## Extra amino acids for gestating sows

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## Abstract

The aim of this trial was to investigate whether the supply of extra amino acids from day 80 of the gestation period and until farrowing increases the birth weight of piglets and whether this supply affects the spread in birth weight within the litter.

The trial comprised 396 sows. In the period from service to day 80, they were all given sow feed that complied with the current standards for protein and amino acids for gestating sows. The sows in the control group continued with this feed until they were moved to the farrowing facility, while the sows in the trial group were given feed that complied with the protein and amino acid standards for lactating sows. In these diets, it was ensured that the standards for lysine, methionine, cystine, threonine and tryptophan were met. The piglets were weighed at birth.

All piglets were weighed individually at birth in two periods with approx. six months' interval. In total, 5,995 piglets were weighed divided among 396 litters. No differences were observed between the groups in birth weight or in the weight spread. Analyses were also made at parity level, and they revealed that the age of the sows did not affect the results. Even though first parity sows generally had smaller and fewer piglets, there was no effect of the supply of amino acids. Analyses of the sows' reproduction results in the subsequent cycle revealed no differences between the groups.

It can thereby be concluded that the current standards for protein and amino acids for gestating sows are sufficient when the sows are moved to the farrowing facility five days before expected farrowing. The supply of extra protein and amino acids from day 80 in the gestation period did not affect the birth weight of the piglets or the reproduction results of the sows in the subsequent cycle.