted resulting in 520 matched tests for the analysis. Frequencies were used to describe the occupational and geographical representation of participants. Results were compared between those who reported serving in the rural community and those who did not. A paired t-test was used to assess whether participants improved from pretest to posttest. Test questions are shown in Table 1.

Results. Nearly all (98.4%) answered the occupation question as “not applicable” so it is not known who was undertaking the FarmResponse training. Only five responded that they were a healthcare professional. Although nearly all states were represented among the participants, 95 were from Pennsylvania and 142 were from Texas; 45.6% were from two states in the US. One participant reported being from Slovenia. Of the 158 who responded to the question asking whether they served rural communities, 118 (74.7%) responded “yes”; 362 (69.6%) did not respond to this question.

Not all participants completed all modules. Almost half (45.4%) completed 17 of 18 modules, 32.7% completed 16 modules, 12.3% completed all 18 modules and the remaining almost 10% completed 14 or 15 of the modules. Module completion was not associated with a lower score on the pretest or posttest.

The pretest score had a mean of 12.3 (SD=2.73, minimum=3, maximum=19) and the posttest score had a mean of 17.3 (SD=1.22, minimum=16, maximum=20). The coefficient of variation (CV) at pretest was 22.2 and at posttest, 7.06. This measure, which is the ratio of the standard deviation to the mean, can be used to compare summary statistics where the means are statistically different. The CV shows that the variability around the mean was much lower at posttest compared to pretest.

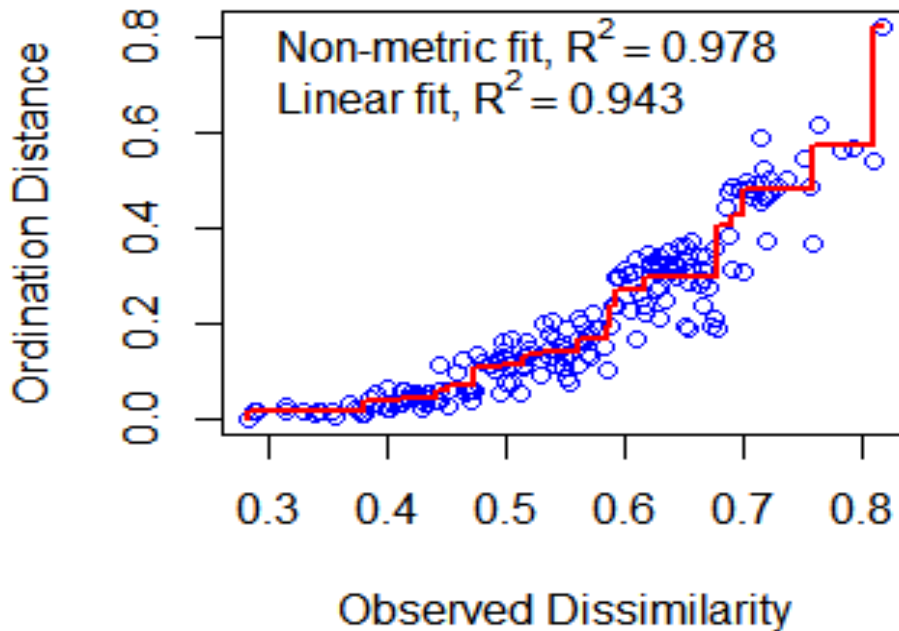
In a paired t-test analysis, the difference between pretest and posttest was 5.05 (95% confidence interval (CI) 4.81, 5.29) with a standard error of 0.12, and was statistically significant ($t=41.5$, $p\text{-value}<0.0001$). The correlation between the pretest and the posttest was 0.19 ($p<0.0001$). Restricting the analysis to the 158 who responded to the question asking whether they provided rural care, there was no difference in test scores in those who worked in a rural community and those who did not.

2. Pretest Question Analysis

Methods. We examined the percentage of participants who correctly answered the questions in the pretest to assess where areas of knowledge about rural and agricultural challenges and risk factors was lacking (Table 1). We conducted a nonmetric multidimensional scaling (NMDS) on the questions after coding them as correctly answered or incorrectly answered. This resulted in a binary variable where an incorrect response = 0 and a correct response = 1. The NMDS allows for the separation of items based on binary responses. Goodness-of-fit tests were used to assess model fit.

Results. A goodness-of-fit test on each of the test questions showed that each stress measure was less than 0.06, indicating an excellent fit of the data to the two dimensional model. Additionally, the Shepard's Diagram in Figure 1 shows that ranking the distance between the questions does not result in information loss compared to the original data. The dissimilarity measured in the question aligns with the distance of counts of each correct response.

Figure 1. Measure of goodness-of-fit of 20 questions separated into two dimensions based on correct and incorrect responses.



Only four questions showed substantial deviation from the true answer using a criterion of a correlation of 0.30 or larger (Table 1). The first was the question about what is in the Total Worker Health Model. Although 32.5% scored correctly on this answering that family history was not in the model, 39.6% said that hazards were not in the model. The remaining individuals responded that sleep (13.7%) and finances (14.2%) were not included. Question

7 (which work hazard accounts for 50% of farmer deaths) also showed differences among participants. About 40% chose the correct answer, tractor rollovers, but 37.4% selected vehicular road accidents, and 22.5% selected large animals and ATVs as major sources of farmer deaths. With question 17, only about 39% knew that In 1999 the USDA was found to have violated Black farmer's civil rights in *Pigford v Glickman*. With question 13, the participants were evenly split on whether males (39.5%) or females (43.2%) experienced greater stress due to farming challenges.

Table 1. Percentage of participants answering correctly at pretest and how these questions can be divided into two subdomains based on correct and incorrect responses.

Pretest question	% correct	Domain 1	Domain 2
1. Which of the following health factors is not depicted in the Total Farmer Health model?	32.5	-0.47	-0.02
2. Based on information from the 2019 American Farm Bureau survey, what percentage of rural residents agreed that “mental health is essential to them and their families”?	52.0	0.08	-0.15
3. What percentage of US farms are small family farms?	66.8	0.03	-0.05
4. Which statement about agricultural production business is true?	68.0	0.01	-0.04
5. In 2017, on average, out of every \$1.00 spent by the consumer on U.S. agricultural products purchased at the retail market how much does the farmer receive?	73.9	0.02	0.004
6. What is a benefit of mediation for agricultural producers?	81.3	-0.002	0.005
7. Which work hazard accounts for 50% of farmer deaths?	40.1	-0.02	-0.31
8. Out of ten industry sectors designated by the US. Bureau of Labor, where does the sector <i>Agriculture, Forestry, Fishing, and Hunting</i> rank in the rate of work-related fatalities (per 100,000) ?	71.5	-0.06	-0.004
9. Which organization (s) can help veteran farmers obtain equipment they may need due to a disability or to prevent injuries?	54.4	0.05	0.14
10. Which is a true statement about immigrant farmers and farmworkers?	79.7	0.01	-0.004
11. Which statement accurately describes Black farmers?	38.8	0.35	-0.009
12. Which statement best depicts the experiences of young farmers?	69.4	0.02	-0.02
13. Which of the following statements are true?	43.2	-0.01	0.30
14. What is one of the accessibility and accommodation barriers faced by farmers needing mental health care?	57.7	0.11	0.04
15. Why does the opioid epidemic appear to be disproportionately affecting the farming community?	84.2	0.009	-0.004
16. Which are the following statements are true regarding suicide and agriculture?	57.0	-0.10	-0.05
17. The percentage of national suicides that involved a firearm are 60%. What percentage of farmer suicides involve a firearm?	49.6	-0.14	0.13
18. According to the Iowa Model of Multiple Modes of Interventions, what should be included to increase education effectiveness in healthcare interventions for agricultural workers?	63.6	0.006	0.05
19. What percentage of mental health professional shortage areas are located in rural America?	78.6	0.02	0.002
20. The Rural Health Information Hub outlined several issues that warrant addressing to improve access for rural communities. Which of these issues does FarmResponse training directly address?	67.0	0.05	-0.005

Small values for each dimension indicates little distance between participants for correct or incorrect responses on each question. They were mostly missed randomly, without any correlation between questions answered correctly or incorrectly. Overall, there were no strong patterns in the pretest data indicating that the certain areas of agricultural risks and culture are lacking in the participants. Only four of twenty questions showed a group that differed in how they incorrectly answered questions.

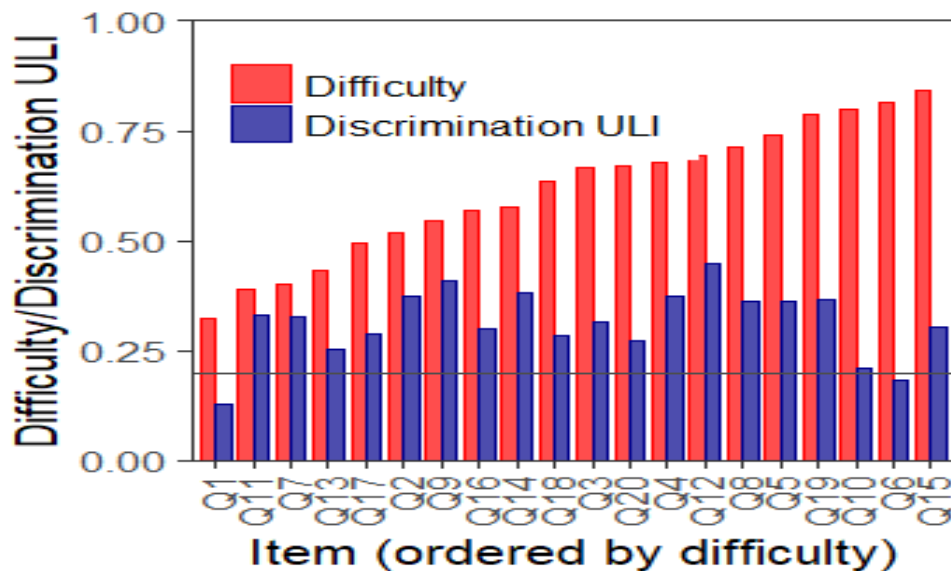
3. Test Question Quality

After examining patterns in the data based on what questions were more likely to be answered correctly or not, assessment of test quality was undertaken by examining how hard the question was for the participant and how well the questions discriminate among test takers.

Methods. A total of 621 participants completed the pretest and were included in this analysis. The quality of the test items was evaluated using measures of discrimination and difficulty. Discrimination is the ability of a test question to identify test takers with more knowledge on a topic from those who know less. Discrimination was calculated by taking the differences in the ratio of correct answers in the upper and lower third of participants (ULI method). Difficulty is based on the average score of the question.

Results. Figure 2 shows the items ordered from more difficult to less difficult. The questions found to be different from the others are also shown to be the most difficult in the graph (Q1, Q11, Q7, Q13 in Table 1). The percentages on the y-axis represent the average percentage correct. The question numbers match those shown in Table 1. Q1 is the most difficult and Q15 is the easiest for participants. The range of just over 0.25 to just over 0.75 is acceptable. There were not too many easy, nor too many difficult questions. Discrimination varies across items, but not as much as difficulty (range 0.14 to 0.39).

Figure 2. Test question difficulty and discrimination, n=621 participants.



4. Conclusion of Test Performance Outcomes

The participants showed statistically significant improvement after participating in the FarmResponse training. Four questions at pretest proved to be more difficult than others and differed in the sample of 621 participants. The discrimination of the test questions at pretest was narrow, but this is probably not the most important metric to consider in test quality. The questions covered a good range of the difficulty scale.

Greater efforts are needed at encouraging participants to fill in the question related to their occupational information. Many individuals did not respond to the question asking about whether they work in a rural community. It would be good to try to understand why the nonresponse to these questions was as high as it was.

5. Participant Perceptions of Program Benefits and Challenges

A. Quantitative Data

To evaluate participant satisfaction with the FarmResponse training, quantitative and qualitative questions were asked at the end of the training. The quantitative questions are shown in Table 3.

Methods. The quantitative evaluation questions were summarized using frequencies, means, and standard deviations. The qualitative responses for question 16 and question 18 on the survey were analyzed by developing themes and coding the comments within the broader themes.

Results. Participants were asked to complete a survey to assess how satisfied they were with the training they received. A total of 563 completed the survey. Of the 563, 43 (7.64%) were staff members in training. The remaining 520 (92.4%) were outside of the AgriSafe organization. Nearly all participants reported that the level of the material presented was appropriate. Fewer than 5% reported that it was too basic or too advanced, and these were evenly split with 12 in each group. More than 50% said it would be easy to apply the material to their practice (56.3%) and 20.8% said it would be very easy to do so. Only 2.84% (n=16) said it would be difficult to use this material in their work. Some of the participants were not working in positions where they could apply this knowledge and reported that it did not apply to them, but they were less than 20% of the sample.

When asked whether the course activities helped them achieve the course objectives, the scores were high and ranged from 4.47 to 4.71 on a 5-point Likert scale. Similarly, mean scores were high on the course increasing professional knowledge, changing communication skills, and expanding referrals. Participants said they would recommend the course to colleagues. They also seemed satisfied with how the course was delivered, the platform it was delivered on, and the activities within the course to facilitate the learning experience.

B. Qualitative Data

The qualitative analysis was conducted to understand the reasons that participants said they would recommend the program and to extract their perceptions of challenges and barriers to applying the FarmResponse training materials to their work.

Table 2. Frequency and number responding to questions asking about their satisfaction with the FarmResponse training program.

Evaluation Question	n	%
1. The overall level of content presented was:		
Appropriate	539	95.7
Too advanced	12	2.13
Too basic	12	2.13
17. How difficult would it be for you to implement changes in your communication and referrals in your practice?		
Very easy	117	20.8
Easy	317	56.3
Neutral	15	2.66
Difficult	16	2.84
Does not apply to me	98	17.4
How well did the activity help you achieve stated objectives? (Scale: 1=Strongly Disagree, 2=Disagree, 3=Neutral, 4=Agree,5=Strongly Agree)		
	Mean	SD
2. Explain the Total Farmer Health model as it relates to factors for mental health in agriculture.	4.59	0.62
3. Describe characteristics of US farm producers and their farms.	4.66	0.57
4. Contrast financial stressors in farm and ranch operators to non-agricultural employees.	4.56	0.64
5. Summarize the impact of mediation as a tool to mitigate farmer stress.	4.47	0.69
6. List work challenges inherent in agricultural production as it relates to mental wellbeing	4.68	0.57
7. Identify the impact of farming cultures on farmer mental health and health-seeking behaviors	4.64	0.60
8. Identify barriers that agricultural workers face in accessing health care.	4.71	0.55
9. Describe risk factors for suicide in agricultural populations.	4.69	0.55
10. Identify three agricultural stress referral sources that can be used to address the needs of this population.	4.58	0.63
11. Improve clinical communication skills concerning mental health distress and stressors of agricultural workers and their families.	4.54	0.66
Please respond to the following statements. (Scale: 1=Strongly Disagree, 2=Disagree, 3=Neutral, 4=Agree,5=Strongly Agree)		
12. This activity increased my professional knowledge.	4.65	0.54
13. This activity changed my communication approach.	4.38	0.75
14. This activity expanded my range of referrals for agricultural workers.	4.57	0.65
15. I would recommend this training to my healthcare colleagues.	4.60	0.62

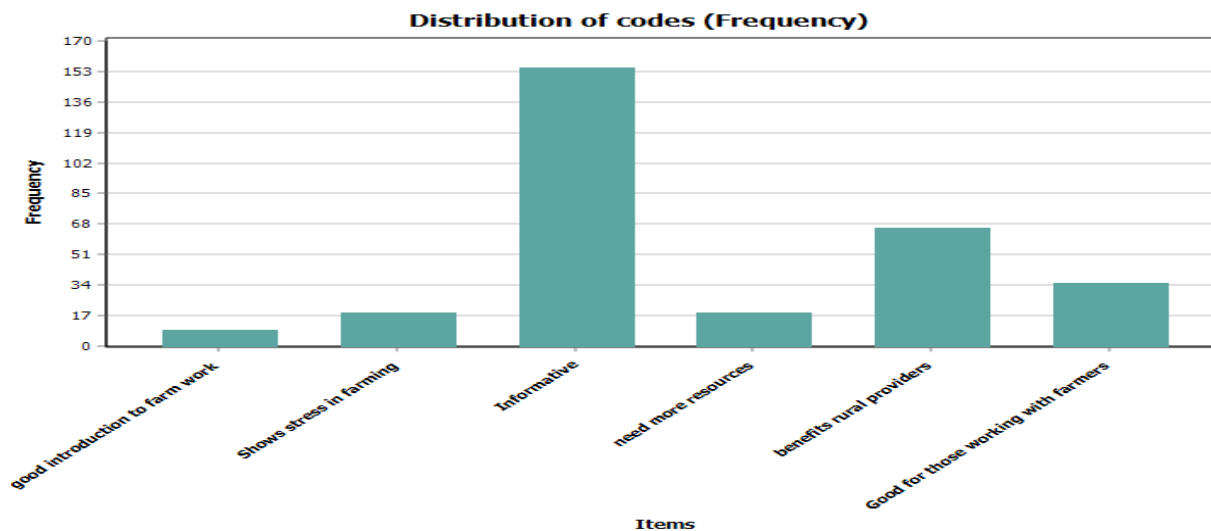
How conducive were the following aspects to the learning process?		
(Scale: Poor=1, Fair=2, 3=Average, 4=Good, 5=Excellent)		
19. Virtual learning platform	4.55	0.69
20. Audiovisuals	4.54	0.73
21. Interactive Activities	4.39	0.86

The first question analyzed using coding to identify themes and labels was number 16 “Would you recommend this training to your healthcare colleagues? (Please explain why or why not.)”. This question was analyzed using themes and related codes to better understand the reasons that participants would or would not recommend the training to others. Table 3 shows the themes, codes, counts and frequencies of the responses.

There were only five individuals who said they would not recommend the training. There were a few who said that they did not know anyone who worked in the rural community to recommend the training to. The two individuals who would not recommend the program said that there was a lack of information about how to communicate about mental health needs with agricultural patients and a second who said the program should be certified by the American Psychological Association or similar professional organization.

The reasons to recommend the program were mostly related to participants feeling it was informative and that they had learned much by participating (42.5%) (Figure 3). Other reasons cited were that it was beneficial to rural providers (18.1%) and good for those working with farmers (9.60%). A less common reason was that it addressed a much needed resource that they could not find anywhere else (5.20%) and that the training specifically addressed the stress in farming as an occupation (5.20%). Some of the participants gave more than one reason. Less frequent reasons were that it was free and provided CEU credits. Two participants thought the course too long for the three CEU credits that it provided them. One of these participants said it took six hours and that should be stated in the training description.

Figure 3. Most frequent reasons given for participants to recommend the FarmResponse training to colleagues.



The codes were based on the words used in the responses. Several said it was a good introduction to farm work specifically. Those who specifically mentioned the importance of understanding farmer stress were coded separately from other responses to assess the number of participants who mentioned this important aspect of farm life. Other respondents specifically mentioned the need for resources, the need for rural providers to have this knowledge, and others mentioned that it is a good training for anyone working with farmers.

Other comments of interest were that this program should be promoted in urban areas where providers are using telehealth to reach rural residents. About 45 of the participants said or implied that they worked in rural areas and overall were appreciative of the training. There were many who participated in the training who do not work in a rural area. Those not in a rural area or not in healthcare said they benefited from it and it would help them if they should encounter someone from a farming background. A few appeared to be instructors and planned to incorporate the training information into their classes.

There were some issues and complaints about the training. A few said it moved too slow and was too long. A number of them had technical issues probably due to being in a rural area with poor internet service, but others said the platform worked perfectly. A few thought the test was too easy and a few thought it was too detailed. There was the comment that statistics should not be included as test material. One participant said that explaining what interventions were available would be helpful.

Table 3 provides examples of statements that fall into a certain category and were coded under these categories. There is some overlap in the categories and the codes and several statements by respondents fell into several categories. Those who reported that generally the training was a great learning experience, informative, and eye-opening were coded in the informative category. This category is largest because most of the comments were not specific and fell into this category. The responses with more detailed reasons such as that the training improved their confidence in communicating with farmers, that the resources provided them were useful, or that they better understood the stresses farmers experience represent practical and applied benefits from the training.

Some individuals reported their employment position in their responses. Two said they were AgriStress hotline workers. One of the hotline employees said they would recommend it because it was helpful. A second hotline person commented that they did not always know the background of the person they were talking to so could not know whether the person was a farmer or from a rural area.

In summary, nearly everyone highly recommended the training. Even those not in a rural area or in healthcare saw the benefit of gaining a better understanding of rural life. One person commented that the training made her “a better human”. Several commented that they wished other healthcare professionals would take this training because it is so beneficial to improving the lives of the farming community. Only a few thought that the training was too long or too slow. Few reported technical difficulties. Not all responded to the questions and a few of the ones who did responded “yes” but without providing any reasons for the recommendation.

Table 3. Qualitative analysis of question asking whether participant would recommend the training to colleagues (n=565).

Category	Code	Count	% Codes	Cases	% Cases
Reasons to not recommend	lack of mental health communication	1	0.30%	1	0.20%
Reasons to not recommend	No healthcare colleagues	3	0.80%	3	0.50%
Reasons to not recommend	APA approval needed	1	0.30%	1	0.20%
Reasons to recommend	hotline specialist	1	0.30%	1	0.20%
Reasons to recommend	good introduction to farm work	9	2.50%	9	1.50%
Reasons to recommend	Shows stress in farming	19	5.20%	19	3.20%
Reasons to recommend	Informative	155	42.50%	152	26.00%
Reasons to recommend	need more resources	19	5.20%	19	3.20%
Reasons to recommend	benefits rural providers	66	18.10%	65	11.10%
Reasons to recommend	Good for those working with farmers	35	9.60%	35	6.00%
Reasons to recommend	free	4	1.10%	4	0.70%
Reasons to recommend	Improves communication with farmers	4	1.10%	4	0.70%
Reasons to recommend	CEU	4	1.10%	4	0.70%
Time commitment	Too long	9	2.50%	9	1.50%
Difficult to navigate	Too slow	10	2.70%	10	1.70%
Difficult to navigate	Minimal technical issues	5	1.40%	5	0.90%
Difficult to navigate	registration	1	0.30%	1	0.20%
references helpful	quality of information	1	0.30%	1	0.20%
promote	telehealth	11	3.00%	11	1.90%
promote	need more interventions	1	0.30%	1	0.20%
platform	Interactive model better	1	0.30%	1	0.20%
platform	Too much detail in test	5	1.40%	5	0.90%

Table 4. Examples of the themes and codes from question 16 asking whether a participant would recommend the training and why or why not.

Category	Example of code
Reasons to recommend	I would definitely recommend all healthcare professionals take this training. It helps them understand farmer stress. I actually do not work in healthcare, but I work with Farmers every day so this content is so relevant to me when talking with farmers.
	This is not a topic that is covered in most counseling programs and is needed to be culturally competent to work with farm families
	Provides ample information about the farmer experience which is helpful in providing services.
	There is information presented about the Agricultural community that I was not aware of, that is very helpful in working with a client from that community
Reasons to not recommend	For mental health professionals, I would not recommend as written due to an under-emphasis on interpersonal mental health communication and specific guidance on how to provide farmers with emotional support.
	The training needs to be approved by APA or a state psychological association in order to ensure that it will count for credit with some state boards (i.e., FL)
Informative	Great detail about the issues afflicting the agricultural producers in the US.
	I think that this is a great way for people to better understand the struggles of rural Americans and farm workers
	It was informative, interesting, and very well done
	I live and grew up in a rural/farming area but didn't grow up on an actual farm and so much of the initial, background, information was new to me. While I understand poverty, the challenges of accessing care, the stigma, etc. I didn't understand the specific issues facing farmers and this gave me that knowledge.
Need more resources	I learned about so many resources that I did not know existed that will help.
	Many valuable educational resources
	Increases knowledge of farm focused resources
	We need more diverse resources to provide care
Good for those working with farmers	I think it will be beneficial for more social workers to be trained in this area.
	It provides additional training of cultural considerations for a population that was not discussed much in school.
	Beneficial for those who have not worked with a rural population before.
Improves communication with farmers	I think that this is a beneficial resource to understanding the best way to communicate and understand farmers and what might be guiding their decisions.
	It gives an idea of how to approach the conversation about stress, anxiety, and potential suicidal thoughts in patients.
	It gives an idea of how to approach the conversation about stress, anxiety, and potential suicidal thoughts in patients
	it is a good tool to help screen and assess. Help with communication skills

The second question analyzed was number 18, “What do you see as the challenges or benefits of your intended change?” Although some of the responses were very similar and in some cases identical to responses in question 16, additional themes were identified. The question can be divided into those responding to the challenges and those responding to the benefits, with some responding to both.

Support for farmers was the most common category and was coded as support if participants used the word support or services, provide resources to, or mention solutions for helping farm communities (Table 5). The major ideas involving supporting farmers were being able to better help them, to be able to use the resources provided to make referrals, and improve the quality of their lives. There were a few who said the training did not provide enough assistance as to how to intervene and what to do if these approaches were not successful.

There were positive comments by those in the AgriStress hotline positions and those who live in rural areas but participate in telehealth to rural areas. There were a number of participants who do not have any contact with rural residents and who live in urban areas. Some of these were instructors who said that they would teach this information to their students. Many of these individuals responded similarly to question 18 as they did to question 16.

The primary benefits reported mirrored the responses in question 16. Supporting the farming community by providing resources, referrals, and better care for them and increased knowledge were overwhelmingly the most reported benefits. Within this broader knowledge category were better understanding the issues that farmers deal with, better able to communicate with farmers to help them, and knowing how to build trust. Being culturally competent and culturally sensitive was mentioned by about 10 participants as a positive outcome of the training.

The barriers described were more diverse. Stigma was mentioned as a barrier to farmers seeking help and the need to change this with the hope that the training would help them do that. Their work environment and how much control they had was also mentioned as a barrier. In terms of access to care, the cost of care and having insurance coverage was frequently mentioned as a barrier to care and accessibility to provider services. The time it takes to implement the changes and trying to remember to incorporate the knowledge into practice were also mentioned as barriers to making changes.

One of the most interesting observations is the idea of accessing the farmers who need their help. Many of the providers expressed a desire to work with and help farmers. Some felt it was upon them to find ways to connect with farmers in distress and others acknowledged that the farmers would need to seek them out. This was a primary barrier that was reported (Table 5), although from two different perspectives. This was coded under access to farmers. Many did not know how to reach out to farmers or know how to make themselves available to farmers who needed assistance. The corollary to this is the willingness and receptivity of farmers to accepting help. Providers were also concerned about the receptivity of farmers when trying to talk to them and build trust. Many who work with farmers expressed the difficulty of getting them to open up. Examples of these statements are provided in Table 6.

In general, the barriers given by participants were time limitations, receptivity on the part of the farmer, the work environment of the participant, having access to a farming population, insurance and costs, and to a less extent, dissemination of information, internet access and implementing what was learned. Ten participants discussed the importance of being culturally-sensitive and 24 mentioned stigma and related issues.

Table 5. Qualitative analysis of question asking about benefits and barriers to applying training knowledge to participant practices (n=586).

Category	Code	Count	% Codes	Cases	% Cases
Support for farmers	support	59	14.60%	59	10.10%
Support for farmers	resources	54	13.30%	54	9.20%
Support for farmers	solutions	4	1.00%	4	0.70%
Increased knowledge	Issues farmers face	53	13.10%	53	9.00%
Increased knowledge	communication	57	14.10%	57	9.70%
Increased knowledge	Build trust	10	2.50%	10	1.70%
AgriStress	better communication	4	1.00%	4	0.70%
cultural competence	culturally sensitive	10	2.50%	10	1.70%
Stigma	change	24	5.90%	24	4.10%
Barriers	time	4	1.00%	4	0.70%
Barriers	receptivity	22	5.40%	21	3.60%
Barriers	Work environment	16	4.00%	14	2.40%
Barriers	access to farmers	61	15.10%	61	10.40%
Barriers	insurance and cost	13	3.20%	13	2.20%
Barriers	Dissemination	2	0.50%	2	0.30%
Barriers	internet access	5	1.20%	5	0.90%
Barriers	implementation	7	1.70%	7	1.20%

Figure 4. Commonly reported barriers by FarmResponse participants.

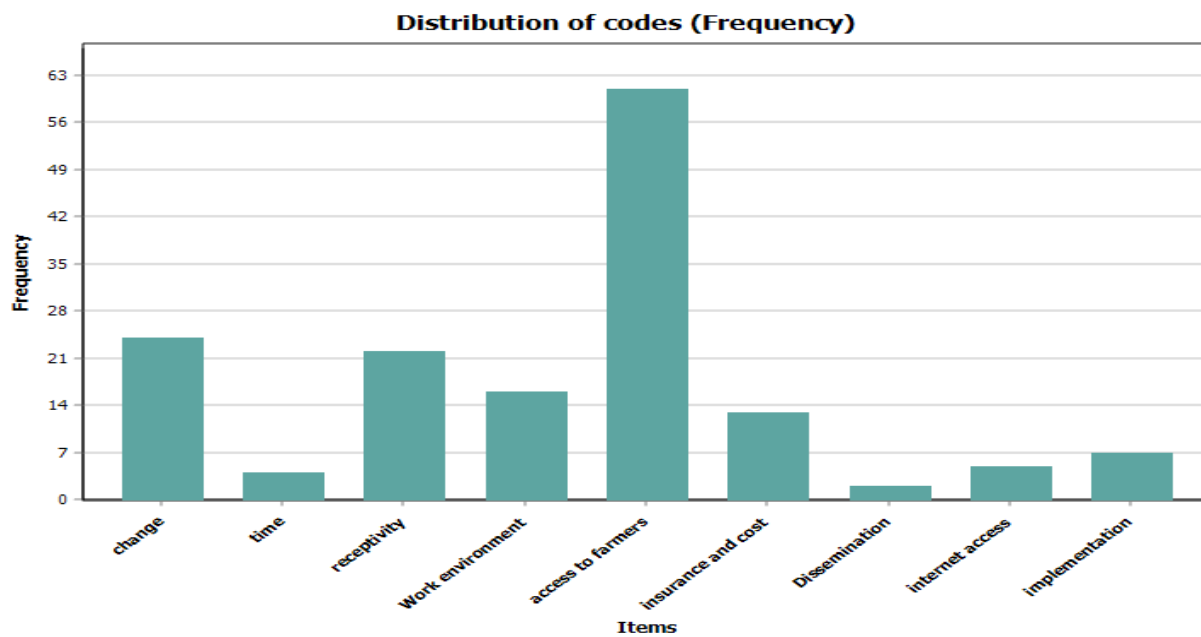


Table 6. Examples of categories and codes from Question 18 asking about barriers and challenges to using the FarmResponse training in their practices.

Support for farmers	
Resources	Now I have the information to refer them to someone if they are really struggling.
	It feels like it will be easy to incorporate change due to having easy access to resources
	I think it will help me steer more individuals to resources that will help improve quality of life
Support	Helping farmers see the benefit of putting time and energy into their mental health as a long-term goal that isn't quickly fixed
	Benefits to extend our reach to those who have traditionally either been reluctant to seek help or have had limited access
	Being better able to help farmers and their families.
Solutions	How to proceed when these approaches don't work
	Have real solutions that are practical for the patient.
	Training didn't provide much actual concrete guidance on how to intervene
Increased knowledge	Greater understanding of the farm community
	Greater understanding and empathy
	Better understanding farmer stressors
Cultural competence	It increases cultural sensitivity.
	I have more cultural competence around rural workers now and appreciate that expanded perspective.
	I work with many folks who would not traditionally talk to a therapist due to differences in background. I hope this expands my reach to help others
Stigma	Stigma is still prevalent, and it's hard to screen people who are not getting any care
	Challenges include facing the stigma
	Stigma, clients not wanting the service due to the cultural beliefs
Barriers	Getting farmers to actually make time for mental health services
	Clinicians finding time to complete the training will be a challenge
	The cost associated with MH counseling for farmers without insurance
	The biggest challenge would be finding financial resources for un-insured patients to see me
	A challenge for my clients to accept assistance in mental health and/or substance abuse
	Challenges will be many will still refuse services at first
	getting the farmers to talk
	Those resistant to change
	I am in a private practice in a very small town, I do believe that the chances of running into someone you know is a barrier to receiving care.
	Breaking through the stoicism of some farm workers.
	The populations perception of mental healthcare
	The challenge is a systemic change

Conclusion of Participant Perceptions of FarmResponse Training

Participants expressed enthusiasm for the training program and a willingness and desire to help the farming community. However, many did not know how to go about accessing this population and were concerned about how the farming community would respond to them. The participants who were already working with farmers said they appreciated the knowledge and felt it would help them better communicate with this population and result in them providing better care and meeting their needs. Participants were well aware of the difficulties in reaching and communicating with farmers and were hoping they could bring about change in these communities to reduce stigma and increase access to care.