Overview
Surgical castration of male piglets have been abolished in several European countries due to animal welfare concerns.

Entire male pigs have superior production characteristics and improved meat quality due to leaner carcasses and higher protein content, as compared to barrows, however its production has been hampered by the existence of boar taint, an unpleasant odour and flavour caused mainly by two compounds: androstenone and skatole.

Meat processing can mask boar taint; however, more studies are needed to investigate possible processing techniques and consumer attitudes towards the final pork product.

Research work objectives
To evaluate the effect of finishing diets and improved housing conditions on the reduction of boar taint compounds and on boar’s meat quality, in order to develop potential alternatives to surgical or chemical castration;

To study the effect of meat processing techniques on the reduction of boar taint odour and flavour;

To determine the viability of the use of entire male pork meat in Portuguese cured products, in order to accomplish the reduction of the number of rejected pork carcasses at slaughtering or cutting lines.

Results so far
The addition of functional ingredients led to a significant decrease in skatole levels and improved housing conditions led to a significant decrease in androstenone levels. It was also possible to produce cooked hams and bacon from entire male’s meat, tested and approved by consumers. Portuguese chorizo “vinha d’alhos” was produced with tainted meat, and a trained sensory panel considered that skatole and androstenone were successfully masked.

Publications