

Tractors work around the clock for the Christmas tree harvest

Christmas is coming ... and the timing of the harvest of hundreds of thousands of festive fir trees in the north of Scotland is critical. That's where contractor Magnus Sinclair and his fleet of John Deere tractors comes in. *Jennifer MacKenzie*

Magnus and his father Alistair expanded their farming operation near Ellon in Aberdeenshire in the 1990s to include contracting work and John Deere tractors have been used exclusively for the last 10 years. Now, their John Deere tractors and operators play a vital role in the harvesting, wrapping and loading for transport of 300,000 Christmas trees grown by the Danish-based Green Team Group. To meet the tight deadline during a four week period involves working through the night to supply the European Christmas tree grower's UK customers. "Our tractors which are working 24 hours a day can run up more than 700 hours a month with minimal problems. It is the equivalent of 100,000 trees per night shift tractor over the period with our drivers working 16 hour shifts," says Magnus. "Our John Deere tractors are all doing 3,000 hours a year and we run them until they have done 10,000 to 12,000 hours, around four years old, before we sell them, which is fairly exceptional use."

"We first started using John Deere tractors in 1985 and since our business has expanded over the last decade or so we have used the company's machines exclusively," adds Magnus. "If we can get the equipment in green we will!" Currently the workhorses in the Sinclair Contractors 'stable' are the tractors – two 7530s, three 6930s, a 6830, and one 6920s – plus two 3220 handlers, sprayers, four mowers and a self-propelled 7350i forage harvester. All are supplied by local dealer HRN Tractors, Insch,

Aberdeenshire. The contracting business has grown to employ 12 people plus part time labour at busy times. As well as agricultural contracting, the Sinclairs have specialised in the spreading and handling of waste from sewage works and paper mills, working under strict SEPA guidelines, as far afield as Orkney.

GREEN ENERGY

The Sinclairs farm 800 acres, 300 of which is growing trees for pulping or biomass use. Their interest in renewable energy will be further expanded with the installation of a 400 kw anaerobic digester which is expected to be operational in 2012. It uses the arable crops and grass grown on the rest of the acreage to generate electricity which goes back into the National Grid.

Magnus Sinclair says the anaerobic digester at their farm at Kinknockie, Udny, should produce a profit equivalent to £320 a acre by taking crops out of food production. The German AD technology system will use grass silage, maize silage and whole-crop wheat. Ensiled maize, which has been successfully trialled by the Sinclairs over the last two years, will be the main ingredient in the crop mix used in the AD process because of its high energy value and biogas yields.

It will showcase locally how the technology can be a viable long-term income source – already the Sinclairs have received many enquiries from farmers in the area who are prevented from





GREEN TEAM GROUP

The Green Team Group's goal is to produce seven million Christmas trees and 5–6,000 tonnes of decoration forage from 9,000 hectares of its own production, sold from Moscow in the east to the Caribbean in the west, accounting for up to 12% of the share of Christmas tree sales and up to 25% for decoration foliage and decorations. Currently the group's own plantations cover approximately 22,200 hectares in Europe. Added to this is a close co-operation with selected producers which within seven to 10 years will increase the sale of ready trees to ten million. With EU buying power expanding towards the east, the market is expected to grow from 60 million to 85 million trees. The Nordmann Fir's share will increase from 50% to 65% of this market.

erecting wind turbines because they are in Aberdeen Airport exclusion zone. The next phase in the Sinclairs' diversification into energy is to make better use of the heat created in the AD process.

SPEED AND RELIABILITY

The Christmas tree harvest is a quieter time for the business's other operations and nine men and six tractors are deployed. "Three years ago we were using the same number of tractors and harvesting a lot less trees. It is a specialist operation and it needs to be done as quickly as possible. A fourth tractor fitted with a netting machine has made a massive difference and I can see us using even more tractors eventually," says Magnus.

The Green Team Group's UK manager who oversees the operation in Scotland Dane Hans Rafn says: "To keep on top of our orders and load up the lorries which arrive to collect the trees, it's very important that we don't have machinery breakdowns."

Trees are labeled for cutting and for different customers. Traditionally, they are cut by a chain saw operator, however, the Green Team is introducing an automated system which can cut up to 1,000 trees an hour. The trees are accessed by tractor along tramlines and the John Deere machines are fitted with netting machines. Operators on the ground feed the individual trees through the machine which are then stacked in pallets on the rear of the tractor. Once the pallet is full, another John Deere collects the pallet and delivers it to a waiting lorry which is loaded for onward transport to the customer in a seamless operation.

Despite the often muddy conditions because of the November weather, the trees have to be presented clean. During wet weather rubber matting is used and tractors are driven to minimise the amount of disruption to the earth. In extreme conditions, the trees are power-washed.

MILLIONS OF TREES

The Green Team Group sold 1.4 million Christmas trees in Europe in 2010, of which half a million was sold in the UK, mainly to home and garden supplies chain B&Q as well as other regional outlets, including garden centres. The company has around 4 million trees growing in Scotland.

All the trees grown in the UK are in Aberdeenshire, the first planted 10 years ago. The Sinclairs have planted a further 1.1 million on 125 acres during 2011 using John Deere's GreenStar precision technology, preventing the need for the field to be physically mapped in blocks. The trees are planted as three year old seedlings which are grown in the Green Team's nurseries in Denmark or Georgia in the former Soviet Union.

Varieties are specially chosen to meet the Christmas tree requirements of different countries – for example, in Germany the tradition is to decorate the tree with candles so the trees grown have open, well-spaced branches. In Scotland it is principally Denmark's native tree, the Nordmann Fir which is grown. It keeps its needles well. Noble Fir and some Spruce is grown, the later for its foliage use in decorations.

AGRICULTURAL CROP

They are grown as an agricultural crop and originally the land was purchased by the Group but now it is looking for farmers and landowners to lease ploughable ground for up to 10 years which could be put back into Christmas trees or into an arable crop rotation.

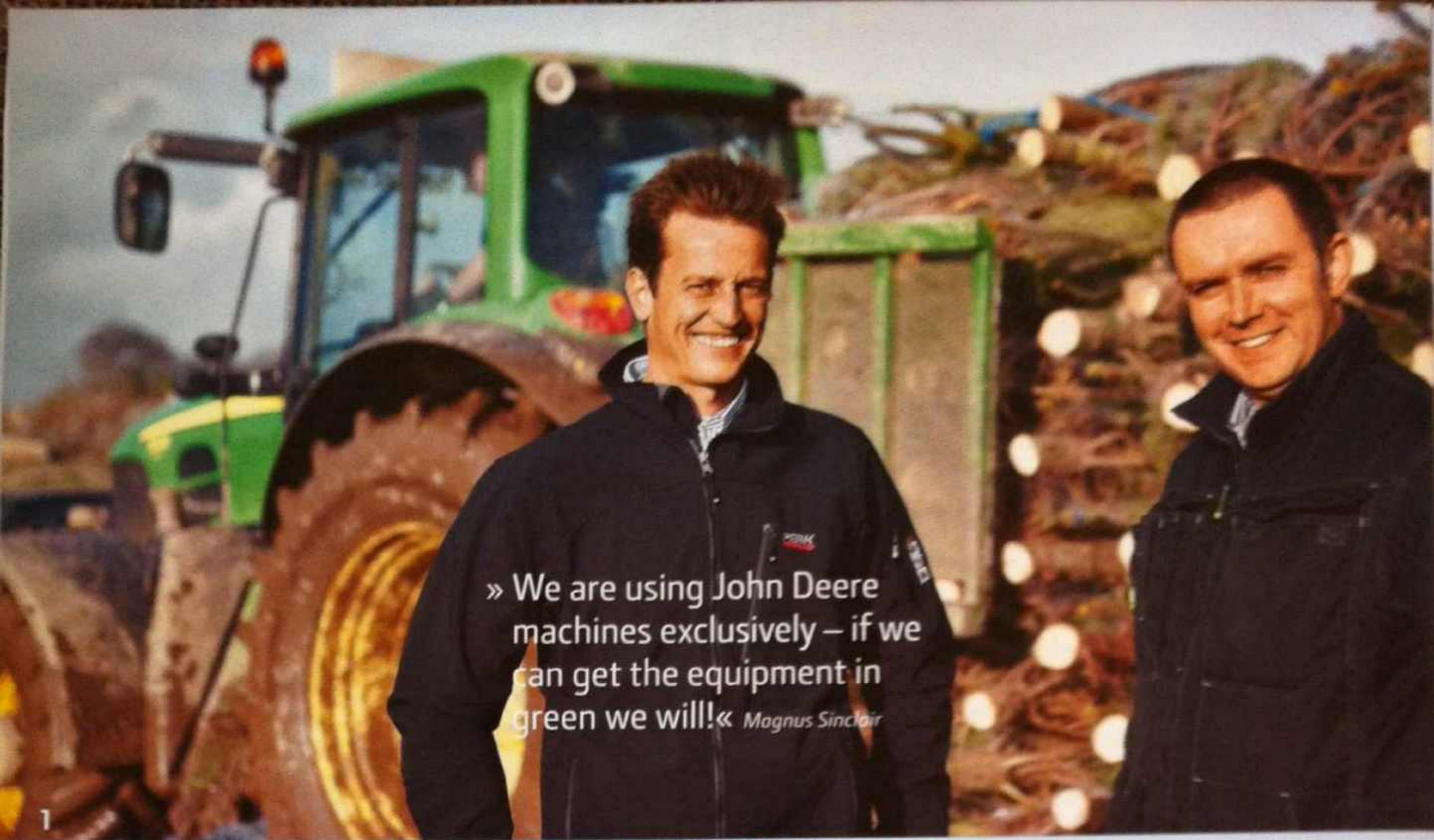
For the first four to five years the group's employees carry out crop maintenance including weeding and fertilisation of the ground with branches pruned at the base of the trees. Harvesting begins in year six with the remainder collected by nine years of growth. The Green Team Group is one of Europe's largest specialist Christmas tree growers and it is meeting an increasing consumer demand for real trees.

"People's attitudes towards real Christmas trees have changed over the last decade and they realise that the trees are a renewable forest and never question the environmental impact of growing them," says Magnus. "The trees have been grown for a purpose and while they are growing they are reducing the CO₂ in the atmosphere. You would need to use an artificial tree for up to 10 years because of the oil used to create it to have the same impact on the environment," says Hans Rafn, a forestry engineer. ■



FURTHER INFORMATION

www.sinclaircontractors.co.uk | www.greenteam-group.com



» We are using John Deere machines exclusively – if we can get the equipment in green we will!« *Magnus Sinclair*

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- 1 The Green Team Group's Hans Rafn, left, and Magnus Sinclair discuss the specialist operation.
- 2 Individual trees are stacked in pallets on the rear of the tractor which, once full, is collected by another John Deere.
- 3 The John Deere machines are fitted with netting machines to wrap the trees.
- 4 Despite the often muddy conditions in November, the trees have to be presented clean.
- 5 In a seamless operation, full pallets are loaded onto a waiting lorry for transport to the customer.