

Forestry Commission  
**ARCHIVE**

FOR  
REFERENCE ONLY

*Treasures*

FORESTRY COMMISSION
LIBRARY
CASE 2072-53
SHELF (047.1)(410)

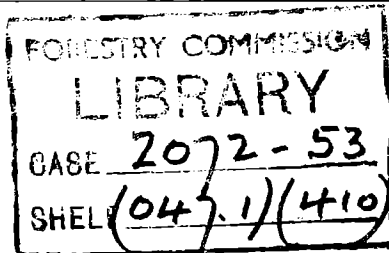
FORESTRY COMMISSION

*Twenty-second*  
~~Nineteenth~~  
Annual Report of the  
Forestry Commissioners  
for the Year ending  
September 30th  
~~1938~~  
1941

---

*Ordered by The House of Commons to be Printed*  
*6th June 1939*

---



LONDON

~~PUBLISHED BY HIS MAJESTY'S STATIONERY OFFICE~~

~~To be purchased directly from H.M. STATIONERY OFFICE at the following addresses—~~  
~~York House, Kingway, London, W.C.2; 120 George Street, Edinburgh 2; 27~~  
~~26 York Street, Manchester 1; 1 St. Andrew's Crescent, Cardiff;~~  
~~80 Chichester Street, Belfast;~~  
~~or through any bookseller~~

~~1939~~

~~128~~

~~Price 1s. 6d. net~~

NOTE.- Owing to war-time difficulties  
this Report was not printed.

C O N T E N T S.

	<u>Page</u>
THE late Sir Hugh Murray	1
FOREST POLICY	1
General	1
Post-War Policy	2
Finance	3
Commissioners' Estates	5
Number of Forests	5
Utilisation of Ground	5
Silvicultural Operations	6
Holdings and Estate Management	6
Other Tenancies	6
Land Acquisition	7
Planting Programme	7
State Forests	7
Assistance to Local Authorities and Private Owners	8
Utilisation of Home Grown Timber	8
Amenity	8
New Forest	9
Private Forestry	9
National Forest Parks	9
Argyll	10
Dean	10
Snowdonia	10
Imperial Forestry Institute	10
The Weather	10
OPERATIONS - <del>FOREST</del> YEAR 1940-1941	11
The Forestry Fund	11
General Organisation	12
Forestry Operations	12
Acquisition of Land, Buildings and Standing Timber	12
Land acquired by Lease, Feu and Purchase...	13
Forestry Commission Units	14
England and Wales	14
Scotland	17
Cultural Operations	19

	<u>Page</u>
Cost of Planting . . . . .	20
Nurseries . . . . .	20a
Seed Supply . . . . .	21
Forest Fires . . . . .	22
Advances for Afforestation Purposes . . . . .	23
Education . . . . .	23
Apprentices' Schools . . . . .	23
Grants to Universities, Colleges, etc. . . . .	23
Imperial Forestry Institute . . . . .	25
Research and Experiment . . . . .	25
Production . . . . .	26
Nursery and Plantation Work . . . . .	26
Entomology and Mycology . . . . .	26
Botany and Soil . . . . .	26
Advisory Committee on Forest Research . . . . .	27
Utilisation . . . . .	27
Agency and Advisory Services . . . . .	27
Special Services . . . . .	27
Forest Workers' Holdings . . . . .	28
Income . . . . .	29
EMPLOYMENT IN THE COMMISSION'S FORESTS . . . . .	31
APPENDIX - PLANTATIONS - YEAR ENDED 30th SEPTEMBER, 1938 . . . . .	32
England and Wales . . . . .	32
Scotland . . . . .	37
Summary . . . . .	41

TWENTY-SECOND ANNUAL REPORT  
of the  
Forestry Commissioners  
for the  
Year ending September 30th 1941.

-----

The late Sir Hugh Murray.- The Commissioners record with the deepest regret the loss of their colleague Sir Hugh Murray, C.I.E., C.B.E., who died on 9th February, 1941. After a distinguished career in the Indian Forest Service Sir Hugh (then Mr. Hugh Murray) was appointed Assistant Commissioner for England and Wales on the inception of the Department in 1919 and in that capacity he served for four years, after which he was a Commissioner for 10 years until compelled by failing health to give way to a younger man. His record was one of great loyalty and keenness under successive Chairmen.

Forest Policy.

General. The Headquarters of the Commission remained at Bristol throughout the year.

The Timber Supply work of the Commission was transferred to the Ministry of Supply on 1st February 1941, under an Order in Council which took the form of a new Defence Regulation No. 67a. A full account of the Commissioners' supply work up to the date of transfer is appended to this Report. *Seemingly not written* 2

Apart from the above there are no events of outstanding importance to report.

The Timber Production Department of the Ministry of Supply continued to work and expand the existing sawmill and mining timber operations in State Forests and standing timber was made available

for this purpose. The quantities and values of sales to the  
FROM SEPTEMBER 1939 TO SEPTEMBER 1941. CUBIC FEET  
Timber Production Department were as follows: Saw timber: 7,835,000  
hardwoods 2,140,000 cu. ft. ~~(£375,800)~~; softwoods 5,695,000 cu. ft. ~~(£347,200)~~;  
Pitwood, etc. 1,347,000 cu. ft. (£375,800). For the most part the thinnings

which were necessary in plantations were carried out by direct  
Commission labour. The area so treated <sup>DURING THE YEAR</sup> was 4,081 acres. A  
(IN THE PREVIOUS FOREST YEAR 4,834 ACRES WERE THINNED).  
considerable amount of useful produce was secured in this way.

Maintenance of plantations (including the thinnings referred  
to in the last para.) received adequate attention. Protection  
against fire hazards was a matter of great anxiety in view of  
enemy action and the vulnerable state of large areas of coniferous  
plantations in the thicket stage. Methods of protection and fire-  
fighting were systematically developed mainly in the directions of  
breaking up the larger blocks of plantations by cleared strips and  
of improving accesses by brashing and, as regards fire-fighting,  
by the provision of small portable pumps and water. As a result  
the fire losses from enemy action were surprisingly small.

Planting was maintained at a high level (26,667 acres) during  
the winter of 1940-41 and represented very little falling off from  
the best accomplished in the immediate pre-war years.

Similarly, nursery stocks were well-maintained although the  
sowing programme had to be curtailed in some respects owing to  
lack of seed which normally is secured from the Continent of  
Europe.

Post-War Policy. The Commissioners continued to give  
attention to post-war problems with a view to formulating proposals  
for submission to Government.

The total area of plantable land acquired during the year  
amounted to 12,450 acres compared with 31,634 acres in 1940, the  
stocks of transplants in the nurseries have been greatly increased,  
the area planted in 1941 was 26,667 acres compared with 27,288  
acres in 1940, and the number of forest workers' holdings  
established was 16.

### Finance.

The sections dealing with Finance and also the Forestry Fund (p. 11 et seq) are confined to the operations of the Forest Management Department of the Forestry Commission, and exclude all payments and receipts relating to the Timber Supply Department, the funds for which were provided by the Ministry of Supply.

The balance in the Forestry Fund at the commencement of the forest year was £363,006. Receipts from Parliamentary Votes (£400,000) and Forestry Operations, etc. (£569,771) amounted to £969,771. Payments amounted to £988,290, so that the balance in the Fund at 30th September, 1941, was £344,487. The progress of payments and receipts is indicated in the table below.



Forestry Fund: Payments and Receipts.

Year ending 30th September.	Payments.			Receipts.			Net Payments.		
	Proposed.	Actual.	Excess (+) Deficit (-)	Proposed.	Actual.	Excess (+) Deficit (-)	Proposed.	Actual.	Excess (+) Deficit (-)
First decade: 1920-29 (10½ finan- cial years)	£ -	£ 4,502,018.	£ -	£ -	£ 851,484	£ -	£ 3,892,000	£ 3,650,584	£ - 241,466
Second decade: 1930-39	£ 8,423,000	£ 7,926,092	£ - 496,907	£ 1,751,000	£ 1,821,352	£ + 90,352	£ 6,692,000	£ 6,104,241	£ - 587,759
Third decade: 1940	£ 1,012,000	£ 822,217	£ - 189,783	£ 349,000	£ 363,198	£ + 14,198	£ 665,000	£ 459,019	£ - 205,981
1941	£ 955,200	£ 938,290	£ + 35,090	£ 461,700	£ 569,771	£ + 108,071	£ 495,500	£ 418,519	£ - 74,981
Total ..							£ -	£ 10,632,315	£ -

Commissioners' Estates.

The following statement presents a general view of the properties under the charge of the Commissioners at 30th September, 1941, and a summary of the main silvicultural operations which have been undertaken

		<u>England and Wales.</u>	<u>Scotland.</u>	<u>Total Great Britain.</u>
<u>Number of Forests:</u>				
At Beginning of year	...	134	112	246
At end of year	... ..	137	114	251
<u>Utilisation of Ground (acres):</u>				
<u>Forest Lands:</u>				
Acquired Plantations	...	52,000	11,000	63,000 <sup>δ</sup>
Planted by Forestry Commission	... ..	258,000	151,000	409,000 <sup>*</sup>
To be planted	... ..	145,000	142,000	287,000
		<u>455,000</u>	<u>304,000</u>	<u>759,000</u>
Nurseries	... ..	800	400	1,200
Agricultural	... ..	25,500	19,700	45,000
Forest Workers' Holdings (including out-run)	... ..	11,100	3,400	14,500
Unplanted and Miscellaneous...	... ..	<u>132,000</u>	<u>275,800</u>	<u>407,800</u>
		<u>684,200</u>	<u>602,800</u>	<u>1,287,000</u>

<sup>δ</sup> After adjustments due to fellings and fires.

<sup>\*</sup> The total area planted, including replacements was 423,053 acres. (see page 7).

	<u>England and Wales</u>	<u>Scotland</u>	<u>Total Great Britain</u>
<b>Silvicultural Operations during Year (Acres):</b>			
Planted or Sown ... ..	17,356	9,511	26,867
Naturally Regenerated ... ..	517	-	517
Underplanted ... ..	207	35	242
Thinned ... ..	3,089	992	4,081
Felled ... ..	5,221	496	5,717

**Holdings and Estate Management:**

**Number of Forest Workers'  
Holdings established:**

During year ... ..	15	1	16
At end of year ... ..	1,096	390	1,486

**Other Tenancies:**

**Agricultural Holdings:**

Under £20 per annum ... ..	835	418	1,253
Over £20 per annum ... ..	423	223	646
Foresters' Houses ... ..	124	70	194
Cottages ... ..	381	305	686
Residential and Sporting Easements, Permissions, Minerals, etc. ... ..	304	263	567
Site Rents and Fees ... ..	2,095	292	2,387
	-	251	251
	<u>4,162</u>	<u>1,822</u>	<u>5,984</u>

It will be observed that during the year the number of forest units has increased by 5 from 246 to 251. Of these new units 3 are in England and Wales and 2 in Scotland.

Including transferred Crown woodlands the total area of land which has been acquired increased by 15,000 acres from 1,212,000 acres to 1,227,000 acres and the plantable area by 13,000 acres from 746,000 acres to 759,000 acres.

Compared with the previous year the changes in silvicultural operations are planting and sowing 26,867 acres against 27,288 acres, area thinned 4,081 acres against 4,834 acres, and area felled 5,717 acres against 5,793 acres.

Land Acquisition.

Acquisitions during the year amounted to 15,700 acres net,  
of which 12,450 acres were classified as plantable.

Acquisition of Plantable Land.

Year ending 30th September.	By Lease or Feu.	By Purchase.	Total.		
			Actual.	Acland Proposals.	Excess (+) Deficit(-)
<b>First decade:</b>	Acres.	Acres.	Acres.	Acres.	Acres.
1920-29	156,759	153,471	310,230	402,000	- 91,770
<b>Second decade:</b>					
1930-39	60,057	284,700	344,757	343,000	+ 1,757
<b>Third decade:</b>					
1940	24,396	7,258	31,634	34,300	- 2,666
1941	2,526	9,924	12,450	34,300	- 21,850
<b>Total</b>	<b>243,738</b>	<b>455,353</b>	<b>699,071</b>	<b>813,600</b>	<b>- 114,529</b>

Planting Programme.

State Forests.

The area planted during the year was 26,867 acres.

Area Planted.

Year ending 30th September.	Proposed to be Planted.	Actually Planted.			Excess (+) Deficit(-) on Decade or Annual Programme.
		New Planting.	Replac- ements.	Total.	
<b>First decade:</b>	Acres.	Acres.	Acres.	Acres.	Acres.
1920-29:					
Conifers	150,000	126,444	4,316	130,760	- 19,240
Hardwoods	unspecified	6,865	1,146	7,511	
				138,271	
<b>Second decade:</b>					
1930-39	"	218,064	12,543	230,607	
<b>Third decade:</b>					
1940		26,411	877	27,288	
1941		<del>25,644</del> 25,644	<del>1,306</del> 1,223	<del>26,813</del> 26,867	
<b>Total</b>		<del>402,034</del> 401,913	<del>20,188</del> 20,105	<del>422,053</del> 423,033	

\* The area proposed to be planted was 25,000 acres per annum for 1930 and 1931, and a minimum of 20,000 acres per annum for 1932 to 1936. From 1937 onwards the proposals embraced the Special Areas programme. The general object in view was to increase the rate of planting as quickly as possible to 30,000 acres per annum.

The total area planted by the Commission to 30th September, 1941, was 423,033 acres, of which 390,617 acres consisted of conifers and 32,416 acres of hardwoods. New planting accounted for 402,928 acres and replacements, which included 8,789 acres replanted after damage by fire, for 20,105 acres. Details are given below.

		<u>Conifers</u>	<u>Hardwoods</u>	<u>Total.</u>
		acres	acres	acres
New planting	...	374,519	28,409	402,928
Replacements	...	16,098	4,007	20,105
Total	...	<u>390,617</u>	<u>32,416</u>	<u>423,033</u>

#### Assistance to Local Authorities and Private Owners.

The Commissioners have continued to assist planting by local authorities and private owners by means of grants and a proceeds-sharing scheme. The total area planted amounts to 134,607 acres, of which 4,427 acres were planted during the year. Particulars of the grants are given on page 23.

			Acres.
First decade:			
1920-29	...	...	72,856
Second decade:			
1930-39	...	...	53,006
Third decade:			
1940	...	...	4,318
1941	...	...	4,427
Total	...		<u>134,607</u>

#### Utilisation of Home Grown Timber.

The war demands have been firstly, for softwoods, such as pine and spruce on an overwhelming scale and, secondly, for good class hardwoods in particular oak and beech. The poor oak timber, of which there is relatively so much, has so far contributed very little to the country's pressing needs.

The Commissioners' stock of standing timber has been heavily depleted and out-turn of mining timber has reached new heights. So far as has been possible the Commissioners have adhered to a policy of not felling middle-aged or immature plantations because they constitute the sole reserve for providing mature timber within the next two or three generations.

#### Amenity.

The Joint Informal Committee of the Commissioners and the Council for the Preservation of Rural England met once during the year under review, further attention being given to Eskdale, Breckland, and Dartmoor. The post-war rehabilitation of woodlands also received the Committee's consideration, in particular reference being made to the small woods which play such an important part in the amenities of the countryside and to the great scarcity of softwoods which will entail an extension of conifer planting after the war.

The Commissioners have been criticised from time to time for their action in planting so great a proportion of soft-woods which are said to be less beautiful than hardwood trees. The war has justified their policy and there is no real reason why amenity and utility should conflict.

#### New Forest.

Mention was made in the last Report of the strong recommendations which the Commissioners had made to the various Planning Authorities that all development schemes should be carefully reviewed and that no claims should be established which were not in harmony with the Report of the Committee of Planning Officers.\* This action was rendered necessary because the war had unfortunately interrupted normal progress in completing planning schemes which are required to implement the recommendations contained in the Report of the Committee.

The war has led to abnormal demands for timber, and woodlands in and around the New Forest are being heavily depleted. No fears are felt with regard to those woods which are in the Commissioners' charge because these will be regenerated or replanted and maintained as woods, but many owners are selling land together with the timber on which it stands, and in such cases there is a real danger when the timber is cleared that the woodland sites will be lost to forestry. The importance of maintaining the rural character of the Forest is a matter on which the Commissioners have always laid much stress, and it is proposed to hold a further conference of representatives of the Planning Authorities concerned together with representatives of the New Forest Verderers, the New Forest Advisory Committee, and the Ministry of Health in order that measures for the protection of the Forest may be reviewed in the light of recent events.

#### Private Forestry.

At the end of the war there will be at least 1 million acres of woodland which will require regeneration either by replanting or by self-seeding. It is not yet possible to foresee the full extent of war fellings, but it is certain that one of the major issues which will arise will be the necessity for rehabilitating the existing woodlands and thereafter maintaining them in a state of productivity.

#### National Forest Parks.

The following table shows the extent, date of opening, and expenditure on Parks so far constituted:

	<u>Extent Acres</u>	<u>Date of Opening</u>	<u>Expenditure Incurred.</u>
Argyll National Forest Park	54,000	1937	£5,100
Dean National Forest Park	23,000	1939	£1,660
Snowdonia National Forest Park	20,000	1940	£2,670

\* "Protection of the New Forest". Report of the Committee of Planning Officers 1938-39. (H.M. Stationery Office).

The procedure with regard to the formation of National Forest Parks is now well established and the purpose is to provide the public with camping and recreational facilities in those forests to which they can safely be admitted. In the Commissioners' opinion the scheme is one which is worthy of fuller development, and since they already hold several other suitable areas the importance of this aspect of the Commissioners' activities will be in the forefront of any post-war planning.

Argyll. During the year certain of the public camping grounds remained closed under Defence of the Realm Regulations, but nevertheless the number of persons accommodated was greater than ever, the total being 32,080 as compared with the previous highest total of 30,870 persons in the 12 months immediately preceding the advent of the war.

Dean. There was a comparatively small number of visitors for whom temporary camping sites were provided on account of the fact that the Pavilion and regular camping ground had been taken over for war purposes.

Snowdonia. The newly-established Snowdonia Park was sampled by members of the Camping Club of Great Britain and although the total number of visitors was limited on account of the war the Commissioners received much commendation on the way the general facilities had been organised.

#### Imperial Forestry Institute.

The Commissioners continued to finance the research work commenced last year to enable valuable data to be collected from the many woods which are being clear-felled to meet war demands, data which would otherwise be irretrievably lost. The project aims primarily at correlation of growth and timber defects with site factors and the investigation includes details as to ecology, soil science, and pathology. Although the number of sites examined during the year was less than in the previous 12 months, largely on account of transport difficulties, it is believed that the better selection of sites should compensate for this.

Further arrangements were made for students of the Institute to visit Forestry Commission areas in place of the customary tours to the Continent.

#### The Weather.

The weather during the year again calls for special comment. During January and February there were very heavy falls of snow which severely hampered normal forestry operations, particularly in Scotland and in the North of England. This was followed by a prolonged drought in the Spring and early Summer, which led to inevitable losses in many newly-formed plantations, and there were periods of acute fire danger.

Operations - Forest Year 1940-1941.

The Forestry Fund.

The position of the Forestry Fund at 30th September, 1941, and at the same date in previous years is shown in Table I.

Table I.- Forestry Fund Account.

Year ending 30th September.	Balance from preceding Year	Receipts.			Payments (Table II, Heads A. to L).	Balance in Forestry Fund 30th September.
		Parliamentary Votes	From Forestry Operations, etc. (Table II Head Z).	Total		
	(1)	(2)	(3)	(4)	(5)	(6)
First decade: 1920-29	£ -	£ 4,000,000	£ 851,484	£ 4,851,484	£ 4,502,018	£ -
Second decade: 1930-39	-	6,126,800	1,821,852	7,948,652	7,926,093	-
Third decade: 1940	372,025	450,000	363,198	813,198	822,217	363,006
1941	363,006	400,000	569,771	969,771	988,290	344,487
<b>Grand Total</b>	-	10,976,800	3,606,305	14,583,105	14,236,613	-

Balances remaining in the Fund at 30th September include provision for the succeeding six months of the financial year.

An analysis of payments and receipts by Heads of Account is given in Table II. Compared with the previous year, total payments rose from £822,217 to £988,290, an increase of £166,073, mainly under the head of Forestry Operations. Receipts were greater by £206,573, and net payments were therefore £40,500 less than in 1940. It may be noted that Heads of Account differ in some respects from those under which estimates are presented to Parliament.

Table II is limited to sums actually expended or received, recorded by the heads of account under which they occurred. In subsequent tables, which are based on commercial practice, outstanding receipts and payments are brought to account, salaries and overhead charges (Heads A to D) are allocated to appropriate objects of expenditure, and adjustments are made between various heads of account in respect of produce used for forest purposes and transfers of land and buildings between the forests and forest workers' holdings.

Expenditure and income adjusted on the basis stated above are shown in Table IIa.



Table II. - Payments and Receipts by Heads of Account.

Year ending 30th September.	Payments.												Receipts Z.	Net Payments
	A. (1)	B. (2)	C. (3)	D. (4)	E. (5)	F. (6)	G. (7)	H. (8)	I. (9)	J. (10)	K. (11)	L. (12)		
First decade: 1920-29	£ 494,157	£ 22,676	£ 20,586	£ 74,424	£ 2,113,897	£ 207,624	£ 76,004	£ 26,927	£ 91,776	£ 23,342	£ 325,455	£ 4,502,018	£ 851,484	£ 3,650,534
Second decade: 1930-39	£ 714,346	£ 53,005	£ 49,485	£ 107,261	£ 6,352,917	£ 128,596	£ 73,538	£ 84,916	£ 57	£ 13,681	£ 468,306	£ 7,926,093	£ 1,321,852	£ 6,104,241
Third decade: 1940	£ 53,620	£ 6,397	£ 6,698	£ 13,565	£ 681,491	£ 9,660	£ 3,657	£ 9,433	£ 52	£ 762	£ 27,872	£ 822,217	£ 363,198	£ 459,019
1941	£ 76,984	£ 5,997	£ 5,996	£ 14,978	£ 844,949	£ 10,250	£ 4,261	£ 7,619	-	£ 174	£ 16,792	£ 986,290	£ 569,771	£ 416,519
Grand Total.	£ 1,343,114	£ 88,078	£ 82,765	£ 210,238	£ 10,678,194	£ 356,520	£ 157,550	£ 139,095	£ 91,985	£ 37,959	£ 838,435	£ 14,238,618	£ 2,606,305	£ 10,632,313

Table Iia. - Expenditure and Income.

Year ending 30th September.	Expenditure (Including Allocation of Column I).										Income.			
	A to D (1)	E. (2)	F. (3)	G. (4)	H. (5)	J. (6)	K. (7)	L. (8)	Total (9)	M. (10)	N. (11)	O. (12)	Total (13)	P. (14)
First decade: 1920-29	£ 582,178	£ 5,512,577	£ 241,694	£ 101,313	£ 79,650	£ 99,233	£ 61,299	£ 289,835	£ 4,485,649	£ 882,108	£ 27,515	£ 6,936	£ 916,559	£ 2,569,090
Second decade: 1930-39	£ 925,404	£ 7,056,560	£ 154,855	£ 97,998	£ 140,245	£ 11,912	£ 42,694	£ 565,871	£ 8,070,155	£ 1,770,014	£ 168,856	£ 4,673	£ 1,943,543	£ 6,126,618
Third decade: 1940 1941	£ 90,908 £ 82,117	£ 781,192 £ 923,624	£ 12,407 £ 12,673	£ 5,249 £ 8,879	£ 14,819 £ 12,480	£ 906 £ 777	£ 1,633 £ 926	£ 37,587 £ 24,479	£ 853,895 £ 979,858	£ 551,362 £ 555,129	£ 20,324 £ 20,905	£ 782 £ 647	£ 572,658 £ 576,581	£ 281,287 £ 403,157
Grand Total.	£ 1,680,602	£ 12,272,973	£ 421,629	£ 210,539	£ 217,194	£ 119,828	£ 106,584	£ 1,017,820	£ 14,389,537	£ 3,758,613	£ 271,600	£ 13,033	£ 4,009,251	£ 10,390,286
Percentage.		85.3	2.9	1.5	1.7	.8	.7	7.1	100	95.8	5.9	.3	100	

Subheads A to D - General Organisation.

Expenditure, £82,117.

The apparent decrease in expenditure compared with 1940 is due to the receipt of £18,340 (credited to Subhead A) on account of the pension liability of staff loaned to the Ministry of Supply. Gross expenditure on Subheads A - D was £100,457, an increase of £9,554 due to war bonus, issues of balance of civil pay to staff serving with the Forces and normal increments.

The technical staff employed and not seconded to the Ministry of Supply comprised 16 Divisional Officers and 47 District Officers.

Subhead E - Forestry Operations.

Expenditure, £922,624; Income, £555,129.

Details of expenditure and income are given in Table E. Expenditure was £141,432 more than in 1940.

Cultural operations rose by £101,574, due to rises in wages and the employment of a larger number of workpeople necessitated by the calling up of experienced men; miscellaneous expenses by £28,842, due to issues of balance of civil pay to men serving with the Forces; and local supervision by £12,980 due to war-time allowances to foresters and increased pay for foremen. Income from forestry operations rose by £3,767.

Overhead Charges, £29,595; Superior Supervision, £75,753, and Local Supervision. Overhead charges are in respect of salaries, allowances and other expenses in the offices of the Commissioners and Assistant Commissioners. Superior supervision represents similar expenditure in respect of the Deputy Surveyors, Divisional Officers and District Officers; and local supervision includes the salaries, housing allowances and miscellaneous expenses of Foresters and Foremen. During the year the number of Foresters and Foremen employed in forestry operations was increased by 27. The numbers at 30th September, 1941, were:- Foresters 205 (Head, 5; Grade I, 49; Grade II, 151), Foremen 146.

Acquisition of Land, Buildings and Standing Timber.- Expenditure amounted to £65,990, of which £32,812 was in respect of purchases of land including standing timber and buildings, and £33,178 in respect of land held on long lease or feu. (This expenditure is not directly applicable to the areas acquired during the year, particulars of which follow.)

The total area of land acquired during the forest year 1940-41 amounted to 16,030 acres, of which 12,782 acres were classified as plantable. On the other hand disposals and adjustments amounted to 260 acres (332 acres plantable).

The average rent or feu duty for land acquired for forestry operations during the year by lease or feu was approximately 1s.10d. per acre and the average price for such land purchased, approximately £1. 0. 1. per acre. If the whole outlay in respect of land, buildings, timber, etc., were charged against plantable land the figures would be 2s. 9d. and £1.15s. 1d. respectively. Land and buildings for forest workers' holdings are excluded.

The net total area in Great Britain in respect of which the legal formalities of acquisition by the Department had been completed by 30th September, 1941, was 1,104,133 acres, the corresponding figures in the previous two Annual Reports being 1,038,359 and 1,002,327 acres. In addition to these completed acquisitions, entry had been secured to other property. Details are given in the table below, which also shows the area of "plantable" land and "other" land, i.e. land which is either too poor to plant or is required for other purposes.

Land acquired by Lease, Feu and Purchase  
from 29th November, 1919, to 30th September, 1941.

	By Lease and Feu.			By Purchase.			Total Acquired
	Plant-able (including planted)	Other Land.	Total	Plant-able (including planted)	Other Land.	Total	
	Acres	Acres	Acres	Acres	Acres	Acres	Acres
<u>England &amp; Wales.</u>							
Finally completed.	140,354	31,382	171,716	283,753	78,441	342,194	513,910
Entry secured.	2,632	107	2,739	222	-	222	2,961
<b>Total</b>	<b>142,986</b>	<b>31,469</b>	<b>174,455</b>	<b>283,975</b>	<b>78,441</b>	<b>342,416</b>	<b>516,871</b>
<u>Scotland.</u>							
Finally completed.	100,383	113,317	213,640	191,358	185,225	376,583	590,223
Entry secured.	429	64	493	-	-	-	493
<b>Total</b>	<b>100,752</b>	<b>113,381</b>	<b>214,133</b>	<b>191,358</b>	<b>185,225</b>	<b>376,583</b>	<b>590,716</b>
<b>Great Britain</b>	<b>243,738</b>	<b>144,850</b>	<b>388,588</b>	<b>455,333</b>	<b>263,666</b>	<b>718,999</b>	<b>1,107,587</b>

Of the net total area acquired by lease, feu and purchase in Great Britain to 30th September, 1941, 699,071 acres were classified at the time of acquisition as plantable and of this area 406,961 acres (58 per cent.) were in England and Wales and 292,110 acres (42 per cent.) in Scotland.

In addition to the above-mentioned areas, Crown Woodlands extending to about 120,000 acres (of which some 60,000 acres are plantable) have been transferred to the Forestry Commissioners.

Table B. - Forestry Operations.

Year ending 30th September.	Expenditure (Table Ia, Column 9).										Income (Table Ia, Column 10).				
	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)	
First decade: 1930-39	\$ 132,997	\$ 201,122	\$ 174,150	\$ 787,509	\$ 1,510,801	\$ 119,853	\$ 115,488	\$ 411,677	\$ 3,512,577	\$ 78,784	\$ 274,091	\$ 406,594	\$ 122,639	\$ 882,108	
Second decade: 1930-39	\$ 332,060	\$ 352,049	\$ 492,661	\$ 1,534,471	\$ 2,071,019	\$ 362,395	\$ 246,853	\$ 664,072	\$ 7,056,580	\$ 76,484	\$ 791,032	\$ 699,094	\$ 205,404	\$ 1,770,014	
Third decade: 1940	\$ 33,265	\$ 32,565	\$ 62,773	\$ 70,857	\$ 421,753	\$ 21,482	\$ 25,487	\$ 98,012	\$ 781,192	\$ 1,634	\$ 92,722	\$ 432,065	\$ 24,935	\$ 551,362	
1941	\$ 29,595	\$ 34,078	\$ 75,753	\$ 65,990	\$ 533,327	\$ 23,765	\$ 23,262	\$ 126,854	\$ 922,624	\$ 2,482	\$ 95,193	\$ 429,374	\$ 29,081	\$ 555,129	
Grand Total. Percentage.	592,918 4.8	619,614 5.1	806,517 6.6	2,458,327 20.0	5,546,900 45.2	536,495 4.3	411,090 3.4	1,500,615 10.6	12,272,973 100	152,383 4.3	1,253,044 33.3	1,905,127 52.3	380,059 10.1	3,758,613 100	

The total area of land in the Commissioners' control is thus approximately 1,227,000 acres. In round figures the utilisation as at 30th September, 1941, was as shown in the table on page 5.

Forestry Commission Units.

England and Wales.

- |   |  |
|---|--|
| 1. Chopwell, Durham.*                             | 22. Rockingham, Northampton.             |
| 2. Delamere, Cheshire.*                           | 23. Swaffham, Norfolk.                   |
| 3. Hafod Fawr, Merioneth*                         | 24. Thetford Chase, Norfolk and Suffolk. |
| 4. Dean Forest, Gloucester, Hereford & Monmouth.* | 25. Rendlesham, Suffolk.                 |
| 5. Tintern, Monmouth.*                            | 26. Ampthill, Bedford.                   |
| 6. Dymock, Gloucester and Hereford.*              | 27. Mortimer, Hereford, Radno and Salop. |
| 7. Salcey, Bucks and Northampton.*                | 28. Walcot, Salop.                       |
| 8. Hazelborough, Bucks and Northampton.*          | 29. Kerry, Montgomery and Salop.         |
| 9. Alice Holt, Hants.*                            | 30. Rheola, Glamorgan.                   |
| 10. Woolmer, Hants.*                              | 31. Margam, Glamorgan.                   |
| 11. Bere, Hants.*                                 | 32. Llantrisant, Glamorgan.              |
| 12. New Forest, Hants.*                           | 33. Llanover, Monmouth.                  |
| 13. Parkhurst, Isle of Wight.*                    | 34. Chepstow, Monmouth.                  |
| 14. Hedgebury, Kent and Sussex.*                  | 35. Bodmin, Cornwall.                    |
| 15. Rothbury, Northumberland.                     | 36. Halwill, Devon.                      |
| 16. Thornthwaite, Cumberland.                     | 37. Haldon, Devon.                       |
| 17. Allerston, Yorks.                             | 38. Eggesford, Devon.                    |
| 18. Selby, Yorks.                                 | 39. Brendon, Somerset.                   |
| 19. Gwydyr, Caernarvon and Denbigh.               | 40. Quantocks, Somerset.                 |
| 20. Goed-y-Brenin, Merioneth.                     | 41. Wareham, Dorset.                     |
| 21. Cannock Chase, Stafford.                      | 42. Bramshill, Berks and Hants.          |
|   | 43. Chiddingfold, Surrey and Sussex.     |

---

\* Former Crown Woods.

- |                                       |   |
|---------------------------------------|---|
| 44. Ennerdale, Cumberland.            | 72. Westbury, Hants.                        |
| 45. Clipstone, Derby and Nottingham.  | 73. Buriton, Hants & Sussex.                |
| 46. Beddgelert, Caernarvon.           | 74. Bawtry, Nottingham.                     |
| 47. Cynwyd, Merioneth.                | 75. Sherwood, Nottingham.                   |
| 48. Dovey, Merioneth and Montgomery.  | 76. Swanton, Norfolk.                       |
| 49. Radnor, Radnor.                   | 77. Dunwich, Suffolk.                       |
| 50. Lyminge, Kent.                    | 78. Brynmawr, Cardigan.                     |
| 51. Kielder, Northumberland.          | 79. Bruton, Somerset & Wilts.               |
| 52. Haugh, Hereford.                  | 80. Myherin, Cardigan.                      |
| 53. Wyre, Worcester.                  | 81. Harwood, Northumberland.                |
| 54. Brecon, Brecknock.                | 82. Kershope, Cumberland.                   |
| 55. Brechfa, Carmarthen.              | 83. Combley, Isle of Wight.                 |
| 56. Ringwood, Dorset and Hants.       | 84. Brighstone, Isle of Wight.              |
| 57. Bourne, Lincoln and Rutland.      | 85. Slaley, Northumberland.                 |
| 58. Hamsterley, Durham.               | 86. Clocaenog, Denbigh and Merioneth.       |
| 59. Hope, Derby.                      | 87. Dyfnant, Montgomery.                    |
| 60. Laughton, Lincoln.                | 88. Crychan, Brecknock and Carmarthen.      |
| 61. Friston, Sussex.                  | 89. Caio, Carmarthen.                       |
| 62. Micheldever, Hants.               | 90. Dartmoor, Devon.                        |
| 63. Ferndown, Dorset.                 | 91. Yardley Chase, Bedford and Northampton. |
| 64. Wilsey Down, Cornwall.            | 92. Arkengarthdale, Yorks.                  |
| 65. Glasfynydd, Brecknock.            | 93. Mynydd Ddu, Brecknock and Monmouth.     |
| 66. Rosedale, Yorks.                  | 94. Herodsfoot, Cornwall.                   |
| 67. Ampleforth, Yorks.                | 95. West Woods, Wilts.                      |
| 68. Owmeinion, Cardigan.              | 96. Bardney, Lincoln.                       |
| 69. Tarenig, Cardigan and Montgomery. | 97. Redesdale, Northumberland.              |
| 70. Mathrafal, Montgomery.            | 98. Challock, Kent.                         |
| 71. Pembrey, Carmarthen.              | 99. Vinehall, Sussex.                       |
-

- 15
- |  |                              |
|--|------------------------------|
| 100. Goodwood, Sussex.                   | 129. Savernake, Wilts.       |
| 101. Lydford, Devon.                     | 130. Osborne, Isle of Wight. |
| 102. Hardknott, Cumberland.              | 131. Chequers, Bucks.        |
| 103. Langdale, Yorks.                    | 132. Monmouth, Mon.          |
| 104. The King's Forest, Suffolk.         | 133. Arundel, Sussex.        |
| 105. Itton, Monmouth.                    | 134. Newborough, Anglesey.   |
| 106. Grizedale, Lancashire. <sup>z</sup> | 135. Orlestone, Kent.        |
| 107. Hafren, Montgomery.                 | 136. Hevingham, Norfolk.     |
| 108. Collingbourne, Wilts.               | 137. Wentwood, Mon.          |
| 109. Gravetye, Sussex.                   |                              |
| 110. Sedbury, Gloucester. <sup>6</sup>   |                              |
| 111. Warke, Northumberland.              |                              |
| 112. Greystoke, Cumberland.              |                              |
| 113. Wigsley, Lincoln and Nottingham.    |                              |
| 114. Hay, Hereford.                      |                              |
| 115. St. Gwynno, Glamorgan.              |                              |
| 116. Mendip, Somerset.                   |                              |
| 117. Hartland, Devon.                    |                              |
| 118. Marden, Sussex.                     |                              |
| 119. Willingham, Lincoln.                |                              |
| 120. Gardiner, Wilts.                    |                              |
| 121. Usk, Brecknock.                     |                              |
| 122. Giedd, Brecknock.                   |                              |
| 123. Coed-y-Rhaiads, Brecknock.          |                              |
| 124. Michaelston, Glamorgan.             |                              |
| 125. Cwmogwr, Glamorgan.                 |                              |
| 126. Scardale, Yorks.                    |                              |
| 127. Coed Sarnau, Radnor.                |                              |
| 128. Wendover, Bucks.                    |                              |

---

<sup>z</sup> Previously known as Hawkshead.

<sup>6</sup> Previously included under Chepstow.



Scotland.

1. Inverliever, Argyll.\*
2. Borgia, Sutherland.
3. Slattadale, Ross.
4. Achnashellach, Ross.
5. Ratagan, Inverness  
and Ross.
6. Inchnacardoch, Inverness.
7. South Laggan, Inverness.
8. Port Clair, Inverness.
9. Culbin, Moray and Nairn.
10. Monaughty, Moray.
11. Kirkhill, Aberdeen.
12. Montreathmont, Angus.
13. Glen Righ, Inverness.
14. Glenduror, Argyll.
15. Glenbranter, Argyll.
16. Tentmuir, Fife.
17. Edensmuir, Fife.
18. Glentress, Peebles.
19. Dalbeattie, Kirkcubright.
20. Newcastleton, Roxburgh.
21. Teindland, Moray.
22. Glenurquhart, Inverness.
23. Glenhurich, Argyll.
24. Drummond Hill, Perth.
25. The Queen's Forest,  
Inverness.
26. Culloden, Inverness.
27. Nevis, Inverness.
28. Craig-nan-Eun, Inverness.
29. Ardgartan, Argyll.
30. Barcaldine, Argyll.
31. Benmore, Argyll.
32. The Bin, Aberdeen.
33. Craig Phadrig, Inverness.
34. Ordiequish, Moray.
35. Salen, Argyll.
36. North Strone, Ross.
37. South Strone, Ross.
38. Glenshiel, Ross.
39. Glenfinart, Argyll.
40. Findon, Ross.
41. Kessoek, Ross.
42. Drumtochty, Kincairdine.
43. Midmar, Aberdeen.
44. Kennay, Aberdeen.
45. Glengarry, Inverness.
46. Blairadam, Fife and Kinross.
47. Forest of Deer, Aberdeen.
48. Forest of Ae, Dumfries.
49. Eilanreach, Inverness.
50. Greskine, Dumfries.
51. Edgarhope, Berwick.
52. Fearnoch, Argyll.
53. Dornoch, Sutherland.
54. Inverinate, Ross.
55. Lennox Castle, Stirling.
56. Loch Ard, Perth.
57. Scootmore, Moray.
58. Clunes, Inverness.
59. Devilla, Fife.
60. Balblair, Sutherland.
61. Lael, Ross.

---

\* Former Crown Wood.

- |   |   |
|---|---|
| 62. Clashindarroch, Aberdeen.             | 91. Glen Devon, Perth.                            |
| 63. Roseisle, Moray.                      | 92. Ardross, Ross.                                |
| 64. Inglismaidie, Kincardine.             | 93. Lossie, Moray.                                |
| 65. Blackcraig, Perth.                    | 94. Millbuie, Ross.                               |
| 66. Achaglachgach, Argyll.                | 95. Inshriach, Inverness.                         |
| 67. Strathyre, Perth.                     | 96. Craigvinean, Perth.                           |
| 68. Knapdale, Argyll.                     | 97. Tilliefoure, Aberdeen.                        |
| 69. Fiunary, Argyll.                      | 98. Corriedoo, Kirkcudbright.                     |
| 70. Carden, Fife.                         | 99. Keillour, Perth.                              |
| 71. Glenloy, Inverness.                   | 100. Cairn Edward,<br>Kirkcudbright. <sup>κ</sup> |
| 72. Auchenroddan, Dumfries.               | 101. Minard, Argyll.                              |
| 73. Kirroughtree,<br>Kirkcudbright.       | 102. Garcrogo, Kirkcudbright.                     |
| 74. Newtyle, Moray.                       | 103. Carradale, Argyll.                           |
| 75. Durris, Aberdeen and<br>Kincardine.   | 104. Twigless, Dumfries.                          |
| 76. Longart, Ross.                        | 105. Laurieston,<br>Kirkcudbright.                |
| 77. Garadhban, Stirling.                  | 106. Saddell, Argyll.                             |
| 78. Inverinan, Argyll.                    | 107. Assich, Mairn.                               |
| 79. Glenbrittle, Isle of<br>Skye.         | 108. Castle O'er, Dumfries.                       |
| 80. Alltcailleach, Aberdeen.              | 109. Wauchope, Roxburgh.                          |
| 81. Fleet, Kirkcudbright.                 | 110. Kilmichael, Argyll.                          |
| 82. Kinfauna, Perth.                      | 111. Glentrool,<br>Kirkcudbright. <sup>ϕ</sup>    |
| 83. Kilsture, Wigtown.                    | 112. Morangie, Ross.                              |
| 84. Whitehaugh, Aberdeen.                 | 113. Blackhall, Kincardine.                       |
| 85. Guisachan, Inverness.                 | 114. Rosarie, Banff.                              |
| 86. Changue, Ayr.                         |   |
| 87. Asknish, Argyll.                      |   |
| 88. Dundough, Kirkcudbright.              |   |
| 89. Carron Valley, Stirling.              |   |
| 90. Tinnisburn, Roxburgh<br>and Dumfries. |   |

κ κ includes Bennan.

ϕ includes Glencaird.

**Table E.5. - Cultural Operations (Table E, Column 5).**

Year ending 30th September.	Plantations.				Nurseries	Grand Total.
	Preparatory work and Planting	Establishment and Maintenance.	Forest Protection.	Total		
	(1)	(2)	(3)	(4)	(5)	(6)
	£	£	£	£	£	£
First decade: 1920-29.	638,503	295,201	95,824	1,029,528	481,273	1,510,801
Second decade: 1930-39.	1,053,327	916,427	377,133	2,346,887	724,132	3,071,019
Third decade: 1940.	139,854	128,221	63,079	331,154	100,599	431,753
1941.	149,570	159,020	89,341	397,931	135,396	533,327
<b>Grand Total</b>	<b>1,981,254</b>	<b>1,498,669</b>	<b>625,377</b>	<b>4,105,500</b>	<b>1,441,400</b>	<b>5,546,900</b>
<b>Percentage</b>	<b>35.7</b>	<b>27.0</b>	<b>11.3</b>	<b>74.0</b>	<b>26.0</b>	<b>100</b>

Cultural Operations.- Expenditure amounted to £533,327 details of which are given in Table E.5. Plantations accounted for £397,931 and nurseries £135,396.

Plantations.- The total area planted or sown during the year was 26,867 acres, of which 24,382 acres were placed under conifers and 2,485 acres under broadleaved species. Included in the above are 1,464 acres re-afforested in former Crown woods and 1,217 acres replanted after damage by fire. Details by forests are given in the Appendix, pages 32 et seq.

The total addition to the woodland area of Great Britain as a result of the Commission's operations was 19,627 acres. In forming plantations and beating-up previous years' plantations 64 million trees were used, of which 50 per cent. were Norway and Sitka spruces; 24 per cent. Scots and Corsican pines; 10 per cent. European and Japanese larches; 1 per cent. Douglas fir, and 14 per cent. broadleaved species.

An area of 242 acres of existing woods was underplanted, necessitating the use of 213,000 plants.

19

The quantities of work done by Divisions during the year are shown in the table below.

Silvicultural Operations.

Division.	Planted and Sown.	Naturally Regenerated.	Under-planted.	Thinned.	Felled.
	Acres	Acres	Acres	Acres	Acres.
<u>England and Wales</u>					
N.E. ...	4,637	-	-	245	173
N.W. ...	1,185	-	17	157	22
E. ...	2,456	176	-	391	471
S.E. ...	1,298	-	2	318	1,338
S.W. ...	850	12	-	54	70
New	924	329	50	181	744
Dean	1,005	-	47	1,218	2,064
N.(Wales)..	1,842	-	91	468	246
S.(Wales)..	3,109	-	-	57	93
<b>Total ..</b>	<b>17,356</b>	<b>517</b>	<b>207</b>	<b>3,089</b>	<b>5,221</b>
<u>Scotland</u>					
North ...	1,655	-	11	251	148
South ...	1,709	-	3	121	100
East ...	2,658	-	14	226	160
West ...	3,489	-	7	394	88
<b>Total ..</b>	<b>9,511</b>	<b>-</b>	<b>35</b>	<b>992</b>	<b>496</b>
<b>Total, Great Britain</b>	<b>26,867</b>	<b>517</b>	<b>242</b>	<b>4,081</b>	<b>5,717</b>

Cost of Planting.- The outlay on labour and material on the areas planted between 1919 and 1941 was £10. 5. 6. per acre.

This figure covers the cost of preparation of ground, drainage, fencing, plants, planting, replacement of failures and weeding, but does not include expenditure on forest protection, supervision and overhead charges.

Nurseries. - The total area under nurseries at 30th September, 1941, was 1,241 acres stocked with 205 million seedlings and 105 million transplants. Comparative figures for the three years 1939-41 are given in the following table: -

Nurseries.

Year ending 30th September.	Country.	Seed Sown (lb.)			Stock of Plants at 30th September (thousands) .			Seedlings.			Area. (Acres) .
		Coniferous.	Broad-leaved.	Total.	Transplants.			Seedlings.			
					Coniferous.	Broad-leaved.	Total.	Coniferous.	Broad-leaved.	Total.	
1941	England and Wales.	4,935	278,860	283,815	65,933	10,355	66,288	100,156	20,776	120,932	817
	Scotland.	5,952	4,268	8,237	85,377	1,008	36,385	32,497	1,036	84,533	424
	Total.	8,887	283,168	292,050	91,310	11,363	102,673	182,653	21,812	205,465	1,241
1940	England and Wales.	3,305	178,843	182,146	69,965	9,391	79,356	59,785	13,605	73,390	682
	Scotland.	2,905	5,296	8,099	37,366	1,290	38,656	54,083	713	54,796	410
	Total.	6,106	184,139	190,245	107,331	10,681	118,012	113,868	14,318	128,186	1,092
1939	England and Wales.	3,265	62,118	66,581	78,573	8,924	87,497	93,813	15,748	109,561	636
	Scotland.	2,519	2,896	5,414	46,262	954	47,216	79,125	2,318	81,443	415
	Total.	5,782	66,012	71,795	124,835	9,878	134,713	172,938	18,066	191,004	1,051

Details showing by Divisions the utilisation of nursery area are as follows:-

Utilisation of Nursery Area.

Division.	Seedbeds.	Lines	Fallow and Green Crops	Other	Total.
	Acres	Acres	Acres	Acres	Acres.
<u>England and Wales</u>					
N.E. ...	19.1	59.1	42.9	18.0	139.1
N.W. ...	7.4	17.6	10.4	4.2	39.6
E. ...	34.5	51.9	40.8	30.6	157.8
S.E. ...	31.6	32.6	16.7	16.2	97.1
S.W. ...	5.4	12.3	6.3	8.0	32.0
New	39.3	17.0	36.6	15.5	108.4
Dean	11.3	12.5	9.6	5.5	38.9
N. (Wales) ...	13.8	39.6	27.0	14.8	95.2
S. (Wales) ...	14.5	32.4	45.8	16.2	108.9
<b>Total ...</b>	<b>176.9</b>	<b>275.0</b>	<b>236.1</b>	<b>129.0</b>	<b>817.0</b>
<u>Scotland</u>					
North ...	15.1	34.9	20.6	13.6	84.2
South ...	21.0	22.6	18.3	9.8	71.7
East ...	23.1	33.3	27.6	20.0	104.0
West ...	30.3	51.1	65.6	17.1	164.1
<b>Total ...</b>	<b>89.5</b>	<b>141.9</b>	<b>132.1</b>	<b>60.5</b>	<b>424.0</b>
<b>Total, Great Britain ...</b>	<b>266.4</b>	<b>416.9</b>	<b>368.2</b>	<b>189.5</b>	<b>1,241.0</b>

**Seed Supply.**- No seed could be obtained from Continental sources and an order for 2,000 lbs of Japanese larch from Japan was not fulfilled. Imports from the United States were satisfactory, 3,000 lbs of Japanese larch and 885 lbs of the European variety being secured, while 75 lbs of the seed of the Lodgepole pine were also obtained from the same source. Canada provided 2,568 lbs of Sitka spruce seed. The total value of these imports amounted to £5,815.

On account of the general uncertainty regarding imports special efforts were made to increase the home-collection of seed. Scots pine was plentiful and sufficient cones were collected to meet all requirements and to allow a carry-over to the ensuing year. In Scotland it was a poor year for European larch both as regards quantity and quality, but in England and Wales sufficient seed of this species was obtained to meet normal sowings. Supplies of hardwood seed were not plentiful, beech once again being exceptionally short.

Forest Fires.- During the year 497 fires occurred, the planted area affected being 3,025 acres, and the damage was assessed at £49,400. These figures include 37 fires caused by enemy action involving a loss of £18,000. In the previous year fires due to enemy action numbered 45 with a loss amounting to £21,000.

Fire-fighting technique has continued to show improvement and equipment for the use of water has been provided more freely. A new pump - of a type more suited to hilly districts - has been put into use.

Arrangements for military assistance in the event of serious outbreaks have been extended, and towards the close of the year contact was made with the newly unified National Fire Service - a contact which may prove to be of exceptional value.

Comparative figures for the five years 1937 to 1941 are given below.

	1937	1938	1939	1940	1941
Number of fires	438	1,144	355	628	497
Area burnt (acres)	126	2,066	975	1,750	3,025
Damage valued at	£2,140	£39,910	£19,465	£38,145	£49,400

Claims aggregating £12,550 have been lodged by the Commissioners in respect of the damage done during the year.

The following table gives the causes of fires in 1941 and it will be seen that most fires originated in sparks from railway engines, but a large number (61) were caused by the general public mainly as the result of carelessness.

Origin	Number of Fires.	Percentage of total Number.
Railways	176	36
General public:		
From public roads, etc.	31	6
Other	30	6
Adjoining land	85	18
Troops, etc.	39	8
Enemy action	37	7
Commission's and Ministry of Supply's employees	34	7
Road engines	4	1
Other	8	1
Unknown	53	10
Totals	497	100

Subhead F.- Advances for Afforestation Purposes.

Expenditure, £12,673.

Grants to private individuals and local authorities for planting amounted to £9,567, and overhead and supervisory charges to £3,106.

The grants were as follows:-

(1) Conifers.- Up to £2 per acre planted or sown and thereafter maintained as a forest crop.

(2) Hardwoods.- For every acre planted or sown with approved species and thereafter maintained as an area for the production of hardwoods:- up to £4 per acre for oak or ash; £3 per acre for beech, sycamore or chestnut, and £2 per acre for other approved species.

The number of schemes in respect of which grants were paid during the year and the areas dealt with are stated below:-

	England and Wales.	Scotland.	<u>Total.</u>
Number of Schemes	188	111	299
	Acres	Acres	Acres
Planting conifers	1,589	2,161	3,750
Planting hardwoods	668	9	677

Subhead G.- Education. Expenditure, £5,879.

Details of expenditure are given in Table G.

Apprentices' Schools: Expenditure £2,052.

At the close of the year Parkend School (Forest of Dean) was re-opened and 22 Forest Apprentices were selected for a 2-year Course of Instruction. The School for more than a year had been utilised for the purpose of special courses of instruction in timber measuring by members of the Women's Land Army.

At Benmore School, Argyll, it was found to be possible to re-introduce the normal 2-year course in substitution for the war-time expedient of 6 months' instruction. A class of twenty apprentices was recruited, a number of whom had already attended the 6 months' course.

Grants to Universities, Colleges, etc.: Expenditure £1,300.

Grants were made during the year to Cambridge University, University College of North Wales, Bangor; King's College, Newcastle-on-Tyne; Aberdeen University.



Table G. - Education.

Year ending 30th September.	Expenditure (Table Iia, Column 4)										Net Expenditure.
	Apprentices' Schools.					Stores, Fuel, Light, etc.	Grants to Institutions.	Total.	Income.	£	
	Superior Super-vision and Overhead Charges.	Salaries and Expenses of In-structors.	Purchase and Rent of Land and Buildings.	Allowances to Apprentices.	£						
First decade:	£	£	£	£	£	£	£	£	£	£	£
1920-29	13,125	15,401	6,195	21,709	14,192	30,691	101,313	2,427	98,886		
Second decade:											
1930-39	12,184	10,848	5,529	17,682	9,309	42,646	97,998	443	97,555		
Third decade:											
1940	664	408	29	1,164	459	2,425	5,349	8	5,341		
1941	777	665	145	591	651	3,050	5,879	42	5,837		
Grand Total.	26,950	27,523	11,698	41,146	24,611	78,812	210,539	2,920	207,619		
Percentage.	12.8	13.0	5.5	19.6	11.7	37.4	100				

29

25

Imperial Forestry Institute: Expenditure, £1,750.-  
 The annual grant to the Imperial Forestry Institute from the Forestry Fund was continued. Ten students attended for the whole or part of the year, including 2 post-graduate Probationer Assistant Conservators of Forests, Malaya.

Subhead H - Research and Experiment.

Expenditure: Gross, £12,480; Net, £12,045.

Details of expenditure are given in Table H.

Table H - Research and Experiment.

Year ending 30th September	Expenditure (Table IIa, Column 5).					Total	Income	Net Expenditure.
	Superior Supervision and Overhead Charges.	Salaries and Expenses	Labour, Stores, etc.	Grants to Institutions.				
	£	£	£	£	£	£	£	
First decade: 1920-29.	13,699	38,458	20,230	7,263	79,650	1,058	78,592	
Second decade: 1930-39.	14,584	55,042	47,030	23,589	140,245	2,540	137,705	
Third decade: 1940	864	5,501	4,768	3,686	14,819	532	14,287	
1941	777	5,452	4,122	2,129	12,480	435	12,045	
<b>Grand Total</b>	<b>29,924</b>	<b>104,453</b>	<b>76,150</b>	<b>36,667</b>	<b>247,194</b>	<b>4,565</b>	<b>242,629</b>	
<b>Percentage</b>	<b>12.1</b>	<b>42.3</b>	<b>30.8</b>	<b>14.8</b>	<b>100.</b>			

Production.

Three new permanent sample plots were established, and one plot was lost owing to wind damage, bringing the total of established plots to 217; of these 118 are in England and Wales and 99 in Scotland. Forty-eight plots were re-measured during the year.

Nursery and Plantation Work.

Nursery investigations have dealt with the study of methods of preparing composts from refuse organic matter, such as bracken, and with the storage of beech seed. Further progress has been made with the raising of trees in nurseries formed on woodland and moorland soils and treated with composts.

On the plantation side the success of earlier experiments on the planting of mixed crops of spruce with various species of pines has led to the laying down of new plots designed to compare different ways of forming the mixture. An investigation has also been carried out on methods of thinning 20-year old pine plantations in East Anglia.

The large-scale method of planting experiment at Hope Forest in Derbyshire was completed.

Entomology and Mycology.

Progress has been made with the study of chafers and a memorandum on practical methods of dealing with these pests has been issued. The prevention of insect outbreaks arising from war fellings is a matter which has received much attention during the year. Control measures have been devised and frequent inspections made.

The usual elm disease survey was carried out during the autumn; there was no material change in the general position.

Botany and Soil.

Work on the mycorrhiza of forest trees was continued and a report by Dr. M.C. Rayner on the progress of the investigation has been published recently in one of the Forestry Journals.

The study of woodlands being felled for war purposes was continued by members of the staffs of various Universities in Great Britain under the guidance of the Imperial Forestry Institute at Oxford and further data were collected on the effect of locality factors upon the health and rate of growth of tree crops.

Botany and Soil.

Further work on the soil survey of Ardgartan Forest in Argyllshire was carried out by Dr. A. Muir of the Macaulay Institute for Soil Research.

Advisory Committee on Forest Research.

A meeting was held, at Symonds Yat, near Monmouth, to discuss the work in progress. Experimental plantations in the Forest of Dean, Tintern, and Dymock Forests were visited.

Utilisation.

The investigation on the rate of seasoning of pitprops prepared at different seasons of the year was completed.

Subhead J.- Agency and Advisory Services.

Expenditure: Gross, £777; Net, £607.

The expenditure is an apportionment of overhead and supervisory charges in respect of the time of various officers of the Commission who have been engaged in answering enquiries and advising woodland owners as to the treatment of their woods.

Subhead K.- Special Services. Expenditure, £926.

Details of expenditure are given in Table K.

Table K.- Special Services.

Year ending 30th September.	Expenditure (Table IIa, Column 7).						In- come	Net Expen- diture.
	Superior Super- vision and Overhead Charges.	Consult- ative Com- mittee's Expenses.	Publi- cations.	Special En- quiries	Relief of Un- employ- ment.	Total		
	£	£	£	£	£	£	£	£
First decade: 1920-29.	26,585	523	1,995	12,368	19,828	61,299	347	60,952
Second decade: 1930-39.	28,698	145	1,279	12,572	-	42,694	33	42,661
Third decade: 1940 1941	864 777	9 -	2 -	760 149	- -	1,635 926	1 -	1,634 926
Grand Total:	56,924	677	3,276	25,849	19,828	106,554	391	106,173
Percentage:	53.4	.6	3.1	24.3	18.6	100		

26

Subhead L. - Forest Workers' Holdings.

Expenditure, £24,479; Income, £20,905.

Total expenditure was £13,108 less than in 1940.  
Details are given in Table L.

During the year 16 holdings were completed and, after allowing for disposals and transfers to other tenancies, the total number of holdings for forest workers amounted to 1486. The average cost of establishing holdings is £497, of which land accounts for £68, and cost of buildings, drainage, water supply, etc., £429.

Subhead Z - Income, \$576,681.

Total income was \$4,218 greater than in 1940. Rents and royalties include \$15,426 from the Forest of Dean mines. "Other" income includes sales of live stock \$14,594, and miscellaneous estate, farm and forest receipts \$14,067. Details are given in Table Z.

Table Z. - Income.

Year ending 30th September.	Forestry Operations.						Forest Workers' Holdings. (Rents, etc).	Miscellaneous.	Grand Total.
	Sales of Land and Buildings.	Rents and Royalties.	Forest Produce.	Other.	Total.				
First decade: 1920-29	£ 78,784	£ 274,091	£ 406,594	£ 122,639	£ 882,108	£ 27,515	£ 6,986	£ 916,559	
Second decade: 1930-39	76,484	791,032	699,094	203,404	1,770,014	168,856	4,678	1,943,543	
Third decade: 1940 1941	1,654 2,481	92,728 96,193	432,065 428,574	24,935 29,091	551,562 555,129	20,324 20,905	782 647	572,468 576,681	
Grand Total.	159,883	1,253,044	1,966,127	380,059	3,758,615	237,600	15,038	4,009,251	
Percentage.	4.0	31.3	49.0	9.5	93.8	5.9	.3	100	

Table I. - Forest Workers' Holdings.

Year ending 30th September.	Expenditure (Table Ia, Column 8).							Income (Table Ia, Column 11).			Net Expenditure.	
	Superior Super-Vision and Overhead Charges.	Purchase and Rent of Land and Buildings.	Buildings.			Painting, Drainage, etc.	Miscellaneous.	Total.	Rents.	Other.		Total.
	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)
<b>First decade:</b>	£	£	£	£	£	£	£	£	£	£	£	£
1930-39	35,894	103,940	198,184	32,302	3,882	17,561	4,120	339,865	26,261	1,254	27,515	362,368
<b>Second decade:</b>												
1940-49	94,599	108,894	234,824	45,230	46,341	27,967	9,616	565,871	167,966	890	168,856	397,015
<b>Third decade:</b>												
1940	8,687	3,690	16,417	317	5,667	1,464	1,395	37,587	20,305	21	20,324	17,265
1941	7,768	2,661	448	5,128	6,246	1,108	1,122	24,479	20,806	99	20,905	3,574
<b>Grand Total,</b>	<b>146,696</b>	<b>219,185</b>	<b>443,873</b>	<b>81,577</b>	<b>62,136</b>	<b>48,100</b>	<b>16,255</b>	<b>1,017,820</b>	<b>235,336</b>	<b>2,254</b>	<b>237,600</b>	<b>780,220</b>
<b>Percentage.</b>	<b>14.4</b>	<b>21.6</b>	<b>43.6</b>	<b>8.0</b>	<b>6.1</b>	<b>4.7</b>	<b>1.6</b>	<b>100</b>	<b>99.0</b>	<b>1.0</b>	<b>100</b>	

Employment in the Commission's Forests.

The number of forest workers employed in the Commission's forests is stated in the table below:-

<u>Summer (Minimum).</u>			<u>Winter (Maximum).</u>		
1920	...	210	1920-21	...	935
1921	...	495	1921-22	...	1,780
1922	...	525	1922-23	...	1,775
1923	...	880	1923-24	...	2,220
1924	...	1,620	1924-25	...	2,650
1925	...	1,980	1925-26	...	2,960
1926	...	2,335	1926-27	...	3,185
1927	...	2,735	1927-28	...	3,495
1928	...	2,740	1928-29	...	3,565
1929	...	2,640	1929-30	...	3,835
1930	...	3,130	1930-31	...	3,850
1931	...	2,830	1931-32	...	3,505
1932	...	2,720	1932-33	...	3,985
1933	...	2,845	1933-34	...	3,735
1934	...	3,015	1934-35	...	4,020
1935	...	3,280	1935-36	...	4,155
1936	...	3,720	1936-37	...	4,565
1937	...	4,065	1937-38	...	5,110
1938	...	4,555	1938-39	...	5,395
1939	...	4,320	1939-40	...	5,155
1940	...	4,740	1940-41	...	5,625
1941	...	4,900	1941-42	...	5,630

Camp House,  
Promenade,  
Bristol, G.



PLANTATIONS - YEAR ENDED 30TH SEPTEMBER 1921 ENGLAND & WALES.

FOREST	AREA PLANTED (ACRES).				SPECIES PLANTED INCLUDING BEATING-UP (THOUSANDS).												
	AFFORESTED		RE-AFFORESTED		TOTAL		Scots & Cyprian Pines	Eur. & Jap Larches	Douglas Fir.	Norway & Sitka Spruces	Oak	Ash	Beech	Others	Total		
	Cont-fers	Broad leaved	Cont-fers	Broad leaved	Cont-fers	Broad leaved											
Alice Holt, Hants x	-	-	70	-	70	-	5	45	-	-	-	-	-	-	-	65	164
Allerston, Yorks.....	514	-	37	9	551	10	411	161	-	-	50	47	5	16	27	1044	
Ampleforth, Yorks.....	70	1	-	-	70	1	48	55	1	-	58	13	2	-	5	180	
Amphill, Bedford.....	-	-	-	-	-	-	4	-	-	-	12	2	-	14	-	32	
Arkenburghdale, Yorks.....	72	-	-	-	72	-	-	-	-	-	244	-	-	-	-	244	
Arundel, Sussex.....	-	-	-	-	-	-	-	-	-	-	6	512	8	-	-	457	
Bardney, Lincoln.....	-	58	29	76	29	134	66	34	31	-	-	-	-	-	2	4	
Bawtry, Notts.....	-	-	-	-	-	-	2	-	-	-	-	-	-	-	-	159	
Beddgelert, Carnarvon.....	37	-	13	-	50	-	-	-	-	-	125	-	-	5	18	159	
Beddgelert, Kent & Sussex x	-	-	168	-	168	-	345	-	-	-	-	-	-	5	1	351	
Bere, Hants x	-	-	27	-	27	-	11	58	-	-	-	6	-	2	3	80	
Bere, Hants x	-	-	19	22	27	22	19	11	-	-	23	-	-	56	8	78	
Bodmin, Cornwall.....	-	-	-	65	-	65	20	-	-	-	-	105	42	-	-	167	
Bourne, Lincoln & Rutland.....	-	-	-	-	-	-	396	-	-	-	-	-	-	-	-	167	
Bramshill, Berks & Hants.....	-	-	-	-	-	-	2	203	46	-	-	-	-	1	-	446	
Brechfa, Carmarthen.....	502	10	51	-	553	10	18	71	-	-	680	-	-	-	78	1028	
Brecon, Brecknock.....	-	-	18	-	18	-	2	20	-	9	20	-	-	-	-	82	
Brendon, Somerset.....	-	-	-	-	-	-	-	20	-	20	9	-	-	-	-	31	
Brighthelm, Isle of Wight.....	46	42	21	-	46	42	110	6	-	1	1	8	21	3	6	221	
Bruton, Somerset & Wilts.....	-	-	21	4	21	4	-	1	-	51	129	-	-	-	-	48	
Brynmawr, Cardigan.....	53	-	-	58	53	-	70	1	-	-	266	-	-	198	-	130	
Burlton, Hants & Sussex.....	-	7	-	-	-	65	-	79	59	-	12	-	-	2	9	268	
Cale, Carmarthen.....	165	-	15	1	178	1	61	-	-	-	266	-	-	50	9	456	
Cannock Chase, Staff'ord.....	82	1	-	23	62	1	277	-	-	-	12	-	-	45	13	352	
Challcock, Kent.....	-	-	35	-	35	23	72	-	-	-	6	-	-	45	25	142	
Chapaton, Cornwall.....	-	-	4	-	4	-	-	-	-	-	-	-	-	81	-	8	
Chequers, Bucks.....	1	34	-	-	1	34	2	-	-	-	36	-	-	-	2	85	
Childingfold, Surrey & Sussex...	-	-	10	8	10	8	1	-	-	-	36	-	-	-	2	85	
Chapwell, Durham x	-	-	12	12	12	12	-	25	-	-	5	32	-	-	3	65	
Clitstone, Derby & Notts.....	3	-	78	5	81	7	400	-	-	-	-	-	-	13	15	428	
Cloosemore, Denbigh & Merioneth..	272	6	11	1	285	7	18	44	-	-	501	-	-	2	17	582	

P O R E S T	AREA PLANTED (ACRES).						SPECIES PLANTED INCLUDING BEATING-UP (THOUSANDS).								
	AFFORESTED		RE-AFFORESTED		TOTAL		Scots & Corsican Pines	Spruce & Fir	Douglas Fir	Norway Spruce	Oak	Ash	Beech	Others	Total
	Cont-fers	Broad leaved	Cont-fers	Broad leaved	Cont-fers	Broad leaved									
Coed Sarnau, Rednor.....	75	-	12	-	75	-	10	-	-	-	-	-	-	59	148
Coed-y-Brenin, Merioneth.....	8	-	-	-	18	-	21	-	-	-	-	-	-	46	450
Coed-y-Rhaleddr, Brecon.....	151	14	9	11	151	14	1	1	48	11	-	92	-	111	111
Collingbourne, Wiltshire.....	-	-	-	-	-9	11	-	-	30	-	-	-	-	-	51
Comlaer, Isle of Wight.....	-	-	-	-	-	24	-	-	263	36	15	-	-	1	1042
Crychan, Brecknock & Carmarthen	386	34	87	-	475	-	15	-	1	-	-	-	-	1	53
Cumeistion, Ceredigion.....	22	-	-	-	22	-	-	-	50	-	-	-	-	17	581
Cwm Ugar, Glamorgan.....	179	16	-	-	179	16	-	-	1	-	-	-	-	1	3
Cynydd, Merioneth.....	-	-	-	-	-	-	-	-	-	-	-	-	-	-	211
Dartmoor, Devon.....	105	2	3	-	106	2	-	-	-	-	-	-	-	4	211
Dean Forest, Glos. Hereford & Monmouth	2	-	374	321	376	321	10	158	-	-	1535	15	9	26	2233
Delamere, Cheshire	13	-	-	-	15	-	21	11	11	11	-	-	-	11	32
Dovey, Merioneth & Montgomery	238	-	17	8	255	8	1	49	8	11	6	-	5	11	515
Dunwich, Suffolk.....	-	-	-	-	-	-	26	-	-	-	-	-	-	1	46
Dyfnant, Montgomery.....	-	-	-	-	-	-	1	5	2	-	-	-	-	3	65
Dymock, Glos and Hereford	-	-	7	1	57	1	3	2	43	5	18	-	-	1	22
Eggesford, Devon.....	50	-	5	-	57	-	4	4	217	1	-	-	-	1	96
Emerdale, Cumberland.....	217	-	5	-	222	-	4	4	4	6	1	-	3	44	470
Ferndown, Dorset.....	-	-	-	-	-	-	79	4	217	1	-	-	-	11	102
Priston, Sussex.....	22	22	-	22	22	22	4	4	4	6	1	3	40	11	255
Gardiner, Wiltshire.....	25	51	6	51	25	51	3	46	2	3	3	67	62	36	220
Gledd, Brecon.....	162	-	-	168	162	168	24	2	10	-	-	-	-	1	595
Glasfynydd, Brecknock.....	110	7	2	153	110	153	1	3	3	-	-	-	550	22	288
Goodwood, Sussex.....	-	-	-	-	2	-	15	-	5	-	-	-	-	-	566
Gravetye, Sussex.....	-	-	-	-	-	-	4	-	-	-	-	-	-	-	4
Greystoke, Cumberland.....	91	-	-	-	91	-	55	16	187	-	-	-	3	1	242
Grizedale, Lancs.....	371	4	-	4	371	4	233	160	299	1	-	-	2	3	698
Gwydyr, Carmarvon & Denbigh	145	-	111	-	356	-	45	154	457	33	-	-	2	79	768
Hafod Fawr, Merioneth.....	-	-	27	-	27	-	-	-	62	0	-	-	-	-	62
Hafren, Montgomery.....	277	-	-	-	277	-	-	8	489	-	-	-	-	22	519
Haldon, Devon.....	36	1	-	-	36	1	-	5	1	-	-	-	1	10	92
Halwill, Devon.....	196	7	-	-	196	7	-	75	7	-	-	-	6	26	346
Hemsterley, Durham.....	275	-	-	-	275	-	170	98	305	2	-	-	1	54	565

P O R K S T	AREA PLANTED (ACRES).				SPECIES PLANTED INCLUDING BEATING-UP (THOUSANDS).																		
	AFFORESTED.		RE-AFFORESTED.		TOTAL.		Scots & Corsican Pines		Spruce & Fir		Douglas Fir.		Norway & Sitka Spruce		Oak		Ash		Beech		Others		TOTAL
	Cont-fers	Broad leaved	Cont-fers	Broad leaved	Cont-fers	Broad leaved																	
Hardknott, Cumberland.....	136	1	-	-	136	-	1	47	103	-	-	109	-	-	-	-	-	-	1	-	-	4	256
Hartland, Devon.....	188	3	-	-	188	-	5	14	295	-	-	295	-	-	-	-	-	-	5	-	-	2	321
Harwood, Northumberland.....	71	-	-	-	71	-	-	-	125	-	-	125	-	-	-	-	-	-	-	-	-	-	125
Haugh, Hereford.....	-	8	-	-	-	-	-	-	-	-	5	55	-	-	-	-	-	-	6	-	-	-	6
HV, Hereford.....	67	-	-	-	67	-	2	100	55	-	-	20	-	-	-	-	-	-	14	-	-	-	174
Haselborough, Bucks & Northants r	-	-	-	-	-	-	7	-	20	-	-	8	-	-	-	-	-	-	24	-	-	-	106
Herodsfoot, Cornwall.....	-	-	12	-	12	-	-	10	8	-	-	8	-	-	-	-	-	-	2	-	-	1	21
Hevingham, Norfolk.....	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Hope, Derby.....	-	-	-	-	-	-	-	-	39	-	-	-	-	-	-	-	-	-	-	-	-	-	39
Itton, Hereford.....	-	-	-	-	-	-	-	1	58	-	-	-	-	-	-	-	-	-	4	-	-	1	6
Kerry, Montgomery & Salop.....	-	-	25	-	25	-	-	2	58	-	-	-	-	-	-	-	-	-	-	-	-	3	65
Kershope, Cumberland.....	319	-	-	-	319	-	2	2	693	-	-	-	-	-	-	-	-	-	-	-	-	-	697
Kielder, Northumberland.....	1852	14	7	-	1859	-	64	12	5356	-	-	-	-	-	-	-	-	-	89	-	-	38	3475
King's Forest (The) Suffolk..	373	78	3	18	376	-	844	15	270	-	-	-	-	-	-	-	-	-	2	-	-	65	1175
Langdale, Yorks.....	187	-	-	-	187	-	147	5	270	-	-	-	-	-	-	-	-	-	2	-	-	4	220
Laughton, Lincoln.....	-	-	-	-	-	-	214	9	3	-	-	-	-	-	-	-	-	-	1	-	-	10	34
Ilanover, Hereford.....	-	-	10	-	10	-	9	39	4	-	-	4	-	-	-	-	-	-	1	-	-	12	55
Ilantlant, Glamorgan.....	-	-	35	-	35	-	-	25	11	-	-	11	-	-	-	-	-	-	5	-	-	-	129
Lydford, Devon.....	-	-	3	-	3	-	-	12	6	-	-	6	-	-	-	-	-	-	8	-	-	-	158
Lymlinge, Kent.....	-	-	55	-	55	-	11	5	208	-	-	15	-	-	-	-	-	-	109	-	-	29	374
Marden, Sussex.....	-	-	12	-	12	-	55	85	208	-	-	15	-	-	-	-	-	-	1	-	-	29	247
Margam, Glamorgan.....	-	-	-	-	-	-	137	-	108	-	-	-	-	-	-	-	-	-	4	-	-	-	247
Mathrafal, Montgomery.....	68	-	-	-	68	-	390	195	223	-	-	2	-	-	-	-	-	-	1	-	-	74	621
Mendip, Somerset.....	221	15	-	-	221	-	107	-	2	-	-	2	-	-	-	-	-	-	225	-	-	6	535
Michaelston, Glamorgan.....	-	20	-	-	-	-	107	-	2	-	-	2	-	-	-	-	-	-	1	-	-	6	154
Micheldever, Hereford.....	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Komomuth, Hereford, Radnor & Salop.....	-	-	45	-	45	-	26	121	145	-	-	1	-	-	-	-	-	-	11	-	-	20	146
Myherin, Carulgan.....	122	-	36	-	158	-	26	18	451	-	-	1	-	-	-	-	-	-	12	-	-	20	597
Myyddi, Ddu, Brecknock & Komomuth.....	158	-	10	-	148	-	2	156	145	-	-	1	-	-	-	-	-	-	12	-	-	30	346
Newborough, Anglesey.....	-	-	-	-	-	-	-	94	244	-	-	-	-	-	-	-	-	-	19	-	-	92	-
New Forest, Hants x.....	-	-	131	-	131	-	340	94	244	-	-	19	-	-	-	-	-	-	20	-	-	92	609

F O R E S T

	AREA PLANTED (ACRES).				SPECIES PLANTED INCLUDING BEATING-UP (THOUSANDS).										
	APPROPRIATED Cont- fers	Broad Leaved	RE-APPROPRIATED Cont- fers	Broad Leaved	TOTAL Cont- fers	Broad Leaved	Scots & Corsican Pines	IBEX & Jap Larches	Douglas Pfr.	Norway & Sitka Spruces	Oak	Ash	Beech	Others	Total
Orlestone, Kent.....	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Osborne, Isle of Wight.....	-	-	-	-	-	-	7	-	-	-	-	-	-	-	7
Parkhurst, Isle of Wight #	-	-	-	-	-	-	4	-	-	-	4	-	-	-	14
Pembrey, Carmarthen.....	22	-	-	2	22	-	119	-	1	-	-	-	3	1	130
Quantocks, Somerset.....	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1
Radnor, Radnor.....	1	-	7	-	8	-	-	45	-	15	-	-	7	7	72
Rededale, Northumberland....	628	-	-	-	628	17	21	-	1067	-	-	-	-	50	1105
Rendlesham, Suffolk.....	2	22	9	48	11	70	13	7	7	-	79	1	52	437	
Rheola, Glamorgan.....	226	-	20	-	246	-	106	-	669	-	-	-	23	28	1015
Ringswood, Dorset and Hants..	286	-	-	-	286	-	582	114	-	74	-	-	-	85	896
Rockingham, Northants.....	-	-	4	106	4	106	59	4	102	297	-	-	60	5	527
Rosedale, Yorks.....	73	-	-	-	73	-	39	17	84	-	-	-	-	5	145
Rothbury, Northumberland....	-	-	14	19	14	-	4	29	11	51	-	-	16	2	113
St. Gwyno, Glamorgan.....	193	7	-	-	193	149	146	-	119	-	-	-	8	31	453
Salcey, Bucks and Northants #	-	-	-	4	-	-	-	-	25	3	-	-	5	-	36
Savernake, Wilts.....	-	-	35	126	35	126	-	101	-	-	394	-	-	-	495
Scardale, Yorks.....	36	14	-	-	36	14	42	26	-	-	-	-	17	-	85
Sedbury, Glos.....	-	-	15	-	15	-	12	5	9	-	-	-	-	-	26
Selby, Yorks.....	-	-	-	-	-	-	15	-	11	-	-	-	-	-	26
Sherwood, Notts.....	10	1	30	-	40	1	78	-	-	-	-	-	2	3	85
Slaley, Northumberland.....	45	-	-	-	45	-	74	46	-	72	-	-	-	-	192
Swallfham, Norfolk.....	10	-	41	-	51	-	203	2	-	4	4	1	5	-	214
Swanton, Norfolk.....	-	-	-	-	-	-	3	-	-	-	-	-	4	1	13
Tarentz, Cardigan & Montgomery	14	-	-	-	14	-	-	-	52	-	-	-	-	-	52
Theftord Chase, Norfolk &															
Suffolk.....	517	121	90	189	607	310	2042	2	38	-	594	-	238	154	3048
Thorntwate, Cumberland....	37	2	-	-	37	2	1	54	-	82	3	-	15	1	156
Thntern, Womouth #	-	-	189	59	189	39	45	107	-	209	135	2	2	18	518
Uit, Brecknock.....	86	6	25	4	109	10	1	165	-	20	-	-	16	18	220
Vinehall, Sussex.....	14	-	32	16	46	16	68	-	-	26	6	-	53	9	162
Walcot, Salop.....	-	-	39	6	39	6	55	-	13	-	-	-	7	4	112
Wareham, Dorset.....	27	-	-	-	27	-	240	35	-	1	-	-	-	10	276
Warke, Northumberland.....	680	-	-	-	680	-	6	12	-	1413	-	-	-	1	1432



PLANTATIONS - YEAR ENDED 30TH SEPTEMBER 1961 - SCOTLAND.

	AREA PLANTED (ACRES).				SPECIES PLANTED INCLUDING PROTECTED SPECIES-UP (TWOUSANDS).				Total							
	APPROVED		RE-APPROVED		TOTAL		Scots & Corsican Pines	Beech & Fir Larrires		Douglas Fir	Norway Spruce & Sitka Spruce	Oak	Ash	Beech	Others	
	Cont-ferns	Broad-leaved	Cont-ferns	Broad-leaved	Cont-ferns	Broad-leaved										
Achnaglachnah, ARGYLL.....	297	-	-	-	297	-	8	30	2	300	-	-	-	-	25	466
Achnashellach, Ross.....	-	-	-	-	-	-	5	18	-	25	-	-	-	-	18	58
Ae, Forest of, Dumfries.....	166	-	-	-	166	-	4	18	-	324	-	-	-	-	6	368
Alltallach, Aberdeen.....	115	-	-	-	115	-	118	-	-	88	-	-	-	-	7	208
Ardfertan, ARGYLL.....	200	-	-	-	200	-	9	8	-	404	-	-	-	-	4	425
Ardras, Ross.....	-	-	-	-	55	-	116	25	-	5	-	-	-	-	-	146
Ashdub, ARGYLL.....	25	-	-	-	25	-	64	10	-	66	-	-	-	-	-	98
Auch, Nairn.....	50	-	-	-	50	-	-	8	-	25	-	-	-	-	-	92
Avonbrodun, Dumfries.....	-	-	-	-	-	-	-	-	-	7	-	-	-	-	-	7
Baldair, Sutherland.....	-	-	-	-	-	-	8	-	-	4	-	-	-	-	-	9
Baronaldie, ARGYLL.....	151	-	-	-	151	-	-	6	-	268	-	-	-	-	9	270
Benmore, ARGYLL.....	79	-	-	-	61	-	9	9	-	170	-	-	-	-	23	219
Bin, (The) Aberdeen.....	28	-	-	-	198	-	71	118	-	166	-	-	-	-	1	349
Blackhall, Perth.....	82	-	-	-	82	-	-	-	-	147	-	-	-	-	55	180
Blackhall, Kinross.....	-	-	-	-	14	-	-	-	-	25	-	-	-	-	3	34
Blarodun, Wife and Marose.....	94	-	2	-	94	-	54	14	-	101	-	-	-	-	7	178
Borgie, Sutherland.....	2	-	-	-	2	-	-	-	-	21	-	-	-	-	6	26
Calra Edward, Kirkcubright.....	224	-	1	-	224	-	-	28	-	326	-	-	-	-	2	428
Cardeu, Wife.....	-	-	-	-	-	-	36	7	-	67	-	-	-	-	9	119
Carradale, ARGYLL.....	251	-	-	-	251	-	60	178	-	178	-	-	-	-	11	436
Carton Valley, Stirling.....	330	-	6	-	330	-	24	7	-	626	-	-	-	-	11	689
Castle O'er, Dumfries.....	152	-	-	-	152	-	-	35	-	221	-	-	-	-	1	255
Changus, AYR.....	50	-	-	-	50	-	2	7	-	117	-	-	-	-	1	126
Clashdunnoch, Aberdeen.....	190	-	-	-	253	-	72	9	-	246	-	-	-	-	2	429
Clunes, Inverness.....	8	-	-	-	8	-	6	9	-	14	-	-	-	-	19	26
Corriedoo, Kirkcubright.....	92	-	-	-	92	-	5	-	-	177	-	-	-	-	19	26
Craig-Kee-Sun, Inverness.....	-	-	-	-	-	-	-	-	-	7	-	-	-	-	-	7
Craig Shudie, Inverness.....	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Craigyfern, Perth.....	68	-	-	-	141	-	-	80	-	117	-	-	-	-	32	272
Culbaly, Nairn and Nairn.....	5	-	-	-	141	-	271	-	-	5	-	-	-	-	3	279







FOREST	AREA PLANTED (ACRES).				SPECIES PLANTED INCLUDING BEATIVE-UP (THOUSANDS).											
	AFFORESTED		RE-AFFORESTED		TOTAL		Scots & Corsican Pines	Spr. & Jap Larches	Douglas Fir.	Norway & Sitka Spruces	Oak	Ash	Beech	Others	Total	
	Conif- fers	Broad leaved	Conif- fers	Broad leaved	Conif- fers	Broad leaved										
Queen's Forest (The) Inverness..	-	-	-	-	-	-	3	-	-	11	-	-	-	-	10	24
Ratagan, Inverness & Ross.....	30	-	-	-	30	-	-	-	94	-	-	-	-	-	10	104
Rosarie, Banff.....	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Baselguy Moray.....	103	-	-	-	103	-	1	-	4	-	-	-	-	-	-	253
Saddell, Argyll.....	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	5
Salen, Argyll.....	43	-	-	-	43	-	-	-	209	-	-	-	-	-	5	212
Scootmore, Moray.....	62	-	-	-	62	-	42	-	80	-	-	-	-	-	9	131
Slattadale, Ross.....	-	-	-	-	-	-	-	13	14	-	-	-	-	-	5	32
South Laggan, Inverness.....	-	-	-	-	-	-	1	-	6	-	-	-	-	-	-	7
South Strone, Ross.....	-	-	-	-	-	-	-	-	13	-	-	-	-	-	5	18
Strathyre, Perth.....	-	-	-	-	-	-	-	-	15	-	-	-	-	-	5	18
Teindland Moray.....	452	3	-	-	452	32	120	1	526	-	-	-	-	20	699	
Tentsmuir, Pife.....	-	-	-	-	-	-	-	-	-	-	-	-	-	5	5	
Milliefoure, Aberdeen.....	67	-	14	-	81	164	-	-	28	-	-	-	-	5	197	
Pinisburn, Dumfries and Roxburgh	75	-	-	-	75	132	20	-	3	-	-	-	-	5	158	
Twiggles, Dumfries.....	135	-	-	-	135	-	7	-	249	-	-	-	-	6	262	
Manchnope, Roxburgh.....	271	-	-	-	271	-	22	-	375	-	-	-	-	1	598	
Whitethaugh, Aberdeen.....	-	-	-	-	-	50	55	-	80	-	-	-	-	-	-	174
<b>TOTAL</b>	<b>7289</b>	<b>40</b>	<b>2070</b>	<b>55</b>	<b>9359</b>	<b>95</b>	<b>4527</b>	<b>2026</b>	<b>66</b>	<b>12562</b>	<b>241</b>	<b>29</b>	<b>118</b>	<b>865</b>	<b>20432</b>	

\* Former Crown Wood.

41 20

A P P E N D I X (Contd.)

PLANTATIONS - YEAR ENDED 30TH SEPTEMBER 1941 - SUMMARY.

F O R E S T	AREA PLANTED (ACRES).						SPECIES PLANTED INCLUDING BEATING-UP (THOUSANDS).																
	AFFORESTED		RE-AFFORESTED		TOTAL		Scots & Corsican Pines		Eup. & Jap Larches		Douglas Fir		Norway & Sitka Spruces		Oak		Ash		Beech		Others		Total
	Cont- fers	Broad leaved	Cont- fers	Broad leaved	Cont- fers	Broad leaved																	
ENGLAND AND WALES.....	11669	629	2236	1662	12905	13889	2291	10432	4301	545	19215	4132	246	2723	1740	4334							
SCOTLAND.....	7289	40	2070	55	9359	9359	95	4527	2026	66	12562	241	29	118	863	20452							
T O T A L	18958	669	4306	1717	23264	23264	2386	14959	6327	611	31777	4373	275	2841	2603	63766							



