

Low-protein diets efficiently reduce diarrhoea but also growth in newly weaned pigs. The hypothesis tested: adding extra SID protein (P) and -amino acids (AA) in the finishing diets pigs can compensate for productivity loss caused by low protein diets for weaners. 2 test groups: control (C) and protein level group (PL). A total of 1,965 pigs in 60 repetitions were followed from weaning till slaughter. The pigs were fed 4 phases: 7-9 kg control vs low p (-18%P & -10% AA), 9-15 kg (-15%P & -10% AA), 15-30 kg same P and AA, 30kg-slaughter (+17%P & +14% AA). In the entire period from weaning till slaughter PL had significantly ($p < 0,01$) 14g lower daily weight gain (891-877g/day), a 0,5 % higher lean meat (62,0-62,5%), a 0,05 FE/day lower feed intake (2,17-2,12 FE/day), and a tendency to better feed utilization (1,93-1,89 FE/kg). Reducing protein 7-15 kg reduced from 408 to 346 g/day ($p < 0,0001$). From 15-30 kg, with identical protein levels, PL showed compared to C a better feed utilization (1,62-1,55 FE/kg), a lower feed intake (1,38 – 1,30 FE/day) and lower weight gain (852-838g/day) (all $p < 0,01$). From 30-60 kg, PL had lower feed uptake, 44 g higher daily weight gain and better feed utilization. C and PL almost grew and ate equal from 60 kg until slaughter. Overall, PL pigs had lower daily weight gain and feed uptake, but a tendency to better feed utilization and a better lean meat % than C. All in all the production value (biological GM) were identical between C and PL. However, the low-protein feed was cheaper, and the high-protein finisher feed was more expensive, i.e. the total cost was approx. € 1 higher for the trial group taking into account current feed prices (2020) and feed consumption.