



# Aldouran Glen

## Management Plan 2016-2021

---

## MANAGEMENT PLAN - CONTENTS PAGE

<b>ITEM</b>	<b>Page No.</b>
Introduction	
Plan review and updating	
Woodland Management Approach	
Summary	
1.0 Site details	
2.0 Site description	
2.1 Summary Description	
2.2 Extended Description	
3.0 Public access information	
3.1 Getting there	
3.2 Access / Walks	
4.0 Long term policy	
5.0 Key Features	
5.1 Planted Ancient Woodland Site	
5.2 Informal Public Access	
5.3 Archaeological Feature	
6.0 Work Programme	
Appendix 1: Compartment descriptions	
Appendix 2: Harvesting operations (20 years)	
Glossary	

## MAPS

Access  
Conservation Features  
Management

## THE WOODLAND TRUST

### INTRODUCTION

The Trust's corporate aims and management approach guide the management of all the Trust's properties, and are described on Page 4. These determine basic management policies and methods, which apply to all sites unless specifically stated otherwise. Such policies include free public access; keeping local people informed of major proposed work; the retention of old trees and dead wood; and a desire for management to be as unobtrusive as possible. The Trust also has available Policy Statements covering a variety of woodland management issues.

The Trust's management plans are based on the identification of Key Features for the site and setting objectives for their management. A monitoring programme (not included in this plan) ensures that these objectives are met and any necessary management works are carried out.

Any legally confidential or sensitive species information about this site is not included in this version of the plan.

### PLAN REVIEW AND UPDATING

The information presented in this Management plan is held in a database which is continuously being amended and updated on our website. Consequently this printed version may quickly become out of date, particularly in relation to the planned work programme and on-going monitoring observations. Please either consult The Woodland Trust website [www.woodlandtrust.org.uk](http://www.woodlandtrust.org.uk) or contact the Woodland Trust ([wopsmail@woodlandtrust.org.uk](mailto:wopsmail@woodlandtrust.org.uk)) to confirm details of the current management programme.

There is a formal review of this plan every 5 years and a summary of monitoring results can be obtained on request.

---

## WOODLAND MANAGEMENT APPROACH

The management of our woods is based on our charitable purposes, and is therefore focused on improving woodland biodiversity and increasing peoples' understanding and enjoyment of woodland. Our strategic aims are to:

- Protect native woods, trees and their wildlife for the future
- Work with others to create more native woodlands and places rich in trees
- Inspire everyone to enjoy and value woods and trees

All our sites have a management plan which is freely accessible via our website [www.woodlandtrust.org.uk](http://www.woodlandtrust.org.uk). Our woods are managed to the UK Woodland Assurance Standard (UKWAS) and are certified with the Forest Stewardship Council® (FSC®) under licence FSC-C009406 and through independent audit.

In addition to the guidelines below we have specific guidance and policies on issues of woodland management which we review and update from time to time.

We recognise that all woods are different and that the management of our sites should also reflect their local landscape and where appropriate support local projects and initiatives. Guidelines like these provide a necessary overarching framework to guide the management of our sites but such management also requires decisions based on local circumstances and our Site Manager's intimate knowledge of each site.

The following guidelines help to direct our woodland management:

1. Our woods are managed to maintain their intrinsic key features of value and to reflect those of the surrounding landscape. We intervene when there is evidence that it is necessary to maintain or improve biodiversity and to further the development of more resilient woods and landscapes.
2. We establish new native woodland using both natural regeneration and tree planting, but largely the latter, particularly when there are opportunities for involving people.
3. We provide free public access to woods for quiet, informal recreation and our woods are managed to make them accessible, welcoming and safe.
4. The long term vision for our non-native plantations on ancient woodland sites is to restore them to predominantly native species composition and semi-natural structure, a vision that equally applies to our secondary woods.
5. Existing semi-natural open-ground and freshwater habitats are restored and maintained wherever their management can be sustained and new open ground habitats created where appropriate.
6. The heritage and cultural value of sites is taken into account in our management and, in particular, our ancient trees are retained for as long as possible.
7. Woods can offer the potential to generate income both from the sustainable harvesting of wood products and the delivery of other services. We will therefore consider the potential to generate income from our estate to help support our aims.
8. We work with neighbours, local people, organisations and other stakeholders in developing the management of our woods. We recognise the benefits of local community woodland ownership and management. Where appropriate we allow our woods to be used to support local woodland, conservation, education and access initiatives.
9. We use and offer the estate where appropriate, for the purpose of demonstration, evidence gathering and research associated with the conservation, recreational and sustainable management of woodlands. In particular we will develop and maintain a network of long-term monitoring sites across the estate.
10. Any activities we undertake will conform to sustainable forest management principles, be appropriate for the site and will be balanced with our primary objectives of enhancing the biodiversity and recreational value of our woods and the wider landscapes.

## SUMMARY

This public management plan briefly describes the site, specifically mentions information on public access, sets out the long term policy and lists the Key Features which drive management actions. The Key Features are specific to this site - their significance is outlined together with their long (50 year+) and short (5 year) term objectives. The short term objectives are complemented by a detailed Work Programme for the period of this management plan. Detailed compartment descriptions are listed in the appendices which include any major management constraints and designations. A short glossary of technical terms is at the end. The Key Features and general woodland condition of this site are subject to a formal monitoring programme which is maintained in a central database. A summary of monitoring results is available on request.

## 1.0 SITE DETAILS

<b>Site name:</b>	Aldouran Glen
<b>Location:</b>	Leswalt, nr Stranraer
<b>Grid reference:</b>	NX007635, OS 1:50,000 Sheet No. 82
<b>Area:</b>	13.11 hectares (32.40 acres)
<b>Designations:</b>	Ancient Semi Natural Woodland, Planted Ancient Woodland Site, Scheduled Ancient Monument

## 2.0 SITE DESCRIPTION

### 2.1 Summary Description

This ancient woodland with a magical feel has a bubbling stream and the remains of an Iron Age hill fort at its heart, plus carpets of bluebell and ramson in May, a rich variety of other woodland plants and abundant wildlife, including chaffinch, treecreeper and wren.

### 2.2 Extended Description

#### Location, Altitude and Aspect

Aldouran Glen wood is located on the south west coast of Scotland, on the Rhins of Galloway approximately 6km north west of Stranraer. Situated in a valley to the north of the B7043, the wood lies between the village of Leswalt (approximately 1/2km to the north-east) and Lochnaw (approximately 1km to the west). It has a predominantly eastern aspect. The altitude of the wood ranges from 40m above sea level in the south-east of the wood to 90m above sea level by the car park in the west.

#### Geography

The wood occupies the upper, flatter terraces as well as the steep slopes of Aldouran glen. The glen contains a small tributary to the Sole Burn, which runs west to east through the middle of the wood.

The wood is also drained by means of several distinct, steep watercourses that flow from the higher land to the south and west into the burn. The area is underlain mainly by sediments of Ordovician and Silurian age, which give rise to brown earths, with some gleying. Soils in the wood are mainly complexes of brown earths and gleys, but have also been influenced by later drift deposits. Ground vegetation suggests that soils range from moderately acid to neutral/slightly base rich over lower slopes, the valley floor and wet flushes associated with surface drainage from land to the south and west. Along the valley floor, soils are poorly draining. The MLURI climate map identifies the area as warm lowland, being exposed with extremely mild winters.

### Description

Most of the glen woodland is ancient woodland however because it has been greatly modified in the past, by the planting of exotic conifers, rhododendron and laurel it is classified as a Planted Ancient Woodland Site (PAWS). North Aldouran Wood (the northern arm) is of more recent origin, although a part is classified as being Long Established Woodland of Plantation Origin (LEPO) and is therefore included in the Ancient woodland inventory. Much of the woodland has retained its characteristic ground flora, despite the planting of exotic broadleaves and conifers over the years. The woodland now contains a good mixture of old and mature broadleaves, dominated by sycamore and beech, but with a proportion of ash alder and elm. There are also occasional oak, cherry and sweet chestnut trees, as well as a few exotic conifers including Norway and Sitka spruce and Western hemlock. There is frequent regeneration of sycamore seedlings as well as occasional beech, but only few groups of more advanced regeneration. The upper, flatter terraces, such as the top slopes along the track to Glenhead Farm and North Aldouran Wood are now planted with mixed native broadleaves. Previous rhododendron control has been a success with some of these areas showing the first signs of recovery. Where gaps in the canopy allow, there is occasional holly, elder, rowan, elm and hazel regeneration scattered through the broadleaved area along with juvenile sycamore trees.

The ground flora is at its most colourful in May, when the wood is carpeted with bluebells and ferns, greater woodrush and ramsons. Greater woodrush, bluebells, male fern and lady fern dominate upper and drier slopes. Wild garlic, dog's mercury and other associated species spread along the valley floor and wetter slopes of northerly aspect. Other commonly found species include lesser celandine, wood sorrel, wood anemone, wood avens, dog violet, enchanter's-nightshade, agrimony, wood ruff, hedge woundwort, golden saxifrage and the relatively rare muscatel. The shrub layer features honeysuckle, wild raspberry and bramble. Wetland and common meadow and hedgerow plants occur around boundaries and in wet hollows. Where there is sufficient light, bluebells and ferns grow strongly within and around the margins of conifer areas. Mature trees, veteran trees and deadwood habitats support a range of mosses, including mouse-tail, forest star and Hypnum species on the tree trunks, as well as liverworts and lichens, some of which are relatively uncommon.

### Other Habitats

The burn running through the glen provides an aquatic/ riparian habitat, which is heavily shaded in parts by dense conifer stands along the valley floor. It is thought that the burn may have at one time supported otter, hence the name Aldouran Glen - 'Glen of the Otter'.

### Wildlife

Numerous bird species inhabit and visit Aldouran Glen wood, including wren, long-tailed tit, coal tit, robin, treecreeper and chaffinch.

---

Dragonflies have been observed in more open, sunny clearings.

Known mammals to frequent the wood include; roe deer and occasionally otter. Red squirrels are often spotted from the community wildlife hide adjacent to the wetland. There is a badger sett flanking the north eastern slope of the glen.

#### Other Features

Compartment 2b contains a small quarry (disused), with a 30ft high cliff at one point and a wet swampy interior.

In the centre of the wood, the earthworks of an iron-age hill fort 'Kemps Grave' (probably dating from 500BC to 300AD) occupy a promontory overlooking the glen from the north. The fort is a scheduled monument, protected under the Ancient Monuments and Archaeological Areas Act 1979.

#### Site History

The neighbouring village is Leswalt, an odd name with unsure origins. Possible derivations for its name include 'llys gwellt' (Welsh) meaning 'grass court' or perhaps 'lios uillt' (Gaelic) meaning 'fort of the glen'.

The presence of non-native trees, rhododendron and laurel suggest that the glen was extensively landscaped at some point in its recent history, perhaps by Sir Andrew Agnew of Lochnaw in the early to mid-19th century.

The wood was acquired by the Woodland Trust in 1994 from the Forestry Commission. Since then, 4 ha of non-native conifers have been clear felled and replanted in 2002 with mixed native broadleaves with additional areas of conifers thinned. In addition, rhododendron has been cleared and the footpath network throughout the wood has been improved and extended.

#### Access Information

Although Dumfries and Galloway, in general, have an abundance of accessible woodland, the Rhins don't. Aldouran Glen is one of the few woodlands in the area where access is welcomed. The woodland is often quiet. The majority of users being local residents, and school children of the neighbouring Leswalt village and outlying communities.

There are four entrances to the wood, one in the south east corner, off the B7403, the second from the car park at the western end of the wood at the top of the hill and the third off the private track to the north of the wood. The fourth entrance provides direct access to the village over the Community wetland area between Leswalt and the wood.

Within the wood there is a network of almost 2km of trodden bare earth path with steps at either end and up to the hill fort from the south.

The car park can hold up to 4 cars.

Management access to the site is good. As well as the public road along the southern boundary and the vehicle track along the eastern boundary there is also the right of vehicular access along the private track along the northern boundary. However within the site vehicular access is difficult. There are no internal vehicle tracks, but flatter terraces including sub-compartments 1c and 2b and the extreme eastern end of 1a are accessible to forestry machinery from road- or track-side. Other areas can only be worked manually with any timber extraction using winches, whilst steep slopes and watercourses at the glen-head effectively mean it is inaccessible for machine working purposes.

## 3.0 PUBLIC ACCESS INFORMATION

### 3.1 Getting there

#### By bus

Nearest bus stop: Leswalt Village Store (0.6 of a mile). Service 408, runs regularly from Stranraer. Further information about public transport is available from Traveline [www.travelinescotland.com](http://www.travelinescotland.com) or phone 0871 200 2233.

#### By car

From Stranraer head north on the A718 (Lewis Street). At the roundabout take the first exit on to Sun Street (B737) and continue for almost a mile. Turn left onto Scheuchan Street (A718) and continue for a mile and a half. At the next roundabout take the second exit on to the B798 (Bridge of Aldouran), following signs for Bridge of Aldouran for half a mile. Turn left on to Glen Road (B7043), then after three quarters of a mile turn right on to an unnamed road.

The car park is just over 300 yards on the right, by the entrance, and has room for four cars. (All measurements are approximate).

### 3.2 Access / Walks

Aldouran Glen is located just over half a mile west of Leswalt Village and can be accessed via four entrances: one in the south east corner off the B7403; the second from the car park at the western end of the wood at the top of the hill; the third off the private track to the north of the wood; and the fourth via direct access from the village through the community-run wetland gardens. ([www.leswaltwetlandgarden.org.uk](http://www.leswaltwetlandgarden.org.uk))

Within the wood is around a mile and a quarter of soft paths with views along the glen and to small waterfalls. A bridge over the burn and steps provide access up to the northern leg of the wood, to the hillfort and to views over Loch Ryan. The paths are narrow and slippery in places and due to regular heavy rainfall can become very muddy for much of the year so suitable footwear is recommended. There are also two or three quite steep sections, especially down from the car park and up to the hillfort after crossing the bridge over the burn.

A children's environmental Arts Trail is a recent addition to the site, and is accessible via Aldouran Glen Wetland Garden. The trail starts at the gate leading into Aldouran Wetland Garden and provides a short circular connecting route through the wetland area and the woodland. The trail has been designed especially for children and families. After a few hundred metres the trail links up with the existing path network. Along the trail several animal carvings wait to be discovered.



## 4.0 LONG TERM POLICY

The long term aim is to restore this PAWS site by securing and enhancing the ancient woodland communities on site and maintaining a continuous cover of broadleaves, through recruitment of natural regeneration or replanting where gaps of sufficient size allow. The threat of over shading from remaining conifer stands will be gradually removed through selective thinning to preserve the remnant ground flora.

It is anticipated that the outbreak of ash dieback in the UK will eventually reach Aldouran Glen. Ash is scattered throughout the woodland and often intimately mixed with other trees. It is anticipated that several tree species will take advantage of the reducing ash component within the woodland canopy and colonise vacant areas as they occur. The long term policy is therefore to manage the woodland by minimum intervention. As they already constitute a major proportion of the woodland canopy, sycamore and beech will be retained, except where they pose a threat to the Ancient Woodland plant communities. Tree species which support similar ecological communities to ash will be encouraged to regenerate to provide a suitable alternative host.

Invasive non-native species such as: *Rhododendron ponticum* and laurel will be greatly reduced across the site.

Existing on-site access facilities will be maintained in line with demand. Access and interpretation will be maintained and enhanced as required.

The Scheduled Ancient Monument, Kemps Grave will continue to be maintained in its current (2016) condition.

*Rhododendron ponticum* and any invasive woody regeneration will continue to be actively controlled to prevent deterioration, as advised by Historic Scotland.

## 5.0 KEY FEATURES

The Key Features of the site are identified and described below. They encapsulate what is important about the site. The short and long-term objectives are stated and any management necessary to maintain and improve the Key Feature.

### 5.1 Planted Ancient Woodland Site

#### Description

A large proportion (c. 5ha) of the southern section of Aldouran Glen (cpt 1a, 1c and 2a (part)) is classified as ASNW although much of this area has been planted with exotics in the early to mid-19th century. Where broadleaved cover has remained, the ground flora is indicative of this continuity of woodland cover with many AW indicator species, wood sorrel, greater woodrush and bluebells present. There are good levels of dead wood within these areas due to the difficulties in gaining machine access. Compartment 1b contains more recent spruce planting and is classified PAWS. The ground flora here is sparse. Regular light thinning of the conifers over the last few years has seen wood sorrel and bluebell begin to gradually re-colonise these areas. To the north of ASNW, up on the flatter terraces a small area (<1ha) is classified as Long Established Woodland of Plantation Origin (LEPO). This forms part of cpt 2b, which was restocked in early 2002 with mixed native broadleaves. A small tributary to the Sole burn flows through the middle of the wood which adds to the floral diversity of the site with ramsons and dogs mercury spreading outwards from the burn edge to carpet the lower slopes of the glen. NVC classification - W9/W10 (lowland mixed broadleaved woodland) with W7 (wet alder ash woodland) along the valley floor. W9 type occurs over wet flushes/lower slopes of northern aspect and grades into W10 (upper slopes and terraces and slopes of southern aspect).

Compartment 2b is an area of established secondary woodland, planted in 2002 with mixed native broadleaves (oak, ash, birch, rowan, hazel, hawthorn and occasional yew) following clear felling of the spruce crop. NVC classification - W10/W11 (lowland mixed broadleaved woodland). A gently undulating area located on the north of the Glen, atop a steep south facing slope. Some semi-mature trees were left standing, mostly sycamore, as well as beech and ash. Understorey consists of thick brambles, broom and gorse in places. Naturally regenerated sycamore and birch occurs in some areas. The restock site buffers the area of ASNW to the south and provides the opportunity for gradual expansion of native ground flora.

#### Significance

In a local context, while there are two or three larger isolated pockets of LEPO woodland, Aldouran Glen is one of only five small (<10ha), scattered Ancient Woodland Sites on The Rhins and is the only one shown on the 1750 maps with the other four first shown on the 1860 maps. It is therefore a hugely important local habitat.

#### Opportunities & Constraints

**Opportunities-**To gradually remove conifers to reduce the threat of over shading. Manipulation of the broadleaves species content will be difficult due to the high proportion of sycamore and beech, but there is scope to selectively favour more native species where regeneration occurs as well as in any restocking.

**Constraints-**The regeneration of rhododendron and spread of laurel represent a threat to natural regeneration of both native ground flora and tree species. Steep slopes create difficulties for management access, particularly to the head of the glen, which is inaccessible to machinery.

### **Factors Causing Change**

Ash dieback-which is becoming widespread throughout the UK (2016), infection by other tree diseases, invasive non-native tree species, invasive Rhododendron ponticum, and occasional wind damage.

### **Long term Objective (50 years+)**

To restore and secure the ancient woodland habitat and enhance existing AW communities by removing threats. Due to the intimate mixture of ash throughout the site, and the impact of ash dieback, non- native tree species (sycamore and beech) will be tolerated, where they do not impact upon Ancient Woodland plant communities. Develop a healthy ground flora with established ancient woodland characteristics throughout the wood. Reduce invasive non-native Rhododendron and laurel.

### **Short term management Objectives for the plan period (5 years)**

Enhance and expand Ancient Woodland plant communities by selective thinning to waste some of the conifers in PAWS zone 3 (cpt 1b) during the period of this plan - by 2021, and controlling the regeneration of rhododendron and spread of laurel throughout the site. Survey site in 2016 for rhododendron regeneration and carry out a programme of removal/control as required. Encourage and favour native tree regeneration throughout the site. Protect and encourage Ancient Woodland communities throughout the site.

## 5.2 Informal Public Access

### Description

Although the woodland is fairly isolated, it is used regularly by local residents. The development of the Aldouran Wetland Garden has led to increased use of the woodland and wetland sites for school visits and locally organised events. There are approximately 2km of existing internal soft paths, with internal views along the glen and to small waterfalls including a bridge over the burn and steps up to the northern leg of the wood and hillfort. The wood is accessed from various directions but the majority of visitors enter from the main car park entrance to the west at the head of the glen. The car park has room for 4 cars. The paths are narrow and slippery in places and regular heavy rainfall means they can become very muddy at times.

A children's environmental Arts Trail is a recent addition to the site. The trail starts at the gate leading into Aldouran Wetland Garden and provides a short circular connecting route through the wetland area and the woodland. The trail has been designed especially for children and families. After a few hundred metres the trail links up with the existing path network. The current level of public use is defined as WT Access Category B (Regular usage: 5-15 people per day).

### Significance

The woodland path provides an attractive walk in an area where there are few other opportunities. The woodland is c0.5km from the centre of the village of Leswalt. Providing public access to woods contributes to the Trust's objective of increasing peoples enjoyment and understanding of woodland.

### Opportunities & Constraints

#### Opportunities

For information provision in association with hill fort interpretation and site interpretation is proposed during the period of this plan-by 2021.

Continue to working in partnership with Aldouran Wetland Garden and Leswalt Community Association re: opportunities for increasing access and visitor experience.

#### Constraints

The steep sided glen and narrow path makes access difficult.

### Factors Causing Change

Occasional wind damage. Other - deterioration of steps and narrowing of paths due to leaf litter and soil erosion, Fly tipping

### Long term Objective (50 years+)

The site continues to offer the opportunity for quiet informal recreation, principally local users.

### Short term management Objectives for the plan period (5 years)

Access provision is in keeping with WT Access Guidelines and site access coding. Reviewed with the management plan every 5 years or if a significant change in local circumstances (e.g. housing development)

### 5.3 Archaeological Feature

#### Description

Promontory Fort, known as Kemps Graves, Glenhead of Aldouran. The fort measures approximately 50m NW-SE by 60m NE-SW. Later prehistoric defended settlement dating from the period c. 500BC-AD 400.

#### Significance

Scheduled Ancient Monument. The arrangement of the ramparts and ditches is unlike that of any of the prehistoric fortifications on the Rhins.

#### Opportunities & Constraints

##### Opportunities

To further research history of site with the potential to develop interpretation material

##### Constraints

No heavy machinery should be used in this part of the site. Vegetation, which could damage the monument should not be allowed to become re-established.

#### Factors Causing Change

Natural regeneration of trees and rhododendron

#### Long term Objective (50 years+)

To maintain archaeological feature in line with Historic Scotland guidance, which currently states that regeneration of trees and shrubs should be controlled.

#### Short term management Objectives for the plan period (5 years)

Inspect fort every 2 years (inspected 2015). If greater than 30 stems/ha over monument greater than 50cm tall then clear regeneration. Monitor for potentially harmful Rhododendron, bracken and bramble establishment.

---

## 6.0 WORK PROGRAMME

Year	Type of Work	Description	Due By
------	--------------	-------------	--------

## APPENDIX 1: COMPARTMENT DESCRIPTIONS

Cpt No.	Area (ha)	Main Species	Year	Management Regime	Major Management Constraints	Key Features Present	Designations
1a	6.92	Sycamore	1850	Min-intervention	Gullies/Deep Valleys/Uneven/Rocky ground, Mostly wet ground/exposed site, People issues (+tve & -tve), Very steep slope/cliff/quarry/mine shafts/sink holes etc	Informal Public Access	Planted Ancient Woodland Site
<p>A dense stand of mature and semi-mature trees, mostly sycamore, with elm, ash, alder, horse chestnut and beech. A small group of mainly Sitka spruce is located at the eastern end of the compartment with occasional other conifers scattered throughout including dawn redwood. Within the sparse shrub layer there is occasional hazel and juvenile ash and sycamore regeneration. There is occasional <i>Rhododendron ponticum</i> scattered throughout. Along the eastern boundary there is a dense stand of laurel. There is occasional tree regeneration; mixed but predominated by sycamore. A burn forms the northern boundary of the compartment, whilst a track and road form the western and southern boundaries, respectively. The ground flora varies, from wood sorrel, greater woodrush, ramsons and dog's mercury- which fan out along the banks of the burn and smaller water courses, to ferns and bluebells in the more open areas. Ferns including; broad buckler fern and scaly male fern are concentrated towards the centre of the compartment. Other species are often found these include; wood anemone, lesser celandine, wood stitchwort, opposite leaved golden saxifrage and woodruff. Fallen and standing dead trees provide deadwood habitat. On the eastern boundary there is a community managed wildlife hide, red squirrel feeding station, a small informal outdoor teaching area and a children's Environmental Art Trail- which is accessible to all. The wildlife hide has views over the community wetland and up into the wood-a good area for spotting red squirrel, Odonata species, amphibians and birds.</p>							
1b	0.37	Norway spruce	1960	PAWS restoration	Archaeological features, Gullies/Deep Valleys/Uneven/Rocky ground, Mostly wet ground/exposed site, No/poor vehicular access within the site	Informal Public Access	Planted Ancient Woodland Site

<p>Situated to the northwest of compartment 1, this small patch of drawn up, mature Norway spruce trees lies on flat ground near the burn. A rare understorey of hazel with juvenile sycamore exists, and there is occasional sycamore regeneration. Felled trees, brash and old stumps provide deadwood habitat for; insects, birds; such as wrens and woodpeckers, and sustain abundant and varied mosses (10 species noted), including Eurhynchium praelongum, Thuidium tamariscinum and Isoetecium myosuroides. Ground flora consists partly of ancient woodland species such as; wood-sorrel, ramsons, dog's mercury, yellow pimpernel, opposite leaved golden saxifrage, herb Robert and bluebells, as well as opportunist plants such as: nettle and cleaver.</p>							
1c	0.20	Oak (sessile)	2002	Wood establishment		Informal Public Access	Planted Ancient Woodland Site
<p>This flat area, at the head of the glen, is a small area of established native mixed broadleaves, planted in early 2002. Some semi-mature and mature native trees were left standing, mainly at the perimeter of the site. These include; sycamore, sweet chestnut, ash and elm. Apart from the new planting, juvenile sycamore and sweet chestnut make up the understorey and there is also occasional natural regeneration of this species. Ground flora is prolific in this often sunny, open area, consisting mainly of bluebells, red campion, herb Robert and to a lesser degree rushes, grasses, foxgloves, broom and brambles. Dragonflies frequent the area.</p>							
2a	2.04	Beech	1850	Min-intervention	No/poor vehicular access within the site, Sensitive habitats/species on or adjacent to site, Very steep slope/cliff/quarry/mine shafts/sink holes etc	Informal Public Access	Planted Ancient Woodland Site, Scheduled Ancient Monument
<p>Most of this compartment is a steep bank to the north of the burn, rising to a plateau of relatively flat ground. There are mature and semi-mature mixed broadleaves, mainly sycamore, with frequent beech and some elm, oak, sweet chestnut, alder, birch and ash. There are sporadic clumps of younger, natural regenerated, trees; predominately comprised of birch and sycamore. Rhododendron ponticum, of varying size, is scattered in small clumps and singletons throughout. The cover of ground flora varies depending on canopy cover. Dominant species include broad buckler and male ferns, greater woodrush, grasses and bluebells. There is a currently unused badger sett, which spreads north into 2b. A SAM hill fort is located in the centre of the compartment at the top of the slope. Within the boundary of the hillfort is a veteran rowan coppice.</p>							
2b	3.83	Birch (downy/silver)	2002	Wood establishment	Sensitive habitats/species on or adjacent to site	Informal Public Access	Planted Ancient Woodland Site



A relatively flat area, to the north of the glen, this restock site was planted in early 2002 with mixed native broadleaves. Some semi-mature trees were left standing, mostly sycamore, as well as beech and ash. Understorey consists of thick brambles, broom and gorse. There is abundant natural regeneration in some places consisting mainly of; sycamore and birch. *Rhododendron ponticum*, of varying size, is scattered in occasional small clumps and singletons throughout, especially near to the Hill Fort. There is a variety of sporadic ground flora, dominated by: honeysuckle, grasses, brambles and rushes, with rare bluebells, herb Robert, ground ivy and red campion. Over ten mosses were identified, including; *Polytrichum commune*, *P. formosum*, and *Mnium hornum*. Abundant brash and some fallen trees provide deadwood habitat. The south eastern border has some semi-mature and mature trees as well as a drystone dyke. The northern boundary consists of a leggy, semi-mature hedge of a variety of trees and shrubs. There is a disused quarry to the northeast of the site. The disused badger sett in 2a extends into the south of this sub-compartment.

---

**Appendix 2: Harvesting operations (20 years)**

Forecast Year	Cpt	Operation Type	Work Area (ha)	Estimated vol/ha	Estimated total vol.
2020	1b	Thin	0.20	20	4
2020	1b	Thin	0.20	20	4

## GLOSSARY

### **Ancient Woodland**

Ancient woods are defined as those where there has been continuous woodland cover since at least 1600 AD. In Scotland ancient woods are defined strictly as sites shown as semi-natural woodland on the 'Roy' maps (a military survey carried out in 1750 AD, which is the best source of historical map evidence) and as woodland all subsequent maps. However, they have been combined with long-established woods of semi-natural origin (originating from between 1750 and 1860) into a single category of Ancient Semi-Natural Woodland to take account of uncertainties in their identification. Ancient woods include Ancient Semi-Natural Woodland and plantations on Ancient Woodland Sites (see below). May support many species that are only found in ancient woodland.

### **Ancient Semi - Natural Woodland**

Stands in ancient woods defined as those consisting predominantly of native trees and shrubs that have not obviously been planted, which have arisen from natural regeneration or coppice regrowth.

### **Ancient Woodland Site**

Stands in ancient woods that have been converted to plantations, of coniferous, broadleaved or mixed species, usually for timber production, including plantations of native species planted so closely together that any semi-natural elements of the understorey have been suppressed.

### **Beating Up**

Replacing any newly planted trees that have died in the first few years after planting.

### **Broadleaf**

A tree having broad leaves (such as oak) rather than needles found on conifers (such as Scots pine).

### **Canopy**

The uppermost layer of vegetation in a woodland, or the upper foliage and branches of an individual tree.

### **Clearfell**

Felling of all trees within a defined area.

### **Compartment**

Permanent management division of a woodland, usually defined on site by permanent features such as roads. See Sub-compartments.

### **Conifer**

A tree having needles, rather than broadleaves, and typically bearing cones.

### **Continuous Cover forestry**

A term used for managing woods to ensure that there are groups or individual trees of different ages scattered over the whole wood and that some mature tree cover is always maintained. Management is by repeated thinning and no large areas are ever completely felled all at once.

### **Coppice**

Trees which are cut back to ground levels at regular intervals (3-25 years).

### **Exotic (non-native) Species**

Species originating from other countries (or other parts of the UK) that have been introduced by humans, deliberately or accidentally.

### **Field Layer**

Layer of small, non-woody herbaceous plants such as bluebells.

### **Group Fell**

The felling of a small group of trees, often to promote natural regeneration or allow planting.

### **Long Term Retention**

Discrete groups of trees (or in some cases single trees) that are retained significantly past their economic felling age. Operations may still be carried out within them and thinning is often necessary to maintain stability.

### **Minimum Intervention**

Areas where no operations (such as thinning) will take place other than to protect public safety or possibly to control invasive exotic species.

### **Mixed Woodland**

Woodland made up of broadleaved and coniferous trees.

### **National vegetation classification (NVC)**

A classification scheme that allows an area of vegetation to be assigned to the standardised type that best matches the combination of plant species that it contains. All woodlands in the UK can be described as being one of 18 main woodland types (W1 - W18), which principally reflect soil and climatic conditions. For example, Upland Oakwoods are type W11, and normally occur on well drained infertile soils in the cooler and wetter north and west of Britain. Each main type can be subdivided into numerous subtypes. Most real woods contain more than one type or sub-type and inevitably some woods are intermediate in character and can't be properly described by any sub type.

### **Native Species**

Species that arrived in Britain without human assistance.

### **Natural Regeneration**

Naturally grown trees from seeds falling from mature trees. Also regeneration from coppicing and suckering.

## **Origin & Provenance**

The provenance of a tree or seed is the place where seed was collected to grow the tree or plant. The origin is the geographical location within the natural range of a species from where seeds/tree originally derives. Thus an acorn collected from a Turkey oak in Edinburgh would have an Edinburgh provenance and a southern European origin.

## **Re-Stocking**

Re-planting an area of woodland, after it has been felled.

## **Shrub Layer**

Formed by woody plants 1-10m tall.

## **Silviculture**

The growing and care of trees in woodlands.

## **Stand**

Trees of one type or species, grouped together within a woodland.

## **Sub-Compartment**

Temporary management division of a compartment, which may change between management plan periods.

## **Thinning**

The felling of a proportion of individual trees within a given area. The remaining trees grow to fill in the space created.

## **Tubex or Grow or Tuley Tubes**

Tubes placed over newly planted trees or natural regeneration that promote growth and provide protection from animals such as rabbits and deer.

## **Weeding**

The control of vegetation immediately around newly planted trees or natural regeneration to promote tree growth until they become established. Either by hand cutting or with carefully selected weed killers such as glyphosate.

## **Windblow/Windthrow**

Trees or groups of trees blown over (usually uprooted) by strong winds and gales.