Spadeadam Forest Design Plan

Introduction

The Spadeadam Forest design plan covers 5,841 hectares of the southwestern section of Kielder Forest that falls within Cumbria. The terrain is of gently rolling hill and other than the Ichin gorge without significant features. The forest is not dominant in any major view, however the south boundary of the forest does fall within the Setting of Hadrian’s Wall World Heritage Site, and is visible from the A69 trunk road. The wind hazard class of the plan area is generally high (the majority being class 5), this combined with the lack of thinning of the lower windhazard class sites in the south limits opportunities to employ continuous cover forestry. There may be opportunities to alter the management of the crops in the southern section to continuous cover in the next rotation. The majority of crops are growing well (achieving yield class 12). They are mainly first rotation crops of which a significant proportion are at or past the date of economic maturity. The following table lays out the main features driving the revision of the design plan, and their influence on the felling and restocking plans.

<table>
<thead>
<tr>
<th>Feature</th>
<th>Description</th>
<th>Concept</th>
<th>Felling / restocking Plans</th>
</tr>
</thead>
<tbody>
<tr>
<td>Operational needs of the base, Laser guidance</td>
<td>When the original plan was draw up operational needs of the RAF were considered</td>
<td>Identify area of military use on the concept map</td>
<td>Due to wind throw an area of trees which was proposed to be maintained as a laser backdrop needs to be harvested. However since previous review the target in question is not currently used and unlikely to be needed in future</td>
</tr>
<tr>
<td>Onset of Windthrow</td>
<td>Some windthrow has occurred within some of the crop notably on sites planted with Lodgepole pine. As Lodgepole pine can degrade rapidly where the onset of windthrow is significant felling proposals need to be changed in order to be able to recover harvestable material</td>
<td></td>
<td>Alteration to some felling coupes in order to take account of the windthrow.</td>
</tr>
<tr>
<td>The diseases Red band needle blight (Dundecospora septospiron), and Phytophthora ramorum</td>
<td>These diseases have caused a moratorium on planting Lodgepole pine (LP) and Japanese larch have required the spatial distribution of restocking species to be altered. Moving Sitka spruce (SS) to the more exposed sites which would have been planted with LP to free more sheltered site in which to plant other conifer</td>
<td></td>
<td>Redistribution of SS and other conifer species on the restocking proposals</td>
</tr>
<tr>
<td>Ancient monuments</td>
<td>Following scheduled ancient monuments fall within the plan area the shielings of Rotherbrough (25136), Jerrycalf Rigg (25143), Hazel Gillis (25169), and Fould Bog (25170 to 25173) plus the site of Barron’s Pike Barrow (27757), and Maidens way (27815)</td>
<td>Manage in accordance with agreed management plan</td>
<td>Maintain as open space on the restocking plan</td>
</tr>
<tr>
<td>Moorland boundary</td>
<td>The transition from forest to the open moor is relatively hard, look to include a more transient habitat</td>
<td>Mitigate the harsh transition from open moor to high forest, though landscape impact of edge treatment needs to be sympathetic.</td>
<td>An element of restocking with open woodland on the moorland boundary was proposed in the last revision and this is maintained. The current age structure limits the ability to which this may be achieved within the next twenty five years.</td>
</tr>
<tr>
<td>Ancient semi natural (ASNW) and ancient replanted woodland (PAWs)</td>
<td>Areas of ancient semi natural and ancient replanted woodland along the Ichin gorge</td>
<td>Identify area on the design concept map</td>
<td>Maintain the area of ancient semi natural woodland as such and the restocking on the adjacent PAWS sites with native species</td>
</tr>
<tr>
<td>Border Mires</td>
<td>A number of border mire sites fall within the plan area, some of which are scheduled as SSSI. Four unscheduled sites in the eastern section of the plan area have been surveyed during the last 5 years which has significantly altered the boundaries.</td>
<td>Identify the area of the mires on the concept map</td>
<td>Maintain as open habitat the former extent of the mire and a minimum buffer of 30m on the restock map. Also adjust the restocking boundaries in light of the recent survey of mire sites. Note all SSSI mires now in unfavourable recovering status</td>
</tr>
<tr>
<td>Right of way</td>
<td>Footpaths and bridleways run through the area. Plus two permissive routes instigated through the now closed East Cumbria Countryside Project</td>
<td>All rights of way (as shown within this plan) will be left unplanted. At restocking, the width of the unplanted land along rights of way will be varied, but never less than 3m for footpaths and 4m for bridleways. Trees planted adjacent to public rights of way will be pruned as required to maintain free access.</td>
<td></td>
</tr>
</tbody>
</table>

**Clearfelling and Restocking Plans**

Copies of both the present and proposed clearfelling and restocking plans are included the main change proposed being (it should be noted that the revised restocking proposal are based on a 25 years time scale).

**Felling proposals**

1. Alteration of coupe boundary in to take account of windthrow.
2. In light of the significant deforestation that will take place in the southern section of the plan area due to mire restoration, rationalise the felling and restructuring to vary age class is no longer an issue.

**Restocking proposals**

1. Introduce area of open woodland and open space adjacent to moorland edge.
2. Redesign the restocking boundaries adjacent to the border mire sites.
3. Alter spatial distribution of restocking species to take account no longer able to plant Lodgepole pine.
Forester

Kielder Forest

Economic Felling

Legend
Coupes
OPTIMALYR

- beyond economic
- 2012 - 2016
- 2017 - 2021
- 2022 - 2026
- 2027 - 2031
- 2032 - 2036
- >2036
- Continuous cover

Scale
Date
1:40,000
Jan 2011

This map is based upon Ordnance Survey Naughty of the Secretary of the National Estate Office
© Crown Copyright. Unauthorised reproduction infringes Crown Copyright and may lead to prosecution and proceedings. Forestry Commission - WeMap