Australian Bureau of Statistics

2007–08

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AGRICULTURAL COMMODITIES AUSTRALIA

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For further information about these and related statistics, contact the National Information and Referral Service on 1300 135 070.

NOTES

ABOUT THIS PUBLICATION

This publication contains final estimates for the main commodities collected in the 2007–08 Agricultural Resource Management Survey (ARMS). Included are statistics on land use, industry activity, crop and horticulture area and production, and livestock. The data are based on a response rate of 87% from a sample of approximately 33,000 agricultural businesses selected for the 2007–08 ARMS.

Further data from the 2007–08 ARMS collection will be released in two subsequent publications. The first is *Water Use on Australian Farms* (cat. no. 4618.0), and the second is *Land Management and Farming in Australia* (cat. no. 4627.0).

The Australian Bureau of Statistics (ABS) will release a range of sub-state geographic level data in conjunction with this publication. Specifically, Natural Resource Management and Statistical Division region outputs will be released as datacubes attached to this publication.

The estimates in this publication are based on the Australian and New Zealand Standard Industrial Classification (ANZSIC) 2006 edition, which was adopted for the first time in 2005–06.

CHANGES IN THIS ISSUE

Due to less content being collected in the 2007–08 ARMS compared with previous Agricultural Surveys, a less detailed range of livestock, broadacre crops, fruit and vegetable estimates are presented in this issue. For further detail refer to paragraph 2 of the Explanatory Notes.

More detailed data for vegetables and livestock will be released in datacubes attached to this publication.

Structural tables containing data pertaining to agricultural business activity by Estimated Value of Agricultural Operations (EVAO) and by area will also be released as datacubes attached to this publication.

Livestock slaughterings and products data (previously table 8) can be found in the quarterly publication, *Livestock Products Australia* (cat. no. 7215.0).

Brian Pink
Australian Statistician

ABBREVIATIONS

'000	thousand
ABS	Australian Bureau of Statistics
ACT	Australian Capital Territory
ANZSIC	Australian and New Zealand Standard Industrial Classification
Aust.	Australia
EVAO	Estimated Value of Agricultural Operations
ha	hectare
kg	kilogram
n.e.c.	not elsewhere classified
NRM	natural resource management
NSW	New South Wales
NT	Northern Territory
Qld	Queensland
RSE	relative standard error
SA	South Australia
SD	statistical division
SE	standard error
t	tonne
Tas.	Tasmania
Vic.	Victoria
WA	Western Australia

NUMBER OF AGRICULTURAL BUSINESSES

The 2007–08 ARMS found that the number of businesses undertaking agricultural activity at 30 June 2008 had fallen by 6% to 141 thousand businesses.

The beef cattle farming industry was the largest sector, comprising around 33% of all agricultural businesses. Grain growers were the next largest sector at 11%, followed by the mixed farming sector (grain-sheep/beef cattle) at 10%. Notably, the number of specialised sheep farmers, and sheep-beef cattle farmers has decreased by 9% and 14% respectively.

The Survey also found that there were an estimated 15 thousand non-agricultural businesses who undertook agricultural activity during 2007–08.

OVERVIEW

The 2007–08 season was characterised by improved growing conditions in most states. Easing of weather conditions in many areas saw production for the majority of the broadacre crops increase from the previous year's harvest. The estimates show increases in the area planted for wheat, barley, and grain sorghum, and a minor increase of lupins for grain. Plantings for cotton and rice decreased significantly from 2006-07 estimates.

CROPS FOR GRAIN

Wheat

The total area sown to wheat for grain in 2007–08 increased by 7% to 12.6 million hectares. The largest increases were reported in Victoria (up 12%) and New South Wales (up 11%).

Improved weather conditions over the last growing season resulted in wheat production increasing by 25% to 13.6 million tonnes. Wheat production rose across all major growing states, with the largest increases reported in Victoria (up by 127% to 2 million tonnes) and South Australia (up by 59% to 2.3 million tonnes).

Western Australia was the largest producer of wheat grain with 5.8 million tonnes, an increase of 13% from 2006–07.

Barley

The total area sown to barley for grain in 2007–08 rose by 17% to 4.9 million hectares, driven largely by a 28% increase in Western Australia.

Favourable growing conditions saw increased barley production in all states. Production of barley rose by 68% to 7.2 million tonnes. The largest increases were reported in Victoria (up 196% to 1.8 million tonnes), South Australia (up 68% to 1.7 million tonnes), and Western Australia (up 50% to 2.7 million tonnes).

Oats

The total area sown to oats for grain in 2007–08 rose by 23% to 1.2 million hectares, with increased plantings in Western Australia (up 33%), South Australia (up 34%) and Victoria (up 20%).

Production of oats for grain doubled to 1.5 million tonnes, with increased production reported in all states. The largest increases were reported in Western Australia with a total harvest of 840 thousand tonnes (up by 90%), and Victoria with 335 thousand tonnes (up 150%).

Grain sorghum

The total area sown to grain sorghum in 2007–08 rose by 54% to 942 thousand hectares. The largest increases were in the main growing states of New South Wales (up 72%), and Queensland (up 47%).

Grain sorghum production rose by 195% to a record 3.8 million tonnes from the 2006–07 estimate, with increases reported in all major growing states. An excellent season in most growing areas contributed to increased production of sorghum. Production in Queensland rose by 181% to 2.5 million tonnes, while in New South Wales it increased by 230% to 1.3 million tonnes.

Lupins for grain

The total area planted to lupins for grain in 2007–08 increased to 752 thousand hectares, up by 2%. Western Australia remained the predominant growing state, with a 3% increase in plantings to 546 thousand hectares. Victoria also reported an increase in the area of lupins planted by 5 thousand hectares (up 12%).

Lupins for grain continued

In all growing states, there was an improvement in lupin yields, approaching historic yield figures. Total production of lupins increased by 41% to 662 thousand tonnes, driven by a 30% increase (to 533 thousand tonnes) in Western Australia.

Rice

Lack of water saw the area planted to rice fall sharply in 2007–08, down 90% on historical lows of 2006–07 to 2 thousand hectares. Rice production was similarly affected, down by 89% to 18 thousand tonnes. New South Wales was the only state in which rice was grown.

OTHER CROPS

Canola

The area of canola planted in 2007–08 increased by 21% to 1.3 million hectares. The largest increases were reported in Western Australia (up 45%) and New South Wales (up 10%).

Production of canola returned to near historic levels, more than doubling on last years estimate and increasing to 1.2 million tonnes. Yields of 1 tonne or more per hectare were reported in Victoria, Western Australia and Tasmania. Production rose across all the main growing states, with the largest increase being reported in Western Australia (up 92% to 752 thousand tonnes).

Cotton lint

The total area sown to cotton in 2007–08 fell by 58% to 69 thousand hectares. Production of cotton lint also fell by 58% to 119 thousand tonnes. The two growing states, New South Wales and Queensland reported sharp falls in both area and production. This was as a result of extremely low water availability at the time of planting combined with adverse seasonal conditions.

Sugar cane

The total area of sugar cane cut for crushing in 2007–08 fell to 381 thousand hectares, a decline of 7% from 2006–07. Production fell by 10% nationally to 32.6 million tonnes. Queensland was the main growing state with, 29.8 million tonnes, or 91% of total production.

FRUIT

Bananas

The bearing area of bananas decreased by 16% to 10 thousand hectares in 2007–08. Banana production also decreased, down by 3% to 207 thousand tonnes. An unseasonal coldsnap in some regions affected crop potential.

Oranges

The number of orange trees of bearing age in 2007–08 fell to 6.1 million, down 8%, whilst production fell by 13% to 409 thousand tonnes. The 17% increase in production in Victoria was more than offset by reduced production in South Australia and Western Australia.

Grapes

In 2007–08 the total area of grape vines remained steady at 173 thousand hectares. Bearing area rose to 166 thousand hectares, offset by the area not yet bearing falling to 6,500 hectares. Grape production increased by 28% to 2.0 million tonnes, with 1.8 million tonnes produced for wine making.

VEGETABLES

Potatoes

The total area planted to potatoes in 2007–08 rose by 12% to 38 thousand hectares. The largest increases were in the states of Victoria (up 32%) and South Australia (up 29%). Production of potatoes rose by 16% to 1.4 million tonnes, driven mainly by increases in production in South Australia and Victoria of 31% and 26% respectively.

Tomatoes

The area planted to tomatoes fell by 7% to 6,800 hectares. Decreases in Queensland and Western Australia were only marginally offset by increases in New South Wales and Victoria.

Despite a national decrease in area of tomatoes planted, tomato yields increased in all growing states. National production of tomatoes rose by 29% to 382 thousand tonnes in 2007–08 with large increases reported in Victoria (up 41% to 174 thousand tonnes) and New South Wales (up 30% to 47 thousand tonnes).

Carrots

The area planted to carrots in 2007–08 fell by 14% to just under 5 thousand hectares. Carrot production increased by 0.4% to 273 thousand tonnes. Large falls in New South Wales and South Australia were offset by increases in most other states.

Onions

The area planted to onions in 2007-08 decreased by 7% to 5 thousand hectares. Increased plantings in Western Australia, Tasmania and New South Wales were more than offset by decreased area in the major growing states of South Australia and Queensland. Production of onions rose by 3% to 254 thousand tonnes, driven largely by increased production in Tasmania (up 25%) and Western Australia (up 57%).

Mushrooms

The area planted to mushrooms in 2007-08 remained steady at 179 hectares. A decrease in the area planted in Queensland (down 32%) was offset by increases in New South Wales and South Australia. Production of mushrooms rose by 10% to 47 thousand tonnes, driven largely by increased production in South Australia and New South Wales.

LIVESTOCK

Milk cattle

The number of milk cattle fell by 5% to 2.5 million at 30 June 2008, with 1.6 million cows in milk and dry reported. Victoria continued to dominate the dairy industry with a total herd of 1.6 million head, although this was a decline of 5% from the previous year.

Meat cattle

Meat cattle numbers fell slightly to 24.8 million head at 30 June 2008. Decreases in meat cattle numbers in most states were offset by increases reported in the more northerly regions, Queensland and the Northern Territory.

Sheep

Sheep numbers fell by 10% to 76.9 million at 30 June 2008, their lowest level since 1920. This was a result of continued difficult seasons due to drought and generally low wool prices. Sheep and lamb numbers fell in all states.

Pigs

The number of pigs in Australia fell by 7% to 2.4 million at 30 June 2008. This was driven mainly by decreases in Victoria (down 15% to 394 thousand head) and Queensland (down 12% to 610 thousand head) but was partly offset by increases in New South Wales. New South Wales reported the largest herd (770 thousand head).

Chickens

The number of chickens for meat production decreased by 10% to 73.9 million birds at 30 June 2008, with decreases reported in all states, except Queensland. The number of chickens for egg production fell by 3% to 14.8 million birds, driven by a 30% decrease in Queensland (or 1.3 million birds) and a 44% decrease in Western Australia (or 680 thousand birds). This was partially offset by increases in New South Wales, Victoria and South Australia.

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1 LAND USE, Area: **Year ended 30 June**

	NSW	*Vic.*	*Qld*	*SA*	*WA*	*Tas.*	*NT*	*ACT*	*Aust.*
	'000 ha	'000 ha	'000 ha	'000 ha	'000 ha	'000 ha	'000 ha	'000 ha	'000 ha
AREA PLANTED TO CROPS(a)									
2006	6 941	3 252	2 503	4 168	7 623	68	9	1	24 565
2007	6 687	3 428	2 215	4 450	6 669	62	*19	^—	23 530
2008	6 816	3 655	2 183	4 257	7 396	52	*14	*1	24 374
AREA OF FARMS(b)									
2006	62 119	12 314	145 519	55 409	98 653	1 739	59 127	45	434 925
2007	58 614	13 250	143 871	50 065	96 742	1 659	61 202	^47	425 449
2008	58 118	12 536	141 058	47 076	93 035	1 542	^63 888	37	417 288
AREA OF NON-AGRICULTURAL LAND(c)									
2006	17 945	10 428	27 546	42 940	154 336	5 101	75 786	191	334 277
2007	21 450	9 492	29 195	48 283	156 246	5 181	73 711	190	343 753
2008	21 946	10 206	32 007	51 272	159 953	5 299	71 025	199	351 914
TOTAL LAND AREA(d)									
Total	**80 064**	**22 742**	**173 065**	**98 348**	**252 988**	**6 840**	**134 913**	**236**	**769 202**

^ estimate has a relative standard error of 10% to less than 25% and should be used with caution

* estimate has a relative standard error of 25% to 50% and should be used with caution

— nil or rounded to zero (including null cells)

(a) Excludes crops harvested for hay and and seed, and pasture and grasses.

(b) Total area of establishments with EVAO of $5,000 or more.

(c) Non-agricultural land is the difference between agricultural land as reported in the ARMS and total area of the state or territory. It comprises conserved land, forestry, urban and unused land such as vacant Crown land, commercially unused land on Aboriginal and other Crown reserves and waste land, ephemeral lakes and mangrove swamps, as well as establishments not included in the scope of the ARMS.

(d) Total area of Australia includes Jervis Bay.

2 BUSINESSES WITH AGRICULTURAL ACTIVITY, By State: **Year ended 30 June**

		2008								
		NSW	*Vic.*	*QLD*	*SA*	*WA*	*Tas.*	*NT*	*ACT*	*Aust.*
		no.	no.	no.	no.	no.	no.	no.	no.	no.
#	Total All Industries	44 439	34 177	29 121	14 996	13 084	4 200	605	82	140 704
01	Agriculture	39 236	30 931	26 159	13 475	11 627	3 583	522	62	125 594
0111–0112	Nursery Production (Undercover plus Outdoors)(a)	^ 260	^ 216	^ 183	*37	*49	*42	*17	1	804
0113	Turf Growing	^ 113	*37	^ 151	**13	^ 48	1	*2	—	^ 366
0114–0115	Floriculture Production (Undercover plus Outdoors)(a)	^ 211	^ 249	^ 119	^ 83	*75	^ 29	^ 9	—	775
0121	Mushroom Growing	^ 37	**23	*52	3	*3	3	—	—	^ 120
0122–0123	Vegetable Growing (Undercover plus Outdoors)(a)	1 069	927	1 082	599	379	324	^ 47	**2	4 429
0131	Grape Growing	1 134	1 859	*93	2 323	^ 538	^ 98	*15	**2	6 062
0132	Kiwifruit Growing	*43	*9	—	—	**13	—	—	—	*65
0133	Berry Fruit Growing	*74	^ 107	^ 131	*16	*29	*31	*1	—	^ 390
0134	Apple and Pear Growing	^ 186	^ 223	*48	*129	^ 176	^ 125	**7	**2	896
0135	Stone Fruit Growing	^ 231	^ 257	^ 157	^ 191	^ 85	^ 58	*1	—	981
0136	Citrus Fruit Growing	^ 454	*221	^ 205	^ 260	*77	**13	—	—	1 230
0137	Olive Growing	*101	*47	**19	*58	*34	—	—	—	^ 259
0139	Other Fruit and Tree Nut Growing	1 423	^ 287	1 445	^ 199	^ 259	^ 58	^ 164	**2	3 837
0141	Sheep Farming (Specialised)	4 068	3 549	^ 362	1 362	1 316	^ 473	—	18	11 148
0142–0143	Beef Cattle Farming plus Beef Cattle Feedlots(Specialised)(a)	14 066	8 719	13 506	1 429	2 468	1 203	230	19	41 640
0144	Sheep-Beef Cattle Farming	3 635	1 651	^ 487	816	^ 351	^ 276	—	^ 10	7 226
0145	Grain-Sheep or Grain-Beef Cattle Farming	5 154	2 511	1 332	1 864	2 023	^ 163	**9	*1	13 059
0146	Rice Growing	*43	3	—	—	—	—	—	—	*46
0149	Other Grain Growing	3 242	3 009	1 352	3 131	2 964	**25	—	—	13 723
0151	Sugar Cane Growing	490	—	3 264	—	^ 4	—	—	—	3 758
0152	Cotton Growing	^ 152	—	142	—	—	—	—	—	294
0159	Other Crop Growing n.e.c.	^ 171	*194	^ 330	*50	*30	*50	**10	—	^ 836
0160	Dairy Cattle Farming	1 223	5 538	762	454	^ 320	495	—	—	8 792
0171	Poultry Farming (Meat)	345	230	^ 124	^ 75	62	^ 26	—	—	862
0172	Poultry Farming (Eggs)	*154	^ 105	*73	*49	*28	^ 8	—	1	^ 417
0180	Deer Farming	*28	**42	**16	*31	**18	^ 3	—	—	*138
0191	Horse Farming	^ 565	^ 495	^ 419	^ 81	^ 116	*18	—	*4	1 697
0192	Pig Farming	^ 177	^ 107	^ 170	114	^ 55	*19	—	—	642
0193	Beekeeping	*140	*145	*52	^ 59	*62	**25	**6	—	^ 488
0199	Other Livestock Farming n.e.c.	^ 247	*171	*81	*49	*45	*18	*5	—	^ 616
99	All Other Industries	5 203	3 246	2 962	1 522	1 457	^ 617	^ 83	^ 19	15 110

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** estimate has a relative standard error greater than 50% and is considered too unreliable for general use

— nil or rounded to zero (including null cells)

(a) Classes have been merged where data were not collected in ARMS. See paragraph 12 in the Explanatory Notes.

3 BROADACRE CROPS , Production: **Year ended 30 June**

	AUST.			2008							
	2006	*2007*	*2008*	*NSW*	*Vic.*	*Qld*	*SA*	*WA*	*Tas.*	*NT*	*ACT*
BARLEY											
Production ('000 t)	9 482	4 257	7 160	814	1 789	143	1 672	2 719	^22	—	—
Area ('000 ha)	4 406	4 182	4 902	1 049	1 107	113	1 244	1 381	^8	—	—
Yield (t/ha)	2.2	1.0	1.5	0.8	1.6	1.3	1.3	2.0	^2.8	—	—
CANOLA											
Production ('000 t)	1 419	573	1 214	79	221	**—	162	752	1	—	—
Area ('000 ha)	972	1 052	1 277	310	196	**2	173	595	1	—	*—
Yield (t/ha)	1.5	0.5	1.0	0.3	1.1	**0.1	0.9	1.3	1.4	—	—
COTTON LINT											
Production ('000 t)	560	282	119	77	—	42	—	—	—	—	—
Area ('000 ha)	327	164	69	40	—	29	—	—	—	—	—
Yield (t/ha)	1.7	1.7	1.7	1.9	—	1.5	—	—	—	—	—
GRAIN SORGHUM											
Production ('000 t)	1 932	1 283	3 790	1 270	—	2 519	*—	**2	—	—	—
Area ('000 ha)	767	613	942	279	**—	661	*—	**1	—	**—	—
Yield (t/ha)	2.5	2.1	4.0	4.5	**0.6	3.8	2.0	2.0	—	—	—
LUPINS											
Production ('000 t)	1 285	470	662	^29	^31	**1	67	533	*1	—	—
Area ('000 ha)	809	736	752	80	^48	**1	77	546	*—	—	—
Yield (t/ha)	1.6	0.6	0.9	0.4	^0.6	*1.5	0.9	1.0	^2.4	—	—
OATS											
Production ('000 t)	1 688	748	1 502	193	335	^12	^115	840	^8	—	*—
Area ('000 ha)	930	1 003	1 238	464	211	^20	^142	397	^4	—	*—
Yield (t/ha)	1.8	0.7	1.2	0.4	1.6	0.6	^0.8	2.1	1.9	—	**0.2
RICE											
Production ('000 t)	1 003	^163	18	18	—	—	—	—	—	—	—
Area ('000 ha)	102	^20	2	2	—	—	—	—	—	—	—
Yield (t/ha)	9.8	8.3	7.6	7.6	—	—	—	—	—	—	—
SUGAR CANE CUT FOR CRUSHING											
Production ('000 t)	37 128	36 397	32 621	^2 587	—	29 788	—	247	—	—	—
Area ('000 ha)	398	409	381	^24	—	355	—	2	—	—	—
Yield (t/ha)	93.3	89.1	85.7	108.7	—	84.0	—	110.3	—	—	—
WHEAT											
Production ('000 t)	25 150	10 822	13 569	2 477	1 995	954	2 296	5 820	27	**—	*—
Area ('000 ha)	12 443	11 798	12 578	4 009	1 514	669	2 121	4 258	7	**—	*—
Yield (t/ha)	2.0	0.9	1.1	0.6	1.3	1.4	1.1	1.4	3.7	**0.5	**0.2

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— nil or rounded to zero (including null cells)

4 FRUIT AND NUTS (a), Production: **Year ended 30 June**

	AUST.			2008							
	2006	*2007*	*2008*	*NSW*	*Vic.*	*Qld*	*SA*	*WA*	*Tas.*	*NT*	*ACT*
CITRUS											
Mandarins											
Production (t)	92 348	104 433	^ 94 364	^ 4 884	^ 4 925	^ 69 480	^ 13 594	^ 1 481	—	—	—
Trees ('000)	1 613	1 448	1 340	^ 83	^ 86	^ 852	^ 273	^ 45	—	—	—
Yield (kg/tree)	57	72	70	^ 59	^ 57	82	50	^ 33	—	—	—
Oranges											
Production (t)	507 233	470 673	409 273	218 687	^ 76 155	^ 6 555	^ 102 578	^ 5 299	—	—	—
Trees ('000)	6 553	6 612	6 053	3 342	^ 1 166	^ 87	1 299	^ 158	—	—	—
Yield (kg/tree)	77	71	68	65	65	76	79	34	—	—	—
POME (b)											
Apples											
Production (t)	276 427	270 476	265 481	44 913	104 002	35 486	19 256	31 528	30 222	—	74
Trees ('000)	8 833	8 590	8 685	1 622	3 084	928	1 164	836	1 048	—	2
Yield (kg/tree)	31	32	31	28	34	38	17	38	29	—	31
Pears											
Production (t)	142 419	134 764	130 492	570	115 925	652	5 048	7 336	961	—	1
Trees ('000)	1 776	1 741	1 729	26	1 444	14	79	145	22	—	—
Yield (kg/tree)	80	77	76	22	80	46	64	51	44	—	22
OTHER FRUIT AND NUTS											
Bananas											
Production (t)	187 384	213 193	207 062	^ 14 045	—	187 636	—	*5 339	—	**41	—
Area (ha) (c)	11 168	11 663	9 853	^ 1 486	—	8 131	—	*219	—	**17	—
Yield (t/ha)	17	18	21	^ 10	—	23	—	^ 24	—	*2	—
Macadamias											
Production (t)	31 613	33 532	32 787	^ 21 473	—	^ 11 273	—	**19	—	**22	—
Trees ('000)	3 325	3 226	3 416	2 145	—	^ 1 251	—	**5	—	**15	—
Yield (kg/tree)	10	10	10	10	—	9	—	**4	—	**2	—
Mangoes											
Production (t)	36 348	57 947	48 928	*108	—	^ 35 236	—	*2 198	—	^ 11 386	—
Trees ('000)	1 437	1 452	1 287	*15	—	907	—	^ 117	—	^ 248	—
Yield (kg/tree)	25	40	38	*7	—	39	—	*19	—	46	—
Peaches											
Production (t)	90 630	81 569	68 369	*8 516	55 351	*1 757	1 264	^ 1 355	^ 127	—	—
Trees ('000)	2 246	2 356	2 270	^ 470	^ 1 469	*175	^ 54	^ 91	^ 11	—	—
Yield (kg/tree)	40	35	30	^ 18	38	^ 10	24	15	^ 11	—	—
Strawberries											
Production (t)	27 336	28 560	24 507	*320	6 788	12 669	1 400	^ 3 001	^ 327	—	—
Area (ha)	1 241	1 240	1 297	*36	390	669	63	^ 117	23	—	—
Yield (t/ha)	22	23	19	*9	17	19	22	^ 26	14	—	—

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* estimate has a relative standard error of 25% to 50% and should be used with caution

** estimate has a relative standard error greater than 50% and is considered too unreliable for general use

— nil or rounded to zero (including null cells)

(a) Number of trees refers to trees of bearing age.

(b) All Apples and Pears data are sourced from the Apples and Pears Survey.

(c) Area refers to area of bearing age.

5 VEGETABLES(a), Production: **Year ended 30 June**

	AUST.			2008							
	2006	*2007*	*2008*	*NSW*	*Vic.*	*Qld*	*SA*	*WA*	*Tas.*	*NT*	*ACT*
CARROTS											
Production (t)	264 961	271 464	272 601	14 893	53 623	25 316	48 314	65 320	^ 65 136	—	—
Area (ha)	6 314	5 715	4 934	^ 370	1 193	703	775	1 072	820	—	—
Yield (t/ha)	42	48	55	40	45	36	62	61	79	—	—
MUSHROOMS											
Production (t)	43 641	42 739	47 103	16 824	15 426	4 323	^ 5 722	np	np	—	—
Area (ha)	177	181	179	55	70	15	^ 20	np	np	—	—
Yield (t/ha)	247	236	263	307	222	282	281	np	np	—	—
ONIONS(b)											
Production (t)	221 924	246 496	254 362	16 790	14 009	^ 27 145	86 056	27 457	82 905	—	—
Area (ha)	4 537	5 413	5 013	533	311	^ 766	1 446	446	1 511	—	—
Yield (t/ha)	49	46	51	32	45	35	60	62	55	—	—
POTATOES(c)											
Production (t)	1 249 605	1 211 988	1 400 206	104 448	322 446	99 241	477 062	85 761	311 218	30	—
Area (ha)	35 268	34 096	38 190	4 070	10 720	3 354	12 124	1 949	5 969	4	—
Yield (t/ha)	35	36	37	26	30	30	39	44	52	8	—
TOMATOES(c)											
Production (t)	450 459	296 035	381 824	46 848	174 379	132 444	14 808	^ 12 317	^ 997	**30	**2
Area (ha)	7 750	^ 7 293	6 796	903	2 996	2 543	^ 85	^ 259	^ 8	**1	**—
Yield (t/ha)	58	^ 41	56	52	58	52	^ 174	48	^ 127	^ 43	10

^ estimate has a relative standard error of 10% to less than 25% and should be used with caution

** estimate has a relative standard error greater than 50% and is considered too unreliable for general use

— nil or rounded to zero (including null cells)

np not available for publication but included in totals where applicable, unless otherwise indicated

(a) All vegetable data are sourced from a supplementary vegetable survey.

(b) Includes brown, red, and white onions.

(c) Includes fresh market and processing.

6 GRAPES(a)(b), Production: **Year ended 30 June**

	AUST.			2008							
	2006	*2007*	*2008*	*NSW*	*Vic.*	*Qld*	*SA*	*WA*	*Tas.*	*NT*	*ACT*
AREA OF VINES AT HARVEST (ha)											
Bearing area	158 166.6	163 951	166 197	41 958	36 094	3 090	70 757	12 746	1 224	215	113
Not yet bearing - area planted or grafted prior to collection	6 768	6 141	4 289	1 185	831	36	1 510	503	192	31	1
Not yet bearing - area planted or grafted during collection year	3 856	3 684	2 190	432	547	51	887	183	91	—	—
Total area of vines	**168 790**	**173 776**	**172 676**	**43 574**	**37 472**	**3 176**	**73 155**	**13 431**	**1 507**	**246**	**114**
GRAPE PRODUCTION (FRESH WEIGHT) (t)											
Wine making	1 781 668	1 370 690	1 837 034	535 989	394 551	3 307	809 113	82 197	10 749	—	1 128
Drying	117 819	81 022	56 139	8 742	45 677	69	1 472	179	—	—	—
Table and other	81 710	78 727	63 621	9 679	36 614	11 237	930	4 045	—	1 116	—
Total production	**1 981 198**	**1 530 439**	**1 956 793**	**554 410**	**476 842**	**14 612**	**811 515**	**86 421**	**10 749**	**1 116**	**1 128**
Yield (t/ha)(c)	12.5	9.3	11.8	13.2	13.2	4.7	11.5	6.8	8.8	5.2	10.0

— nil or rounded to zero (including null cells)

(a) Additional varietal information is available (see Glossary).

(b) All grape data are sourced from the annual Vineyards collection.

(c) Yield represents the quantity of grapes harvested per hectare of bearing vines.

7 LIVESTOCK, Numbers: **Year ended 30 June**

	AUST.			2008							
	2006	*2007*	*2008*	*NSW*	*Vic.*	*Qld*	*SA*	*WA*	*Tas.*	*NT*	*ACT*
CATTLE ('000)											
Milk cattle(a)											
Cows in milk and dry	1 880	1 796	1 640	195	1 055	100	103	54	134	—	—
All other milk cattle(b)	908	868	897	126	529	74	57	^ 47	^ 64	—	—
Total	***2 788***	***2 663***	***2 537***	***321***	***1 583***	***174***	***160***	***101***	***198***	—	—
Meat cattle											
Cows and heifers one year and over	13 197	12 800	13 472	2 982	1 206	6 113	533	1 217	224	^ 1 193	4
All other meat cattle(c)	12 409	12 573	11 312	2 348	1 049	5 617	433	796	220	^ 848	^ 2
Total	***25 606***	***25 373***	***24 784***	***5 330***	***2 254***	***11 731***	***966***	***2 013***	***444***	***^ 2 041***	***6***
Total cattle and calves	**28 393**	**28 037**	**27 321**	**5 651**	**3 838**	**11 905**	**1 126**	**2 113**	**642**	**^ 2 041**	**6**
Proportion of total herd											
Milk cattle (%)	9.8	9.5	9.3	5.7	41.3	1.5	14.2	4.8	30.9	^ —	—
Meat cattle (%)	90.2	90.5	90.7	94.3	58.7	98.5	85.8	95.2	69.1	^ 100.0	100.0
SHEEP ('000)											
Breeding ewes one year and over	48 605	46 431	45 411	15 799	9 680	2 044	6 059	10 580	1 217	** —	32
All other sheep(d)	42 423	39 280	31 526	10 579	7 085	1 916	3 924	7 074	920	** —	29
Total	**91 028**	**85 711**	**76 938**	**26 378**	**16 765**	**3 960**	**9 983**	**17 654**	**2 137**	** —	**61**
PIGS ('000)											
Breeding sows	302	286	263	^ 87	^ 42	60	39	^ 33	2	** —	—
All other pigs(e)	2 431	2 319	2 149	*684	^ 352	550	324	^ 228	11	—	—
Total	**2 733**	**2 605**	**2 412**	**^ 770**	**^ 394**	**610**	**363**	**262**	**13**	** —	—
CHICKENS ('000)											
For meat production	78 448	82 114	73 869	^ 27 014	21 976	11 588	np	6 325	np	—	—
For egg production	15 936	15 271	14 760	^ 4 772	^ 5 011	2 933	746	869	209	** —	220

^ estimate has a relative standard error of 10% to less than 25% and should be used with caution

* estimate has a relative standard error of 25% to 50% and should be used with caution

** estimate has a relative standard error greater than 50% and is considered too unreliable for general use

— nil or rounded to zero (including null cells)

np not available for publication but included in totals where applicable, unless otherwise indicated

(a) Excluding house cows.

(b) Includes heifers 1 to 2 years, heifers over 2 years, bulls, and calves.

(c) Includes bulls, steers, and calves.

(d) Includes rams, marked lambs, wethers, hoggets and non-breeding ewes.

(e) Includes bores, gilts, suckers, weaners, growers and finishers.

EXPLANATORY NOTES

INTRODUCTION

1 This publication contains estimates for commodities collected in the 2007–08 Agricultural Resource Management Survey (ARMS) and related supplementary collections (i.e. Apples and Pears, Vineyards, and Vegetable Collections). It contains detailed statistics on landuse, broadacre crops, horticulture, livestock numbers and industry characteristics of agricultural businesses.

GENERAL

2 Changes to the ABS Agricultural Survey program for 2007–08 resulted in the annual Agricultural Survey being combined with a benchmark survey of land management practices undertaken by agricultural businesses, and a survey of management responses to adverse seasonal conditions experienced by affected agricultural businesses. As a result of these changes, the range of agricultural commodities and livestock categories was reduced compared to previous years.

3 The less detailed range of broadacre crops, fruit, vegetable, and livestock data is reflected in Tables 3, 4, 5 and 7 of this publication, and the reduction in commodity detail will be apparent when comparing to the 2006–07 data.

4 Expanded vegetable and livestock commodities can be found in the datacubes attached to this publication.

5 Where figures have been rounded, discrepancies may occur between sums of the component items and totals.

STATISTICAL UNITS USED

6 Since 2005–06, the ABS has used an economic statistics units model on the ABS Business Register (ABSBR) to describe the characteristics of businesses and the structural relationships between related businesses. The units model is used within large and diverse business groups to define reporting units that can provide data to the ABS at a suitable level.

7 Respondents to the 2007–08 ARMS were drawn from the ABS Business Register.

SCOPE AND COVERAGE

8 The scope of the 2007–08 ARMS was all agricultural businesses recorded on the ABS' Business Register (ABSBR) above a minimum size cutoff. The ABSBR is based on the Australian Business Register (ABR) which is administered and maintained by the Australian Taxation Office (ATO).

9 A minimum size cut-off of $5,000 was applied to determine whether a business was in-scope for the 2007–08 ARMS. The measure of size was based on the ABS' Estimated Value of Agricultural Operations (EVAO) or a derived value based on Businesses Activity Statement (BAS) turnover.

10 While the ABSBR does not include all agricultural businesses in Australia, it provides improved coverage from the former ABS-maintained Agricultural Survey frame as most businesses and organisations in Australia need to obtain an Australian Business Number (ABN) from the ATO for their business operations. The ABR-based register is also more up-to-date as it excludes agricultural businesses with cancelled ABNs and incorporates regularly updated information on agricultural businesses from the ATO.

11 For the 2007–08 ARMS, a sample of approximately 33,000 agricultural businesses was selected from an in-scope population of approximately 150,000 agricultural businesses.

INDUSTRY CLASSIFICATION

12 The industry classification used in this publication is the 2006 version of the Australian and New Zealand Standard Industrial Classification (ANZSIC). Prior to the 2005–06 issue of this publication, estimates were based on the ANZSIC 1993 edition. ANZSIC 2006 was developed to provide a more contemporary industrial classification system taking into account issues such as changes in the structure and composition of the economy, changing user demands and compatibility with major international

INDUSTRY CLASSIFICATION *continued*

classification standards. For more information, please refer to *Australian and New Zealand Standard Industrial Classification (ANZSIC), 2006* (cat. no. 1292.0).

13 For the 2007–08 ARMS several ANZSIC classifications were amalgamated because some data were not collected during the ARMS cycle. These amalgamations were:

- 0111 and 0112: Nursery Production Undercover plus Nursery Production Outdoors.
- 0114 and 0115: Floriculture Production Undercover plus Floriculture Production Outdoors.
- 0122 and 0123: Vegetable Growing Undercover plus Vegetable Growing Outdoors
- 0142 and 0143: Beef Cattle Farming plus Beef Cattle Feedlots (Specialised)

RELIABILITY OF ESTIMATES (SAMPLE ERROR)

14 The estimates in this publication are based on information obtained from a sample drawn from the total agricultural business population in scope of the collection, and are subject to sampling variability; that is, they may differ from the figures that would have been produced if all businesses had been included in the survey. One measure of the likely difference is given by the standard error (SE) which indicates the extent to which an estimate might vary by chance because only a sample was taken. There are about two chances in three that a 'sample' estimate will differ by less than one SE from the figure that would have been obtained if all businesses had responded, and about nineteen chances in twenty that the difference will be less than two SEs.

15 In this publication, 'sampling' variability of the estimates is measured by the relative standard error (RSE) which is obtained by expressing the SE as a percentage of the estimate to which it refers.

16 Most published national estimates have RSEs less than 5%. For some states with limited production of certain commodities, RSEs are greater than 10%. Estimates that have an estimated RSE between 10% and 25% are annotated with the symbol '^'. These estimates should be used with caution as they are subject to sampling variability too high for some purposes. Estimates with an RSE between 25% and 50% are annotated with the symbol '*', indicating that the estimate should be used with caution as it is subject to sampling variability too high for most practical purposes. Estimates with an RSE greater than 50% are annotated with the symbol '**' indicating that the sampling variability causes the estimates to be considered too unreliable for general use. Separate indication of the RSEs of all estimates is available on request.

RELIABILITY OF ESTIMATES (SAMPLE ERROR) *continued*

17 A table with RSEs for selected commodities follows:

RELATIVE STANDARD ERRORS OF SELECTED COMMODITIES, At 30 June 2008

	NSW	*Vic.*	*Qld*	*SA*	*WA*	*Tas.*	*NT*	*ACT*	*Aust.*
	%	%	%	%	%	%	%	%	%
Barley for grain, production	6.41	5.00	7.99	5.69	3.76	18.67	—	—	2.43
Canola, production	8.16	9.47	66.09	7.66	6.28	8.40	—	—	4.41
Lupins for grain, production	10.89	17.59	88.73	9.52	4.94	38.10	—	—	4.20
Oats for grain, production	6.70	8.86	14.34	10.29	8.52	13.93	—	31.82	5.29
Wheat for grain, production	3.41	5.05	4.66	4.21	2.58	9.08	77.85	37.55	1.67
Oranges, production	5.74	14.92	14.43	11.24	19.74	—	—	—	5.02
Carrots, production	7.64	4.64	7.72	7.09	6.03	12.59	—	—	3.74
Potatoes, production	4.47	6.86	9.95	4.70	5.17	4.69	—	—	2.50
Total meat cattle	2.61	3.23	3.23	5.20	5.35	4.66	12.48	6.72	2.01
Total milk cattle	5.57	4.22	7.26	7.32	8.03	8.30	—	—	2.90
Total sheep	2.59	4.08	7.41	3.10	3.30	5.14	93.34	5.08	1.57
Total pigs	24.53	10.37	5.75	8.41	9.78	4.12	90.92	—	8.31

— nil or rounded to zero (including null cells)

CROPS, PASTURES AND HORTICULTURE

18 Statistics on area and production of crops relate, in the main, to crops sown during the year ended 30 June. Statistics of perennial crops relate to the position at 30 June and the production during the year ended on that date, or fruit set by that date. Statistics for apples and pears, grapes, and vegetables which in some states are harvested after 30 June, are collected by supplementary surveys and are included in this publication.

LIVESTOCK SLAUGHTERING AND LIVESTOCK PRODUCTS

19 Livestock slaughtering and livestock products, including milk and wool data, and poultry slaughtering are no longer included in this publication. Further information can be found in the publication *Livestock Products, Australia* (cat. no. 7215.0).

ABS DATA AVAILABLE ON REQUEST

20 Expanded vegetable and livestock data will be released as separate datacubes attached to this publication. Sub-state geographies, specifically Statistical Division (SD) and Natural Resource Management (NRM), for agricultural commodities will also be released in datacubes attached to this catalogue number.

21 The additional land management practices and final adverse seasonal conditions estimates collected by the 2007–08 ARMS will be released in *Land Management and Farming in Australia* (cat. no. 4627.0). Water use data collected as part of ARMS will be released in *Water Use on Australia Farms* (cat. no. 4618.0). Sub-state geographic level data, (SD and NRM) will be released as datacubes attached to their respective catalogue numbers.

22 As well as the statistics included in this and related publications, the ABS may have other relevant data available on request. Inquiries should be made to the National Information and Referral Service on 1300 135 070.

GENERAL ACKNOWLEDGMENT

23 ABS publications draw extensively on information provided freely by individuals, businesses, governments and other organisations. Their continued cooperation is very much appreciated: without it, the wide range of statistics published by the ABS would not be available. Information received by the ABS is treated in strict confidence as required by the *Census and Statistics Act 1905*.

RELATED PUBLICATIONS

24 A range of agricultural publications is produced by the ABS, including:

- *Agricultural Commodities: Small Area Data, Australia*, cat. no. 7125.0
- *Livestock and Meat, Australia — Electronic Publication*, cat. no. 7218.0.55.001
- *Livestock Products, Australia*, cat. no. 7215.0
- *Natural Resource Management on Australian Farms*, cat. no. 4620.0
- *Principal Agricultural Commodities, Australia, Preliminary*, cat. no. 7111.0
- *Value of Principal Agricultural Commodities Produced, Australia, Preliminary*, cat. no. 7501.0
- *Value of Agricultural Commodities Produced, Australia*, cat. no. 7503.0
- *Water Use on Australian Farms*, cat. no. 4618.0

25 For comparisons of the agriculture industry with other industries, users are referred to:

- *Australian National Accounts: National Income, Expenditure and Product*, cat. no. 5206.0
- *Australian National Accounts: State Accounts*, cat. no. 5220.0

26 Current publications and other products released by the ABS are listed under the Statistics and Themes pages on the ABS website <http://www.abs.gov.au>. The ABS also issues a daily Release Advice on the web site which details products to be released in the week ahead.

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