Inspiring a verified culture of care post-identification of abuse on an undercover video using a baseline assessment of expressed competencies compared to post training measurement of expressed competencies

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Introduction

Sometimes the need to change human behavior is determined from internal evaluation, and sometimes the need to change is uncovered and stimulated from the outside. This case study presents a company's training response to an undercover video taken by a swine farm employee simultaneously working for Mercy for Animals. The video identified unacceptable behavior outside of company protocol on a sow farm (Farm A). Two animal handling actions captured on video were animal abuse which resulted in immediate dismissal of the accountable employees. This case study details the training plan created for remaining employees potentially influenced by the expression of these unacceptable behaviors, and shares expressed competency results of employees after re-training compared with the baseline expressed competency results recorded the day of the release of the undercover video.

Materials and methods Immediate actions and baseline competency

measurements The same day of the undercover video release all pigs on site were assessed by a 3rd party veterinarian to ensure all pigs were safe and to help assess needed actions. To measure human behavioral impact on pig welfare, the 3rd party applied the Common Swine Industry Audit (CSIA)¹ inspection guidelines to every pig and pig housing location on Farm A. The veterinarian observed animal handling events as well. Opportunities for immediate actions as well as employee training (Table 1) were identified from both the video and from the on-farm assessment via measurement of baseline pig handling competencies per employee. Baseline competencies to measure were chosen based on the video and from missing competencies observed in the on-farm assessment (Table 2). A medical record outlining needed change was created. The system's production team and veterinarian discussed with the 3rd party veterinarian and agreed on an action and training plan.

Training plan

This targeted response plan included first a Farm A specific re-training plan on animal handling followed by some lesson specific topics that worked to address missing expressed competencies (Table 1). Farm A's successful completion would be followed by a system-wide re-training plan on animal handling. This plan was initiated with a live manager training meeting to explain the situation, and its ramifications, to achieve an understanding of the importance of successful completion. Farm A's training was implemented immediately utilizing Pork Avenue Training Portal (PATP).² The program components per learning experience includes online training, graphical SOP's and in-barn verification which employed the See it. Do it. Teach it. methodology.³⁻⁹ Training delivery occurred via learning experiences delivered on PATP's online learning management software. Simultaneously, an internal and external verification plan was detailed and executed post re-training to measure expressed competency results using the lesson's In-Barn Verification Checklists as guidance documents (Table 1, 2, 3). All training accomplishments were recorded on PATP's online learning management software and a transcript of learner accomplishment created per learner.7

See it.

Farm A chose to administer most videos and quizzes as a group and have a discussion after each lesson on skills they needed to express differently on farm. Groups were formed based on preferred language of English or Spanish. Learners were informed prior to the videos that they needed to learn the topics well enough that they could teach it back to a verifier. The See it portion of the experience was marked as complete on the individual employee's transcripts.

Do it.

Then the learners continued to complete skills which were manager or mentor observed until verified. If desired, pictorial SOP's were available for review in English and Spanish.

Teach it.

Internal verification included having individuals teach what they learned back to an In-barn Verifier. In-barn Verifiers presented themselves to each employee as "their student" and encouraged them to "pretend I am a new employee and teach me how to do this task." While they spent most of the verification experience listening, verifiers utilized the In-barn Verification Checklists to make sure all key competencies were taught back successfully according to the farm protocol and asked about a key competency if it was not brought up specifically. When individuals successfully passed their In-barn Verifications, Verifiers marked this part of the learning experience complete on their transcript. **Table 1:** Action List and Training Calendar for Farm A--Opportunities for immediate actions as well as employee training were identified from both the video and from the on-farm assessment by an external veterinarian

Action	Who responsible	Timeline Goal	Completion
Avoiding Willful Acts of Abuse	J	7/19/2018	7/19/2018
Avoiding Willful Acts of AbuseIn Barn Verification	J	7/19/2018	7/19/2018
Euthanasia Training (live intro)	K	7/18/2018	7/18/2018
CO2 Euthanasia with the Euthanex AgPro Lesson	К	Week of 8/6/18	8/10/2018
Pig Behavior and YOULesson	Group lesson scheduled and discussed	8/16/2018	8/1/2018
Pig Behavior and YOUInternal Verification of Each Employee	J	8/16/2018	8/1/2018
Training and Handling BoarsLesson	Group lesson scheduled and discussed	8/16/2018	8/17/2018
Training and Handling BoarsInternal Verification of Each Employee	J	week of 8/27/18	9/5/2018
Training and Handling BoarsExternal Verification of Process	Sarah Probst Miller, DVM	9/12/2018	9/12/2018
Moving Pregnant Sows and GiltsLesson	Group lesson scheduled and discussed	8/16/2018	8/10/2018
Moving Pregnant Sows and GiltsInternal Verification of Each Employee	J	8/16/2018	8/10/2018
Moving Pregnant Sows and GiltsExternal Verification of Process	Sarah Probst Miller, DVM	9/12/2018	9/12/2018
Weaning SowsLesson	Group lesson scheduled and discussed	8/16/2018	8/17/2018
Weaning SowsInternal Verification of Each Employee	J	week of 8/27/18	9/5/2018
Weaning SowsExternal Verification of Process	Sarah Probst Miller, DVM	9/12/2018	9/12/2018
Weaning PigsLesson	Group lesson scheduled and discussed	8/16/2018	8/17/2018
Weaning PigsInternal Verification of Each Employee	J	week of 8/27/18	9/5/2018
Weaning PigsExternal Verification of Process	Sarah Probst Miller, DVM	9/12/2018	9/12/2018
Loading Market HogsLesson	Group lesson scheduled and discussed	8/16/2018	8/17/2018
Loading Market HogsInternal Verification of Each Employee	J	week of 8/27/18	9/5/2018
LESSONS TO STRATEGICALLY ASSIGN BY TASK OR JOB DESCRIPTION			
Castration	J	By end of week of 8/27/18	8/24/2018
ID and Tx Sick Sows	J	By end of week of 8/27/18	9/5/2018
ID and Tx Sick Pigs	J	By end of week of 8/27/18	9/5/2018
Rupture Repair	J	By end of week of 8/27/18	9/5/2018
Detectable Needle Best Practices	J	By end of week of 8/27/18	9/5/2018
Euthanasia Decision	J	By end of week of 8/27/18	8/24/2018
CO2 Euthanasia with the Euthanex AgPro	J	By end of week of 8/27/18	8/24/2018
Captive Bolt EuthanasiaPenetrating	J	By end of week of 8/27/18	8/24/2018
Captive Bolt Maintenance	J	By end of week of 8/27/18	8/24/2018
Fit to Load Lesson Series	J	By end of week of 8/27/18	9/5/2018
Providing Adequate Space and Housing	J	By end of week of 8/27/18	9/5/2018

Results

The baseline expressed competencies for the training curriculum chosen was at a 25.8% competency expression rate on farm for chosen handling competencies. Post external verification of training, staff averaged a 95% handing competency expression rate (Table 3). This is a 69.4 -percentage point difference and a 268.75% increase in handling competency expression on farm. Retraining throughout the entire system is occurring throughout Fall and Winter of 2018/19. External verification of other farms occurs in December 2018 and January 2019, and results will be reported in this presentation.

Conclusion and discussion

In 2017, this farm set clear accountability goals per key performance indicator and made an accountability plan to achieve those goals. For example, one of their 2017 goals for 2018 was to move the system from 29 P/MF/Y to over 30. They succeeded. In fact, at the time of the video release, the farm where the behavior outside of company protocol occurred averaged 32.5 P/MF/Y. Amid this production success, the animal abuse video occurred. The farm has owned this and has made a team commitment to never lose sight that their number one priority is excellent pig care. Post retraining on animal handling and this animal care commitment, the farm of concern is still averaging over 32.5 P/MF/Y.

Using the "See it. Do it. Teach it." methodology³⁻⁸ has effectively improved competency expression in other studies from a 59% level of competency expression to an 85% competency expression level.^{10, 11} This case study also achieved improved levels of expressed competency. Specifically utilizing this educational methodology alongside external verification, it increased expressed competency 69.4 percentage points which was a 268.8% increase. Of note, in this study the baseline competencies (Table 2) were specifically chosen to represent those missing on the video and the assessment which makes the baseline lower than a random assessment of competencies. However, it accurately represents the missing competencies that the system wanted to ensure living on farm. Therefore, the percent change accurately measures the intentions of the intervention.

References

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Table 2: Baseline competencies to measure were chosen based on the video and from missing competencies observed in the on-farm assessment

Observe the following and score Yes/No for Key Competencies	7/17/2018-Baseline	9/12/2018—Follow-up
Training and Handling Boars		
Handler properly positioned sort-board between self and boar		
Two people present if boar in pen with people		
Farm has plan for boar culling		
Farm safely loads boar to boar movement equipment		
Moving Pregnant Sows and Gilts		
Hallway is prepped and distractions removed		
No dead pigs in hallway		
Sows are moved calmly and slowly		
Sows are moved in groups of 3 to 5		
Pressure is appropriate		
Noise is intermittent calm and not constant		
Employees use appropriate language when moving animals		
Weaning Sows		
Hallway is prepped, and distractions removed		
No dead pigs in hallway		
Sows are moved calmly and slowly		
Sows are moved in groups of 3 to 5		
Pressure is appropriate		
Noise is intermittent calm and not constant		
Employees use appropriate language when moving animals		
Weaning Pigs		
Hallway is prepped, and distractions removed, not slippery		
No dead pigs in hallway		
Pigs are moved calmly and slowly		
Pigs are moved in properly sized groups per farm protocol		
Pressure is appropriate		
Noise is intermittent calm and not constant		
Employees use appropriate language when moving animals		
Euthanasia		
No pigs with BCS of 1 observed in random sample of farrowing		
No pigs with BCS of 1 observed in random sample of gestation		
Farm has approved method of euthanasia in place		
There is a log for cleaning of captive bolt gun		
Captive bolt gun is cleaned and disinfected and stored properly when not in use		
Employee designated to euthanize can demonstrate how to determine if a pig is truly dead.		

Table 3: Baseline verses post-training competency assessment

	7/17/2018 Baseline competency assessment	9/12/2018 Post-training competency assessment	
Number of Expressed Competencies	8	29.5	
Total Competencies Measured	31	31	
Percent of Competencies Expressed	26%	95%	
Percentage Point Difference	69%		
Percent Increase	268.75%		