

of 30.3 per cent. The retail prices index-number for the twelve months ending June 1922 was 1845, as compared with 1591 for 1921-22, the percentage decrease being 13.8, while the wholesale price index-number decreased by 23.2 per cent., from 2253 to 1730.

In making comparisons between these three sets of index-numbers, it is to be borne in mind that the figures do not, of course, indicate the relation between the different prices themselves, that is, between retail and wholesale prices, etc., for the reason that the weighted average prices are in each case made equal to 1000 for the year 1911. The figures show the relative increase or decrease in each set of price-indexes.

CHAPTER X.—RATES OF WAGE AND HOURS OF LABOUR.

1. **General.**—The collection of data respecting the nominal rates of wage payable in different callings and in occupations in various industries carried on in each State was first undertaken by this Bureau in the early part of the year 1913. Owing to the difficulty of ascertaining reliable particulars of the numbers of apprentices, improvers and other juvenile workers to whom progressive rates of wage fixed or otherwise according to increasing age or experience are payable from year to year, the inquiry was confined to the rates of wage payable to adult workers only, and was further limited generally to those industries in operation within the metropolitan area of the capital city in each State. However, in order to make the inquiry a comprehensive one, it was necessary to include certain industries which obviously are not carried on in the capital cities, *e.g.*, Mining, Shipping, Agricultural, and Pastoral. The particulars acquired were obtained primarily from awards, determinations, and industrial agreements under Commonwealth and State Acts, and related to the minimum wage prescribed. In cases where no award, determination or agreement was in force, the ruling union or predominant rate of wage being paid was ascertained from employers and secretaries of trade unions. For convenience of comparison, weekly rates of wage were adopted, though in many instances the wages were actually based on daily or hourly rates as specified in awards, determinations, or agreements, in view of the fact that it is often in those industries and occupations in which employment is of an exceptionally casual or intermittent nature that wages are fixed and paid at a daily or hourly rate. Hence the average weekly earnings in such occupations will probably fall considerably short of the computed weekly rates. The information thus obtained referred to the weekly rate of wage in upwards of 400 industries, and related to 1569 male occupations or callings. These particulars furnished the necessary data for the computation of average rates of wage in various industrial groups,* and in

* The following industrial classification of industries was adopted :—

Classification of Industries and Occupations.

I.	Wood, Furniture, Sawmill, Timber-works, &c.	VIII.	Mining, &c.
II.	Engineering, Metal Works, &c.	IX.	Railway and Tramway Services.
III.	Food, Drink, and Tobacco, &c., Manufacture and Distribution.	X.	Other Land Transport.
IV.	Clothing, Hats, Boots, Textiles, &c.	XI.	Shipping, Wharf Labour, &c.
V.	Books, Printing, Bookbinding, &c.	XII.	Pastoral, Agricultural, Rural, Horticultural, &c.
VI.	Other Manufacturing.	XIII.	Domestic, Hotels, etc.
VII.	Building.	XIV.	Miscellaneous.

each State and all States. The average rate of wage thus computed represented the arithmetical average* of the rates of wage payable in all classified occupations. It is not claimed that results obtained by this method are precisely correct, but owing to the difficulty of obtaining any satisfactory data as to the number of persons engaged in each of the occupations for which rates of wage had been obtained, no *detailed* system of weights could be applied. Though a great deal of information as to the number of persons engaged in different industries and occupations was available from the Census (1911) results, it was found impracticable to bring the classification of these results into line with the detailed classification of occupations in the various industries, as set out in the awards, determinations, etc. For final results for each State and for each industrial group throughout the States, however, a careful system of weighting was adopted. For example, in computing the result for any State in any year, the computed average wage in each industrial group was multiplied by a number (weight) representing the relative number of all male workers engaged in that group of industries in the particular State. The sum of the products thus obtained, divided by the sum of the weights, represents the average wage for that State for the particular year.†

The whole question of weighting was referred to in some detail in Report No. 1 (*Prices, Price Indexes and Cost of Living*) of the Labour and Industrial Branch of this Bureau. With the necessary verbal modifications, many of the statements there made and the problems there considered in regard to the subject of prices, refer equally to the question of weighting in other investigations, such as the present.

The results thus ascertained for the year 1913 were published in Labour Report No. 2, pp. 28-43. In the early part of the year 1914 the scope of the inquiry was considerably extended, and particulars of the weekly rates of wage in 930 specified industries and 4256 adult

* The summation of the weekly rate of wage divided by the number of occupations included.

† The weights used in the computation of the average wage in male occupations were as follow:—

Current Rates of Wage for Adult Male Occupations.—Weights used for each Industrial Group.

Particulars.	I.	II.	III.	IV.	V.	VI.	VII.	VIII.	IX.	X.	XI.	XII.	XIII.	XIV.
N.S.W. ..	136	228	199	84	65	162	252	343	187	74	137	704	134	902
Victoria ..	118	195	180	95	68	141	190	157	136	54	65	455	95	734
Queensland ..	67	62	108	23	20	34	70	133	73	22	45	352	45	302
S. Australia ..	24	71	45	16	13	40	68	29	48	17	44	182	24	223
W. Australia ..	65	38	32	7	8	16	32	142	40	9	32	118	31	158
Tasmania ..	25	14	17	6	5	7	20	49	10	6	12	104	10	80
Australia ..	435	606	561	231	169	400	632	853	494	182	335	1,915	339	2,399

occupations (3948 male, and 308 female)* were included, and results obtained thereby to the 30th April, 1914, were published in Labour Report No. 5, pp. 44-50. These results were further analysed, and the average number of working hours which constituted a full week's work in each occupation was ascertained and weighted in a similar manner to the rates of wage. This course was adopted in order to overcome the difficulty of making comparisons of the rates of wage in any specified occupation, owing, in many instances, to a different number of working hours constituting a full week's work in separate States. By dividing the weighted average number of working hours into the weighted average weekly rate of wage, what for some purposes may be considered a more adequate standard of comparison was ascertained. Results obtained from these computations were given for each industrial group for each State.

Since the 30th April, 1914, the number of occupations included in comparative computations has been kept constant, but the particulars of wages contained in Appendixes IV. and V. to this Report include those for many additional occupations. In most instances these have been taken from awards or determinations made subsequent to that date by industrial tribunals or from agreements registered under Commonwealth or State Acts, or as a result of direct inquiry.

In order to supplement the results thus obtained, investigations have been made regarding rates of wage in past years with a view to showing their general trend in each State and in various industrial groups. The total number of occupations for which particulars were available back to 1891 was 652. The methods adopted for the collection of the data and computation of the results were explained in Report No. 2 (see pages 23-4), and will not be repeated here. The particulars given in this Chapter show variations in nominal wages from year to year in each State and in various industrial groups. Index-numbers are also given showing variations in effective wages in each State.

2. **Adult Male Weekly Wages—Each State, 1914-22.**—The arithmetical average of the rates of wage given in the appendixes referred to furnishes the basis for the computation of relative weighted wages in

* The weights used in the computation of the average wage in female occupations were as follow :—

Current Rates of Wage for Adult Female Occupations.—Weights used for each Industrial Group.

Particulars.	III. Food, Drink, etc.	IV. Clothing, Boots, etc.	I. II. V. VI. Other Manufactures Combined.	XIII. Domestic, Hotels, etc.	XIV. Miscellaneous Shop Assistants, Clerks, etc.
New South Wales	23	228	44	104	124
Victoria	28	320	57	80	111
Queensland	5	80	8	47	40
South Australia	3	56	7	22	32
Western Australia	1	29	..	20	..
Tasmania	1	18	2	8	..
Australia	61	731	118	290	307

different industrial groups and States. In the following table particulars are given of the results thus obtained of the weighted average nominal weekly rates of wage payable to adult male workers, at the 30th June, 1914, and at the end of the periods specified to the 31st December, 1922, for a full week's work, in each State and for Australia, together with index-numbers for each State at each specified interval with the average for Australia for the year 1911 as base (=1000) :—

Wages—Adult Males—Weighted Average Nominal Weekly Rate payable for a Full Week's Work, and Wage Index-numbers, 30th June, 1914, to 31st December, 1922.

NOTE.—Index-numbers based on the average wage for Australia in 1911 (51s. 3d.) as base (=1000). The index-numbers in this table are comparable throughout.

Particulars.	N.S.W.	Vic.	Q'land	S.A.	W.A.	Tas.	*Australia.
No. of Occupations Included.	874	909	627	567	489	482	3,948

RATES OF WAGE.

	N.S.W.		Vic.		Q'land		S.A.		W.A.		Tas.		*Australia.	
	s.	d.	s.	d.	s.	d.	s.	d.	s.	d.	s.	d.	s.	d.
30th June, 1914	55	11	54	4	52	10	54	4	62	0	52	7	55	3
31st December, 1914	56	2	54	7	53	5	54	5	62	10	52	8	55	7
30th June, 1918	64	9	63	4	65	7	63	3	69	5	60	2	64	6
31st December, 1918	65	11	65	6	69	0	65	6	70	4	61	2	66	5
30th June, 1919	68	9	67	5	71	6	66	9	71	2	62	9	68	7
31st December, 1919	76	0	72	0	78	7	70	5	77	8	69	0	74	11
30th June, 1920	82	9	77	5	86	10	73	4	81	0	74	2	80	7
31st December, 1920	94	0	86	1	91	0	82	8	89	0	85	0	89	10
30th June, 1921	95	3	92	0	96	5	85	8	93	6	88	3	93	3
31st December, 1921	95	10	93	7	96	8	80	5	95	0	91	8	94	6
31st March, 1922	95	7	93	2	94	9	89	5	94	0	90	9	94	0
30th June, 1922	93	8	91	5	94	0	87	5	93	6	88	7	92	4
30th September, 1922	91	10	91	0	93	10	87	6	93	9	88	8	91	6
31st December, 1922	91	6	91	4	93	10	87	6	93	9	88	5	91	6

INDEX-NUMBERS.

	N.S.W.	Vic.	Q'land	S.A.	W.A.	Tas.	*Australia.
30th June, 1914	1,091	1,059	1,030	1,060	1,225	1,026	1,079
31st December, 1914	1,096	1,065	1,042	1,062	1,226	1,028	1,085
30th June, 1918	1,264	1,236	1,280	1,234	1,354	1,174	1,259
31st December, 1918	1,286	1,278	1,356	1,278	1,372	1,193	1,296
30th June, 1919	1,342	1,316	1,390	1,302	1,398	1,225	1,338
31st December, 1919	1,498	1,404	1,534	1,373	1,516	1,340	1,462
30th June, 1920	1,615	1,510	1,694	1,432	1,581	1,447	1,572
31st December, 1920	1,835	1,679	1,785	1,613	1,751	1,674	1,762
30th June, 1921	1,858	1,796	1,881	1,672	1,824	1,722	1,820
31st December, 1921	1,869	1,826	1,896	1,745	1,853	1,735	1,844
31st March, 1922	1,865	1,816	1,845	1,744	1,849	1,771	1,844
30th June, 1922	1,828	1,784	1,835	1,700	1,824	1,728	1,801
30th September, 1922	1,792	1,777	1,831	1,707	1,831	1,730	1,786
31st December, 1922	1,785	1,783	1,830	1,708	1,829	1,726	1,785

* Weighted average.

From the preceding table it will be seen that the average weekly wage for adult male workers, as indicated by index-numbers at the 30th June, 1914, in two States, viz., New South Wales and Western Australia, exceeded the weighted average wage for Australia. This feature remained constant in varying degrees of excess throughout the period under review until the end of September, 1917, when the index-number representing the average wage for Queensland was also higher than the weighted average wage index-number for Australia.

At the end of the year 1918, the index-number for New South Wales was lower than that for Australia, while those for Queensland and Western Australia were higher. During 1919, the average rates of wage in New South Wales and Queensland increased more rapidly than in the other States, and at the end of the year the index-numbers for these States and also for Western Australia were higher than the Australian average. The average rate of wage increased considerably in all States during the year 1920. At the close of that year the wage for Western Australia dropped, for the first time since 30th June, 1914, below that for Australia, although at the end of the following year it had regained its former position. Toward the close of 1921, certain decreases of wages occurred, particularly in New South Wales, but the weighted average wage in each State showed an increase at the end of the period. During the year 1922 the average wage in each State suffered a reduction on account of adjustments made owing to the decrease in the cost of living. The wage for Australia fell from 94s. 6d. at the end of 1921 to 91s. 6d. at December 1922. The largest decrease, 4s. 4d. per week, occurred in New South Wales, followed by Tasmania with a decrease of 3s. 3d. per week. The rates for Queensland and Western Australia were higher at the end of 1922 than the wage for Australia as a whole, while that for New South Wales equalled it and Victoria, Tasmania and South Australia were lower.

3. Adult Male Weekly Wages—Each Industrial Group, 1914-22.—

The following table gives particulars in regard to (a) the average weekly rate of wage in each of the industrial groups, and (b) the weighted average wage for all groups combined, at 30th June and 31st December, 1914, and at the periods specified for the years 1918 to 1922.

Wages—Adult Males—Weighted Average Nominal Weekly Rate payable for a Full Week's Work, and Wage Index-numbers in each Industrial Group, 30th June 1914, to 31st December, 1922.

NOTE.—Index-numbers for each industrial group and all industrial groups, based on the average wage for all groups in 1911 (51s. 3d.), as base (= 1000). The index-numbers in this table are comparable throughout.

Date.	INDUSTRIAL GROUP.															
	I. Wood, Furniture, etc.	II. Engineering, etc.	III. Food, Drink, etc.	IV. Clothing, Boots, etc.	V. Books, Printing, etc.	VI. Other Manufacturing.	VII. Building.	VIII. Mining.*	IX. Railways, etc.	X. Other Land Transport.	XI. Shipping, etc.*	XII. Agricultural, etc.†	XIII. Domestic, etc.†	XIV. Miscellaneous.	XV. All Industrial Groups.‡	
	s. d.	s. d.	s. d.	s. d.	s. d.	s. d.	s. d.	s. d.	s. d.	s. d.	s. d.	s. d.	s. d.	s. d.	s. d.	
30th June, 1914	59 2	57 2	55 2	52 0	63 9	55 8	65 4	64 11	59 8	51 4	48 7	49 5	47 0	53 10	55 3	
31st December, 1914	59 6	57 9	55 8	53 0	63 10	56 0	65 5	65 2	59 8	52 8	48 0	49 5	47 11	54 0	55 7	
30th June, 1918	66 8	65 2	64 6	60 0	71 4	64 4	72 7	73 4	66 4	62 8	61 3	61 1	54 12	61 5	64 6	
31st December, 1918	68 11	68 8	66 0	61 5	74 1	66 1	74 9	78 6	68 11	63 5	64 5	63 1	56 7	63 3	66 5	
30th June, 1919	69 10	70 9	67 2	62 6	76 0	67 11	74 9	84 2	69 6	64 3	66 11	65 10	50 2	64 7	68 3	
31st December, 1919	75 9	77 6	75 6	73 5	80 9	75 4	79 8	88 4	78 6	73 4	77 9	75 12	68 7	71 3	74 11	
30th June, 1920	82 8	83 7	82 9	78 0	92 5	82 1	85 10	89 10	84 3	79 1	84 7	75 3	71 8	77 11	80 7	
31st December, 1920	95 1	92 5	89 3	86 5	99 6	88 11	95 7	103 10	93 1	87 3	88 0	87 1	80 6	84 11	89 10	
30th June, 1921	97 8	97 11	92 7	91 2	102 0	93 8	101 4	105 8	97 8	90 10	95 3	88 0	82 1	89 8	93 2	
31st December, 1921	98 2	98 2	93 10	93 3	104 7	95 0	102 5	105 4	97 5	90 10	101 8	89 0	84 2	91 1	94 0	
31st March, 1922	97 5	98 0	93 9	92 6	104 0	93 8	102 4	104 9	95 11	89 8	100 6	89 1	84 6	90 4	94 0	
30th June, 1922	96 7	95 6	92 10	92 6	103 7	92 5	102 2	103 7	95 10	89 7	99 9	83 11	83 5	89 6	92 4	
30th September, 1922	95 5	94 0	91 9	91 6	102 9	91 8	101 4	103 8	93 6	88 4	99 6	83 11	82 1	88 7	91 6	
31st December, 1922	95 4	93 10	91 10	91 1	102 9	91 11	100 5	103 8	93 4	88 5	99 9	83 11	82 4	88 8	91 6	

Date.	INDEX-NUMBERS.															
	I.	II.	III.	IV.	V.	VI.	VII.	VIII.	IX.	X.	XI.	XII.	XIII.	XIV.	XV.	
30th June, 1914	1,154	1,116	1,077	1,031	1,243	1,086	1,275	1,267	1,164	997	948	964	918	1,050	1,079	
31st December, 1914	1,161	1,127	1,085	1,034	1,246	1,093	1,276	1,272	1,165	1,026	972	965	935	1,054	1,085	
30th June, 1918	1,301	1,076	1,258	1,171	1,392	1,255	1,416	1,529	1,291	1,222	1,196	1,192	1,056	1,198	1,259	
31st December, 1918	1,345	1,340	1,288	1,198	1,446	1,289	1,449	1,532	1,345	1,237	1,257	1,231	1,104	1,234	1,296	
30th June, 1919	1,363	1,381	1,311	1,219	1,483	1,326	1,459	1,643	1,356	1,253	1,264	1,264	1,155	1,260	1,338	
31st December, 1919	1,479	1,512	1,473	1,433	1,576	1,470	1,554	1,724	1,532	1,431	1,518	1,370	1,338	1,380	1,462	
30th June, 1920	1,613	1,631	1,615	1,484	1,803	1,602	1,674	1,782	1,643	1,544	1,650	1,467	1,398	1,521	1,572	
31st December, 1920	1,855	1,803	1,742	1,687	1,941	1,786	1,865	2,026	1,816	1,702	1,716	1,699	1,571	1,656	1,752	
30th June, 1921	1,906	1,911	1,806	1,779	1,989	1,828	1,978	2,061	1,906	1,772	1,858	1,717	1,602	1,742	1,820	
31st December, 1921	1,916	1,915	1,832	1,819	2,040	1,854	1,990	2,056	1,901	1,760	1,984	1,736	1,642	1,778	1,844	
31st March, 1922	1,901	1,911	1,829	1,805	2,029	1,827	1,997	2,043	1,871	1,749	1,961	1,739	1,628	1,763	1,834	
30th June, 1922	1,884	1,863	1,812	1,805	2,022	1,804	1,994	2,021	1,869	1,748	1,946	1,638	1,623	1,750	1,801	
30th September, 1922	1,861	1,834	1,791	1,784	2,004	1,788	1,977	2,023	1,823	1,724	1,941	1,638	1,601	1,729	1,786	
31st December, 1922	1,860	1,832	1,792	1,777	2,004	1,793	1,960	2,022	1,821	1,725	1,947	1,637	1,606	1,730	1,785	

* Including the value of victualling and accommodation where supplied. † Including the value of board and lodging where supplied. ‡ Including the value of board and lodging where supplied as follows:—In Sydney, 10s. 2d. to 21s. 6d. (according to class of establishment); in Melbourne, 20s. and 23s.; in Brisbane, 14s. and 16s.; in Adelaide, 22s. (Restaurants), and 25s. (Hotels and Clubs); in Perth, 24s. 6d.; and in Hobart, 22s. per week. § Weighted average.

The foregoing table shows that the rate of increase in the weighted average weekly wage in occupations and callings classified in the fourteen industrial groups during the period 30th June, 1914, to 31st December, 1922, was greatest in Group XI. (Shipping), 105.4 per cent., followed in the order named by Groups XIII. (Domestic, etc.), 74.9 per cent., and X. (Other Land Transport, 72.4 per cent. The smallest increase occurred in Group VII. (Building), 53.7 per cent. In eight of the groups the increase was less, and in six groups more than the increase in the weighted average for all groups. During 1922 decreases in average wages occurred in all industrial groups, the greatest being 5.7 per cent. in Group XII. (Agricultural, etc.), followed by Groups II. (Engineering, etc.), 4.4 per cent.; IX. (Railways, etc.), 4.2 per cent.; VI. (Other Manufacturing), 3.3 per cent. The percentage reduction during the year was least in Group VIII. (Mining), 1.7 per cent.

4. **Adult Female Weekly Wages—Each State, 1914 to 1922.**—The index-numbers given in the preceding paragraphs for male adult workers are computed with the weighted average wage in 1911 as base (=1000). This has been done in order that comparisons may be made between these index-numbers and the retail prices index-numbers which are also computed to the year 1911 as base. In the case of females, however, it has not been possible to secure information for years prior to 1914. For that reason the index-numbers are computed with the weighted average rate of wage payable to adult female workers in Australia at 30th April, 1914, as base (=1000).

The following table shows the weighted average weekly rate of wage payable to adult female workers for a full week's work in each State and Australia at the 30th June, 1914, and at the intervals specified to the 31st December, 1922. The table shows also index-numbers for each State based on the average weekly wage at the end of each of the periods indicated, computed with the weighted average wage for all States at the 30th April, 1914, as base (=1000).

It will be seen that the general upward movement in the average weekly wage for adult female workers, as given for Australia, was comparatively small, until 1916, when the average wage increased rapidly, the increase during the year 1920 being the largest which has been recorded. As in the case of male occupations, the increase in the wages for females in 1921 was much less than in 1920. Reductions were recorded in female wages during 1922, but the decrease over the whole of Australia was relatively much less than in the case of males. The Australian average fell from 48s. 8d. to 47s. 11d., a decrease of 9d. per week, although in the States of Victoria and Tasmania slight increases were recorded. The largest reduction, 2s. 1d. per week, occurred in Queensland, followed by New South Wales with 1s. 4d. per week. The Western Australian average remained stationary during the period. The advance during the whole period under review was 76.3 per cent.; this increase took place since the beginning of 1916.

Wages—Adult Females—Weighted Average Nominal Weekly Rate payable for a Full Week's Work, and Wage Index-numbers, 30th June, 1914, to 31st December, 1922.

NOTE.—Index-numbers based on the average wage for Australia at the 30th April, 1914 (27s. 2d.) as base (= 1000). The index-numbers in this table are comparable throughout.

Particulars.	N.S.W.	Vic.	Q'land.	S.A.	W.A.	Tas.	Australia.*
No of Occupations Included	85	87	37	47	24	28	308

RATES OF WAGE

	s.	d.	s.	d.	s.	d.	s.	d.	s.	d.	s.	d.		
30th June, 1914	26	9	27	4	27	0	24	1	37	4	25	10	27	2
31st December, 1914	26	10	27	0	27	1	24	1	37	4	25	10	27	5
30th June, 1918	31	3	30	6	30	8	28	6	38	10	28	5	30	11
31st December, 1918	31	10	31	3	32	10	29	5	38	10	28	0	31	9
30th June, 1919	33	7	32	2	33	2	29	7	39	11	28	9	32	0
31st December, 1919	40	0	34	5	38	4	33	3	43	7	33	0	37	1
30th June, 1920	41	9	37	9	41	7	35	9	48	0	39	11	39	10
31st December, 1920	46	0	43	1	44	11	40	7	52	11	41	10	44	6
30th June, 1921	48	6	46	2	49	10	43	7	54	11	46	9	47	7
31st December, 1921	49	0	47	10	50	3	45	2	56	4	47	6	48	8
31st March, 1922	48	4	47	10	48	2	44	6	56	4	47	6	48	2
30th June, 1922	48	4	47	10	48	2	44	6	56	4	47	6	48	1
30th September, 1922	48	2	47	8	48	2	44	6	56	4	47	6	48	0
31st December, 1922	47	8	48	0	48	2	44	0	56	4	47	7	47	11

INDEX-NUMBERS

30th June, 1914	984	1,006	993	885	1,373	950	1,000
31st December, 1914	987	1,022	990	885	1,373	950	1,008
30th June, 1918	1,149	1,121	1,128	1,050	1,430	1,047	1,137
31st December, 1918	1,173	1,151	1,208	1,084	1,439	1,059	1,168
30th June, 1919	1,235	1,184	1,222	1,089	1,434	1,059	1,206
31st December, 1919	1,474	1,268	1,412	1,225	1,605	1,215	1,305
30th June, 1920	1,536	1,388	1,530	1,317	1,767	1,470	1,467
31st December, 1920	1,695	1,586	1,652	1,405	1,947	1,540	1,637
30th June, 1921	1,784	1,709	1,835	1,605	2,022	1,721	1,751
31st December, 1921	1,803	1,761	1,849	1,661	2,074	1,749	1,790
31st March, 1922	1,780	1,762	1,772	1,639	2,072	1,749	1,771
30th June, 1922	1,778	1,760	1,771	1,639	2,073	1,749	1,770
30th September, 1922	1,773	1,756	1,771	1,639	2,073	1,749	1,766
31st December, 1922	1,754	1,767	1,771	1,620	2,075	1,751	1,763

* Weighted Average

5. **Adult Female Weekly Wages—Each Industrial Group, 1914-22.**—The following table gives particulars of the weighted average weekly rate of wage payable to adult female workers at the 30th June, and 31st December, 1914, and at the periods specified for the years 1918 to 1922, in the industrial groups in which they are mainly employed, and in all groups combined. Taking the average wage for all groups at the 30th April, 1914, as base (=1000), index-numbers are given, computed on the average rate of wage ruling at the end of each period indicated.

Wages—Adult Females—Weighted Average Nominal Weekly Rate payable for a Full Week's Work, and Wage Index-numbers in each Industrial Group, 30th June, 1914, to 31st December, 1922.

NOTE.—Index-numbers for each Industrial Group and all Industrial Groups, based on the Average Wage for all groups at 30th April, 1914 (27s. 2d), as base (= 1000). The index-numbers in this table are comparable throughout

Date	INDUSTRIAL GROUP					
	III. Food, Drink, etc.	IV. Clothing, Boots, etc.	I, II, V & VI. All Other Manufacturing	XIII. Domestic Hotels, etc.*	XIV. Miscellaneous.	All Groups, †

RATES OF WAGE.

	s.	d.	s.	d.	s.	d.	s.	d.	s.	d.	s.	d.
30th June, 1914	22	6	24	0	26	11	31	1	30	12	23	10
31st December, 1914	23	5	24	11	27	0	30	2	31	4	27	11
30th June, 1918	27	8	29	11	30	10	33	6	31	5	30	17
31st December, 1918	29	3	30	9	32	0	34	1	32	4	31	9
30th June, 1919	31	0	31	9	33	5	34	9	33	5	32	9
31st December, 1919	34	3	37	4	36	9	36	9	36	5	37	1
30th June, 1920	36	10	39	4	41	0	41	9	39	5	39	10
31st December, 1920	41	10	43	5	44	0	46	3	46	4	44	0
30th June, 1921	43	0	47	7	46	10	47	10	48	5	47	7
31st December, 1921	43	9	48	7	48	0	48	6	50	0	48	8
31st March, 1922	43	10	48	1	47	9	48	3	49	2	48	8
30th June, 1922	43	10	48	1	47	5	48	1	49	3	48	1
30th September, 1922	43	5	48	0	47	6	47	10	49	2	48	9
31st December, 1922	43	3	47	10	47	4	48	3	48	9	47	11

INDEX-NUMBERS.

30th June, 1914	828	911	991	1,144	1,119	1,000
31st December, 1914	862	917	994	1,110	1,153	1,008
30th June, 1918	1,018	1,100	1,135	1,233	1,156	1,137
31st December, 1918	1,078	1,131	1,178	1,255	1,189	1,168
30th June, 1919	1,142	1,169	1,230	1,279	1,229	1,206
31st December, 1919	1,277	1,373	1,353	1,403	1,332	1,365
30th June, 1920	1,354	1,449	1,508	1,537	1,450	1,467
31st December, 1920	1,533	1,597	1,619	1,701	1,700	1,637
30th June, 1921	1,584	1,752	1,725	1,761	1,783	1,751
31st December, 1921	1,609	1,789	1,766	1,787	1,841	1,770
31st March, 1922	1,615	1,770	1,757	1,772	1,810	1,771
30th June, 1922	1,612	1,770	1,746	1,770	1,810	1,770
30th September, 1922	1,599	1,767	1,748	1,760	1,810	1,766
31st December, 1922	1,593	1,762	1,741	1,777	1,794	1,763

* See Footnote † to table on page 72. † Weighted Average.

The greatest increase in the weekly rate of wage has occurred in Group IV. (Clothing, Boots, etc.), 93.4 per cent., followed in the order named by Groups III. (Food, Drink, etc.), 92.4 per cent.; I., II., V. and VI. (All Other Manufacturing), 75.7 per cent.; XIV. (Miscellaneous), 61.6 per cent., and XIII. (Domestic, Hotels, etc.), 55.3 per cent. The weighted average weekly rate of wage for all groups was 76.3 per cent. higher at the end of 1922 than at the 30th June, 1914.

The average wage for females in each industrial group suffered reduction during the year 1922, the largest decrease being 2.6 per cent. in Group XIV, followed in the order named by Groups IV., 1.5 per cent., I., II., V. and VI., 1.4 per cent., III., 1.0 per cent., and XIII. 0.6 per cent. The weighted average for all groups decreased by 1.5 per cent.

6. Hours of Labour and Hourly Rates of Wage, 31st December, 1922.

—The rates of wage referred to in the preceding paragraphs of this Chapter relate to the minimum rates payable for a full week's work. It should be observed, however, that the number of hours which constitutes a full week's work differs in many instances, not only as between various trades and occupations in each State, but also as between the same trades and occupations in the several States. In order to secure what may be for some purposes a more adequate standard of comparison, the results given in the preceding paragraphs are herein reduced to a common basis, viz., the rate of wage per hour, classified according to industrial groups in each State and all States. In Appendixes IV. and V. of this Report, particulars in detail regarding the number of hours worked per week in the various industries in the several States are shown. It will there be seen that the specified number of hours of labour per week covers a very wide range. In the following tables the average number of hours per week for each State, according to industrial groups, is given.

The tables on pages 77 and 78 show (a) the average weekly wage, (b) the average number of working hours per week for a full week's work, and (c) the average hourly wage for adult male and female workers in each State and industrial group except Groups XI. (Shipping, etc.), and XII. (Pastoral, Agricultural, etc.). Owing to the fact that many of the occupations included in these two groups are of a casual or seasonal nature, and that the hours of labour are not generally regulated either by awards or determinations of industrial tribunals or otherwise, the necessary particulars for the computation of average working time and hourly rates of wage are not available.

The general effect of reducing the weighted average rates of wage to a common basis (*i.e.*, per hour) is to eliminate on comparison any apparent difference between the several States which may be due to unequal working time.

(i.) The following table gives particulars in regard to the weighted average nominal weekly and hourly rates of wage payable to adult male workers and weekly hours of labour at the 31st December, 1922 :—

Weekly and Hourly Rates of Wage—Adult Males—Weighted Average Rates of Wage Payable, and Weekly Hours of Labour, 31st December, 1922.

Industrial Groups.	Particulars.*	N.S.W.	Vic	Q'ld	S.A.	W.A.	Tas.	Aust.
I. Wood, Furniture, etc.	Weekly Wage	95/-	96/3	96/6	91/11	95/7	92/-	95/4
	Working Hours	44 53	46 23	44 11	45 04	47 37	45 50	45 54
	Hourly Wage	2/11	2/1	2/2½	2/0½	2/-	2/0½	2/1
II. Engineering, Metal Works, etc.	Weekly Wage	93/1	95/6	94/5	91/6	93/9	94/8	93/10
	Working Hours	47 14	48 00	44 00	48 00	45 65	47 23	46 95
	Hourly Wage	1/11½	1/11½	2/1	1/10½	2/0½	2/-	2/0
III. Food, Drink, etc.	Weekly Wage	91/5	92/9	92/10	90/2	90/9	89/-	91/10
	Working Hours	40 55	47 14	45 43	46 41	47 21	47 94	46 57
	Hourly Wage	1/11½	1/11½	2/0½	1/11½	1/11	1/10½	1/11½
IV. Clothing, Boots, etc.	Weekly Wage	89/3	91/6	93/9	93/9	96/5	87/1	91/1
	Working Hours	44 00	45 85	44 00	44 00	44 36	46 29	44 83
	Hourly Wage	2/0½	2/-	2/1½	2/1½	2/2	1/10½	2/0½
V. Books, Printing, etc.	Weekly Wage	102/1	104/7	99/2	99/4	110/10	98/8	102/9
	Working Hours	43 54	44 90	44 00	47 53	43 10	46 00	44 42
	Hourly Wage	2/4½	2/4	2/3	2/1	2/6½	2/1½	2/3½
VI. Other Manufacturing	Weekly Wage	92/9	91/3	91/-	90/9	93/8	91/4	91/11
	Working Hours	46 46	47 56	45 18	48 00	47 60	47 66	46 96
	Hourly Wage	2/-	1/11	2/0½	1/10½	1/11	1/11	1/11½
VII. Building	Weekly Wage	101/8	100/5	104/5	93/6	99/6	96/11	100/5
	Working Hours	44 59	43 47	44 00	44 00	45 42	44 15	44 15
	Hourly Wage	2/3½	2/3	2/4½	2/1½	2/2½	2/2½	2/3½
VIII. Mining†	Weekly Wage	104/2	101/4	111/5	71/5	108/2	92/9	103/8
	Working Hours	43 33	44 94	43 03	43 79	43 87	45 42	44 01
	Hourly Wage	2/4½	2/3	2/7	1/7½	2/5½	2/0½	2/4½
IX. Rail & Tram Services	Weekly Wage	91/1	94/8	98/1	90/6	95/1	92/-	93/4
	Working Hours	46 02	47 49	47 89	48 50	48 15	48 00	47 38
	Hourly Wage	1/11½	2/-	2/0½	1/10½	1/11½	1/11	1/11½
X. Other Land Transport	Weekly Wage	88/1	88/2	86/-	90/-	93/-	92/9	88/5
	Working Hours	48 14	48 56	48 33	48 00	48 00	48 00	48 26
	Hourly Wage	1/10	1/9½	1/9½	1/10½	1/11½	1/11½	1/10
XI. Shipping, etc. ..	Weekly Wage ‡	98/6	101/9	99/3	101/5	99/5	100/5	99/9
	Working Hours	..	..	..	..	..	..	..
	Hourly Wage	..	..	..	..	..	..	..
XII. Pastoral, Agricultural, etc.	Weekly Wage §	84/5	80/3	88/7	80/4	84/6	86/-	83/11
	Working Hours	..	..	..	..	..	..	..
	Hourly Wage	..	..	..	..	..	..	..
XIII. Domestic, Hotels, etc.	Weekly Wage §	83/7	81/5	82/-	84/3	83/8	66/4	82/4
	Working Hours	48 00	48 48	48 00	48 00	48 00	54 00	48 30
	Hourly Wage	1/9	1/8½	1/8½	1/9	1/9	1/22	1/8½
XIV. Miscellaneous ..	Weekly Wage	88/2	90/8	80/9	86/6	86/-	84/-	88/8
	Working Hours	46 85	47 97	46 69	47 78	46 98	47 65	47 29
	Hourly Wage	1/10½	1/10½	1/11	1/9½	1/10	1/9½	1/10½
All Groups	Weekly Wage	91/6	91/4	93/10	87/6	93/9	88/5	91/6
All Groups excepting XI. and XII	Weekly Wage	93/-	93/5	95/6	88/8	95/4	88/11	93/1
	Working Hours	46 05	46 99	45 51	47 00	46 41	46 93	46 38
	Hourly Wage	2/0½	1/11½	2/1½	1/10½	2/0½	1/10½	2/-

* Particulars relate to the Weighted Average weekly wage, working hours and hourly wage, respectively. † Average rates of wage and hours prevailing at the principal mining centres in each State. ‡ Average rates of wage are for occupations other than Masters, Officers, and Engineers in the Merchant Marine Service, and include value of victualling and accommodation, where provided, at 81/11 per month. § See footnotes to table on page 72.

(ii.) The following table gives particulars in regard to the weighted average nominal weekly and hourly rates of wage payable to adult female workers and weekly hours of labour at the 31st December, 1922:—

Weekly and Hourly Rates of Wage—Adult Females—Weighted Average Rates of Wage payable, and Weekly Hours of Labour 31st December, 1922.

Industrial Group.	Particulars.*	New South Wales.	Victoria	Queensland.	South Australia.	Western Australia.	Tasmania.	Australia
III. Food, Drink, etc.	Weekly Wage	42/7	44/9	41/11	39/9	35/-	44/6	43/3
	Working Hours	46.30	48.00	46.17	48.00	44.00	48.00	47.14
	Hourly Wage	-/11	-/11½	-/11	-/10	-/9½	-/11½	-/11
IV. Clothing, Boots, etc.	Weekly Wage	49/-	47/-	47/3	47/11	51/9	45/3	47/10
	Working Hours	44.14	45.29	44.00	44.00	44.00	45.11	44.64
	Hourly Wage	1/1½	1/0½	1/1	1/1	1/2	1/-	1/0½
I. H. V. & VI. All other Manufacturing	Weekly Wage	45/7	49/3	44/7	45/9	..	45/-	47/4
	Working Hours	45.74	47.17	44.07	47.50	..	45.00	46.40
	Hourly Wage	1/-	1/0½	1/0½	-/11½	..	-/11½	1/0½
XIII. Domestic, Hotels, etc.	Weekly Wage†	45/8	48/1	46/8	45/1	61/6	53/11	48/3
	Working Hours	47.08	47.69	47.33	48.00	48.00	54.00	47.64
	Hourly Wage	-/11½	1/-	-/11½	-/11½	1/3½	1/-	1/0½
XIV. Shop Assistants, Clerks, etc.	Weekly Wage	48/7	50/11	53/-	36/6	..	..	48/9
	Working Hours	45.71	46.50	47.00	48.00	..	..	46.40
	Hourly Wage	1/0½	1/1½	1/1½	-/9½	..	..	1/0½
All Groups	Weekly Wage	47/8	48/-	48/2	44/-	58/4	47/7	47/11
	Working Hours	45.33	46.14	45.60	46.10	45.97	47.86	46.82
	Hourly Wage	1/0½	1/0½	1/0½	-/11½	1/2½	1/-	1/0½

* The particulars relate to the Weighted Average weekly rates of wage, working hours and hourly wage, respectively. † See footnote † to table on page 72.

7. **Hours of Labour and Hourly Rates of Wage, 1914 to 1922.**—Particulars are given in the following table, classified according to States for male and female occupations separately at 30th April, 1914, and at the end of December, 1914 to 1922 relating to (a) the weighted average weekly wage, (b) the weighted average number of working hours constituting a full week's work, and (c) the weighted average hourly wage. It should be observed that the weighted average weekly wage relates to all industrial classes combined, and includes the value of board and lodging where supplied in land occupations and the value of victualling in marine occupations,* whereas the number of working hours and the hourly wage relate to all industrial classes other than Groups XI. (Shipping), and XII. (Agricultural, Pastoral, etc.). Owing to the fact that many of the occupations included in these two groups are of a casual or seasonal nature, and that the hours of labour in these occupations are not generally regulated either by awards or determinations of industrial tribunals or otherwise, the necessary data for the computation of the average number of working hours are not available.

* See footnotes to table on page 77

Weekly and Hourly Rates of Wage—Adult Workers—Weighted Average Rates of Wage payable and Weekly Hours of Labour, 30th April, 1914, and at the end of the years 1914 to 1922.

Date.	Particulars.	N.S.W.	Vic.	Q'land.	S.A.	W.A.	Tas.	Aust.
MALE WORKERS.								
30th April, 1914.	Weekly Wage*	s. d. 55 9	s. d. 54 3	s. d. 52 8	s. d. 54 4	s. d. 62 2	s. d. 52 6	s. d. 55 1
	Working Hours	49.42	48.80	48.78	48.60	47.78	48.62	48.98
	Hourly Wage†	1/2	1/1 1/4	1/1 1/4	1/1 1/4	1/4 1/4	1/1	1/2
31st Dec., 1914.	Weekly Wage*	s. d. 56 2	s. d. 54 7	s. d. 53 5	s. d. 54 5	s. d. 62 10	s. d. 52 8	s. d. 56 7
	Working Hours	49.35	48.66	48.64	48.59	48.18	48.62	48.87
	Hourly Wage†	1/2	1/1 1/4	1/1 1/4	1/1 1/4	1/4 1/4	1/1	1/2
31st Dec., 1915.	Weekly Wage*	s. d. 57 7	s. d. 55 3	s. d. 54 4	s. d. 54 8	s. d. 63 4	s. d. 53 2	s. d. 56 6
	Working Hours	49.28	48.50	48.56	48.50	48.12	48.56	48.77
	Hourly Wage†	1/2 1/4	1/2	1/2	1/2	1/4 1/4	1/1 1/4	1/2 1/4
31st Dec., 1916.	Weekly Wage*	s. d. 61 11	s. d. 58 10	s. d. 60 4	s. d. 59 0	s. d. 65 2	s. d. 57 0	s. d. 60 8
	Working Hours	48.51	48.22	48.27	48.14	48.11	48.55	48.33
	Hourly Wage†	1/3 1/4	1/3	1/3 1/4	1/3	1/4 1/4	1/2	1/3 1/4
31st Dec., 1917.	Weekly Wage*	s. d. 64 5	s. d. 63 0	s. d. 65 3	s. d. 63 1	s. d. 68 11	s. d. 59 7	s. d. 64 2
	Working Hours	48.41	48.14	47.19	47.82	48.10	48.48	48.10
	Hourly Wage†	1/3 1/4	1/4	1/5	1/4	1/5 1/4	1/3	1/4 1/4
31st Dec., 1918.	Weekly Wage*	s. d. 65 11	s. d. 65 6	s. d. 69 6	s. d. 65 6	s. d. 70 4	s. d. 61 2	s. d. 66 5
	Working Hours	48.16	47.98	46.90	47.77	47.69	48.39	47.88
	Hourly Wage†	1/4 1/4	1/4 1/4	1/6	1/4 1/4	1/6	1/3 1/4	1/5
31st Dec., 1919.	Weekly Wage*	s. d. 76 9	s. d. 72 0	s. d. 78 7	s. d. 70 5	s. d. 77 8	s. d. 60 0	s. d. 74 11
	Working Hours	47.77	47.38	46.19	47.58	47.60	47.89	47.41
	Hourly Wage†	1/7 1/4	1/6 1/4	1/9	1/5 1/4	1/7 1/4	1/5 1/4	1/7 1/4
31st Dec., 1920.	Weekly Wage*	s. d. 94 0	s. d. 86 1	s. d. 91 6	s. d. 82 8	s. d. 89 9	s. d. 85 9	s. d. 89 10
	Working Hours	47.51	47.19	45.63	47.29	46.53	47.33	47.07
	Hourly Wage†	2/-	1/10	2/0 1/4	1/8 1/4	1/11 1/4	1/10	1/11
31st Dec., 1921.	Weekly Wage*	s. d. 95 10	s. d. 93 7	s. d. 96 8	s. d. 89 5	s. d. 95 0	s. d. 91 8	s. d. 94 6
	Working Hours	45.66	46.95	45.52	47.07	46.24	46.84	46.22
	Hourly Wage†	2/1 1/4	2/0 1/4	2/2	1/10 1/4	2/1	1/11 1/4	2/0 1/4
31st Dec., 1922.	Weekly Wage*	s. d. 91 6	s. d. 91 4	s. d. 93 10	s. d. 87 6	s. d. 93 9	s. d. 88 5	s. d. 91 6
	Working Hours	46.05	46.99	45.51	47.00	46.41	46.93	46.38
	Hourly Wage†	2/0 1/4	1/11 1/4	2/1 1/4	1/10 1/4	2/0 1/4	1/10 1/4	2/-
FEMALE WORKERS.								
30th April, 1914.	Weekly Wage	s. d. 26 9	s. d. 27 4	s. d. 26 11	s. d. 24 1	s. d. 37 4	s. d. 25 10	s. d. 27 9
	Working Hours	49.34	48.54	49.32	49.33	48.69	50.76	49.08
	Hourly Wage	-/6 1/4	-/6 1/4	-/6 1/4	-/5 1/4	-/6 1/4	-/6 1/4	-/6 1/4
31st Dec., 1914.	Weekly Wage	s. d. 26 10	s. d. 27 9	s. d. 27 1	s. d. 24 1	s. d. 37 4	s. d. 25 10	s. d. 27 5
	Working Hours	49.34	48.54	49.82	49.33	49.44	50.76	49.11
	Hourly Wage	-/6 1/4	-/6 1/4	-/6 1/4	-/5 1/4	-/9	-/6 1/4	-/6 1/4
31st Dec., 1915.	Weekly Wage	s. d. 27 5	s. d. 26 11	s. d. 26 11	s. d. 24 6	s. d. 37 5	s. d. 28 0	s. d. 27 4
	Working Hours	49.45	48.46	49.84	49.35	49.86	50.14	49.12
	Hourly Wage	-/6 1/4	-/6 1/4	-/6 1/4	-/6 1/4	-/9	-/6 1/4	-/6 1/4
31st Dec., 1916.	Weekly Wage	s. d. 28 7	s. d. 28 6	s. d. 27 3	s. d. 24 10	s. d. 38 10	s. d. 28 3	s. d. 28 5
	Working Hours	49.44	48.36	49.85	49.02	49.08	49.83	49.02
	Hourly Wage	-/7	-/7	-/6 1/4	-/6 1/4	-/9 1/4	-/6 1/4	-/7
31st Dec., 1917.	Weekly Wage	s. d. 30 5	s. d. 30 4	s. d. 30 5	s. d. 27 9	s. d. 38 10	s. d. 28 5	s. d. 30 6
	Working Hours	48.98	48.32	48.99	48.73	48.78	49.83	48.71
	Hourly Wage	-/7 1/4	-/7 1/4	-/7 1/4	-/6 1/4	-/9 1/4	-/6 1/4	-/7 1/4
31st Dec., 1918.	Weekly Wage	s. d. 31 10	s. d. 31 3	s. d. 32 10	s. d. 20 5	s. d. 38 10	s. d. 28 9	s. d. 31 9
	Working Hours	48.35	48.32	48.37	48.73	48.78	49.83	48.42
	Hourly Wage	-/8	-/7 1/4	-/8 1/4	-/7 1/4	-/9 1/4	-/7	-/7 1/4
31st Dec., 1919.	Weekly Wage	s. d. 40 0	s. d. 34 5	s. d. 38 4	s. d. 33 3	s. d. 43 7	s. d. 33 0	s. d. 37 1
	Working Hours	47.53	47.63	46.76	47.67	48.12	49.28	47.54
	Hourly Wage	-/10	-/8 1/4	-/9 1/4	-/8 1/4	-/11	-/8	-/9 1/4
31st Dec., 1920.	Weekly Wage	s. d. 46 0	s. d. 43 1	s. d. 44 11	s. d. 40 7	s. d. 52 11	s. d. 41 10	s. d. 44 6
	Working Hours	46.83	46.23	46.09	46.51	46.20	47.86	46.47
	Hourly Wage	-/11 1/4	-/11 1/4	-/11 1/4	-/10 1/4	1/1 1/4	-/10 1/4	-/11 1/4
31st Dec., 1921.	Weekly Wage	s. d. 49 0	s. d. 47 10	s. d. 50 3	s. d. 45 2	s. d. 56 4	s. d. 47 6	s. d. 48 8
	Working Hours	45.06	46.04	45.66	46.10	45.97	47.86	45.69
	Hourly Wage	1/1	1/0 1/4	1/1 1/4	-/11 1/4	1/2 1/4	1/-	1/0 1/4
31st Dec., 1922.	Weekly Wage	s. d. 47 8	s. d. 48 0	s. d. 48 2	s. d. 44 0	s. d. 50 4	s. d. 47 7	s. d. 47 11
	Working Hours	45.33	46.14	45.60	46.10	45.97	47.86	45.82
	Hourly Wage	1/0 1/4	1/0 1/4	1/0 1/4	-/11 1/4	1/2 1/4	1/-	1/0 1/4

* Weighted average weekly wage in all industrial groups combined.

† Weighted average working hours per week, and computed hourly rates of wage for all industrial groups excepting Groups XI. (Shipping, etc.), and XII. (Agricultural, Pastoral, etc.). Working hours have not been generally regulated by industrial tribunals for occupations classified in Industrial Groups XI and XII.

There was a diminution in each of the States, during the period 1914 to 1921, in the number of working hours constituting a full week's work for male and female occupations, but during 1922 certain increases in hours of labour were recorded, principally in New South Wales. The effect of these changes on the hourly rate of wage as compared with the general increase in the weekly wage is readily seen from the comparative index-numbers given in the following table. In each instance (male and female occupations separately) the basis taken is the weighted average for Australia at the 30th April, 1914 (=1000).

Index-numbers for Weekly and Hourly Weighted Average Wages, 30th April, 1914, and 31st December, 1914 to 1922.

NOTE.—Weighted Average for Australia at 30th April, 1914, as base (= 1000).

Date.	Particulars.	N.S.W.	Vic.	Q'land.	S.A.	W.A.	Tas.	Aust.
MALE WORKERS.								
30th April, 1914.	Weekly Wage ..	1,011	984	955	986	1,128	952	1,000
	Hourly Wage ..	998	980	963	991	1,170	853	1,000
31st Dec., 1914.	Weekly Wage ..	1,019	990	969	988	1,140	856	1,000
	Hourly Wage ..	1,010	990	985	993	1,173	936	1,000
31st Dec., 1915.	Weekly Wage ..	1,044	1,002	986	992	1,149	985	1,023
	Hourly Wage ..	1,039	1,006	1,008	1,001	1,182	946	1,020
31st Dec., 1916.	Weekly Wage ..	1,123	1,067	1,095	1,071	1,182	1,034	1,100
	Hourly Wage ..	1,127	1,074	1,097	1,075	1,206	1,011	1,105
31st Dec., 1917.	Weekly Wage ..	1,168	1,148	1,203	1,144	1,260	1,081	1,164
	Hourly Wage ..	1,162	1,138	1,209	1,145	1,252	1,079	1,164
31st Dec., 1918.	Weekly Wage ..	1,196	1,189	1,261	1,188	1,276	1,110	1,205
	Hourly Wage ..	1,198	1,192	1,297	1,178	1,282	1,120	1,210
31st Dec., 1919.	Weekly Wage ..	1,303	1,306	1,426	1,377	1,409	1,251	1,359
	Hourly Wage ..	1,405	1,322	1,512	1,262	1,408	1,259	1,378
31st Dec., 1920.	Weekly Wage ..	1,708	1,561	1,650	1,500	1,628	1,556	1,620
	Hourly Wage ..	1,725	1,570	1,753	1,492	1,656	1,567	1,655
31st Dec., 1921.	Weekly Wage ..	1,738	1,697	1,753	1,623	1,723	1,663	1,715
	Hourly Wage ..	1,817	1,741	1,805	1,637	1,790	1,675	1,770
31st Dec., 1922.	Weekly Wage ..	1,690	1,657	1,702	1,588	1,701	1,605	1,660
	Hourly Wage ..	1,735	1,700	1,803	1,621	1,766	1,628	1,720
FEMALE WORKERS.								
30th April, 1914.	Weekly Wage ..	984	1,006	989	885	1,373	950	1,000
	Hourly Wage ..	980	1,021	976	881	1,386	920	1,000
31st Dec., 1914.	Weekly Wage ..	987	1,022	996	885	1,373	950	1,000
	Hourly Wage ..	983	1,035	983	881	1,364	920	1,000
31st Dec., 1915.	Weekly Wage ..	1,007	990	990	901	1,376	1,031	1,005
	Hourly Wage ..	1,002	1,005	976	898	1,357	1,011	1,009
31st Dec., 1916.	Weekly Wage ..	1,050	1,047	1,094	915	1,429	1,041	1,047
	Hourly Wage ..	1,044	1,063	991	916	1,451	1,027	1,048
31st Dec., 1917.	Weekly Wage ..	1,119	1,116	1,120	1,020	1,430	1,045	1,121
	Hourly Wage ..	1,122	1,134	1,122	1,027	1,440	1,029	1,130
31st Dec., 1918.	Weekly Wage ..	1,173	1,151	1,208	1,084	1,430	1,059	1,168
	Hourly Wage ..	1,191	1,169	1,226	1,092	1,426	1,044	1,155
31st Dec., 1919.	Weekly Wage ..	1,474	1,268	1,412	1,225	1,605	1,215	1,366
	Hourly Wage ..	1,623	1,307	1,463	1,262	1,639	1,211	1,410
31st Dec., 1920.	Weekly Wage ..	1,695	1,536	1,652	1,495	1,947	1,540	1,637
	Hourly Wage ..	1,777	1,685	1,761	1,578	2,069	1,580	1,730
31st Dec., 1921.	Weekly Wage ..	1,803	1,761	1,849	1,661	2,074	1,749	1,790
	Hourly Wage ..	1,965	1,878	1,969	1,770	2,215	1,794	1,923
31st Dec., 1922.	Weekly Wage ..	1,784	1,767	1,771	1,620	2,075	1,751	1,793
	Hourly Wage ..	1,899	1,881	1,908	1,726	2,215	1,797	1,880

8. **Weighted Average Nominal Hours of Labour.**—The following table shows the weighted average nominal hours of labour (exclusive of overtime) in a full working week for *male* workers in each State and Australia at the 30th April, 1914, and at 31st December, 1914 to 1922. There are shown also index-numbers for each State based on the average weekly hours at the end of each of the periods specified, computed with the weighted average hours of labour for all States at the 30th April, 1914, as base (=1000).

Weighted Average Nominal Hours of Labour (exclusive of Overtime) Worked by Adult Male Workers during a Full Working Week and Hours Index-Numbers, 30th April, 1914, and 31st December, 1914 to 1922.

NOTE.—Index-Numbers based on the Average Hours of Labour for Australia at the 30th April, 1914 (48.93) as base (= 1000). The index-numbers in this table are comparable throughout.

Particulars.		N.S.W.	Vic.	Q'land.	S.A.	W.A.	Tas.	Aust.
30th April, 1914.	Weighted average weekly hours of labour*	49.42	48.80	48.78	48.60	47.78	48.62	48.93
	Index-numbers ..	1,010	997	997	993	976	994	1,000
31st Dec., 1914.	Weighted average weekly hours of labour*	49.35	48.66	48.64	48.59	48.18	48.62	48.87
	Index-numbers ..	1,009	994	994	993	985	994	999
31st Dec., 1915.	Weighted average weekly hours of labour*	49.28	48.50	48.56	48.60	48.12	48.56	48.77
	Index-numbers ..	1,007	991	992	991	983	992	997
31st Dec., 1916.	Weighted average weekly hours of labour*	48.51	48.22	48.27	48.14	48.11	48.55	48.33
	Index-numbers ..	991	985	987	984	983	992	988
31st Dec., 1917.	Weighted average weekly hours of labour*	48.41	48.14	47.19	47.82	48.10	48.48	48.10
	Index-numbers ..	989	984	964	977	983	991	983
31st Dec., 1918.	Weighted average weekly hours of labour*	48.16	47.98	46.90	47.77	47.69	48.39	47.88
	Index-numbers ..	984	981	950	976	975	989	979
31st Dec., 1919.	Weighted average weekly hours of labour*	47.77	47.36	46.19	47.58	47.60	47.89	47.41
	Index-numbers ..	976	968	944	972	973	979	969
31st Dec., 1920.	Weighted average weekly hours of labour*	47.51	47.19	45.63	47.29	46.53	47.33	47.07
	Index-numbers ..	971	964	933	966	951	967	962
31st Dec., 1921.	Weighted average weekly hours of labour*	45.66	46.95	45.52	47.07	46.24	46.84	46.22
	Index-numbers ..	933	960	930	962	945	957	945
31st Dec., 1922.	Weekly Average weekly hours of labour*	46.05	46.99	45.51	47.00	46.41	46.93	46.38
	Index-numbers ..	941	960	930	961	948	959	948

* Weighted average working hours per week for all industrial groups excepting Groups XI. (Shipping), and XII. (Agricultural, Pastoral, &c.), in which working hours have not been generally regulated by industrial tribunals.

There was a considerable diminution in each State during the period 1914 to 1921 in the number of working hours constituting a full week's work for male occupations, while during 1922 in certain States, but principally in New South Wales, hours of labour were increased. The weighted average weekly hours index-number for Australia at the 31st December, 1922, was 948, as compared with 1000 at 30th April, 1914, a reduction of 5.2 per cent. The lowest weighted average nominal weekly hours index-number at the 31st December, 1922, was that for Queensland (930), followed in the order named by New South Wales (941), Western Australia (948), Tasmania (959), Victoria (960), and South Australia, (961). During the period under review the percentage reduction in hours was greatest in New South Wales (6.8), followed by Queensland (6.7), Victoria (3.7), Tasmania (3.5), South Australia (3.2), and Western Australia (2.9).

9. Average Nominal Weekly Wage—Each State, 1891 to 1922.—

The following table shows the average weekly rate of wage payable to adult male workers in each State from 1891 to 1922. The wages given in this table are relatively identical with the index-numbers shown in the table on p. 83.

Average Nominal Rates of Wage Payable to Adult Male Workers for the years specified from 1891 to 1922.

Particulars.	1891.	1896.	1901.	1911.	1912.	1914.	1915.	1916.	1917.	1918.	1919.	1920.	1921.	1922.
	s. d.	s. d.	s. d.	s. d.	s. d.	s. d.	s. d.	s. d.	s. d.	s. d.	s. d.	s. d.	s. d.	s. d.
N. S. Wales	44 1 42	1 43 11 51	5 54 3 56	2 57 7 61	1 1 64	5 65 11 76	9 04 0 95	10 91 6						
Victoria	40 6 38	0 40 9 50	6 63 2 54	7 55 8 58	10 63 0 65	6 72 0 86	103 7 91 4							
Queensland	46 6 44	8 46 2 51	1 51 9 53	5 54 4 60	4 65 3 69	6 78 7 91	6 96 8 93 10							
S. Australia	41 7 41	8 42 0 51	11 53 9 54	5 54 8 59	0 63 1 65	6 70 5 82	8 89 5 87 8							
W. Australia	52 4 53	7 53 11 59	0 61 0 62	10 63 4 65	2 68 11 70	4 77 8 89	9 95 0 93 9							
Tasmania	38 6 35	6 36 10 41	0 47 10 52	8 53 3 57	0 59 7 61	2 69 0 85	9 91 8 88 5							
Australia	43 5 41	10 43 5 51	3 53 10 55	7 56 6 60	8 64 2 66	5 74 11 89	10 94 6 91 6							

The average weekly rate in 1922 was highest in Queensland, followed in the order named by Western Australia, New South Wales, Victoria, Tasmania and South Australia. In each of the States of New South Wales, Victoria and Queensland, the rates show an increase in each of the years specified except in 1896 and in 1922. In South Australia there was an increase in each of the years specified, except 1922, while in Western Australia the average rates remained constant in 1906, and 1907, with increases in each year other than 1922. In Tasmania there was a decrease in 1896, in 1907, and in 1922, and substantial increases in 1912 and 1913. During the period 1911 to end of the year 1922, the average weekly rate of wage in New South Wales increased 78 per cent., in Victoria 81 per cent., in Queensland 84 per cent., in South Australia 69 per cent., in Western Australia 59 per cent., in Tasmania 116 per cent., and the weighted average weekly rate for Australia increased from 51s. 3d. to 91s. 6d., an increase of 78.5 per cent.

10. Average Nominal Weekly Wage—Each Industrial Group, 1891 to 1922.—The following table shows for each of the years indicated the average weekly wages payable in each of the fourteen industrial groups. The wages are relatively identical with the index-numbers shown in the table on page 84.

Average Nominal Rates of Wage Payable to Adult Male Workers in each Industrial Group for the years specified from 1891 to 1922.

Particulars.	1891.	1896.	1901.	1911.	1912.	1914.	1915.	1916.	1917.	1918.	1919.	1920.	1921.	1922.
	s. d.	s. d.	s. d.	s. d.	s. d.	s. d.	s. d.	s. d.	s. d.	s. d.	s. d.	s. d.	s. d.	s. d.
Group I.	52 5 48	2 52 3 57	8 58 7 59	6 60 2 63	10 66 0 68	11 75 9 95	1 98 2 95 4							
" II.	47 8 47	7 48 5 54	6 56 7 57	9 60 2 62	1 65 0 68	8 77 6 92	6 98 2 93 10							
" III.	33 2 37	11 44 7 50	9 53 2 56	5 57 9 61	2 63 7 66	0 75 6 80	3 93 10 91 10							
" IV.	36 8 36	6 36 3 50	3 53 0 53	2 56 7 59	7 61 5 73	5 86 6 93	3 91 1							
" V.	53 5 50	1 51 0 58	11 60 11 63	10 64 4 68	1 70 4 74	1 80 9 90	6 104 7 102 9							
" VI.	46 4 44	8 46 6 51	11 53 1 56	0 67 8 61	8 63 10 66	1 75 4 88	11 95 0 91 11							
" VII.	50 6 47	6 53 10 62	1 63 10 65	5 65 10 69	8 72 5 74	3 79 8 95	7 102 5 100 5							
" VIII.	58 1 59	10 54 8 61	2 62 4 65	2 66 7 72	9 78 4 78	6 88 4 103	10 105 4 103 8							
" IX.	50 10 51	0 52 4 57	0 59 7 59	8 60 10 63	4 63 11 68	11 78 6 93	1 97 5 93 4							
" X.	39 6 36	0 40 9 46	7 50 10 52	8 53 4 57	10 62 0 63	5 73 4 87	3 90 2 88 5							
" XI.	35 2 34	6 38 5 44	7 48 3 40	10 52 7 59	1 61 2 64	5 77 0 88	0 101 8 99 9							
" XII.	34 10 33	6 32 1 43	0 48 4 49	5 49 8 55	0 61 1 63	1 70 3 87	1 89 0 83 11							
" XIII.	32 10 30	6 30 8 45	5 45 10 47	11 48 7 51	0 53 11 56	7 68 7 80	6 84 2 82 4							
" XIV.	39 7 38	7 38 10 47	7 52 0 54	0 54 7 58	3 60 9 63	3 71 3 84	11 91 1 88 8							
ALL GROUPS	43 5 41	10 43 5 51	3 53 10 55	7 56 6 60	8 64 2 66	5 74 11 89	10 94 6 91 6							

It may be seen that in 1922 the weekly rate of wage was highest in Group VIII. (Mining), 103s. 8d., while the lowest average weekly rate was in Group XIII. (Domestic, Hotels, etc.), where the rate was 82s. 4d. The average weekly rate for all groups together increased in all the years since 1891, except in 1896 and 1922. The rate in 1901 was the same as in 1891, (43.5d.), but in 1919 had increased to 74s. 11d., in 1920 to 89s. 10d., in 1921 to 94s. 6d., while in 1922 it fell to 91s. 6d.

11. Nominal Wage Index-Numbers—Each State, 1901 to 1922.—The following table shows, by means of index-numbers, the variations in wages for all industries in each State, the weighted average wage for Australia in 1911 being taken as base (= 1000). These results are based generally upon rates of wage prevailing in the capital cities of each State, but in certain industries, such as mining, agriculture, etc., rates are necessarily taken for places outside the metropolitan areas :—

Variations in Nominal Wage Index-numbers (Adult Males), for years specified, 1901 to 1922. (Weighted Average Wage for Australia in 1911 = 1,000.)

Particulars.	No. of occupations included.		Nominal Wage Index-Numbers.											
	1901 to 1912.	1913-22.	1901.	1911.	1912.	1914.	1915.	1916.	1917.	1918.	1919.	1920.	1921.	1922.
N.S. Wales..	158	874	858	1,003	1,058	1,096	1,124	1,208	1,257	1,286	1,498	1,835	1,869	1,785
Victoria ..	150	909	796	985	1,038	1,065	1,078	1,148	1,229	1,278	1,404	1,679	1,826	1,793
Queensland	87	627	901	907	1,010	1,042	1,060	1,177	1,273	1,356	1,534	1,785	1,866	1,830
S. Australia	134	567	819	1,013	1,048	1,062	1,067	1,151	1,231	1,278	1,373	1,613	1,745	1,708
W. Australia	69	489	1,052	1,152	1,191	1,226	1,236	1,272	1,345	1,372	1,516	1,751	1,853	1,820
Tasmania ..	54	482	719	799	934	1,028	1,039	1,112	1,163	1,193	1,346	1,674	1,786	1,726
Australia*	652	3,948	848	1,000	1,051	1,055	1,102	1,134	1,252	1,296	1,462	1,752	1,844	1,785

* Weighted average.

The difference between nominal wages in the several States has decreased very considerably since 1906. Wages in Queensland have increased since 1914 at a higher rate than in any other State. In Tasmania the first determination under the Wages Boards Acts, 1910-1911, came into force in 1911, and the wages in that State increased substantially as a result. They are still, however, lower than in any other State except South Australia.

12. Nominal Wage Index-numbers—Industrial Groups, 1901 to 1922.—The following table shows variations in nominal wage index-numbers, the occupations having been classified in fourteen industrial groups. As already pointed out, these index-numbers are comparable throughout, and show, not only the variations in wages in each industrial group, but also the relative wages as between the several groups :—

Variations in Nominal Wage Index-numbers (Adult Males) in Industrial Groups for years specified, 1901 to 1922. (Weighted Average Wage for all Groups in 1911 = 1,000.)

Particulars.	No. of occupations included.		Nominal Wage Index-Numbers.										
	1901 to 1912.	1913-22.	1901.	1911.	1914.	1915.	1916.	1917.	1918.	1919.	1920.	1921.	1922.
I. Wood, Furniture, etc.	27	270	1,019	1,125	1,161	1,174	1,246	1,288	1,345	1,479	1,855	1,916	1,800
II. Engineering, Metal Works, etc.	101	636	945	1,064	1,127	1,174	1,311	1,268	1,340	1,612	1,803	1,915	1,832
III. Food, Drink, etc.	34	576	871	991	1,086	1,127	1,194	1,241	1,288	1,473	1,742	1,832	1,792
IV. Clothing, Hats, Boots, etc.	13	124	708	981	1,034	1,037	1,104	1,163	1,198	1,433	1,687	1,816	1,777
V. Books, Printing, etc.	25	205	996	1,149	1,246	1,259	1,328	1,376	1,446	1,576	1,941	2,040	2,004
VI. Other Manufacturing	102	875	907	1,013	1,093	1,125	1,303	1,245	1,289	1,470	1,736	1,854	1,793
VII. Building	67	190	1,050	1,213	1,276	1,235	1,359	1,413	1,449	1,554	1,865	1,990	1,990
VIII. Mining	71	161	1,067	1,194	1,272	1,299	1,420	1,528	1,532	1,724	2,026	2,056	2,022
IX. Rail & Tram Services	68	224	1,021	1,113	1,165	1,187	1,236	1,286	1,345	1,532	1,816	1,901	1,821
X. Other Land Transport	9	70	795	910	1,026	1,041	1,123	1,210	1,237	1,431	1,702	1,700	1,725
XI. Shipping, etc.	74	198	751	871	972	1,026	1,153	1,194	1,257	1,618	1,716	1,984	1,947
XII. Agricultural, Pastoral, etc.	8	72	627	839	965	969	1,073	1,192	1,231	1,370	1,809	1,736	1,637
XIII. Domestic, Hotels, etc.	17	114	598	387	935	948	995	1,052	1,104	1,338	1,671	1,642	1,606
XIV. Miscellaneous	36	233	759	929	1,054	1,065	1,137	1,185	1,234	1,389	1,656	1,775	1,730
All Groups†	652	3,043	848	1,000	1,036	1,102	1,184	1,252	1,298	1,462	1,752	1,844	1,785

† Weighted average.

13. **Nominal Wages and Effective Wages.**—The relation between nominal and effective wages was discussed at some length in Labour Report No. 6, Section IV., par. 3, and reference to the matter was also made in Labour Report No. 11, p. 95.

14. **Variations in Effective Wages, 1901 to 1922.**—In comparing wages, two elements are of obvious importance, viz., (i.) hours worked per day or week, and (ii.) the cost of commodities and housing. Thus 60s. per week of 60 hours represents the same hourly rate as 48s. per week of 48 hours. Similarly, if the cost of commodities and housing increases 25 per cent., e.g., if the prices index-number rises from 1000 to 1250, then 60s. per week (the index-number being 1250), is effectively equal only to 48s. (when the index-number was 1000). Or, again, if the prices index-number falls from 1000 to 750, then 60s. per week, when the index-number is 750, would have the same purchasing power as 80s. when the index-number was 1000. Ignoring for the present the number of hours worked, and assuming that the real value of the average wages is to be measured by their purchasing power, the actual average wages paid may be reduced to their effective value by applying the prices index-numbers to the nominal wages index-numbers. The following table shows the effective wage index-numbers so ascertained in each State for each of the years indicated from 1901 to 1922.

In computing these effective wage index-numbers, the nominal wage index-numbers given in paragraph 11 hereof have been divided by the price index-numbers in Chapter V., paragraph 5 hereinbefore. The resulting index-numbers show for each State and for Australia for the years specified the variations in *effective* wages.

Effective Wages—Adult Males—1901 to 1922.

Particulars.	1901.	1911.	1912.	1913.	1914.	1915.	1916.	1917.	1918.	1919.	1920.	1921.	1922.
N.S.W. . .	961	973	922	924	909	850	867	893	902	948	994	1,084	1,092
Victoria . .	915	1,037	981	1,007	964	844	877	950	947	948	939	1,051	1,097
Queensland .	1,172	1,090	1,032	1,080	1,045	912	991	1,078	1,033	1,064	1,085	1,248	1,269
S. Australia .	948	957	906	947	929	847	896	989	957	935	919	1,056	1,085
W. Australia .	1,024	1,023	1,032	1,076	1,073	1,011	1,005	1,079	1,107	1,068	1,033	1,152	1,223
Tasmania . .	827	838	896	976	943	843	870	894	880	900	911	1,002	1,045
Australia	964	1,000	956	975	952	862	894	950	952	968	982	1,087	1,116

In the preceding table the effective wage index-numbers are all computed to the one base, that of the Commonwealth for 1911. The index-numbers are comparable in all respects, and comparisons may be made as to the increase or decrease in the effective wage index-number for any State over any period of years. Thus it will be seen that, comparing 1922 with 1901, and also with 1911, there has been an increase in the index-numbers in all States.

15. **Effective Wages and Standard of Comfort, 1901 to 1922.**—In the preceding paragraph particulars are given as to variations in effective wages in each State, due allowance having been made for variations in the purchasing-power of money, though not for unemployment.

For years prior to 1913 the data available as to unemployment are so meagre that comparative results allowing for variations both in the purchasing-power of money and in unemployment cannot be accurately computed for the several States. In the subjoined table, however, the percentage of unemployment for Australia at the end of the years specified has been used in order to obtain results showing the variations in unemployment upon effective wages. For the year 1914 and subsequent years, the wage index-numbers, percentages of unemployment and retail price index-numbers are the average for the year. In similar tables given in preceding Reports, the wage index-number and unemployment percentages have referred to the end of all the years given. If a comparison is made with the results shown in this table, and those given in the tables appearing in previous Reports, it will be seen that they differ somewhat. The table given herewith, however, is a more accurate reflection of the position for the whole of the years 1914 to 1922 inclusive. Column I. shows the nominal rate of wage index-numbers, and Column II. the relative percentages unemployed (see Chapter III.). Applying these percentages to the numbers shown in Column I., and deducting the results from each corresponding index-number, so as to allow for relative loss of time, the figures in Column III. are obtained. These figures are then recomputed with the year 1911 as base, and are shown in Column IV. In Column V. the price index-numbers are shown, and in Columns VI. and VII. the effective wage index-numbers are given, firstly, for full work, and secondly allowing for lost time. These are obtained by dividing the figures in Columns I. and IV., respectively, by the corresponding figures in Column V. The resulting index-numbers show for Australia for the years specified the variations in *effective wages* or in what may be called the "standard of comfort."*

* This expression must not be confused with "standard of living." A change in the standard of living necessarily involves a change in regimen (see Labour Report No. 1), that is, a change in the nature or in the relative quantity of commodities purchased, or both. A change in the "standard of comfort" merely implies a variation in effective wages, which variation may, or may not, result in, or be accompanied by, a change in the "standard of living."

A comparison between the figures in Columns I. and VI. shows the relation between the nominal rates of wage and the purchasing efficiency of these rates. The figures in Column VII. (see graph on page 8) show variations in *effective* wages after allowing not only for variations in prices, but also for unemployment.

Unemployment, and Nominal and Effective Wage Index-numbers, for the Years specified, 1901 to 1922.†

Year.	I. Nominal Wage Index- Numbers.	II. Percentage Unem- ployed.	Rate of Wage Index- Numbers, allowing for Lost Time.		V. Retail Price Index- Numbers.	Effective Wage Index-Numbers.	
			III. Actual.	IV. Recom- puted. (1911 = 1,000).		VI. Full Work.	VII. Allowing for Unemploy- ment.
1901	844	6.6	793	832	880	964	945
1906	866	6.7	808	848	902	960	940
1907	893	5.7	842	884	897	996	986
1908	909	6.0	846	888	951	940	934
1909	923	5.8	870	913	948	974	963
1910	955	5.6	901	945	970	985	974
1911	1,000	4.7	953	1,000	1,000	1,000	1,000
1912	1,051	5.5	993	1,042	1,101	955	946
1913	1,076	5.3	1,021	1,071	1,104	975	970
1914	1,081	8.3	991	1,040	1,140	948	912
1915	1,092	9.3	990	1,039	1,278	854	818
1916	1,144	5.8	1,078	1,131	1,324	864	854
1917	1,226	7.1	1,139	1,195	1,318	930	907
1918	1,270	6.8	1,190	1,255	1,362	932	921
1919	1,370	6.6	1,280	1,343	1,510	907	880
1920	1,627	6.6	1,621	1,590	1,785	911	894
1921	1,826	11.2	1,621	1,701	1,697	1,070	1,002
1922	1,801	9.3	1,634	1,715	1,600	1,126	1,072

† As to the effect in abnormal periods, see Section IV., par. 8, of Labour Report No. 6.

Note.—For years prior to 1914, the nominal wage index-numbers and the percentage unemployed relate to the end of the year only, but from 1914 onward these figures, in addition to those for retail prices, are averages for the whole year.

The nominal wage index-number has steadily increased, and the increase has in some years been at a greater and in others at a lesser rate than the retail price index-numbers. The effective wage index numbers (both "Full Work" and "Allowing for Unemployment") do not, on the whole, show any general increase, but fluctuate between a range which reached its maximum in 1922, and its minimum in 1915. In 1907 there was a large decrease in unemployment, which is reflected in the "peak" in the effective wage index-number for that year. The rise in prices in 1908, which was a drought year, caused a considerable fall in effective wages. From that year, however, until the year 1911, the effective wage index-number steadily increased from 934 to 1000, but this increase was almost counterbalanced by the fall in 1912, which was due to the large increase in prices and the smaller increase in unemployment. In 1913 prices were on the average practically the same as for 1912, while nominal wages increased and unemployment decreased, with the result that effective wages both for full work and allowing for unemployment increased. The effective wage index-numbers for 1914 both show a decrease on the preceding year. This decrease is particularly marked in the case of the index-numbers in which allowance is made for unemployment. In 1915 there was a decrease in unemployment when compared with the preceding year, but on the other hand the cost of food and groceries showed a very substantial increase, so that while nominal wages increased slightly,

effective wages both for full work and allowing for unemployment decreased, being in fact lower than for any other year covered by the investigation. In 1916, 1917, 1918, and again in 1919, effective wages both for full work and allowing for unemployment increased, owing to the fact that the increase in nominal wages was greater than the increase in prices. In 1920 effective wages for full work increased, but owing to the somewhat large increase in unemployment, effective wages, allowing for unemployment, decreased. In 1921 effective wages both for full work and allowing for unemployment increased owing to the fact that while prices declined considerably, wages as a whole, and for the year, increased.

In 1922 there was a decrease in nominal wages, but also a decrease in the retail price index-number, and the percentage of unemployment. The result of these changes is shown in the effective wage index-number, which is greater both for full work and allowing for unemployment.

16. Relative Productive Activity and Effective Wages, 1871 to 1922.

—The preceding tables refer to variations in effective wages, having regard to fluctuations in prices and unemployment. Another important matter is the question of *relative output* or production per head of population, measured quantitatively. If measured by mere value, increase of price would have the effect of making an equal production with that of a time when prices were lower, show a fictitious increase. For example, the annual figures showing the estimated value of production from Australian industries do not directly show whether there has been any increase in the *quantity* produced, since the price-level at the time is itself a factor in the determination of the values. Before, therefore, any estimate of the relative increase or decrease in production (that is, in the relative quantity of output) can be made, the variations due to the price element must be eliminated. This is done in the table on page 88, in which Column I. shows the estimated *value* of production (a) in the aggregate and (b) per head of mean population. In Column II. the estimated value of production per head of population is shown in the form of index-numbers with the year 1911 as base; that is to say, the production per head in 1911 is made equal to 1000, and the values for the other years computed accordingly. In Column III. wholesale and production price index-numbers are given; it is assumed that these index-numbers reflect, with substantial accuracy, variations in wholesale and production prices in Australia. The figures in Column IV. are obtained by dividing the figures for each year in Column II. by the corresponding figures in Column III. They show the estimated relative productive activity per head of population, taking the year 1911 as the basic or standard year, the fluctuations due to variations in prices having been eliminated. The results given by the application of the wholesale price-index numbers may be regarded in general as confirming the results given in the final column, which are to be taken as the best measure of the relative productive activity per head of population.

It should be observed that the index-numbers for the years from 1914 to 1922 cover a period which in several respects was abnormal. At the beginning of that period there was a severe and extensive drought, and again in 1918 drought conditions were prevalent. Further, the enlistments for war service took from industry over 300,000 adult males in the prime of life, while the dislocation of industry owing to the altered

conditions arising out of the war must also have adversely affected the productivity of Australia. It is impossible to measure these effects quantitatively.

Estimated Value of Australian Production, 1906 to 1922.

Year.	Agricultural.	Pastoral.	Dairy, Poultry, and Bee Farming	Forestry & Fisheries.	Mining.	Manufacturing.	Total.
	£1000.	£1000.	£1000.	£1000.	£1000.	£1000.	£1000.
1906 ..	25,349	45,389	13,611	4,879	26,648	31,172	147,043
1907 ..	30,500	50,660	15,584	4,826	28,317	36,155	166,042
1908 ..	37,150	47,259	15,045	4,286	24,557	36,637	164,934
1909 ..	41,056	50,864	15,064	4,462	23,036	39,713	174,195
1910 ..	39,752	56,993	17,387	4,789	23,222	45,896	187,741
1911 ..	38,774	50,725	19,107	5,728	23,303	50,767	188,404
1912 ..	45,754	51,615	20,280	6,432	25,475	57,022	206,578
1913 ..	46,162	57,866	20,341	6,388	25,594	61,586	217,887
1914 ..	36,052	61,055	21,562	6,419	22,058	62,956	210,097
1915 ..	75,475	66,180	21,156	5,777	22,060	62,863	253,531
1916 ..	61,255	76,142	26,949	5,505	23,192	64,205	257,248
1917 ..	59,641	82,822	31,326	5,523	24,998	69,797	273,607
1918 ..	59,036	86,793	33,738	7,137	25,462	75,362	287,528
1919-20 ..	72,202	100,920	38,830	10,170	18,982	98,162	339,266
1920-21 ..	112,801	86,882	52,613	10,490	21,618	109,435	393,834
1921-22 ..	81,371	69,254	44,417	10,373	19,977	120,751	346,662

Estimated Relative Productive Activity in Australia for the Years specified, 1871 to 1922.

Year.	I.		II.	III.		IV
	Estimated Value of Production.			(a) Wholesale Price-Index-Number	(b) Production Price-Index-Number		Estimate Relative Productive Activity per head
	(a) Total. (000 omitted.)	(b) Per Head of Population.	1911=1,000.			1911=1,000.
1871 ..	£ 46,700	£ 27.46	667	1,229	..	* 543 † ..
1881 ..	71,116	30.83	748	1,121	..	667 ..
1891 ..	96,087	29.65	720	945	..	762 ..
1901 ..	114,585	29.96	727	974	..	746 ..
1906 ..	147,043	35.94	873	948	..	921 ..
1907 ..	166,042	39.90	969	1,021	..	949 ..
1908 ..	164,934	38.97	946	1,115	1,074	848 881
1909 ..	174,195	40.29	978	993	1,000	985 978
1910 ..	187,741	42.43	1,030	1,003	970	1,027 1,062
1911 ..	188,404	41.19	1,000	1,000	1,000	1,000 1,000
1912 ..	206,578	43.52	1,057	1,170	1,110	903 952
1913 ..	217,887	44.52	1,081	1,088	1,051	994 1,029
1914 ..	210,097	42.25	1,026	1,149	1,263	893 812
1915 ..	253,531	51.01	1,238	1,604	1,431	772 865
1916 ..	257,248	52.30	1,270	1,504	1,489	844 847
1917 ..	273,607	54.91	1,333	1,662	1,607	802 829
1918 ..	287,528	56.53	1,374	1,934	1,770	710 776
1919-20 ..	339,266	63.96	1,553	2,312	2,117	672 734
1920-21 ..	393,834	72.77	1,767	2,266	2,097	780 843
1921-22 ..	346,662	62.91	1,527	1,741	1,564	877 976

* Relative Production per head if computed by application of Wholesale Price Index-numbers.
 † Relative Production per head (computed by application of Production Price Index-numbers, the basis being indicated in Production Bulletin No 13).