



East Anglia

CROXTON FOREST DESIGN PLAN

Total Plan Area: 714 Hectares

LOCAL PLANNING AUTHORITIES:

Norfolk County Council

Breckland District Council

Date – October 2007

CONTENTS PAGE

	<u>PAGE NO</u>
1. DESCRIPTION	2
2. ORIGINAL FDP – ASSESSMENT	2
3. DESIGN BRIEF	3
4. SPECIES AND FELLING AREA	4-5
5. PLAN APPRAISAL	5-6
6. MONITORING	6
7. PLAN REVIEW	7
8. APPROVAL	7
APPENDIX I – Tolerance Table	8
APPENDIX II – Scan of signature from hard copy	
APPENDIX III – Felling Map	
APPENDIX IV – Restock Map	

1. Description

The plan area is 714 hectares in extent, situated some four miles north of Thetford. The woodland block of Croxton is adjacent and to the north east of Croxton village. It is bounded on the western side by The Street and to the east by the A1075. To the north is a military camp and the Stanta training area. The block is extensively used for military training. The majority of the woodland at Croxton is leasehold, Thorpes Belt to the north of the block is owned freehold by the Forestry Commission. The whole of the plan area is in Norfolk, the administrative area is Breckland District Council.

The forest area has been mapped by the Soil Survey of Great Britain, which has identified a number of different soil types. The soils in the plan area consist of mainly Brown Sands of varying depth over chalk. However, for all practical purposes the area is sand over chalk and the greatest influence on management is depth of sand with the shallower, more alkaline soils supporting a limited range of tree species.

The Devils Punchbowl is a SSSI within the northern boundary of the Croxton Block, it is a symmetrical Breckland mere of geological importance noted for the fluctuating water levels, which often are out of synchronisation with current seasonal climatic patterns. On the north eastern boundary is East Wretham Heath SSSI.

Harling Drove, a byway open to all traffic runs east-west through the block; it is also designated as the Hereward Way, a regionally significant long distance path.

The topography is generally of a southerly aspect, but there is some undulation throughout.

Corsican pine has been the most widely planted species in the past but there are also areas of Scots Pine often planted in intimate mixture with beech. Broadleaf belts and roadside planting are a feature of the forest.

2. Original FDP – Assessment

The FDP process has changed in a number of ways since the original plan was drafted five years ago and this is reflected in the new areas that the FDP needs to address. These new areas are listed below with a description of their potential impact.

The UK Forest Standard – This is a Forestry Commission document that sets the standard that both public and private owner should meet to demonstrate good forest practice. One of the main impacts of the standard on this plan is the requirement to have at least a 7 year gap between adjacent felling coupes. The issue of “adjacency” of coupes does occur within this plan.

The UK Woodland Assurance Standard (UKWAS) – The Forestry Commission has received accreditation under this standard so that it can sell its timber as Forest Stewardship Council (FSC) certified. This standard covers a wide range of issues that affect the way the forest is managed. The main effect of UKWAS on this plan is the requirement for the new FDP to meet certain minimum design thresholds including the amount of open space that is created during the life of the plan and the area that is designated as a natural reserve and managed by minimum intervention.

East Anglia Forest District Strategic Plan – This plan was recently revised by the forest district to show how it will deal with strategic issues and how it will carry forward some of the objectives of the East of England Regional Woodland Strategy. There are three strategic objectives that will effect this FDP:

“P1.3.iii) To collate and prioritise the ideas/objectives of all teams to fully inform the FDP.”

“P1.3.iv) Take into account the internal and external landscape considerations for the area.”

“En 2.2) To manage and monitor SACs, SPAs and SSSIs.”

The first two objectives are part of the normal forest design plan process and the third objective is tested when the revised FDP undergoes an appropriate assessment for its impact on the Breckland Forest SSSI/SPA

3. Design Brief

The issues that the forest design plan should address are set out below under three broad headings, which relate to the structure of the English Forestry Strategy.

Economic

- The felling plan should aim to smooth production from crops in cyclic clearfell but also meet market commitments for 2007-11.
- Design felling coupes that are economical to restock.
- Restocking should aim to maximise production but also to increase species and habitat diversity.
- Restock species should take soil pH into account and the threat posed by Red Band Needle Blight.

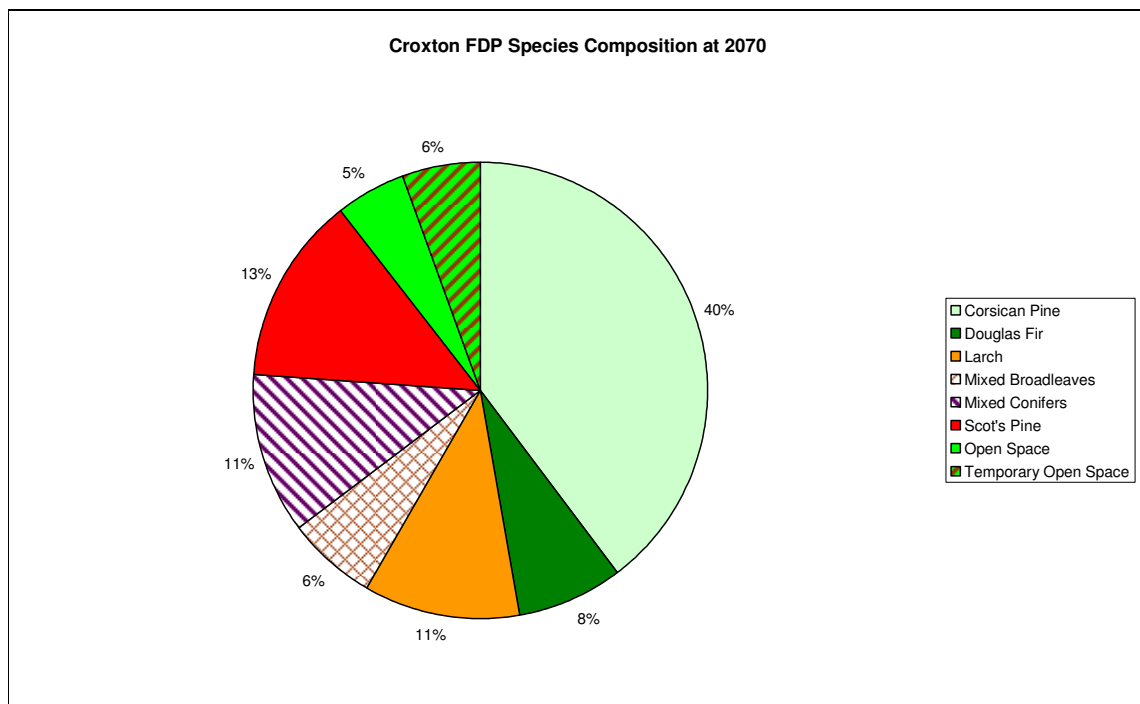
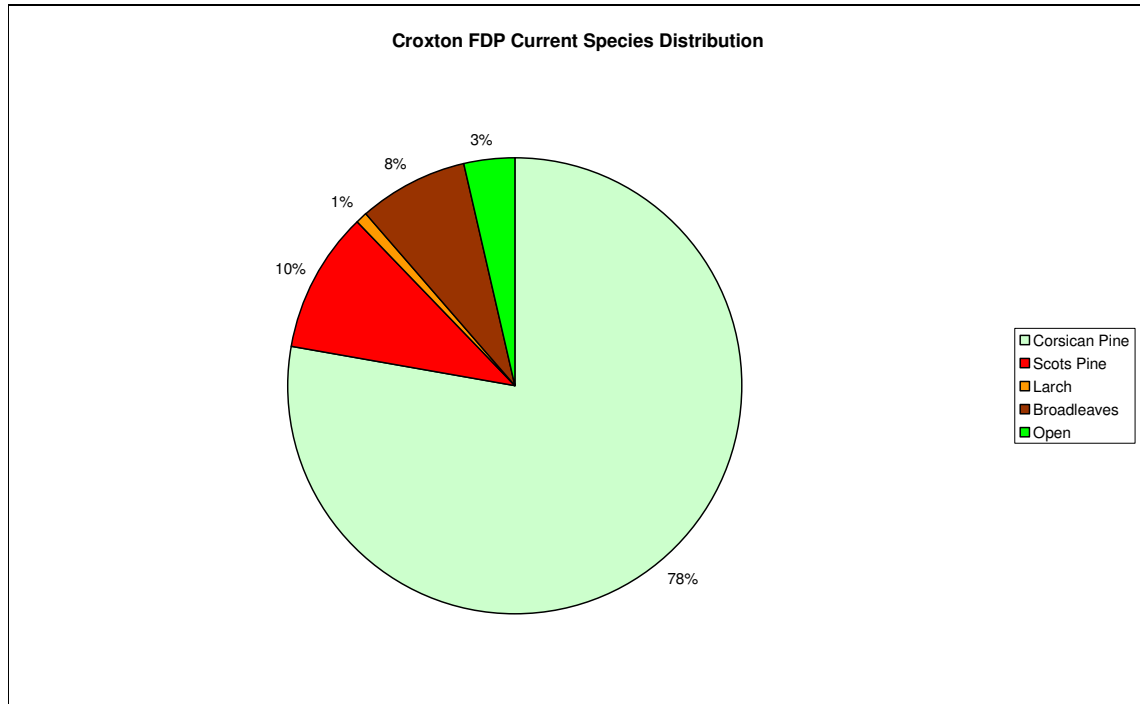
Social Issues

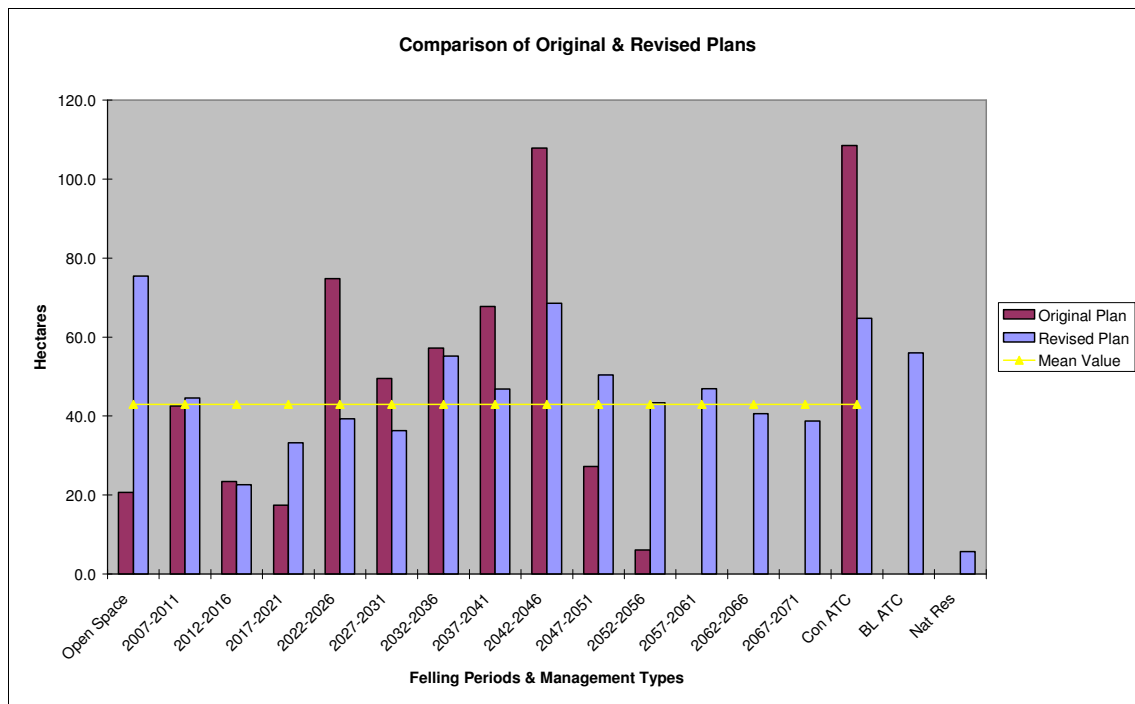
- Maintain a pleasant woodland environment.
- Reduce the size and shape of felling coupes to fit into the landscape.

Environmental Issues

- Felling plans should aim for a more even distribution of felled area for Woodlark/Nightjar habitat under the SPA.
- Link open spaces and widen conservation rides.
- Increase amount of open space to a minimum of 10% of the plan area (UKWAS target).
- Identify a minimum of 1% of the plan area, which is suitable as a Natural Reserve (UKWAS target).
- Restructure area in the north of the block to eliminate coupes that are marked as being felled in adjacent felling periods.

4. Species and Felling Area





* The indicative mean is an estimated value based on the area of cyclic clearfell within the FDP divided by 59. The 59 represents an average rotation length of 57 years plus 2 years of fallow while the ground is prepared for the next crop.

5. Plan Appraisal

The appraisal of the revised plan is measured against the design brief on page 3, this has three separate sections and the appraisal relates to these sections:

Economic Issues

The relationship between timber volume production and felling area is close enough for the bar chart above to illustrate the smoothing effect that the revised plan has had on volume. The production of timber volume has been levelled significantly but it will take another rotation before the actual felling area is closer to the indicative mean value. It is also noticeable that the felling area for the period 2012-16 is considerably below the indicative mean, this is due to these areas being among the last of the first rotation crops before the second rotation crops are fully mature.

A comparison of the pie charts on page 4 indicates that species diversity will increase over the life of the plan. The plan shows a decrease in the amount of Corsican Pine that will be planted. This is partly as a response to the threat posed by Red Band Needle Blight but also as a result of matching other species to the appropriate soil type. The future management of the mixed conifers and broadleaved areas will be by continuous cover systems, with 1% of the total area managed by minimum-intervention.

Social Issues

The revision of the plan has retained significant broadleaf belts along roadsides. Areas of trees are also retained around properties within the forest. The size and number of felling coupes within the block has been designed to increase visual diversity.

Environmental Issues

As mentioned earlier, the felling area bar chart on page 5 shows how the revised plan has “smoothed” the creation of felling area so that Woodlark and Nightjar habitat is more evenly distributed. The effect of the revised plans on the cyclic felling area across the whole SPA has been calculated on GIS (Geographic Information System). The analysis of this data shows that the current cyclic clearfell area is 13,180 hectares but this will increase to 13,240 hectares by 2066. This is an increase of 60 hectares, which means there is now 483 hectares of cyclic clearfell above the SPA minimum threshold area of 12,757 hectares.

The SPA regulations require that no more than 10% of the clearfell area is in coupes under 5 hectares in size, as felled coupes smaller than this are judged to be less attractive as breeding habitat for Woodlark and Nightjar. The revised Croxton plan has several small felling coupes which total 1.8% of the felling area, this is under the 10% threshold.

The pie chart on page 4 shows an increase in permanent open space of 2% when compared to the original plans. This increase in open space has been created, largely, by widening rides that link existing open space. The resulting effect is a network of wide rides of high conservation value. The creation of this network can be hastened by widening the rides at the time of next thinning. It has been difficult to increase the area of permanent managed open space as the best conservation gain would be to create an area of managed heathland but this is not an option on leasehold land.

In mitigation for the area of permanent managed open space being less than the UKWAS target of 10%, several clearfell areas will not be restocked so as to produce a continuation of temporary open space. These temporary open spaces will eventually become woodland through natural regeneration and it is expected that these coupes will remain in cyclic clearfell. When temporary and permanent open space are added together they account for 11% of the design plan area. It should also be noted that the cycle of clearfelling produces an abundance of ephemeral open space, which is particularly used by Nightjar and Woodlark.

6. Monitoring

Once the felling of a coupe has been completed, the shape of that coupe is captured on the ground using a GPS (Global Positioning System) receiver and the data is uploaded into GIS. The resulting point data is then compared to the original coupe shape to confirm that the felling coupe has been accurately laid out on the ground.

A felled coupe is usually restocked two years later, when all the ground preparation and weed control has been completed. At this point the forest district database is updated to show the newly planted species and their proportions. As part of this updating process the restocking information is compared with the FDP restock plan to confirm compliance. The restocking can vary slightly from the FDP as physical features, such as banks and pits, come to light after felling, which were not picked up during the planning process. Most of these minor changes are within the tolerances agreed between Forest Enterprise and the Forestry Commission – see Appendix I.

7. Plan Review

This FDP will be reviewed internally after 5 years and formally revised before 31 March 2018.

8. Approval

Forest Enterprise seeks approval from the Forestry Commission to fell and restock 92 hectares and for selective felling of approximately 40 hectares within 120 hectares for the purpose of continuous cover forestry during the period 1/4/2008 to 31/3/2018 as shown on the enclosed plans.

Maps included with this document are as follows –

Analysis & Concept

Management

Habitat

Signed:Date.....

Approved:Date.....

Forest Management Director

Regional Director

Appendix I

Tolerance Table

	Adjustment to felling coupe boundaries	Timing of Restocking	Changes to species	Windthrow clearance
FC Approval normally not required	0.5 ha or 5% of coupe	Up to 3 planting seasons after felling	Change within species group e.g. evergreen conifers; broadleaves	Up to 2ha
Approval by exchange of letters and map	0.5ha to 2ha or 10% of coupe	Up to 4 planting seasons after felling	Change from other conifers to Corsican Pine	> 2ha to 5ha
Approval by formal plan amendment	> 2ha or >10% of coupe	Over 4 planting seasons after felling	Change from broadleaves to conifers	> 5ha

Appendix II Scanned copy of signature

CSM 6 Appendix 1a

FOREST ENTERPRISE - Application for Forest Design Plan Approvals in England

Forest Enterprise - Property

Forest District:	EAST ANGLIA
Woodland or property name:	CROXTON
Nearest town, village or locality:	CROXTON
OS Grid reference:	TL888880
Local Authority district/unitary Authority:	BRECKLAND DISTRICT COUNCIL

Areas for approval

	Conifer	Broadleaf
Felling	132	
New planting (complete appendix 4)		

1. I apply for Forest Design Plan approval*/~~amendment approval~~* for the property described above and in the enclosed Forest Design Plan.

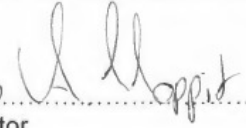
2. * I apply for an opinion under the terms of the Environmental Impact Assessment (Forestry) (England & Wales) Regulations 1999 for afforestation*/deforestation*/ roads*/ quarries* as detailed in my application.

3. I confirm that the pre consultation, carried out and documented in the Consultation Record attached, incorporated those stakeholders which the FC agreed must be included. Where it has not been possible to resolve specific issues associated with the plan to the satisfaction of consultees, this is highlighted in the Consultation Record.

4. I confirm that the proposals contained in this plan comply with the UK Forestry Standard.

5. I undertake to obtain any permissions necessary for the implementation of the approved Plan.

Signed 
Forest District Manager

Signed 
Conservator

District EAFD

Conservancy East of England Region

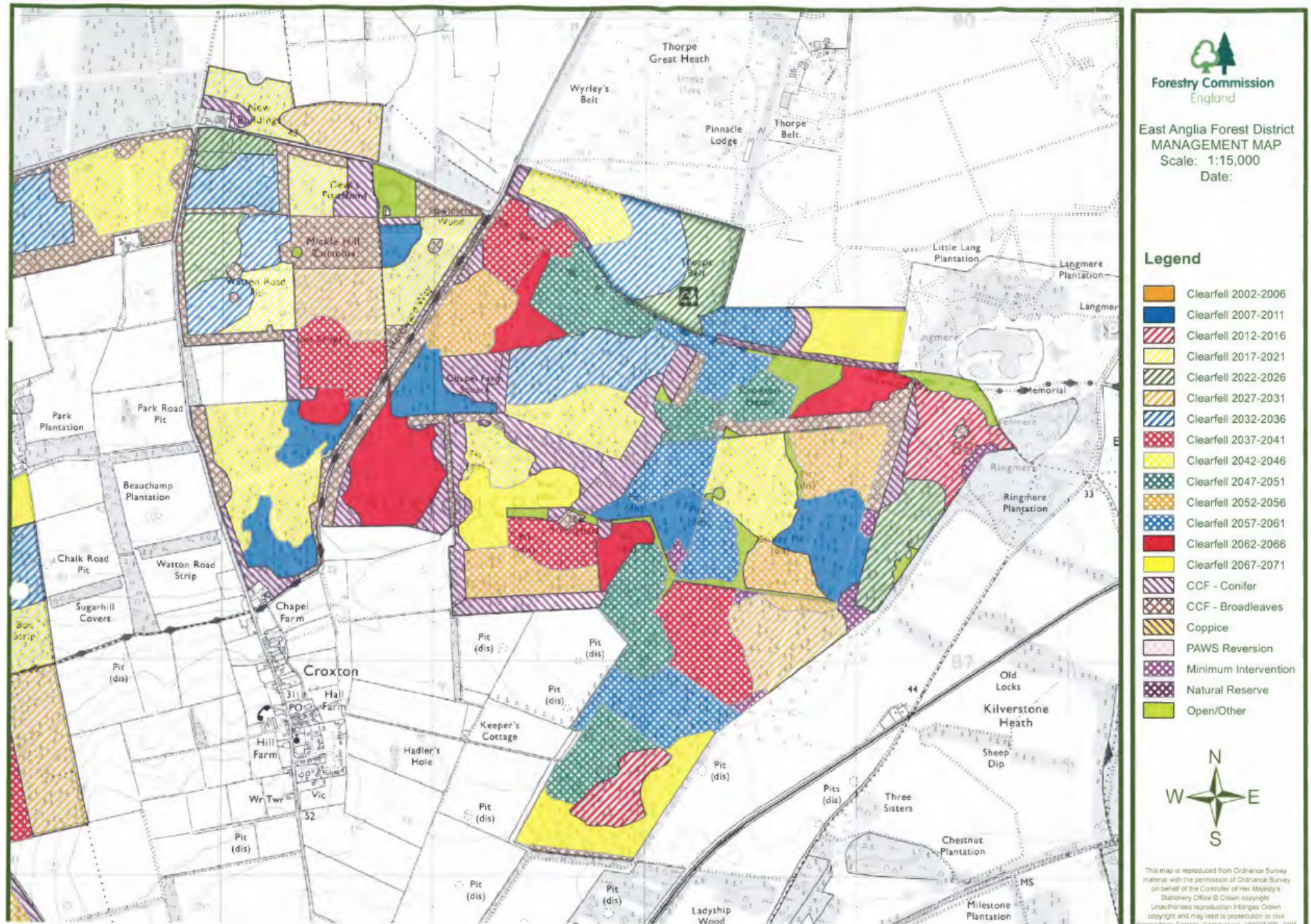
Date 14/2/08

Date of Approval 11th April 2008

Date approval ends 10th April 2018

*delete as appropriate

Appendix III Felling Map



Appendix IV Restock Map

