



Project Report

April 2014



Supplementing lactating ewes at grass

EBLEX is funding a project with Harper Adams University and Scotland's Rural College (SRUC) on the metabolisable protein requirements for pregnant and lactating ewes. The grazing part of the project is about to start.

The research question being addressed is whether supplementing ewes with additional digestible undegradable protein (DUP or 'bypass protein') while they are lactating and at grass, can lead to greater animal performance.

Spring grass is very high in crude protein but can lack high quality protein. According to the Agricultural and Food Research Council (AFRC), fresh grass at 75-80 D-value has 129g per kg DM of rumen degradable protein but only 30g of DUP.



Special protein pellet

The work is being done at SRUC where one group of ewes and lambs is being fed a specially created pellet containing protected rapeseed meal and soya bean meal, which have been heat-treated to increase the levels of DUP.

The pellet will be fed through a restricted access trough feeder. The aim is for the ewes to receive around 200g per day. Ewe body condition score and lamb performance will be compared to a control group which do not have access to it. The aim is to see if there is any cost benefit in supplementing ewes while at grass.



Will ewes eat more grass or less?

The plan is to estimate grass intakes by measuring N-alkanes in the dung, as this will show whether the concentrates have displaced grass in the diet. Or it may be that ewes that receive higher levels of quality protein, will increase their grass intake because their rumens are functioning better.

Grass heights will be measured during the project, as it is thought supplementation may have the biggest impact when grass is limited.

Further reading

More information on the project can be found [on the EBLEX website](#).
The final report is due in April 2015.