Improvement of production results in a Korean farrow-to-finish farm with PHE after implementation of Enterisol Ileitis vaccination

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INTRODUCTION

Ileitis is an enteric disease caused by *Lawsonia intracellularis*. Despite Ileitis being common in the swine industry farm, managers are not familiar with it. Most of the Ileitis cases are mild or subclinical with no obvious clinical signs. Ileitis is often not treated in the farm until there is a severe or haemorrhagic diarrhea. But the subclinical type of Ileitis in the grower-finisher house can also cause significant losses[1].

This case report describes the benefits of implementing oral live vaccination against Ileitis of clinical type, first as mass vaccination of pigs 3 to 15 weeks of age, followed by routing vaccination at 3 weeks of age.

MATERIALS AND METHODS

This study was conducted in a one-site system of 150 sow farm. From March of 2013, a continuous diarrhea in nursery and haemorrhagic diarrhea in grow-finisher began to appear. Mortality increased and many pigs had clinical signs of wasting and lethargy.

Feces samples from pigs were used to detect enteric pathogens in the nursery, grower and finisher house. Samples were tested by PCR for presence of *Lawsonia intracellularis*, Swine dysentery, and Salmonella.

First, Tiamulin was used to control diarrhea but symptoms did not completely disappear. Vaccination of pigs with Enterisol Ileitis was implemented as a second measure. Initially all pigs between 3 and 15 weeks of age were vaccinated against Ileitis in the nursery and grower house, followed by routine vaccination at 3 weeks of age. Five days before and after vaccination, no antibiotics were applied to protect vaccine efficacy. Mortality and slaughter data were compared before (Apr. – July 2013), in transition (Aug. – Oct. 2013) and after vaccination (Nov. – Dec. 2013).

RESULTS

Lawsonia intracellularis was detected by PCR test in the feces samples (table 1). After implementing vaccination with Enterisol® Ileitis mortality decreased from 12.5 % to 6.6 % in the grower-finisher house and from 2.3 % to 1.9 % in the nursery house (figure 1).

The average age of slaughter was reduced from 210 days of age to 190 days of age and the weight at slaughter increased from 108 kg to 114 kg after implementing Ileitis vaccination (figure 2).

DISCUSSION AND CONCLUSION

After the implementation of Enterisol® Ileitis, not only the mortality but also other performance parameters like average age and average weight at slaughter were improved clearly. The performance improvement in the transition period demonstrated that even older pigs up to 15 weeks of age can benefit from vaccination. Compared to the use of antibiotics only, vaccination used in addition is much more effective to control Ileitis.

Table 1: The results of RT-PCR to detect Ileitis, swine dysentery and salmonella.

Sample No. (days of age)	Lawsonia	Swine Dysentery	Salmonella
1 (50)	Positive	Negative	Negative
2 (50)	Negative	Negative	Negative
3 (100)	Positive	Negative	Negative
4 (100)	Negative	Negative	Negative
5 (100)	Positive	Negative	Negative
6 (150)	Positive	Negative	Negative
7 (150)	Negative	Negative	Negative

Figure 1: Mortality in nursery and grow-finisher.

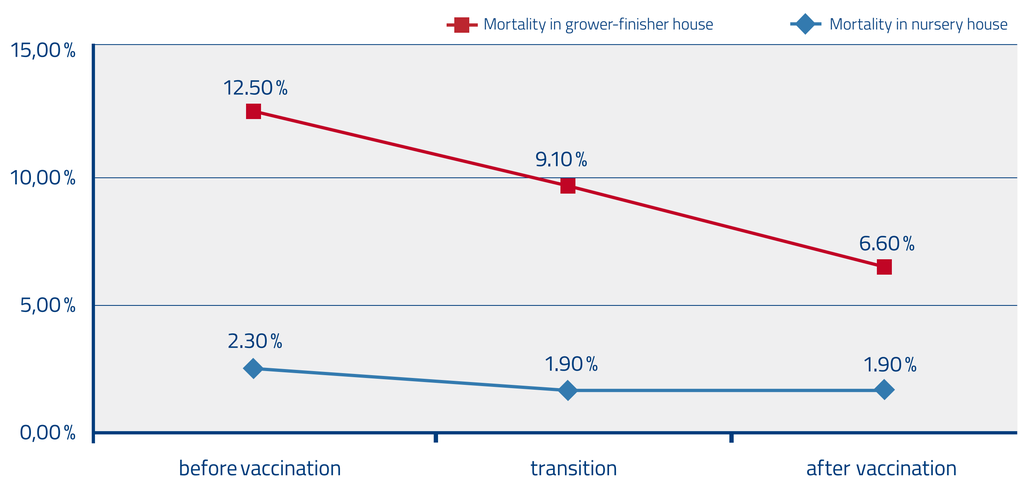
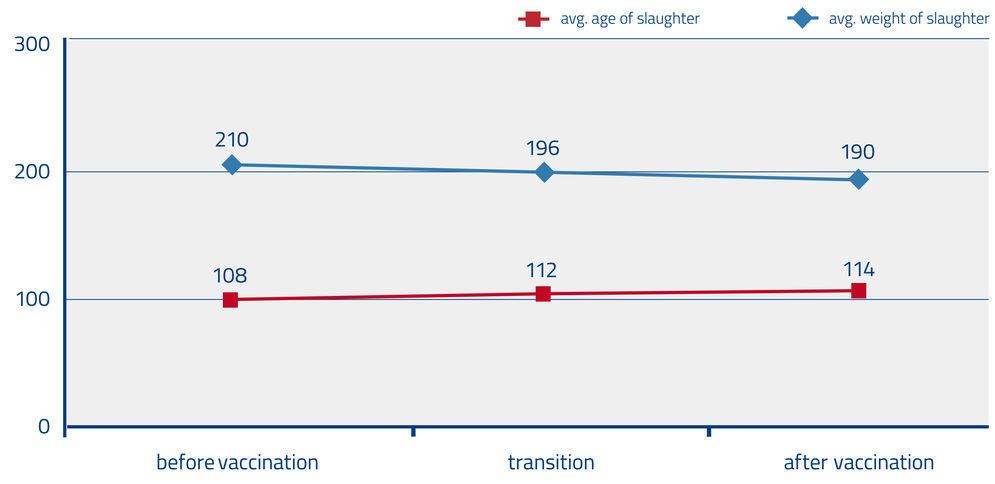


Figure 2: Average age (days of age) and weight (kg) at slaughter.



REFERENCES

1. Jacobson et al., 2010. Vet J, 184, 264 – 268