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Considerations, expectations, and evaluating alternative strategies to address health challenges: A practitioner's approach

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As swine practitioners, we have been trained to focus on and diagnose disease, and address production problems. The treatment of disease often results in an intervention that involves an antibiotic via feed, water, injection and/or a vaccination. Management, pig flow, husbandry, environment, nutrition, and biosecurity, are other issues that are often simultaneously evaluated and addressed along with disease. In many situations, these conventional interventions address the problem and we move on. However, when these interventions fail, what are our options?

This is when alternative therapies may be effective. For definition, I will define an alternative therapy as one with a reasonable scientific basis or physiological link that may be directly or indirectly related to the problem I am dealing with, yet not of conventional thinking.

Alternative therapies require an open-minded approach with reasonable expectations. Reasonable expectations can mean that the alternative therapy reduces the problem as compared to conventional strategies, yet does not raise the cost of production- thus offsetting the gain. One still needs to see an improvement in the bottom line.

Evaluating success can be difficult, and often the same strategy does not work consistently from herd to herd. This is often due to the complexities of health. Evaluation and implementation needs to be on a case by case basis, while having the flexibility to remove or implement the strategy. This involves spending time in the barns with the owners, employees, and pigs, constantly observing, and evaluating diagnostic results. However, at the end of the day, we need to answer the question, "Did improvement occur or not?" Ultimately, this answer is often a combination of both objective and subjective evaluation.

Provided is a clinical case example of utilizing and evaluating what I would consider an alternative therapy.

- Clinical problem: 20 day old weaned pigs failing to start in the nursery; 10% of pigs fall out of group

- Diagnosis: Swine flu followed with K88 *E. coli*
- Initial intervention
 - Implement SIV vaccine 4 weeks pre-farrow to sows
 - Excede injection to pigs at weaning
 - Aspirin in water during day 1 through day 5 post wean
 - Neomycin in water day 1 through day 5 post wean
- Cost of intervention: Approximately \$.53/pig
- Result of intervention: Fallouts reduced to 5%
- Revised intervention
 - Start pigs on yogurt/oats during the first 5 days
 - Discontinue Excede at weaning and neomycin
 - Continue aspirin
 - Continue SIV vaccine
- Cost of new intervention: \$.30/pig
- New results of intervention: Fallouts reduced to 3%

In summary, alternative therapies can be effective in certain situations. The challenge is determining when and how to implement. Expectations need to be determined before hand. Evaluation requires continuous follow up, and although alternative therapy may fail with one farm, it can be a success with another.

