BBD-PP-45

TITLE
PROTOCOLLED APPROACH OF MULTIFACTORIAL PRE-WEANING DIARRHEA: A CASE STUDY

Victor Geurts[1], Martijn Hoogeslag[2], Pieter van Rengen[2], Sonja Agten[1]

[1] *MSD-AH Nederland, Boxmeer, The Netherlands*
[2] *Veterinary Clinic Lintjeshof, Nederweert, The Netherlands*

CONTENT
Background and Objectives
Several pathogens can induce pre-weaning diarrhea. E.coli,Clostridia and Rota virus have the highest prevalence. Hygiene and colostrum intake are very important for prevention besides effective vaccination of sows. The legal cascade rule opens the opportunity to use not registered- or autogenous vaccines when registered vaccines are not available or not effective to prevent animal suffering. In this study a structural approach is described to solve complex pre-weaning diarrhea on a 1400 sows farm, where, also efficacy differences between the autogenous- and registered E.coli vaccination were investigated.

Materials and Method
Pathogenic E.coli,Rota-virus and C. perfringens typeA(?2+) were diagnosed via feaces. An autogenous vaccine containing E.coli,C.perfringens(type A) and Rota was used with a limited effect. This motivated the farmer to implement advised approach:
1.Diagnosis via culture/pcr diarrhea.
2.Estimate and improve colostrum intake by piglets (comparing sow titers with piglet titers).
3.Limited cross fostering.
4.Proper cleaning, drying and disinfection. Dry surface via usage of lime powder.
5.Monitor effect via diarrhea prevalence on litter level, age of diarrhea, causative agent and sow E.coli titers.

Results:
The sow E.coli antibodies against adhesion antigens and LT were low at farrowing.
On 3-2018 the prevalence of pre-weaning diarrhea on litter level was 60%. Symptoms were present after 2-3 days up to weaning. After implementing step 1 to 4 the diarrhea on litter level dropped from to 40%(6-2018). The pre-weaning diarrhea was mainly caused by E.coli.
The autogenous sow vaccination was replaced by Porcilis Porcoli. This increased all sow E.coli-titers 4-8times which resulted in further decrease of the pre-weaning-diarrhea prevalence to 5 %.

Discussion and Conclusion:
Complicated multifactorial pre-weaning piglet diarrhea can be solved by always following the logical steps of diagnose, measure colostrum intake, limit cross fostering, hygiene and effective passive immunization via sow vaccination. Porcilis Porcoli was more effective than the autogenous vaccination.