Metabolic Diseases of Dairy Cattle - Fat Cow Syndrome

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Overfeeding during late lactation and the dry period overconditions dairy cows. Such cows seem to have an increase in both metabolic and infectious diseases after calving and fail to respond to treatment. The main symptom exhibited in the fat cow is a refusal to eat. Excess fat in and around the internal organs and on the cow can reduce feed intake after calving possibly by restricting gut capacity and by the release of larger than normal amounts of free fatty acids into the blood, thereby depressing appetite. The problem occurs with the onset of lactation and is most common in cows with long dry periods. The resulting complex of ailments, commonly referred to as Fat Cow Syndrome, includes difficult calving, retained placenta, metritis, displaced abomasum, mastitis, ketosis and milk fever. Specific signs of the condition are loss of appetite, depression, marked drop in milk production, progressive weight loss, chronic ketosis, nervous signs and an elevated temperature due to associated disease problems. The cows fail to respond to treatment.

What can be done to prevent the problem? The first step would be to shorten the dry period or maintain a calving interval from 12 to 13 months. Experience has shown that proper feeding and management of dry and early lactating cows can prevent Fat Cow Syndrome. Separating dry cows into two groups and feeding less have been effective means of correcting the problem. Rations should be balanced in carbohydrates, protein, minerals, vitamins and adequate fiber. Feed more grass-type hay and less silage to heavy springers. Avoid drastic changes in the diet at the time of calving.

A recent study at Ohio State University showed that reduced protein feeding during the late dry period helped correct the problem. Also, work in Michigan showed a large decrease in Fat Cow Syndrome when the ration in a given herd was balanced to contain high amounts of hay and low amounts of grain and silage. Fat Cow Syndrome is more easily prevented than treated. Adopt a good dry cow feeding program.