# Case Study

# **Broadband Use in Farming**

### James Risk, Farmer, West Stirlingshire

Farming today is more than just livestock and big machinery. James Risk sees a constant increase in the amount of work he has to carry out by computer, and a fast broadband connection is becoming ever more important for most of this work.

"Everything is online nowadays," he says.



"The annual application for grants used to be done by filling in huge amounts of forms. Now everything has to be submitted through the Scottish Government's Rural Payments website.

"The Single Farm Payment Scheme application has to be completed each May. Although doing it online means that the application can be checked for consistency, a lot of data about our field, crops, livestock etc. has to be sent back and forward. Without fast broadband this can be very slow, and can make the whole process even more time-consuming, and at a busy time of year.

"To qualify for payments, the data we send has to be accurate. To help with this we use online tools such as Google Maps to keep track of field usage and to make sure that the field areas we claim for are correct.

"These days all animal records are kept on computer. The software I use doesn't just keep track of stock on the farm. It also transfers data automatically to and from the online scheme whenever cattle are bought or sold."



Since the computerised data is so essential for the business, James can't afford to lose it. As well as maintaining local backups, he also makes use of an online Cloud-based solution to help keep it as safe as possible. A fast broadband connection enables this and also helps in other ways.

"We recently had to carry out some maintenance work and had to be sure that it was completed to the necessary environmental standards. Rather than having an inspector make another trip to the farm to check the work in person, I was able to take digital photographs of it all and send them by email. It was a large upload but saved time in the long run."

The less time spent waiting for information to be sent or received, the more time James has for the more traditional farming activities.

Case Study: Rural Business

#### Co-located rural business reliant on Broadband

# Alistair Campbell, CC North Ltd, Killearn Mill

Energy management systems have been for years become more reliant on IT networks within and out with buildings. To allow remote interrogation of systems it is essential that our company which has its main office in Killearn to have a fast and efficient broadband connection.

"We regularly have to send updated software files to our site engineers to allow modifications and/or upgrades of existing projects. These files are regularly bigger than 50MB but can also be as large as 300MB. With 'offpeak' connection speeds of 5.3Mb/s download and 0.25Mb/s upload these files can take over 30 minutes to send, during 'peak' times this only becomes slower," he says.





"We have between 10-14 staff working in the office, supporting 6 mobile engineers and, as you can see from the map, our customers are on several hundred remote sites spread all across the north of Scotland. Using the Internet and a fast, responsive broadband connection, many of these sites can be examined remotely that allows a 'first-fix' correction to be attempted before a mobile engineer needs to be assigned.

"We operate very closely on designs of new building projects assisting Architects & Mechanical/Electrical Consultant Engineers with a focus on CAD design which relies on continually transferring large design/drawing data files, often in excess of 200MB.

"In fact, we are just one of several companies operating from neighbouring offices on the Killearn Mill site with a desperate need for a Fast Broadband connection. We are located outside the main village and over 1.5 km from the local exchange, even measured by line-of-sight, so none of us get particularly fast speeds.

The other businesses, Energy Efficient Cooling Ltd, Sterling Cold Storage Ltd, Scimitar Engineering Ltd, and Park Life also work with large computer files being sent or received. These again may be CAD drawings, architectural and structural plans, specifications or proposals, and Parklife, who publish a What's On guide and Advertiser booklet for businesses and communities covering Loch Lomond and the Trossachs are continually receiving advertising materials or sending drafts for approval, and exchanging emails with their contributors as well as the final press-ready copy for printing.

Again, having to wait, and maybe go for a coffee while an email or file gets sent, can be very frustrating and inefficient for the business.