#### FORESTRY COMMISSION.

### FIFTH ANNUAL REPORT

OF THE

#### FORESTRY COMMISSIONERS.

Year ending September 30th, 1924.

(Presented pursuant to Act 9 & 10 Geo. V., c. 58, s. 8(4).)

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Year ending September 30th, 1924.

#### REVIEW OF THE FIRST FIVE YEARS' WORK, 1919-1924.

The object of the Forestry Act of 1919 was three-fold:-

(1) to increase the supplies of home-grown timber in view of the anxiety and waste caused by reliance on imported timber during the war,

(2) to provide a reserve against the time when the exhaustion of the virgin forests of the world begins to be

acutely felt,

(3) to secure the increased employment and increased production which follow the conversion of waste land or poor pasture into forest.

The Act of 1919 set up this. Commission and provided for a fund of £3,500,000 to cover the work of the first ten years, including education and research, as well as afforestation in all its branches. The Commissioners were appointed for five years. These years having elapsed, the moment seems opportune for a review of the work accomplished.

The Commission had to begin almost from the beginning. forest service existed and no state forests except the Crown Woods. Even in these, little progress had been made in establishing systematic management when the war intervened and excessive fellings had perforce to be made. The trained staff attached to the Crown Woods has, however, played an important part in the organisation of the new department, and the Commission has been fortunate in securing the services of several experienced foresters trained on private estates. Behind the work of these men lay the knowledge gained by a small but devoted band of forest students and the scientific teaching they had imparted in various universities and agricultural colleges. Several of these scientists are now attached to the Commission. With the assistance of the Development Commission emergency seed beds had been sown towards the close of the war in the Crown nurseries. These proved a most valuable asset in the earlier years.

The Commissioners, as Parliament contemplated, have taken the Report of the Acland Committee\* as their guide. That report

<sup>&</sup>lt;sup>e</sup> Final Report of the Forestry Sub-Committee of the Reconstruction Committee of the Cabinet (Cd. 8881).

recommended a division of the work of afforestation bet sen the State itself and public bodies and private owners assisted by State grants. The portion of this programme definitely applicable to the first five years provided for the afforestation of 33,300 acres of conifers by direct State action. In addition an undefined proportion of the 10,000 acres of hardwoods allotted to the 10-year period was to be replanted by the State. It was also contemplated that 110,000\* acres would be planted or replanted during the 10-year period by local authorities or private individuals with State assistance, but no definite proportion was allocated to the first five years.

The area actually planted by the Commission in the five years was 39,469 acres, of which 37,790 acres were with conifers and 1,679 acres with hardwoods. A part only of this area can be deemed to have been "afforested."† The Commissioners had to decide whether they would confine their efforts to the afforestation of new areas or include the planting of felled woodlands. They decided to include the latter where there was no hope of their being replanted otherwise. 27,817 acres have, in fact, been afforested and 11,652 acres, acquired in a derelict condition, replanted. The proportion of hardwoods has fallen short of the area which the Commissioners desired to plant, the postponement of this expensive work being made in deference to the need for economy. Grantst made to public bodies and private individuals have resulted in the planting (or preparation, with undertaking to plant) of 42,082 acres.

The total area planted under the auspices of the Commission was thus 81.551 acres.

The rate of planting conifers under the State programme was to rise from nil in the first or preparatory year by equal annual increments of 3,300 acres to 13,300 acres in the fifth year ard 30,000 acres in the tenth. In view of the heavy work allocated to the later years, the Commissioners decided to equalise the programme by increasing the quota in the earlier years. At the end of the second year they were nearly 3,000 acres ahead of the programme. At this point the Geddes Committee intervened, with the result that planting was stereotyped for the next three years at 10,000 acres per annum. The advantage gained in the first two years was thus lost and the rate of planting has, at the end of the fifth year, fallen 3,000 acres behind the Acland programme. The Commissioners are thus compelled to face in exaggerated form the precise difficulty they had planned to avoid.

<sup>\*</sup> Cd. 8881, p. 69.

<sup>†</sup> The word "afforest" is used here to denote the planting of waste land or land used for other purposes than forestry as contrasted with the replanting of felled areas.

<sup>‡</sup> Apart from two proceeds-sharing schemes initiated by the Development Commissioners the regular grants advocated by the Acland Committee were, in view of existing conditions, temporarily superseded by unemployment grants. These, though formed on a different basis, have achieved the same object.

The fact that the total area planted with conifers in the five years exceeds the Acland programme by nearly 4,500 acres does not mitigate this misfortune. It is in the acceleration of the rate of planting that the whole difficulty resides. Last year the late Government decided to resume the expanding programme and, provided there is no further change of policy, it is hoped that the ground lost will be regained and the whole ten years' programme accomplished within the time and money prescribed for the purpose by Parliament.

The Commissioners' planting work is entirely dependent on the timely acquisition of suitable land and the raising of stocks of suitable plants in the forest nurseries. In both respects the progress made during the five years has been satisfactory, though interrupted, like the planting itself, by changes in Government

policy.

The area of plantable land acquired is 141,470 acres\*, of which approximately 100,000 acres represents an addition to the existing forest area, the remainder being felled or devastated woodlands. The area to be acquired by the end of the five years was set out by the Acland Committee at 165,200 acres. It is necessary to acquire land well in advance of planting operations and to make sure that at each centre there will be sufficient in prospect not only to provide a forest of economic size, but also to enable planting to be spread over fifteen to thirty or more years so that the forest may contain woods of different ages and thus afford continuous employment and a continuous yield of timber. Subject to this condition there is room for a good deal of give and take, though the Commissioners feel that the margin on which they have been hitherto working is too narrow. In practice it has been found a false economy to work on so narrow a margin.

It has been the policy of the Commissioners to restrict acquisitions so far as possible to land of little value for any other They have been fortunate in obtaining considerable areas of such land, in some cases almost derelict but suitable for timber growing, in Norfolk, Suffolk, Surrey, Dorset, Hampshire and in the Scots deer forests. As regards the last and the Highlands of Scotland generally, it is disappointing to have to record that in many of the districts surveyed the proportion of land too high or poor to grow timber is so large that the acquisition and fencing of the plantable remainder is not an economic proposition. In other parts of England and Scotland where no waste land exists, the Commissioners have had to fall back on hill grazings. Here the present high value of sheep has proved a serious obstacle, and sheep farmers have resented the planting of Other classes, however, seem to realise that a sheep farms. change calculated permanently to increase employment and production ten fold cannot be otherwise than a benefit to the

<sup>\*</sup> Including 4,866 acres of plantable land acquired in Iroland.

district. Arable land is never planted nor is it acquired a all unless required for forest holdings or nurseries or unless it is inseparable from planting land.

In acquiring land the general practice of the Commissioners has been to ascertain the actual net revenue and to arrange a fair price on that basis. Many landowners are personally interested in forestry, and nearly all are friendly to the work of the Commission. The certain cases gifts of land have been made, by Mr. C.H. Brassey, Lord Ullswater and others, a notable instance quite recently being the gift by Mr. H. J. Younger of the estate of Benmore in Argyllshire, extending to approximately 10,000 acres, and containing about 2,500 acres of plantable land as well as valuable collections of trees and shrubs. The average cost of the plantable land acquired by purchase in the first five years works out at approximately £3 & . 0d. per acre. This figure includes a good deal more than the land itself. It includes the cost of any unplantable land inseparable from the plantable, though this is sometimes capable of producing a small return; it also includes buildings, which in many cases the Commissioners have been able to adapt to their purpose thus saving considerable expenditure, and in some cases the value of standing timber. Shorn of these extras, the planting land itself has probably not cost more than £1 15s. 4d. per acre on the average. The average price of plantable land acquired by lease and feu is approximately 2s. 3d. per acre.

In addition to the Crown Woods (see page 13), there are now planting centres in process of planting in England and Wales and 28 in Scotland.\* At most centres the area already acquired is sufficient for a forest of economic size. Elsewhere smaller areas have been acquired to serve as nuclei in districts where plenty of suitable planting land exists. Where there is a ready market for pit-wood relatively small areas can be worked economically. In the absence of such a market the economic unit cannot be placed at less than 1,000 to 1,500 acres. This is the minimum the Commissioners keep in view.

The largest continuous stretch of plantable land which has been acquired is in the Thetford district of East Anglia. Here a forest of 20,000 acres is in the making, and is thus comparable in size with the New Forest. A large proportion of this ground had for many years produced nothing but rabbits, and many of the homes and farms had been abandoned. Twenty cottages and small farms have been put in repair and are now occupied, while a further 27 holdings for forest workers are under construction. The number of men employed varied during the year 1923-4 from 95 in winter to 46 in summer. There is little doubt that the work has been of the utmost benefit to the rural population.

<sup>\*</sup> See map facing page 22.

missioners, since the area which can be planted in any one year is strictly limited by the available numbers of plants of suitable size and species, and it takes on an average three years to raise a suitable plant. The amount of seed required is so large that special arrangements have to be made both in this country and abroad for collection and extraction. The occurrence of bad seed years, which is not uncommon, is apt to upset plans. The production of plants from new nurseries is usually indifferent, and such nurseries require several years' working before they get into good heart. Even so, the cost of the plants raised has been well below the market price. Last year's planting\* (10,519 acres) absorbed over 22 million plants. These plants were raised partly in the nurseries attached to the forests and partly in central nurseries, from which they were distributed.

The actual work of planting, weeding and beating up, including the cost of plants, preparation and fencing, but not overhead charges, now costs on an average about £7 10s. per acre. The cost varies greatly with the district. On the light East Anglian soils, where little preparation is required and small plants can be used, planting is cheap, and in some cases crops have been established by the still cheaper method of direct sowing. In Devonshire or Wales, where rich soils and a soft climate favour a rank growth of weeds, larger plants have to be used and the cleaning of the young plantations is even then an expensive business. This expenditure will eventually be recovered, since these plantations will produce far heavier crops of timber than those made on light soils. Most expensive of all are the areas where felled and derelict woodlands have to be cleared or where unsaleable scrub has to be removed to make way for a better crop. The cost of preparation in these cases often exceeds the capital value of the land. On the light soils Scots pine and Corsican pine are the species mostly employed. On the better soils Douglas fir and larch (European and Japanese) are planted according to conditions, and spruce (Norway and Sitka) on the poorer types of hill There have been some failures, mainly due to the use of too small plants in the earlier years when larger were not available, and to the exceptional drought of 1921. On the whole the plantations look well.

The nucleus of a regular forest service has now been created for the first time in this country. The finance and general administration are necessarily concentrated in the offices in London and Edinburgh, where a staff of 59 are employed, including clerks and typists. The country has been divided into Divisions, of which there are seven in England and Wales (counting the New and Dean Forest each as a Division) and three in

<sup>\*</sup> Including the replacement of failures in the work of previous years.

Scotland. The supervision of the practical work in the hanc of the Divisional and District officers, who number 29. The forests now employ approximately 110 foresters and foremen and, including these, the number of forest workers employed during the last twelve months varied between 1,620 and 2,650 (see page 37).

The Commissioners take this opportunity, at the conclusion of the first quinquennial period, to place on record their appreciation of the able and devoted service rendered by all ranks of the Forest Service.

They wish to call special attention to the work of the Assistant Commissioners for England and Wales and Scotland, Messrs. Pritchard and Sutherland, whose administrative ability, keenness and power of work have made it possible to carry out the Acland Forestry Programme.

The work of the Divisional Officers—Research and Executive—together with the District Officers working under them, also deserves recognition. These officers have worked indefatigably and have shown both intelligence and resource in tackling the many and varied problems which have arisen.

The working foresters, on whom the greater portion of the responsibility of the planting work has fallen, have been well chosen and have proved themselves reliable and competent.

The Clerical and Financial Staff at Headquarters, the Assistant Commissioner's Offices and Divisional Centres, have given efficient service and have materially contributed to the smooth and economic working of the service in the field.

The establishment of workers' holdings in connection with the forests was an integral part of the policy adopted by Parliament. The high cost of building since the war and the limitation of expenditure to the prime object of planting unfortunately caused this side of the scheme to be held up until the close of the fiveyear period. The Commissioners were thus compelled to confine their efforts in this direction to the utilisation and repair of cottages and other buildings acquired with planting land, no new houses being erected unless they were absolutely necessary for the accommodation of foresters in charge. In this way 40 foresters were provided with houses and 43 forest workers with houses and holdings. Meanwhile land suitable for holdings was acquired at practically every planting centre, so that, when the late Government gave the word to go ahead with building last autumn sites were at once available. scheme now in progress is described on page 33 of this Report. These forest workers' holdings are not intended to be selfsupporting, since the tenants and their families can rely on work in the forest for at least six months of the year. land attached to them normally does not exceed 10 acres. It is thus possible to locate a number of holdings in districts where, apart from the work provided by the forest, it would be

discrete for a single farmer to make a living. The Commissioners aim at creating one such holding for every 200 acres of land afforested. In Scotland the Board of Agriculture has co-operated with the Commission and has created a number of small holdings alongside the Commission's operations. Many of the holders find employment in the plantations, and the arrangement is to the general advantage.

The work of the Commission has not been confined to the afforestation scheme above described. The Crown Woods have been taken over and are now managed by the Commission. Consultative Committees have been established in England, Wales and Scotland and have rendered excellent service. survey of the woodlands of the United Kingdom has been organised and almost completed with the assistance of a large body of voluntary workers. Two conferences of foresters from all parts of the Empire have been held, one in London and one in Canada, and as one tangible result an Imperial Forestry Institute has been founded at Oxford providing post-graduate and refresher courses. An attempt has been made to assess the forestry resources of the Empire and of the countries on which we rely for our imports of timber. Grants for Forestry Education have been made to four Universities and Colleges in England and Wales and three in Scotland. The training school for working foresters in the Forest of Dean has been maintained and a new school of similar type established in Scotland near Beauly. Steady progress has been made with forest research and the results published in a series of bulletins and leaflets.

The experience of these five years leads the Commissioners to make an earnest appeal to Statesmen and Members of Parliament in regard to one vital matter. It is evidently difficult for those not actually engaged in organising forest work to realise the importance in this enterprise of steady adherence to a settled Instability of purpose is the bane of an undertaking which depends more than any other on timely preparation. full enquiry and discussion Parliament decided in 1919 to spend £3,500,000 in a ten-year effort to reconstitute the reserves of home-grown timber and secure for this country the collateral advantages of a form of rural development well understood and carefully fostered in other parts of Europe. The changes which have since been made in the interest of national economy have effected a small postponement in expenditure without any eventual saving. But they have completely dislocated the work of the Commission. When, for example, the expanding programme was dropped the number of men in training had to be reduced and ten promising forest officers were dismissed. Now that the expanding programme is resumed the Commissioners find their work sorely hampered by the want of trained men. The Forestry Fund has never been short of money. It has been replenished from time to time both by ad hoc Parliamentary Votes and from money voted for the

relief of unemployment. But authority to spend has alm at invariably been given too late. In one case, for instance, the unemployment grant was withheld till the middle of the planting season, the Government having up to that date declined to sanction any preparation. Without impugning the good intentions of any one concerned or underrating the peculiar difficulty of the times through which the country has been passing, the Commissioners feel bound to call attention to the fact that continuity in policy is the very essence of success in the work committed to their charge. The Commissioners welcome the intention expressed by the present Government of allowing the ten-year scheme to proceed without further interruptions.

#### FOREST POLICY DURING 1924.

GENERAL.—During the year under review two important modifications were made in Forest Policy. In February the Commissioners presented to the late Government a memorandum describing in detail the position and proposing first a return to the Acland Planting Programme, and secondly the systematic establishment of holdings for forest workers as part of afforestation operations. These proposals were fully considered by a Cabinet Committee which recommended the adoption of both proposals and a Supplementary Vote of £275,000 to give effect to them during the financial year 1924-25. The necessary vote was not passed until July so that little effective work could be done during the Forest Year expiring September 30th.

FINANCE.—The balance remaining in the Forestry Fund at the 30th September, 1923, amounted to £211,986, payments into the Fund amounted to £618,942, and out of the Fund to £332,748. The balance in the Fund at the end of the year was consequently £498,180, an increase of £286,194 over the corresponding figure for the previous year. The difference is due mainly to the late date at which the Supplementary Vote for £275,000 was made available.

It should be borne in mind that the balance in the Fund on 30th September of any year has to bear the expenditure of the Commission for the following—the heavier—six months, i.e., to the end of the financial year.

Land Acquisition.—Acquisitions during the year amounted to 34,704 acres of which 20,455 acres were classified as plantable and 14,249 acres as "other," i.e., as too good or too poor to be used for timber production. The acquisitions to the end of the Forest Year, 1924, are compared in the table below with the proposals of the Acland Report. It will be observed that the total area of plantable land acquired during the first five years is less by 23,730 acres than the proposed area, the deficit having increased by 21,145 acres during the year under review.

#### Acquisition of Plantable Land.

Year	By Lea	sing or F	euing.	Ву	Purchas	e.		Total.	
ended 30th Sept.	Proposed (Acland Report).	Actual.	Excess (+) Deficit (-).	Proposed (Acland Report).	Actual.	Excess (+) Deficit (-).	Proposed (Acland Report).	Actual.	Excess (+) Deficit (-).
1920 1921	Acres. 8,800 9,200	Acres. 26,944 19,893	Acres. +18,144 +10,693	Acres. 22,000 22,000	Acres. 6,684 14,968	Acres15,316 - 7,032	Acres. 30,800 31,200	Acres. 33,628 34,861	Acres. + 2,828 + 3,661
1922 1923 1924	8,800 8,800 17,600	22,703 21,885 8,099	+13,903 +13,085 - 9,501	22,000 22,000 24,000	1,234 6,704 12,356	-20,766 -15,296 -11,644		23,937 28,589 20,455	- 6,863 - 2,211 21,145
Total	5 <b>3,2</b> 00	99,524	+46,324	112,000	41,946	-70,054	165,200	141,470	-23,730

#### Planting Programme.

#### (A) STATE FORESTS.

Conifers.—The progress made towards planting the area laid down by the Acland Report is shown in the table below. The area actually planted during the year was 10,065 acres compared with 13,300 acres under the Acland programme, while the total to the end of the year was 37,790 acres compared with 33,300 acres.

Planting Programme: Conifers.

				Acland	Com-			18 (+) it (-) on
		Year.		Com- mittee's Pro- gramme.	mission's revised Pro- gramme.	Actually planted.	Acland Com- mittee's Pro- gramme.	Com- mission's revised Pro- gramme.
				Acres.	Acres.	Acres.	Acres.	Acres.
let :	year,	1919-20		Nil	1,600	1,296	+1,296	- 304
2nd	,, '	1920-21	•••	3,300	5,700	6,105	+2,805	+ 405
3rd	17	1921-22		6,700	8,100	10,517	+3,817	+2,417
4th	"	1922-23		10,000	11,500	9,807	<b>–</b> 193	- 1,693
5th	**	1923-24	•••	13,300	14,800	10,065	-3,235	<b>— 4,735</b>
6th	11	1924-25		16,700	18,100		<del></del>	
7th	23	1925-26	•••	20,000	21,000	37,790	+4,490	-3,910
8th	72	1926-27	•••	23,300	23.000 ·			
9th	11	1927-28		26,700	<b>23</b> ,000			
10th	"	1928-29	•••	30,000	23,200			
	Tota	al		150,000	150,000		'	

It is important to note that although the total area planted in the five-year period is nearly 4,500 acres in advance of the Acland Programme the rate of planting in the fifth year is over 3,200 acres in arrears. Broad-leaved Species.—No definite programme has been lown for the ten-year period. The areas actually planted are:

		${f A}$ cres.
1919-20		$\dots$ 121
1920-21		272
1921-22		176
1922-23		656
1923-24		$\boldsymbol{454}$
	$\mathbf{Total}$	1,679

Total.—The total area planted or sown during the year under review was 10,519 acres.

#### (B) Assistance to Local Authorities and Private Owners.

The area proposed to be afforested or replanted by local authorities and private owners during the 10 years was 110,000 acres, or an average of 11,000 acres per annum.

For reasons explained in previous Reports, no progress was made during the years 1919-20 and 1920-21, but by means of grants for unemployment relief the following work has been accomplished:—

Year.		Planted.	Prepared for Planting.	Cleared of Scrub.
		Acres.	Acres.	Acres.
1921-22		10,192	9,127	3,322
1922-23	•••	6,148	6,075	2,015
1923-24	•••	6,530	2,772	1,721
Tot	al	22,870	$\overline{17,974}$	7,058

This table shows the areas in respect of which grants have been paid. Recipients of grants for "preparation for planting" undertook to plant up without payment of a further grant. The area planted will consequently exceed 40,000 acres.

The following planting work has also been done in connection with two proceeds-sharing schemes initiated by the Development Commissioners:—

				Acres.
1919-20				357
1920-21				213
1921-22				257
1922 - 23				91
1923-24				320
	Total	• • •		1,238

#### Education and Research.

During the year under review arrangements were completed in accordance with Resolution No. 4 of the British Empire Forestry Conference (Canada), 1923, for founding at Oxford a Forestry Institute for post-graduate, research and refresher courses. By the consent of His Majesty the King the Institute is styled the Imperial Forestry Institute. It is controlled by a Board of Governors, of whom the University nominates one-half and the Commissioners and the Colonial Office the remainder. The contribution from the Forestry Fund towards the expenses of the Institute is fixed at £2,000 per annum for a period of five years. The contribution of Colonial Governments was fixed in the first instance at £3,000 per annum for a similar period, but has since been increased to provide for special work in which the Colonies are particularly interested.

The Institute, which is temporarily housed in conjunction with the University School of Forestry, opened at Michaelmas term 1924 with nine students. The first Board of Governors is constituted as follows:—

Lord Clinton, Forestry Commissioner (Chairman);

The Vice-Chancellor of Oxford University, Mr. J. Wells, M.A., Warden of Wadham College;

The President of Magdalen, Sir Herbert Warren, K.C.V.O., M.A., Hon. D.C.L.;

Professor W. G. S. Adams, Fellow of All Souls College;

Mr. R. L. Robinson, O.B.E., B.A., B.Sc., Forestry Commissioner:

Major R. D. Furse, D.S.O., Colonial Office;

Lieut.-Colonel G. L. Courthope, M.C., M.P., Empire Forestry Association;

Professor R. S. Troup, C.I.E., M.A., D.Sc., Director.

#### The Crown Woods.

By Order in Council dated March 21st, 1924, the following Crown properties, consisting chiefly of woods and forests, were transferred from the Commissioners of Woods and Forests to the Forestry Commissioners as from April 1st, 1924, and, subject to local acts affecting individual forests, will in future be managed on the same principles as estates acquired by the Commissioners for afforestation purposes:—

	Approx. total area.
$\mathbf{Forest}.$	Acres.
New Forest, Hants	65,000
	1,450
Parkhurst Woods, Isle of Wight	 1,393
Alice Holt Woods, Hants	 2,154
Woolmer Woods, Hants	 $\dots 2,070$
TO 1	 2,200
Dean Forest,* Gloucester	 19,871

Includes Abbots Wood, Clearwell Woods and Hope Wood.

	Approx. total area Acres.
Forest.	Acres.
Highmeadow Woods, Gloucester	3,500
Dymock Woods, Gloucester	715
Tintern Woods, Monmouth	<b>3,</b> 700
Hafod Fawr, Merioneth	1,369
Salcey Woods, Northants	$1,\!278$
Hazelborough Woods, Northants	448
Delamere Woods, Chester	2,000
Chopwell Woods, Durham	820
Inverliever, Argyll	12,680
Total	120,648
<del></del>	

In the case of Bedgebury the transfer was jointly from the Commissioners of Woods (who owned the soil) and the Board of Trade (who owned the timber).

The Commissioners have not yet had an opportunity of making a detailed classification of the areas transferred, but according to the hundred and second Report of the Commissioners of Woods the areas carrying timber or under forestal treatment amounted to 62,554 acres.

By agreement between the Treasury, the Office of Woods and Forests, and the Forestry Commission the transfer was effected on the basis of a "clean cut" at April 1st, 1924; that is to say, the Commissioners assumed all the assets and liabilities of the individual properties as from that date.

#### OPERATIONS—FOREST YEAR 1923-24. The Forestry Fund.

The position of the Forestry Fund at September 30th, 1924, and at the same date in previous years is shown in Table I.

Table I.—Forestry Fund Account.

			${f R}{f e}$	ceipts.		Payments.	
Year ending 30th Sep-	Balance from pre- ceding Year.		stry Fund	For Relief of Unem- ployment	Totals.	Table II. Heads	Balance remaining in the Fund 30th Sep-
tember.		Parlia- mentary Votes.	Other (Table II. Head Z.)	Parlia- mentary Votes.	I Ovais.	A. to L.	tember.
	(1)	(2)	(3)	(4)	(5)	(6)	(7)
	£	£	£	£	£	£	£
<b>192</b> 0	Nil.	478,000	12,229	_	490,229	106,858	383,371
1921	383,371	200,000	29,149	<u> </u>	229,149	318,768	293,752
1922	293,752	20,000	24,544	250,000	294,544	398,431	189,865
1923	189,865	153,000	40,736	100,000	293,736	271,615	211,986
1924	211,986	453,000	85,942	80,000	618,942	332,748	498,180
Totals		1,304,000	192,600	430,000	1,926,600	1,428,420	

The Parliamentary Votes for £453,000 were made in two sums consisting of £178,000 and £275,000, the latter being a supplementary Vote in consequence of the decision to revert to an expanding planting programme and systematically to establish forest workers' holdings.

Receipts and payments by Parliamentary Heads of Accounts are shown in Table II. In comparing figures for 1923 and 1924 it must be borne in mind that the latter include six months' expenditure and receipts in connection with the transfer of the Crown Woods. The total payments increased from £271,615 to £332,748, the largest change being under Fcrestry Operations (sub-head E), which increased by £67,473. Receipts increased from £40,736 to £85,942, the newly transferred Crown Woods accounting for a considerable proportion of the increase. The net payments for 1924 were approximately £16,000 more than in the previous year.

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

<u>.</u>	A.	В.	c.	D.	E.	F.	G.	н.	J.	K.	L		z.	
Year ending 30th September.	Salaries, Wages and Allowances.	Headquarters Charges.	Assistant Commissioners' Charges.	Divisional Officers' Charges.	Forestry Operations.	Advances for Afforestation Purposes.	Education.	Research and Experiment.	Agency and Advisory Services.	Special Services.	Forest Workers' Holdings.	Total Pay- ments.	Re- ceipts	Net Pay- ments.
	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	(14)
1920	£ 25,156	£ 577	£ 1,825	£ 4,829	£ 66,550	£	£ 4,547	£ 1,538	£ 1,577	£ 259	£	£ 106,858	£ 12, <b>2</b> 29	£ 94,629
1921	71,925	1,256	3,880	10,207	208,630	352	9,222	<b>3</b> ,340	9,557	899	_	318,768	29,149	289,619
1922	51,459	4,454	5,242	7,614	201,139	51,050	10,386	2,686	68,395	1,006	_	398,431	24,544	373,887
1923	38,050	2,137	2,439	4,722	156,965	30,790	8,717	2,308	15,151	10,336	_	271,615	40,736	280,879
1924	_	1,847	1,512	5,287	224,438	45,247	4,830	2,810	2,096	1,960	5,036	332,748	85,942	246,806
Totals	224,275	10,271	14,898	32,659	857,722	127,439	37,702	12,682	91,776	18,960	5,036	1,428,420	192,600	1,235,820

The working results for 1924 and previous years are shown in Table IIa, in which all salaries, wages, allowances and similar charges which have to be kept separate for Parliamentary purposes are allocated to the appropriate objects of expenditure. Income and expenditure for each year are brought to account irrespective of whether they have been received and paid respectively, while a proportion of the expenditure on unemployed labour, representing additional cost over normal work or expenditure incurred on work undertaken before its due time, on Forestry Operations (sub-head E) is carried to Special Services (sub-head K). Table IIa, which is the basis of the financial tables appearing later in the Report, consequently differs in some respects from Tables I and II, which show cash transactions only.

					Ext	Expenditure.	je.							Income.	Je.	1			
Subheads A to D. i.e. Superior Supervision and Overhead	<b>B</b>	<b>B</b>		뚄	!	ශ්	Ħ.	ي.	Ä.	ьi	(01)	Z.1	Z.2 I	Z.3	Z.4	Z.5	70	to (18)	6 Col.
-8196 -101	-8196 -101	-8196 -101	101					-6.d- .es.	icea.	,618,	P4 (8	e <b>r</b> 8-		-195 -195	Tol	 		(z1	ituri 1) .[(
Un- Un- Sed). y Oppes	Un- ted).  Opposes	y Opposes	es estat oses.	estat oses.		·uo	nəmi	bna bivie	Serv	Vork. inge.	.6¥. (3	qO v		3	nent.	'898	orke	) .elo	pe <b>nd</b> se Co
Totals.  Allocate Subh to 1  Capital (allocati forestr forestr forestr tions.  Affor Affor Affor	Le to I  Oapital ( allocate  Torestry  tions.  Advanc  Affort	Forestry tions. Advanc Affor Purp	ьтопв. Адуапс Айот Ригро	тоћА отиЧ	itaanbii		Кегеатс Ехрег	Agency S	Special	V teetoT Hold	OO latoT euloni	Готевиту tions.	Educati	Agency visory vices. Kesearol	гітөскі Адуансе	editores Purpo	Special S W testo T	oibloH OO LatoT isuloni	Zet Exp
(4) (5)	(3) (4) (5)	(4) (5)	(5)	-	$\Box$	ල -		(8)	6	(01)	(11)	(12)	(13)	(14)	2)	(16			(S)
4	34 ·	대 대	વા '		90	વર		વર	વા	<b></b>	લ		앢	વર	— લ	વર	વર     વર		l
334,148 1,373	1,820 334,148 1,373	334,148 1,373	1,373		., ., .,	7#7	5,472	7,809	5,401	l	387,567	37,337	199	889	· 1	<u> </u>		- 38,224	349,343
7 7 7 7 7 7 7 7 7 7 7 7 7 7 7 7 7 7 7 7	14,060	- Cac <sub>1</sub> ±1	]		4		- 	100,00	70/	Ι.	56.544		1	8996	· 		- 92	- 19,79	
1,516	1,516 229,644 60,426	229,644 60,426	60,426	60,426 12,35	2,35	~	6,646	60,658	13,495	l	384,742	30	1,396	547 E	299	111 2	252	- 34,172	
44 286 56 181 009 37 505	781 4,131 — 56 181 099 37 505	181 099 37 505	37.505		202	<u>-</u>	"	17,563	8 007	1	23,103		08:	5,574	<u>.</u>  }	 	 	6,239	
123	and the state of t	1 1 1 1	2   3		1			1,421	9,446		708.01	5	0191	9 %	2	6	77	- 35,264	225,288
006'1   756'	208 25,972 1,900	25,972 1,900	006'1   756'	006	983	_	1,789	1,688	3,268	826	36,634	١	١	,			<b> </b> 		36.634
221,065 45	,065 45,247 7	,065 45,247 7	,065 45,247 7	247 7	7,26(		-	2,097	6,985	5,075	293,079	869'06	324	13	6	64	14	8 91,130	
36,634 36,426 208 247,037 47,147 8.243	208 247,037 47,147 8	247,037 47,147 8	47,147 8	· 00			7,139	3,785	10,253	5,901	329,713	869,06	324	13	6 	64	141	8 91,130	238,553
Great Britain 221,350 21,750 3,600 991,928 146,451 53,936 Ireland 27,262 26,479 783 18,674 – 2,877	3,600 991,928 146,451 783 18,674	991,928 146,451	146,451	l	3,93 2,87		34,382	90,400	35,976 10,215	5,901	1,362,574	192,641 690	3,429	1,284 5	286	564 2	278	8 198,790 - 26,041	1,163,784
248,612 244,229 4,383 1,010,602 146,451 56,813	4,383 1,010,602 146,451	1,010,602 146.451	1	1	8.9		34,382 1	148,365	46.191	1.90.	1.453.088 193.331		2 500	96 599	1 989	264	Füe	188 166 8	
					٠ إ		_	_			000600		2						102,022,1

Notes.—1. Figures in italica relate to Ireland.
 2. Salaries of Instructors in Schools and of Research and Experiment Officers are shown under Salaries, Wages, etc. (A.) in Table II, but under Education (G.) and Research (H.) in the above Table.
 3. Table II. shows under Forestry Operations the total payments made. In Table IIa., however, an amount representing uneconomic labour, etc., in respect of Unemployment Relief Schemes has been deducted from Forestry Operations (E.) and transferred to Special Services (K.).

#### Sub-heads A to D, General Organisation: Expenditure, £36,634.

Additional work in consequence of the transfer of the Crown Woods and reversion to the expanding planting programme has been met by treating the New Forest and the Forest of Dean as two additional Divisions and allocating the remaining transferred subjects among the existing Divisions. In addition, a beginning has been made to strengthen the technical organisation by appointing new District Officers, so that in due course there shall be two at least to each Division.

The expenditure figure of £36,634 (Col. 1) is not comparable with that of £44,342 for 1923 owing to the fact that the latter includes a contribution of £6,866 towards a Pension Fund, an obligation which the Treasury has now decided shall be met as it accrues by payments from revenue. The Pension Fund was accordingly abolished during the year and the balance (£7,043) credited to 1924. Disregarding the Pension Fund therefore, comparable figures of expenditure would be: 1924, £43,677; 1923, £37,476.

# Sub-head E, Forestry Operations: Expenditure £247,037; Income, £90,698.

Both expenditure and income show substantial increases over 1923 in consequence of the transfer of the Crown Woods and also, in the case of expenditure, because of renewed preparations for meeting the expanding planting programme, expenditure being £65,938 greater and income £57,091 greater.

The total direct expenditure amounted to £221,065 and overhead and superior supervision charges to £25,972.

Income amounted to £90,698, of which £42,852 represented sales of forest produce, £25,264 rents, £10,839 sales of land, buildings, etc., £11,743 "Other," including sales of surplus sheep stock.

The main items of expenditure and income are shown in Table E, which also gives the comparative figures for previous years.

	•1	Zet Zyenditure	(15)	ધ્ય	296,811 <i>14,418</i>	198,645 3,566	147,492	156,339	799,287 17,984
	2).)	Total.	(14)	£ 6.846	27,458 105	30,999 585	33,607	869,06	192,641 690
	(Col. (12).	Other.	(13)	£ 153	1,955	16,702 493	9,854	11,743	40,407 493
	Table $\Pi a$ .	Forest Produce.	(12)	£ 9,272	20,444	7,283	16,902	42,852	96,753
	Income. Ta	Rents.	(11)	£ 154	5,059 102	6,474	5,951	25,264	42,902 180
erations.	Inc	Sales of Land, Buildings, etc.	(10)	900 J		540	006	10,839	12,579
Table E.—Analysis of Forestry Operations.		Total.	(6)	भ	334,148 <i>14</i> ,523	229,644 4,151	181,099	247,037	991,928 18,674
of Fore		Stores and Miscellaneous.	(8)	£ 2,432 )	$\begin{array}{c c} 59 \\ 15,766 \\ 468 \end{array}$	30,516 211	19,879	26,404	94,997
Inalysis	Col. (4).)	Roade and Buildinge.	(7)	£ 1,472	7,986	4,779	5,049	7,318	26,604
e E.—A		Preparation and Sale of Produce.	(9)	£ 357	1,680	3,918	4,287	9,217	19,459 40
Tabl	(Table $\Pi a$ .	Сијентај Орегађјопа.	(5)	£ 19,611	680 1,289	129,414 819	82,359	114,356	431,378 2,788
	enditure.	Acquisition of Land, etc.	(4)	£ 40,393	85,803 5,294	17,191 1,737	892,72	49,418	220,573 7,031
	Expe	Local Supervision.	(3)	$rac{\mathfrak{L}}{1,236}$	65,093 5,093 59	9,816	10,552	14,352	41,049
	  -  -	Superior.	(2)	<del></del>	28,227	17,639 695	12,709	16,447	75,922 1,078
		Отегреяд Ораг <u>g</u> ев.	(1)	ધ્ય	38,454 6,208	16,371 548	18,496	9,525	82,846 6,756
		Year ending 30th September.		1920)	1921	1922	1923	1924	Total

Note,-The figures in italics refer to Ireland.

# FIFTH ANNUAL REPORT OF FORESTRY COMMISSIONERS. [H.C. 107/1924-25.]

#### CORRIGENDUM.

Page 19. Land acquired from 29th November, 1919, to 30th September, 1924.

In 5th column of table—

For "Plantable (including planting)" read "Plantable (including planted)".

Noverhead Charges, £9,525; Superior Supervision, £16,447, and Local Supervision, £14,352.—Overhead charges is an apportioned sum representing the expenditure on all salaries, allowances and office charges other than those of Divisional Officers, District Officers, Deputy Surveyors and their Assistants (all of which are included under Superior Supervision), foresters and foremen (included under Local Supervision).

On the 1st April, 1924, the Deputy Surveyors of the New Forest and Dean Forest, with four Assistants and clerical staffs, were transferred to the Commission, and in August, 1924, the

number of District Officers was increased by three.

The number of foresters and foremen increased by thirty during the year.

Acquisition of Land, Buildings and Standing Timber: Expenditure, £49,418.—During the year £38,813 was paid in respect of the purchase of land, including the standing timber and buildings thereon, and £10,605 in respect of land held on long lease or feu.

The average rent or feu duty for land acquired during the year by lease or feu is approximately 1s. 4d. per acre and the average price for land purchased approximately £2 3s. 5d. per acre, or if the whole be charged against plantable land only, 2s. 4d. and £3 13s. 6d. respectively.

Land acquired from 29th November, 1919, to 30th September, 1924.

		By Le	ease and	Feu.	Ву	Purchas	ie.	Total by
_		Plant- able (in- cluding planted).	Other Land.	Total.	Plant- able (in- cluding planting).	Other Land.	Total.	Lease, Fen and Pur- chase.
P. 7 . 2 . 2 . 2 . 2 . 2 . 2 . 2 . 2 . 2		Acres.	Acres.	Acres.	Acres.	Acres.	Acres.	Acres.
Finally completed Entry secured		35,882 15,710	69 <b>2</b> 818	36,574 16,528	24,717 3	631 —	25,318 3	61,922 16,531
Total	<i></i>	51,592	1,510	53,102	24,720	631	25,351	78,453
Soutland-								
Finally completed Entry secured		31,926 13,719	23,014 18,442	54,940 32,161	14,563 84	27,477 40	42,040 124	96,980 32,285
Total		45,645	41,456	87,101	14,647	27,517	42,164	129,265
Ireland (to 31st March, 1922 Finally completed	:) <del>_</del>	2,287	£32	2,819	2,579	795	3,374	6,193
Total		2,287	532	2,819	2,579	795	3,374	6,193
Grand Total		99,514	43,498	143,022	41,946	28,943	70,889	213,911

The area in respect of which the legal formalities of acquisition by the Department had been completed by the 30th September, 1924, was 165,095 acres, the corresponding figures in the two previous annual reports being 125,337 and 102,094 acres. From

these areas 6,193 acres situated in Ireland have to be deduct. In addition to these completed acquisitions, entry has been secured to a number of other properties. Details are given in the table on p. 19, which also shows the area of "plantable" and "other land," i.e., land which is either too poor to plant or is required for other purposes.

The total area acquired to 30th September, 1924, is 213,911 acres, of which 141,470 acres were classified at the time of acquisition as plantable. Of the plantable area 76,312 acres (54 per cent.) are situated in England and Wales and 60,292 acres

(42.6 per cent.) in Scotland.

Cultural Operations: Expenditure, £114,356.—Expenditure on Cultural Operations relates to plantations and nurseries of which the former absorbed £72,834 and the latter £41,522. An analysis of expenditure is given in Table E.5.

Plantations.—Of the total expenditure on plantations £56,039 was in respect of first plantings and £16,795 in respect of weeding and beating up existing plantations. The item £6,334 (Table E.5 col. 6) is in respect of Forest Protection and includes labour and material for protection against trespass, fire, injurious insects and fungi, vermin, etc. In future years this item will be dealt with somewhat differently as a considerable proportion of the expenditure will be in respect of the forests as a whole and not merely of the year's plantings.

The total area planted or sown during the year was 10,519 acres, of which 10,065 acres were placed under confers and 454

acres under broad-leaved species.

The total addition to the woodland area of Great Britain was 7,585 acres, the remaining plantations being on the site of felled woodlands. In making these plantations and in beating up the previous years' plantations 22,173,000 trees were planted, of which 48 per cent. were Scots and Corsican pines, 26 per cent. Norway and Sitka Spruces, 10 per cent. European and Japanese larches and 11 per cent. Douglas fir.

The cost of planting in England and Wales works out at £7 7s. 5d. per acre, and in Scotland at £8 2s. 1d. These figures include preparation of ground, drainage, fencing, plants and planting, beating up and weeding, but do not include supervision. The cost of clearing scrub is included, but not the receipts. Except for seed, tools and wire the whole of the expenditure was on wages.

The figures relative to areas and species stated in the tables on pp. 24-25 are exclusive of 965 acres planted in the Crown Woods which came under the technical supervision of the Commissioners, and are shown separately on p. 26. During the second half of the year under review part of the total expenditure incurred by the Commission on Cultural Operations was in respect of the plantations in transferred subjects. This expenditure has not been shown separately, since in future years all the properties will be treated on the lines already adopted for the Commission's forests.

				21					
	Grand Total		(15)	£ 19,611 680	85,638 1,289	129,414 $819$	82,359	114,356	431,378 2,788
		Totals.	(14)	£ 7,665 680	28,336 662	$61,247 \\ 66$	31,602	41,522	170,372
Nurseries.	Оркеер.	Labour and Other.	(13)	£ 5,448 560	19,308 647	49,146 32	27,813	34,858	136,573 1,239
Nurs	ηďΩ	Seed.	(12)	$\mathfrak{t}_{1,127}$	5,297	8,253	2,739	5,665	23,081 134
		New Works.	(11)	£ 1,090 20	3,731 $I5$	3,848	1,050	666	10,718
	sequent	Totals.	(10)	<b>ध्यः ।</b>	1,492	4,891	5,331	16,795	28,509
	Second and Subsequent Years.	Weed-Beating ing.	(6)	<del>сы</del>	999	3,767	2,135	2,897	12,464
	Second	Weed- ing.	(8)	<b>4</b> 3	827	1,124	3,196	10,898	16,045
		Totals.	(7)	£ 11,946 —	55,810 627	63,276 753	45,426	56,039	232,497 1,380
TIONS.		Other.	(9)	£ 183	2,342	2,869 16	3,385	6,334	15,113 22
PLANTATIONS.	gs.	Weed-	(2)	£ 705 —	1,033	1,946	3,227	4,191	11,102
	First Plantings.	Plant- ing.	(4)	£ 3,561 —	27,310 144	24.137 437	12,622	13,901	81,531 581
	First	Feucing.	(3)	£ 3,279 —	12,550 162	12,231 283	10,577	14,448	53,085 445
		Drain- age.	(2)	£ 843	1,794	4,352 10	4,065	4,361	15,415
:		Prepara- tion of Ground.	(1)	£ 3,375 —	10,781 155	17,741	11,550	12,804	56,251 162
	Year ending	30th Sept.		1920	1551	2261	1923	1924	Totals

Note.—The figures in italics relate to Ireland.

#### SCOTLAND.

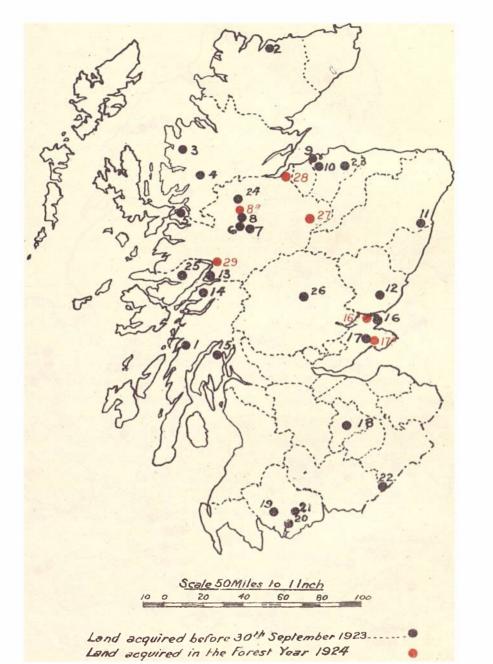
#### FORMER CROWN WOOD.

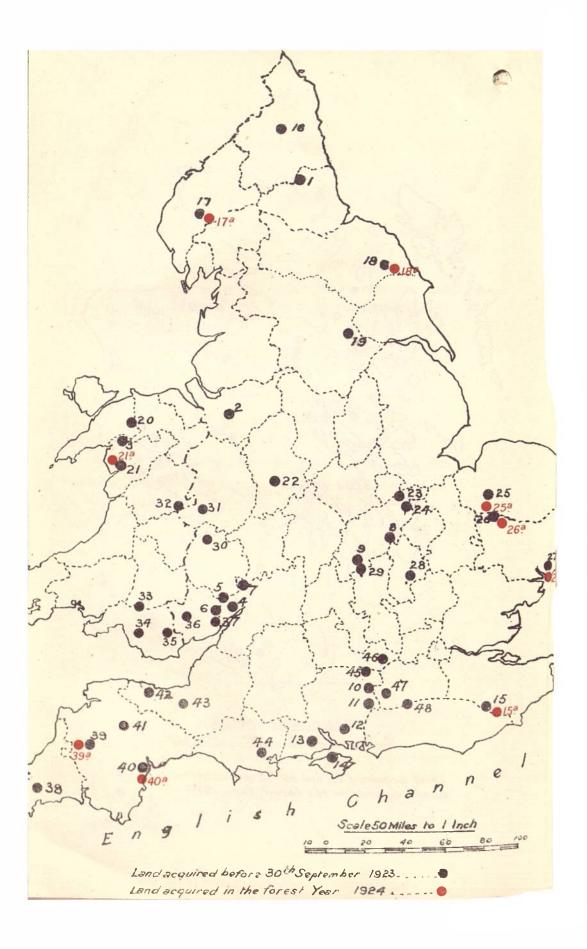
#### 1. Inverliever.

#### FORESTRY COMMISSION AREAS.

2.	Borgie.		<b>16</b> .	Tentsmuir.	
3.	Slattadale.		16a.	Do.	(addition to).
4.	Achnashella	ch.	17.	Edensmuir.	
5.	Ratagan.		17a.	Do.	(addition to).
6.	Inchnacardo	och.	18.	Glentress.	
<b>7</b> .	South Lagg:	an.	19.	New Gallow	ay.
8.	Port Clair.		20.	Screel Hill.	
8a.	Do.	(addition to).	21.	Aucheninne	9.
9.	Culbin.		2 <b>2</b> .	Newcastleto	n.
<b>10</b> .	Monaughty.		23.	Teindland.	
10a.	Do.	(addition to).	24.	Glen Urquh	nart.
11.	Kirkhill.		<b>25</b> .	Glenhurich.	
11a.	Do.	(addition to).	<b>26.</b>	$\mathbf{Drummond}$	Hill.
<b>12</b> .	Montreathm	iont.	<b>27</b> .	Glenmore.	
13.	Glen Righ.		28.	${\bf Culloden}$ .	
14.	Glenduror.		<b>29</b> .	Nevis.	

15. Glenbranter.





#### ENGLAND AND WALES.

#### FORMER CROWN WOODS.

1.	Chopwell.	9.	Hazelborough
· 2.	Delamere.	10.	Alice Holt.
3.	Hafod Fawr.	11.	Woolmer.
4.	Dean Forest.	12.	Bere Woods.
5.	Highmeadow.	13.	New Forest.
6.	Tintern.	14.	Parkhurst.
7.	Dymock.	15.	Bedgebury.
8.	Salcey.		

#### FORESTRY COMMISSION AREAS.

- 15a.	Bedgebury	(addition to).	- 30.	Mortimer.	
· 16.	Rothbury.		•31.	$\mathbf{Walcot}$ .	
17.	Thornthwa	ite.	- 32.	Kerry.	
17a.	Do.	(addition to).	$\cdot$ 33.	Rheola.	
· 18.	Allerston.		<b>34</b> .	Margam.	
18a.	Do.	(addition to).	·35.	Llantrisant.	
	Selby.		·3 <b>6.</b>	Llanover.	
· 20.	Gwydyr.		·37.	Chepstow.	
· 21.	Vaughan.		-38.	Bodmin.	
21a.	Do.	(addition to).	· <b>3</b> 9.	Halwill.	
22.	Cannock C	hase.	39a.	Do.	(addition to).
23.	Westhay.		·40.	$\mathbf{Haldon}$ .	
24.	Apethorpe.		40A.	Do.	(addition to).
	Swaffham.		· 41.	Eggesford.	
25A.		(addition to).	$\cdot 42.$	Exmoor.	
	Thetford C	hase.	· <b>43</b> .	Quantocks.	
26A.	Do.		· 4 <b>4.</b>	Wareham.	
	Rendleshan	a.	45.	Bramshill.	
27A.		(addition to).	<b>46</b> .	Wokingham.	
	Ampthill.		· 47.	Churt.	
. 29.	Brackley F	Iatch.	· <b>4</b> 8.	Chiddingfold	•

Plantations. Year ended 30th September, 1924—England and Wales.

Forest.  Allerston, Yorks 308 Ampthill, Bedford 308 Bodmin, Cornwall 7 Brackley Hatch, Northants 7 Branshill, Ilants 7 Cannock, Stafford 28 Connock, Stafford 28 Cohepstow, Mommouth 28 Chepstow, Mommouth 28	Afforested.  ni. Broad.  17. Ieaved.  4 32  7		rested.	Total.	1	m	-				-			
thants					т_	Ė	p	Design Line	Norway					
thants		fers.	Broad- leaved.	Coni- fers.		я.	Jap. Larch.	Pir.	and Sitka Spruce.	Oak.	Ash.	Beech.	Others.	Totals.
s st			1	308	-	365	59	167	45				_	640
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· Churt. Surrey	1	60	111	9	117	201	0		en	717	8	l	<b>⊋</b>	261
ahir.		3.5		7 0	 	190	i	l	I	1	i	ı	1	180
· Eggeford Degon		2.3		2;		77	٦	۱ ٔ	1	I	l	ſ	I	172
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:	+ 0	1	ı	44		149		0	1	1	I	١	1	159
Tally Carnaryon 03		66	1	162	1	96	83	122	388	7	6	21	9	726
:	1	78	i	79	ı	144	14	34	110	1	ı	١	1	302
:	  -	35	ı	140	1	22	63	125	139	1	ı	ŀ	1	291
.×  :	ا ا	1	ı	253	ľ	1	1	130	428	١	١	I	i	555
Lianover, Monmouth 65	5  -	80		150	١	337	21	71	9	l	ı	13	١	502
уал	1	99	1	99	ı	68	22	98	92	ł	l	c	oc.	279
. Margam, Glamorgan 166	ا —	l	4	166	+	72	92	101	107	ı	1		16	379
:	\ -	354	1	354	1	7.1	161	130	85	1	25	1	1	469
:	- 62	161	1	240	ı	65	64	165	33	1	1	4	1	327
		1		682	1	1,630	1		1	١	1	1	44	1.674
_	1	09	l	144	1	49	40	53	71	į	1	_	80	222
Kotnbury, Northumberland 178	   	1	1	178	ı	1	125	31	134	1	1	1	١	290
:	1	œ	210	<b>∞</b>	210	ì		1	17	l	379	I	30	426
:	<u> </u>	1	ı	295	1	069	89	33	3.	l	1	i	တ	808
Thectord Chase, Sunoik 1,036	 	1	1	1,036	!	2,077	20	I	I	1	ł	1	18	2,165
erland -	l	12	1	15	1	37	-	l	260	1	-	١	1	298
oneth	 	83	ı	162	1	106	30	124	92	l	00	İ		360
:	  -	173	1	173	1	34	160	116	58	I	ıc	]	1	979
.Wareham, Dorset 181	  -		1	181	l	1	1	œ	-	١	1	١	36	4
Westhay, Northants	  -	1			١		1	1	<b>'</b>	ا	13		3 0	di.
. Wokingham, Berks —	 	160	1	160	ı	259	ŀ	ı	1	1	1	I	ì	6
District Dis	<u> </u>						j							
	32	2,424	381	5,682	413	ı	1	ı	1	1	1	I	!	1
- :		621	1	280				I	1	1	ı	١	I	i
Great Total	90	9.520	.00											

22,173

250

135

501

285

5,674

2,350

2,321

10,657

**454** 

10,065

381

2.553

73

7,512

Total, Great Britain :

Green Truel	11.798	an and	Dlandadion o.	14 :	Vanr. andod	3014	Sopriom hor, 1024	-1024-	Soutland.	land.		-	•	134 - FLW	11.500
	_		Area planted (acres).	ed (scres	  -			Speci	es plante	Species planted, including beating up (thousands)	ng beat	ing up	(thousar	ıdı).	
Forest.	Affo	Afforested.	Re-aff	Re-afforested.	Ĭ	Total.	1	Bur.	- 3	Norway					
	Coni- fers.	Broad.	Coni- fers.	Broad- leaved.	Coni- fers.	Broad- leaved.	sican Pine.	and Jap. Larch.	Fir.	Sitka Spruce.	Oak.	Ash.	Beech.	Others.	1. Al.
Achnashellach, Ross	209			1	209		44	52	54	218	1 1	-	=	1 1	368
Auchemnnes, Kirkcudbright Borgie, Sutherland	3.6	- 1	11	 	72	-	87	۲	, ic	96	1 1	1 1	22	Н	202
Culbin, Elgin	356	27	11		356 172	ا ہ	662	3	۱,۳		1 1	1 1	1	rc	$^{711}_{277}$
Edensmuir, Fife	124	-	1	!	124	-	241	[]	ı	11	ı	1	' <sub>1</sub>	1	253
Glenbranter, Argyll	350	10			350	c:	1 1	21 50		523 359	[ ]	1 1		ا م	525 369
Glenburich, Argyll	144	۱ ا		- 	144	۱ ۱	1	71	<u>'</u>	84	]	l	1	1	155
Glenmore, Inverness	199	ı	1	1	199		133	45 -	∞ <del>4</del>	147		1 1	<b>→</b>	<del>-</del> -	341 161
Glentress. Peebles	<u> </u>	I I	1 1		္က တ		100	106	£ 89	19	1			67	295
688	105	1		1	105	l	1	34	19	66	1	1	1	] '	152
Inchnacardoch, Inverness	190	=	1	1	190	1 =	2	١٥	999	731 103	1	]	1 -	— cr	26 26 26 26 26 26 26 26 26 26 26 26 26 2
Monanchty Elein	140				140	9	96	198	. <del></del>	107	11		12	. rc	
Montreathmont, Forfar	125	1	1	1	125	1	212	21	12	87	1	i	S		341
Newcastleton, Roxburgh	132	۳ ا			132	=	1 %	× 9	%	362	1 1	1 1		il	370 246
Port Clair, Inverness		ا ء		- 	159	۱ :	3	3	င္ဆင္ဆ	121			· 1	. 1	206
Ratagan, Ross	113	1	ı	ı	113	i	'	င္ထင္တ	20	86	1	j	1	I	157
Screel Hill, Kirkeudbright	[] []	1	1	ı	5 5		9 =	6.7	4. 6. 6.	133				li	177
South Laggan, Inverness	102		 	1 1	102		; 	38		160		ı	<u> </u>	ļ	198
	97	τc -		- 	97	rc -	153	21	11	8 91	11	1 1	1 1	2	182 465
Totals—		,   				•									
Planted Direct Sowing	3,761 42	<del></del>	11	11	3,761	141	11	11	11	11	ll	11	1-1	11	1 1
Grand Total	3.803	41			3,803	41	2,424	1,140	498	3,269	1	1	81	32	7,444
					<i>9</i> 2	SUMMARY.	3Y.								
England & Wales Sootland	3,709	- 32 +1	2,553	381	6,262 3,803	413	8,233	1,181	1,852 498	2,405 3,269	285	501	14 28 	218	14,729
								ĺ			İ		]		

		<del></del>		1	ا
	İ	Total.	585 585 585 888 888 5917 6611 6611 167 167		2,036
в).		Others.	2   E           2   5 m	11	91
thousand	. —	Beech.		11	38
) qu gaig		Ash,	13 		34
ding bear		Oak.	3   68	11	130
Species planted, including beating up (thousands).	Norway	and Sitka Spruce.	62 99 118 120 10 10	1	569
scies plan		Douglas Fir.	109 109 20 164 37	11	396
Spe	Bur.	& Jap. Larch.		11	242
_	Scots,	and Cor- sican Pine.	28 22 22 117 88 88 197 197 197	11	536
	al.	Broad- leaved.	13 12 12 13 13	109	109
ċ	Total.	Coni- fers.	140 116 117 110 110 110 110 110 110 110 110 110	856	856
Area planted (acres).	Re-afforested.	Broad- leaved.	13 12 12 13	109	109
rea plant	Re-aff	Coni- fers.	14 40 183 36 36 36 11 11 61	889	688
<b>⋖</b> 1	ested.	Broad. leaved.	[[]]]		l
	Afforested.	Coni- fers.	1	168	168
-	Forest.		Alice Holt, Hants Chopwell, Durham Dean Forest, Glos. * Delamere, Cheshire Dymock. Glos Hazelboro' N'thnts Inverliever, Argyle New Forest, Hants Parkhurst, I. of Wight Salcey, Northauts Tintern, Monmouth Woolmer, Hants	Totals— Planted Direct Sowing	Grand Total

\* Includes Abbots Wood, Highmeadow Woods and Hope Wood.

† Trunsferred to the Commissioners on 1st April, 1924.

r'orest Fires.—For the first time the Commissioners' experienced, during the year under review, serious trouble from forest fires. Practically all of them occurred in the late winter (February and March) when a long period of easterly winds rendered the grass very inflammable. The total number of fires reported was 126, and the total area affected was 641 acres. Many of the fires were quite trivial in character, but 19 fires were of a serious character and destroyed 474 acres of plantations. The causes of the fires were various. The three most serious were caused respectively by (1) boys lighting gorse, (2) sparks from railway engines, and (3) apparently malicious action. The most frequent cause of fire was sparks from railway engines.

The Commissioners have given considerable attention during the year to the prevention of fires, and have improved the

organisation for prevention and control.

Nurseries.—The total area under nurseries at 30th September, 1924, was 482 acres stocked with 179 million seedlings and 57 million transplants. Comparative figures for the three years 1922-24 are given in the following table:—

Nurseries.

Year end-		S	Seed Sow	n		Sto		nts at 30t thousands		ıber	
ng Dth	Country.		(lbs.)		Т	ransplant	68.	t -	Seedlings	ı.	
tep- tem- er.		Conifer- ous.	Broad- leaved.	Total.	Conifer- ous.	Broad- leaved.	Total.	Conifer- ous.	Broad- leaved.	Total.	Area (Acres).
124	England and Wales.	10,310	1,144	11,454	29,788	2,691	32,479	105,023	1,300	106,328	306
	Scotland	3,453	97	3,550	24,196	242	24,438	71,405	1,313	72,718	176
	Total, Great: Britain.	18,763	1,241	15,004	53,984	2,933	56,917	176,428	2,613	179,041	482
1!23	England and	8,178	11,702	19,880	22,665	1,480	24,145	69,029	3,586	72,615	272
	Scotland	3,044	<b>3,3</b> 09	6,353	18,881	173	19,054	59,362	1,225	60,587	169
i	Total, Great Britain.	11,222	15,011	26,233	41,546	1,653	43,199	128,391	4,811	133,202	441
1:22	England and Wales.	4,558	33,669	38,222	21,012	2,412	23,424	62,455	3,391	65,846	126
İ	Scotland Ireland (to 31st March, 1922.)	3,269 —	_ <sup>19</sup>	3,288	19,150 2,381	199 7	19,349 2,388	65,607 6,090	224 25	65,831 6,115	181 38
	Total, United Kingdom.	7,822	33,688	41,510	42,543	2,618	45,161	134,152	3,640	137,792	345

Supply of Seed.—The 1923 crops yielded abundant supplies of Douglas fir and Sitka spruce seed, large quantities of which were purchased from the Canadian Government. Conflicting reports were received regarding European larch, but it would appear that the 1923 seed crop was generally a failure; plentiful supplies of old seed, however, were available. Corsican pine was at first reported to have failed, but subsequently abundant supplies were offered. This seed was stated to be of the 1923 crop, but the bulk of it did not give such a high germination in the laboratory as

new seed purchased in previous years. Norway spruce seed was

plentiful and of good quality.

The position with regard to home-collected seed was somewhat Scots pine yielded a very poor crop in Scotland, unsatisfactory. and supplies in England and Wales were barely sufficient to meet requirements. Beech and chestnut failed completely and the oak crop was only moderate.

The quantity of seed sold to nurserymen and private individuals in this country and to Dominion Governments amounted to

2.703 lbs.

The Commissioners have to express their gratitude for two generous gifts of seed during the year, one of 1,028 lbs. of Douglas fir from Mr. Charles Lathrop Pack, President of the American Tree Association, and the other of 66 lbs, of mountain pine (erect variety) from the French Government.

#### Sub-head F.—Advances for Afforestation Purposes: Expenditure: Gross, £47,147; Net, £47,083.

Of the total expenditure, £1,900 was in respect of overhead and supervisory charges, while £7,516 was in respect of proceedssharing schemes and included a single payment of £7,447 due to Liverpool Corporation on a modification of the terms of agreement for afforesting Lake Vyrnwy Water Catchment area. remainder, viz., £37,731 was in respect of grants for planting, preparation for planting and scrub clearing for the relief of unemployment. The grants are dealt with further on page 36.

#### Sub-head G.—Education: Expenditure: Gross, £8,243; Net, £7,919.

Details of expenditure and income are given in Table G below:

Table G.—Analysis of Education.

			Expendi	iture (Ta	ble IIa, (	Col. (6)).				ae (Tal ol. (13		
Year	Superior		Appre	ntices' Sc	hools.							ıre.
ending 30th Sep- tember.	Super-	Salaries and Expenses of Instructors.	Purchases and Rent of Land and Buildings.	Allowances to Apprentices.	Stores and Equipment.	Fuel and Light and Sundry Expenses.	Grants to Insti- tutions.	Totals.	Labour of Apprentices.	Other	Totals	Net Expenditure.
	£	£	£	£	£	£	£	£	£	£	£	£
<b>192</b> 0	8,432	1,343	2,033	1,417	425 —	605	_	21,544	(=	103	199	21,345 2,277
1921	537	3,493 1,291	2,479	2,468	982	1,625	1,242	2,277		96	) -	2,211
1922	1,092	2,793	127	8,157	411	2,513	2,264	12,357		1,396	1,896	10,961 520
1923	138 1,617	$\frac{462}{1,614}$	- 311	4,202	— 16 <b>3</b>	1,287	2,598	600 11,792	1,258	80 252	50 1,510	10,282
1924	283	1,447	421	1,140	56	843	3,053	8,243	282	42	324	7,919
Totals	7,124 675	10,690 2,202	5,371	12,684	2,037	6,873	9,157	53,936 2 877	1,540 —	1,889 80	3,429 80	50,507 2,797

Note.-The figures in italics relate to Ireland.

pprentices' Schools; Expenditure, Gross £4,207, Net £3,925.— The schools at Parkend (Forest of Dean) and at Beaufort (Inverness-shire) were maintained during the year, and 29 men received training. At the final qualifying examination 15 men who had successfully completed the two years' course were granted certificates of proficiency.

An alteration in the method of accounting for the allowances of apprentices working in the Commission's forests was made during the year. The value of work so done has been apportioned at the outset between Education and Forestry Operations (Subhead E). The figures for the year under review are therefore not

comparable with those for the previous years.

Grants to Universities and Colleges: Expenditure, £3,053.— The following Universities and Colleges were in receipt of grants during the year:—Oxford University; Cambridge University; University College of North Wales, Bangor; Armstrong College, University of Durham; Aberdeen University and North of Scotland College of Agriculture; Edinburgh and East of Scotland College of Agriculture.

The above Universities and Colleges provide courses of training for forest officers and also for those engaged in allied occupations,

such as estate management and agriculture.

The number of students who were studying forestry for degree and diploma examinations was 105. The forestry courses associated with agriculture and estate management were attended by 128 students. The number of forestry degrees granted during the year was 26, while 34 candidates gained forestry diplomas.

# Sub-head H.—Research and Experiment: Expenditure: Gross, £7,139; Net, £7,130.

Details of expenditure are stated in Table H below :—

Table H.—Analysis of Research and Experiment.

		Expendit	ure (Tabl	e IIa, Colui	nn (7)).			
Year ending 30 Sept.	Superior Super- vision and Overhead Charges.	Salaries and Ex- penses.	Instru- ments, Stores, etc.	Labour, Seed and Sundry Expenses.	Grants to Insti- tutions.	Totals.	Income (Table IIa, Col. (15)).	Net Expen- diture.
1920	£	£	£	£	£	£	£	£
1921	3,380 }	4,078 5,983	30 <b>16</b> 9	137 945	750	15,472	_	15,472
1922	556	4,463	75	983	569	6,646	567	6,079
1923	625	2,981	168	843	508	5,125	10	5,115
1924	1,789	2,981	94	1,009	1,266	7,139	9	7,130
Totals	6,350	20,486	536	3,917	3,093	34,382	586	33,796

Research and experimental work has been continued along

systematic lines, and has made steady progress.

Production.—During the year six new permanent sample plots were established, two in England and four in Scotland, while four other new plots were selected, thinned and put in order for future measurement. Up to the end of September, 1924, a total of 149 sample plots had been established in Great Britain, of which 84 are in England and 65 in Scotland, while 17 plots have been remeasured once, 12 in Scotland and five in England. In addition, 13 plots in England have been remeasured twice.

The position as regards species is now as follows:—

	-	_		Measured			
Species.			Once.	Twice.	Thrice.	Others.	Total.
Scots pine Norway spruce Mixed Scots pine and spruce.	 I Nor	 way	20 13 1	3			20 16 1
E. Larch Douglas fir Thuja plicata Tsuga heterophylla Abies grandis Corsican pine Sitka spruce Japanese larch Weymouth pine Oak Oak and beech mixed Ash			14 25 2 1 1 11 5 17 1 3	8 2 — 1 — 2 1 — —	7 3     3	4	33 30 2 1 2 11 7 18 1 3 3
Totals			115	17	13	4	149

The Commissioners are indebted to the various landowners who have afforded facilities for the laying out of sample plots in their woods. Without their willing co-operation much valuable information would have been lost.

Nursery and Plantation.—Experimental work has been carried on steadily by the Commissioners' officers with the object of improving existing nursery and planting practice and so reducing the cost of producing suitable nursery stock and minimising the losses among young trees when planted out in the forest. This work is linked up with the investigations which are being made in the laboratories of the Universities referred to below.

Attention is being given to securing growing stock from the best sources of origin, and by means of small scale experimental plantings information is being gained as to the behaviour of the more valuable home and exotic species on different sites, and particularly on poor sites, in different localities.

Entomological.—Research work on the life history and habits of forest pests has made satisfactory progress. In several cases the results of previous research have been linked up with practice.

\*\*Sotanical.—Investigations were continued at certain Universites, assisted by grants from the Forestry Commission.

Oxford (Mr. W. E. Hiley).—Problems relating to the nursery stages of certain coniferous trees.

Edinburgh (Dr. M. Wilson).—Researches into fungus diseases.

Edinburgh (Mr. J. L. S. Smith).—Enquiry into the origin and botanical characteristics of the Dunkeld hybrid larch.

Aberdeen (Messrs. E. V. Laing and G. K. Fraser).—Soil and ecological problems incidental to different planting conditions, with special reference to peat.

# Sub-head J.—Agency and Advisory Services: Expenditure: Gross £3,785; Net, £3,772.

Expenditure under this head shows a considerable drop from the previous year (£19,530 net) owing to the fact that with the transfer of the Crown Woods to the Commissioners expenditure previously charged under this head became chargeable to Subheads E and K. The expenditure incurred was mainly in respect of unemployment relief work in the Crown Woods during the first six months of the year, that is, before the date of transfer.

#### Sub-head K.—Special Services: Expenditure: Gross, £10,253; Net, £10,239.

Details of expenditure in connection with Special Services are stated in Table K below. Roughly, one-third of the total cost is made up of the time and expenses of staff who are engaged (usually part time) on various activities incidental to the main duties which the Commissioners have to carry out. Relief of unemployment (£5,069) represents the "uneconomic" cost of work done under Sub-head E (Forestry Operations) in connection with unemployment relief schemes.

Year ending th September. Expenditure (Table IIa, Col. (9)). Income (Table Net Superior Pay-Πa, Consulta-Relief Expen-Supervision Special ment of tive Com-Publiof Un-Col. diture. Totals: and Enquir-30th Irish (17)). mittees cations. employ-Overhead ies. Expenses. ment. Shares. Charges. £ £ £ £ £ 1920 37 319 218 3,766 5 5,401 5,401 727 761 26 735 1921 291 111 659 29 1922 2,188 92 479 576 10,160 13,495 252 13,243 6 1923 1,372 65 122 669 4,599 6,827 12 6,815 9,446 9,446 9,446 1924 3,268 44 5,069 55 1,817 10,253 14 10,239 Totals 10,594 349 19,828 35,976 35,698 1,634 3,571 278 9,446 729 10,215 40 26 10,189

Table K.—Analysis of Special Services.

Note — The figures in italics relate to Ireland.

Publications.—The publications issued by the Commission during the year under review were as follows:—

Leaflet No. 13.—The Larch Longicorn Beetle.

Special Leaflet.—Home and Empire Forestry (prepared for the British Empire Exhibition, Wembley, 1924).

Fourth Annual Report of the Forestry Commissioners, being the report for the year ending 30th September, 1923.

In addition, leaflets Nos. 1, 3 and 4, the stock of which had become exhausted, were revised and re-issued.

Exhibits at Agricultural Shows.—As in previous years, the Commissioners arranged forestry exhibits at the shows of the Royal Agricultural Society at Leicester, the Bath and West Society at Taunton, the Royal Welsh Agricultural Society at Bridgend, and the Highland and Agricultural Society at Perth.

British Empire Exhibition, Wembley, 1924.—The Commissioners participated in the forestry exhibit organised by the English and Scottish Timber Trades and other bodies interested in forestry.

British Association for the Advancement of Science, Meeting at Toronto, 1924.—On the invitation of the association a representative of the Commission attended the above meeting, at which a large number of papers on forestry subjects were read.

Imperial Botanical Conference, London, 1924.—Representatives of the Commission attended and contributed papers.

Census of British Woodlands.—During the year under review the survey of 15 counties has been completed in Scotland, and the relative statistics are given below. Considerable progress has also been made with the work in England and Wales, but no further counties have been completed.

	! ! :		A	rea of V	Voodlan	ds.			Percentage of Total	17 00u-
County.	Coni- fers.	Mixed.	Hard woods	Cop- pice.	Sorub.	Felled.	Uneco- nomic	Total.	Area of Wood- lands felled.	lands as percentage of Total Area of County
	Aores	Acres.	A		·	`	! ·			
Dumfries	Acres. 12,778	2,224	Acres. 61,71	Acres.	Acres. 2,367	Acres. 5,432	Acres. 2,617	Acres. 31,619	17.2	4.6
Renfrew	2,643	487	1,166		860	1,669	2,715	9,540		6.3
Kirkendbright		1,244	4,680	1,310	3,585	4,153	3,367	24,551	16.9	4.3
Selkirk	1,635	1,578	708	109	349	742	1,088	6,209	12.0	3.6
Wigtown	2,437	2,009	2,115	107	877	960	1,826	10,331	9.8	3.3
Dumbarton	2,157	1,105	2,786		5,586	1,490	2,420	15,494	9.6	9.9
Lanark	10,386	2,359	4,778	64	2,207	6,374	4,193	30,361	21.0	5.4
Haddington	2,452	2,615	533	182	1,050	1,454	5,295	13,581	10.7	7.9
Aberdeen	61,054	2,386	1,527	_	13,592	40,493	8,458	127,510	31.8	10.1
Kincardine	16,077	1,524	207	_	1,944	7,684	3,292	30,728	25.0	12.6
Fife	7,654	3,984	3,991	109	920	9,747	5,561	31,966	30.2	9.9
Argyll Midlothiau	22,433	3,411	1,655	120	52,859	5,934	3,708	90,120	6.6	4.5
Midlothiau	2,192	954	2,410	l —	569	1,788	6,823	14,736	12.1	6.3
Nairn	9,450	1,457	99	i —	2,859	4,067	252	17,684		17.0
Berwick	5,383	1,235	1,918	<b>-</b>	1,085	2,617	4.552	16,790	15.6	5.7

Lensus of Production (1924).—Preliminary arrangements have been made by the Commissioners in connection with the general Census of Production, 1924, to ascertain the quantities and values of timber extracted during the year from British woodlands. The schedule which has been adopted after consultation with the Board of Trade, the Forestry Consultative Committees and Arboricultural Societies is printed as an appendix to this report. On previous occasions, when the Census was conducted by the Boards of Agriculture, schedules were issued broadcast to allowners of woodland, but the results were not entirely satisfactory. On this occasion it is proposed to limit the enquiry to selected representative estates from which particulars will be obtained and correlated with the Census of Woodlands already in progress.

Softwood Resources.—The enquiry into the timber resources of the world with special reference to softwood supplies is being continued.

#### Consultative Committees.

The Consultative Committee for England held four meetings during the year, including a visit to Thetford Chase; the Scottish Committee met twice and the Welsh Committee four times, including a visit to Vaughan Forest.

Formal references were submitted by the Commissioners to the Committees for their advice and assistance on the following matters:—

- (1) Grants for normal afforestation schemes as distinguished from those in relief of unemployment.
- (2) Forestry propaganda and publicity.

The following subjects were discussed by some of the Committees and suggestions thereon were sent to the Commission:—

- (a) Survey of woodlands in Great Britain.
- (b) Grants for afforestation schemes in relief of unemployment
- (c) Insertion of forestry data on Ordnance Survey maps.
- (d) Sample plots.
- (e) Railway rates on home-grown timber.

The Commissioners regret to have to record the death during the year of Mr. M. C. Duchesne, who gave for many years untiring help to the cause of Forestry. The vacancy thus caused on the English Committee has been filled by the appointment of Mr. J. S. Corbett.

# Sub-head L.—Forest Workers' Holdings: Expenditure, £5,901; Receipts, £8.

The systematic establishment of forest workers' holdings was not incorporated into Forest Policy until the year under review was almost at an end, and it was possible, therefore, to do wite more than make preliminary arrangements for proceeding with the work.

The Commissioners believe that this scheme can make a substantial contribution, at relatively small cost, to land settlement. They have always recognised that it is preferable from every point of view to settle permanent forest workers in parttime holdings adjacent to the forest rather than to be dependent entirely on temporary labour. Financial considerations have hitherto stood in the way, and the utmost which the Commissioners were able to do from the monies placed at their disposal was to utilise existing cottages on estates acquired for afforestation.

The forest holdings to be created will consist of a cottage and garden with enclosed agricultural or cultivatable land up to a maximum of 10 acres, together with such additional grazing land as may be available. The holder should thus be able to keep two cows and use the holding for the production of potatoes and other crops according to the character of the land. The holder will be guaranteed by the Commissioners not less than 150 days' work in the forest, for the most part at fixed piece work rates; these rates enable the men to earn more than the local agricultural wage. The forest holdings will be situated advantageously as regards the forest work, and let on 364-day tenancies.

For the present it is laid down that not more than five holdings shall be provided for every 1,000 acres of forest land acquired. The maximum expenditure on house and buildings is fixed at £800, and the maximum value of the enclosed land to be associated with a holding at £150. A considerable number of cottages have already been acquired and included in the prices of estates purchased for afforestation, and, of these, 72 are already available, with very little expenditure, for the purpose of the scheme. This will appreciably reduce the average cost of the first holdings established, but the maximum figures will be reached in some of the forests where no houses exist and the cost of building is necessarily high.

At the time of compiling this report the Commissioners are engaged on the creation of 141 forest holdings.

It will be observed that the forest workers' holding is not intended to provide full-time work for the occupier, but to serve the double end of identifying him with the progress of the forest and affording an industrious man opportunities of improving his standard of living.

The forest workers' holding is thus a special case distinct in its main bearing from the statutory Small Holdings laid down

representation of the agricultural departments, and it has been agreed accordingly that to avoid dual responsibility the work shall be undertaken by the Forestry Commissioners. At the same time care has been taken to secure close liason between the Ministry of Agriculture and the Board of Agriculture for Scotland on the one hand and the Commissioners on the other as regards the acquisition of land which may prove suitable for the purposes of the respective departments.

#### Sub-head Z.—Income, £91,130.

The sources of Income are given in Table IIa (page 16). Income from forestry operations shows an increase over 1923 of £57,091, which is almost identical with the income for six months from the transferred Crown properties (£57,157). Details are given below:—

	Commission's Forests.	Transferred Crown Properties (6 months only).
Land and Buildings Rents (including Mining Rents and	£ 8,080 8,275	£ 2,759 16,989
Royalties). Forest Produce Other sales (including stores, live stock, rabbits, gravel, etc.).	9,708 7,478	33,144 4,265
· ·	33,541	57,157
	£9	0,698

Under Land and Buildings the largest single item is an amount of £8,000 for the sale of a mansion house not required in connection with afforestation operations; Rents and Royalties include £9,286 from the Forest of Dean mines; Forest Produce includes £38,762 from the sale of timber, £4,090 from Nursery Stock and Seed; "Other Sales" include live stock £3,199, sand and gravel in New Forest £2,858.

#### Unemployment Relief.

The schemes were similar in character to those undertaken in previous seasons.

(1) Operations on the Commission's Properties (now including the Crown Woods).

Work in the form of an acceleration of the normal programme was carried out at 69 different centres. The normal planting

programme was advanced by 677 acres, and a consider amount of work in preparation for subsequent planting was carried out, such as draining, fencing, scrub-clearing and formation of roads.

It is estimated that employment equivalent to 15,000 manweeks was given, in addition to the work provided by the normal programme.

## (2) Operations on Properties belonging to Corporate Bodies and Private Individuals

Expenditure took the form of grants for planting (up to £4 10s. per acre to corporate bodies and up to £3 per acre to private individuals), preparation of ground to be planted subsequently (up to £3 per acre in each case), and scrub clearing in preparation for planting (up to £2 per acre and in special cases one-third of the net cost with a limit of £4 per acre to corporate bodies, and up to £2 per acre to private individuals).

The area brought under treatment is shown in the following table:—

	England and Wales.	Scotland.	Total.
No. of Schemes	. 240	121	361
Planting Preparation of Ground Sorub clearing	. 792	Acres. 3,312 1,980 1,206	Acres. 6,530 2,772 1,721

The amount of the grants under these schemes was £28,695, but not all of the grants had been paid by 30th September, 1924.

It is estimated that this work provided approximately 30,000 man-weeks' employment.

#### Total Employment in the Commission's Forests.

The course of employment in the Commission's forests follows a well-defined curve. Numbers are at their minimum towards the end of summer and increase steadily with planting operations until early spring when planting is ending and nursery operations are proceeding at full pressure. Thereafter the numbers decline again during the summer at a rate which depends on the type of season (in wet summers the labour required for weeding operations is greater than in dry). As the Commissioners' operations expand, both the maximum and the minimum show, year by year, steady increase on the

esponding figure for the preceding year. These changes are illustrated by the figures below:—

			Numbers	Employed.		
		_	Summer (Minimum).	Winter	(Maxi	mum).
1920			 210	1920/21	•••	935
1921	•••		 $\overline{495}$	1921/22		1,780
1922			 525	1922/23		1,775
1923		•••	 880	1923/24	•••	$2,\!220$
1924	•••	•••	 1,620	1924/25	•••	2,650

Note.—450 employees were transferred to the Commission with the Crown Woods on 1st April, 1924.

(Signed)\*

LOVAT (Chairman).

F. D. ACLAND.

CLINTON.

L. FORESTIER-WALKER.

HUGH MURRAY.

R. L. Robinson.

W. R. SMITH.

W. STEUART-FOTHRINGHAM.

#### A. G. HERBERT,

Secretary,

22, Grosvenor Gardens, London, S.W. May, 1925.

#### APPENDIX I.

#### Imports of Timber, Wood Manufactures and Pulp of Wood.

It is worthy of note that the quantity of unmanufactured timber imported during 1924 exceeded for the first time the pre-war average of 10,204,000 loads, the increase being 72,000 loads, or 0.7 per cent. The average value per load in the same period rose from £2.7 to £5, an increase of 85 per cent.

Imports of wood manufactures are entered by value only and show an increase of 17 per cent. over the 1923 figure and of 99 per cent. over the average of the five pre-war years.

The quantity of pulp of wood imported during 1924 amounted to the record quantity of 1,226,000 tons and was 8 per cent. more than in 1923 and 43 per cent. more than in the average of the five pre-war years. The average value per ton, however, showed a decline of 10 per cent. on that of 1923, but an increase of 70 per cent. over the pre-war average.

Sir John Stirling-Maxwell's valuable services are not lost to the Commission as, at the request of the Prime Minister, he is acting with the Commission in an honorary capacity at the present time.

<sup>\*</sup> Sir John Stirling-Maxwell did not sign the Report as he has temporarily resigned from the Forestry Commission pending the passing of the Forestry Act which increases the number of Commissioners from 8 to 10.

	Q	uantities	(thousan	ds).	7	alue (the	ousands).	
Description.		Average 1914-18.	1923.	1924.		Average 1914–18.	1923.	1924.
	·		' <u>-</u>	Тімв	ER,	<u></u>		
Hewn-Hard—	Loads.	Loads.	Loads.	Loads.	£	£	£	£
Mahogany	_		48	58		_	698	887
Walnut Oak	_	_	1 18	11 (	_	_	188	
m1-	· —		6	} 95 <			137	976
Other sorts		_	32	11 1	_		408	
Hewn-Soft (Fir, pine,	542	129	244	378	1,353	583	1,129	1,796
spruce, etc.). Sawn-Hard—	012	120		,	1,000	1	1,120	2,,,,,
Mahogany	-	_	26	30	l —		528	588
Walnut	-	- 1	8	) (	<b>–</b>	_ i	177 ر	
Oak	_	-	147	483		_	2,048	6,497
Teak	-	-	25	[ 100]	-		623	0,101
Other sorts	! -	-	203	) (	_		2,387	
Sawn-Soft—								
Deal and Planks	_		2,926	1	_	_	16,835	07.409
Boards	_	-	1,098	5,139	_		6,448	27,463
Other sorts Planed or Dressed—		-	<b>6</b> 55	) (	_	_	3,368	
1711	l		307				2,195)	
35 . 1 . 5		_	79	504			557	3,437
Att	_		39	( *0° )			314	<b>D</b> , <b>T</b> O 1
Other Descriptions—		_	งจ	, ,		_	317	
Pitprops	2,944	1,673	3,675	3,003	3,510	4,425	7,680	5,912
Staves	161	71	84	127	795	648	564	1,111
Sleepers		130	294	453	_	602	1,340	2,276
Veneers and panel			2	2	_		90	85
wood.								
Not elsewhere specified.	6,557*	3,550*	2	4	21,903*	24,362*	23	42
Fotal unmanufactured timber.	10,204	5,553	9,919	10,276	27,561	30,620	47,746	51,070
umber.		!		l <u></u>		,	,	
İ			Wo	OOD MANU	FACTURE	s.		
Furniture and cabinet ware.	_	-	_	-	416	115	539	599
Builders' woodwork (window frames,	_	_	-	-	180	62	377	706
doors, etc.).								
Chip boxes	! <u> </u>		_	i		' <u> </u>	5)	
rool handles	_	_	_	_	_		260	
Do	_	_	_	_	_	i —	251	4,066
Domestic woodwork					1		( )	4,000
(bread platters,	i i	1					! !	
(bread platters, trays, etc.).				1	0.000	1 001	3,153	
(bread platters,	_	_	_	_	2,099	1,821	0,177	
(bread platters, trays, etc.). Not elsewhere speci-		- -			2,695	1,998	4,585	5,371
(bread platters, trays, etc.). Not elsewhere specified.  Total manufactured	_	_	_	_				5,371
(bread platters, trays, etc.). Not elsewhere specified.  Total manufactured	_	_	_	PULP OF	2,695			5,371
(bread platters, trays, etc.). Not elsewhere specified.  Total manufactured	Tons.	Tons.	Tons.	PULP OF Tons.	2,695			9,767

<sup>\*</sup> These figures apply mainly to sawn softwoods. It is not possible to differentiate according to the various categories enumerated above owing to a change in the Board of Trade classification from 1920 onwards.

# APPENDIX II.

# Census of Production (1924).

(Form of schedule issued by the Forestry Commissioners in connection with the production of home-grown timber.)

Section 1.—Distribution of Total Woodland Area.

Section 2.—Production of Timber, 1923-24.

Trees felled for sale or home use, or sold for felling, during the twelve months ended 30th September, 1924.

Part A.—By Types of Woodland.

	 			Age Classes.	lasses.					
Type of Woodland.	0-20 years.	ears.	21-40 уеаге.	ears.	41-80 years.	ırs.	Over 90 years.	ears.	Total.	
	Quantity.	Value.	Quantity.	Value.	Quantity. Value. Quantity. Value. Quantity. Value. Quantity. Value.	Value.	Quantity.	Value.	Quantity.	Value.
High Forest Mainly conifers	cubic feet.	약 	cubic feet.	भ भ	cubic feet. £	ભ	cubic feet.	ઋ	cubic feet.	ਿ ਂਜ
Mainly hardwoods										
Mixed conifers and hardwoods										
Coppice (underwood)	:	:    :	:	Area felle	Area felled (or sold for felling)	r felling		acres.		
Coppice (underwood) with standards Coppice (underwood)				Area felle	Area felled (or sold for felling)	r felling				
Standards		:				9		22 TOU		
Scrub	÷				Are	.• 3a cleared	Area cleared	,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,		
Felled and/or devastated	:							20109:		
Amenity woods, parks, etc.	:	:						:		
Hedgerow timber	:	:	:	:			:	: :		
							Total			<u>.</u>
										₹• 2.6

Section 2.—Production of Timber, 1923-24—(contd.).

				Timber of Sawmill Size.	awmill	Pitprop Material.	terial.	Firewood.	·	Other Wood.	ood.	Total.	
	1			Quantity.	Value.	Quantity.	Value.	Quantity. Value. Quantity. Value. Quantity. Value.	Value.	Quantity. Value.	Value.	Quantity.	Value.
CONIFERS:—Scots Pine	;			cubic feet	भ 	cubic feet.	~ 위 ——-	cubic feet. £ (See note 2). £		cubic feet.	÷}	cubic feet.	भ
Larch	: :	: :	: :										
Spruce	:	:	:						_				
Douglas Fir	:	:	:	•			_						
Others (please specify kinds i	 specify	 kinds	i.		<b>-</b>								
possible)	:	:	:										
HARDWOODS:-													
Oak	:	:	÷										
Beecn	:	•	÷										
Birch	: :	: :	: ;	•					_				
Elm	÷	:	;						_				
Sycamore	:	:	:		<del>-</del> -								
Others (please specify kinds	 specify	kinds	:: <u>-</u>	_									
possible)	:	:	•		· <u></u>								
													1
TOTAL	Г	:	:										

Produce.
riscellaneous
3M
Section

(Bark, Charcoal, etc.)

Value.	च्स	•	l F	L Otali.			<b>{</b>
		ιδ.	under 18.	Female.			
ıy.		restry Operation	Juveniles under 18.	Male.			
Quantity.	i	ns employed in Fa	Wenter	A OTTION			
		Section 4.—Number of Persons employed in Forestry Operations.	Mon				
Kind of Product.		Section 4			Permanent or principal occupation. Number as at 30th September, 1924	Temporary or occasional occupation.	Maximum during year

#### Explanatory Notes.

- 1. Fellings.—All trees sold for felling should be included, even if they were not actually felled in the year of return. Trees sold standing in a previous year, even if felled during 1923-24, should not be entered. Thinnings, if utilised or sold, should be included in the return.
- 2. Quantity.—Quantities by cubic feet should be given on the basis of quarter-girth over-bark measurement. Where timber or other produce has not been sold by volume and the number of cubic feet cannot be given, the quantity may be expressed in tons, cords, number of trees, etc., the unit of measurement used being stated.
- 3. Value.—For the sake of uniformity, all values should be expressed as for timber standing, the necessary adjustment being made if the timber has been disposed of otherwise. Values should also be assigned to timber, etc., used on the estate, any felling or conversion charges being excluded.
- 4. Species.—Under Part B of Section 2, while it is desirable that production should be classified by individual species, there may be cases where such details cannot be given. If so, it is hoped that differentiation may at least be made between conifers and hardwoods.
- 5. Period of Return.—The figures in the return should be confined to the twelve months from 1st October, 1923, to 30th September, 1924, or alternatively (if more convenient) to the last complete estate accounting year if this ends within the second half of 1924; in the latter case the date on which the 12 months terminated should be stated.