

Casus Lipids in Angus

In the northern part of The Netherlands a small Dutch Aberdeen Angus herd is managed in a natural grazing system (NGS). This NGS applies a year round pure grass system, no concentrates, no grain. In wintertime the animals have free admittance to a shelter with hay.

Wide open space and quietness, no concrete, minimum fencing. The animal is on its own. After slaughter, bone hanging and dry-aging are practised to enhance and promote the intrinsic meat quality, better tenderness and more flavour to the meat.

Relevant choices are made in the grazing system and in the meat processing. The contribution toward the animal and its environment are familiar, but what is the impact on the chemical composition of lipids in beef and the human health claim of these lipids?

There are health benefits, accredited to long-chain polyunsaturated fatty acids, like conjugated linoleic acid (CLA), in beef.

1. What are the health effects of CLA
2. What are the biochemical properties of conjugated linoleic acid (CLA).
3. Can an applied feeding regimen and production management determine the total lipid composition in beef?
4. Can genomic prediction be of use for determination of the lipid composition in beef?

These questions need to be answered. The end product of this study (4 EC according to ECTS) will be a full report (3 hard copies) plus presentation within the Life Sciences R&D (LSRD) group in Leeuwarden.

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The case is assigned by, and the report and presentation will be given to:

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