

Milk Production



United States
Department of
Agriculture

Washington, D.C.

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July Milk Production Up 1 Percent

Milk production in the 21 major States during July totaled 11.0 billion pounds, 1 percent above production in these same States in July 1992. June revised production, at 11.0 billion pounds was 1 percent more than June 1992.

Production per cow in the 21 major States averaged 1.351 pounds for July, 29 pounds above July 1992.

The number of cows on farms in the 21 major States was 8.14 million head, 109,000 below July 1992 and 6,000 below June 1993.

During the April-June period, the 21 major States produced 33.4 billion pounds of milk, 84.4 percent of the U.S. production. If the remaining 29 States not surveyed monthly followed the same pattern as the 21 States, the U.S. production would be 13.0 billion for July.

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Milk Cows and Production: By Quarter, United States, 1992-93

Month	Milk Cows <u>1/</u>		Milk Per Cow <u>2/</u>		Milk Production <u>2/</u>		1993 as % of 1992
	1992	1993	1992	1993	1992	1993	
	---- 1,000 ----		---- Pounds ----		Million Pounds		Percent
Jan-Mar	9,863	9,777	3,852	3,862	37,989	37,763	99
Apr-Jun	9,841	9,738	3,971	4,065	39,077	39,589	101
Jul-Sep	9,826		3,818		37,515		
Oct-Dec	9,827		3,782		37,166		
Annual	9,839		15,423		151,747		

1/ Includes dry cows. Excludes heifers not yet fresh.

2/ Excludes milk sucked by calves.

Milk Cows and Production: By State, June 1992-93 1/

State	Milk Cows <u>2/</u>		Milk Per Cow <u>3/</u>		Milk Production <u>3/</u>		1993 as % of 1992
	1992	1993	1992	1993	1992	1993	
	---- 1,000 ----		---- Pounds ----		Million Pounds		Percent
CA	1,156	1,166	1,610	1,645	1,861	1,918	103
FL	182	177	1,135	1,175	207	208	100
ID	186	188	1,460	1,460	272	274	101
IL	185	178	1,200	1,280	222	228	103
IN	145	145	1,335	1,360	194	197	102
IA	307	305	1,140	1,190	350	363	104
KY	181	178	945	1,015	171	181	106
MD	98	100	1,205	1,200	118	120	102
MI	339	340	1,350	1,360	458	462	101
MN	660	650	1,280	1,320	845	858	102
MO	229	230	1,100	1,130	252	260	103
NY	745	743	1,340	1,360	998	1,010	101
NC	96	94	1,215	1,245	117	117	100
OH	329	310	1,230	1,280	405	397	98
PA	650	647	1,340	1,355	871	877	101
TN	192	185	960	980	184	181	98
TX	375	385	1,200	1,275	450	491	109
VT	163	163	1,315	1,315	214	214	100
VA	136	132	1,185	1,205	161	159	99
WA	251	258	1,625	1,630	408	421	103
WI	1,645	1,570	1,300	1,330	2,139	2,088	98
21 State:							
Total	8,250	8,144	1,321	1,354	10,897	11,024	101

1/ 1992 and 1993 revised.

2/ Includes dry cows. Excludes heifers not yet fresh.

3/ Excludes milk sucked by calves.

Milk Cows and Milk Production: By Month, 21 Selected States, 1992-93

Month	Milk Cows <u>1/</u>		Milk Per Cow <u>2/</u>		Milk Production <u>2/</u>		
	1992	1993	1992	1993	1992	1993	1993 as % of 1992
	----- 1,000 -----		----- Pounds -----		Million Pounds		Percent
Jan	8,298	8,215	1,291	1,310	10,715	10,760	100
Feb	8,278	8,196	1,238	1,216	10,251	9,965	97
Mar	8,257	8,178	1,344	1,356	11,096	11,087	100
Apr	8,255	8,153	1,314	1,344	10,850	10,956	101
May	8,250	8,148	1,367	1,404	11,280	11,443	101
Jun	8,250	8,144	1,321	1,354	10,897	11,024	101
Jul	8,247	8,138	1,322	1,351	10,900	10,993	101
Aug	8,243		1,295		10,673		
Sep	8,237		1,246		10,263		
Oct	8,238		1,278		10,532		
Nov	8,235		1,237		10,184		
Dec	8,247		1,292		10,659		
Annual	8,253		15,546		128,300		

1/ Includes dry cows. Excludes heifers not yet fresh.

2/ Excludes milk sucked by calves.

Milk Cows and Production: By State, July 1992-93

State	Milk Cows <u>1/</u>		Milk Per Cow <u>2/</u>		Milk Production <u>2/</u>		1993 as % of 1992
	1992	1993	1992	1993	1992	1993	
	---- 1,000 ----		---- Pounds ----		Million Pounds		Percent
CA	1,157	1,168	1,635	1,675	1,892	1,956	103
FL	181	178	1,060	1,100	192	196	102
ID	187	188	1,540	1,500	288	282	98
IL	185	176	1,220	1,280	226	225	100
IN	146	145	1,340	1,360	196	197	101
IA	307	304	1,170	1,190	359	362	101
KY	181	178	945	1,000	171	178	104
MD	98	100	1,175	1,190	115	119	103
MI	340	340	1,370	1,380	466	469	101
MN	660	650	1,265	1,285	835	835	100
MO	229	230	1,080	1,100	247	253	102
NY	747	743	1,320	1,340	986	996	101
NC	96	94	1,185	1,225	114	115	101
OH	327	310	1,230	1,250	402	388	97
PA	646	649	1,330	1,345	859	873	102
TN	190	185	950	950	181	176	97
TX	375	386	1,175	1,245	441	481	109
VT	164	164	1,300	1,305	213	214	100
VA	136	131	1,160	1,170	158	153	97
WA	252	259	1,680	1,680	423	435	103
WI	1,643	1,560	1,300	1,340	2,136	2,090	98
21 State:							
Total	8,247	8,138	1,322	1,351	10,900	10,993	101

1/ Includes dry cows. Excludes heifers not yet fresh.

2/ Excludes milk sucked by calves.

Survey Procedures: Primary data used to determine these estimates were obtained from a sample of producers. Individual States maintain a list of all known milk producers and information on the size of their herd. States use all known sources of producers to ensure that their lists are as complete as possible. About 20,000 producers are sampled in January and data are collected from about 10,000 respondents. There are about 7,300 respondents in each of the remaining quarters. Generally all larger producers and a sample of smaller producers are included in the survey. Questionnaires are mailed to producers near the end of the month to obtain data for the first day of the month, January 1, February 1, etc. Toward the end of the data collection period, statisticians review mail returns to ensure that each size group is adequately represented. If additional reports are needed in some size groups, statisticians obtain these by telephone.

Estimation Procedures: Each State statistician prepares their estimate by plotting survey estimates and averages on time series charts. The individual State estimates are reviewed by the Agricultural Statistics Board for reasonableness.

Revision Policy: Milk production, rate per cow, and number of cows are subject to revision the following month for monthly States or the following quarter for the quarterly States. Normally, Federal Market Order sales are the main reason for revisions, however, not all orders have data available in time for this revision. A second revision is made in February each year based on additional administrative data. In the event that some additional changes are necessary, a third revision is made in February the following year. Estimates are again reviewed after data for the five-year Census of Agriculture, conducted by the Department of Commerce are available.

Reliability: Since all operations with dairy animals are not included in the sample, survey estimates are subject to sampling variability. Survey results are also subject to non-sampling errors such as omissions, duplications, and mistakes in reporting, recording, and processing the data. The effects of these errors cannot be measured directly. They are minimized through rigid quality controls in the data collection process and through a careful review of all reported data for consistency and reasonableness.

To assist users in evaluating the reliability of the estimates in this report, the "Root Mean Square Error" is shown for selected items in the table below. The "Root Mean Square Error" is a statistical measure based on past performance and is computed using the differences between first and final estimates. The "Root Mean Square Error" for milk cow inventory estimates over the past 10 quarters is 0.6 percent. This means that chances are 2 out of 3 that the final estimate will not be above or below the current estimate of 9.74 million head by more than 0.5 percent, or about 49,000 head. Chances are 9 out of 10 that the difference will not exceed 0.8 percent, or about 78,000 head (the 90 percent confidence level).

Reliability of April-June Milk Estimates 1/

Item	Root Mean Square Error	90% Confidence Level	Difference Between First and Final Estimates <u>1/</u>			Number of Quarters		
			Average	Smallest	Largest	First Above Final	First Below Final	
	- Percent -		- Mil Lbs. -			- Number -		
Milk Production	0.6	1.1	435	-40	0	-394	5	4
			----- 1,000 Head -----					
All Milk Cows	0.5	0.8	78	-34	-1	-94	9	1

1/ Based on records for the past 10 April-June quarters.

The next "Milk Production" report will be released at 3 p.m. ET on September 15, 1993.

