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March Milk Production up 1.5 Percent

Milk production in the 23 major States during March totaled 17.8 billion pounds, up 1.5 percent from March 2017. February revised production at 15.9 billion pounds, was up 1.8 percent from February 2017. The February revision represented a decrease of 12 million pounds or 0.1 percent from last month's preliminary production estimate.

Production per cow in the 23 major States averaged 2,038 pounds for March, 22 pounds above March 2017. This is the highest production per cow for the month of March since the 23 State series began in 2003.

The number of milk cows on farms in the 23 major States was 8.74 million head, 29,000 head more than March 2017, but 2,000 head less than February 2018.

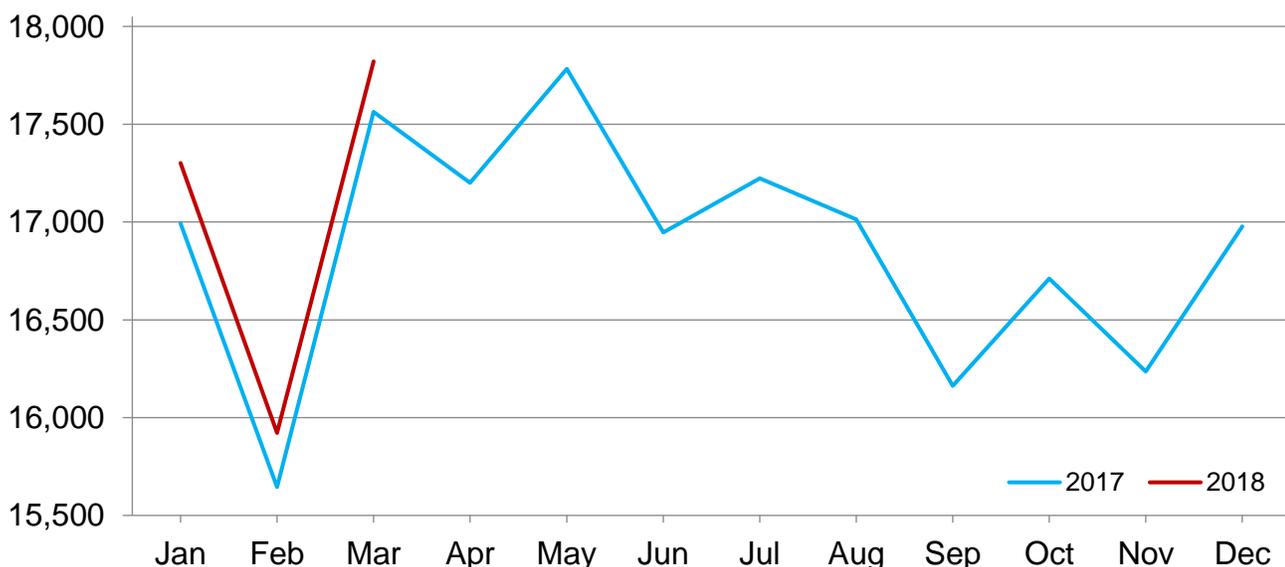
January-March Milk Production up 1.5 Percent

Milk production in the United States during the January - March quarter totaled 54.4 billion pounds, up 1.5 percent from the January - March quarter last year.

The average number of milk cows in the United States during the quarter was 9.41 million head, 9,000 head more than the October - December quarter, and 38,000 head more than the same period last year.

Monthly Milk Production – 23 Selected States

Million pounds



Milk Cows and Production by Quarter – United States: 2017-2018

[May not add due to rounding. Blank data cells indicate estimation period has not yet begun]

Quarter	Milk cows ¹		Milk per cow ²		Milk production ²		
	2017	2018	2017	2018	2017	2018	Change from 2017
	(1,000 head)	(1,000 head)	(pounds)	(pounds)	(million pounds)	(million pounds)	(percent)
January-March	9,369	9,407	5,717	5,781	53,562	54,385	1.5
April-June	9,399		5,888		55,344		
July-September	9,402		5,687		53,473		
October-December	9,398		5,649		53,087		
Annual	9,392		22,941		215,466		

¹ Includes dry cows. Excludes heifers not yet fresh.

² Excludes milk sucked by calves.

Milk Cows and Production by Month – 23 Selected States: 2017-2018

[May not add due to rounding. Blank data cells indicate estimation period has not yet begun]

Month	Milk cows ¹		Milk per cow ²		Milk production ²		
	2017	2018	2017	2018	2017	2018	Change from 2017
	(1,000 head)	(1,000 head)	(pounds)	(pounds)	(million pounds)	(million pounds)	(percent)
January	8,691	8,744	1,955	1,979	16,993	17,302	1.8
February	8,696	8,745	1,799	1,821	15,645	15,922	1.8
March	8,714	8,743	2,016	2,038	17,564	17,821	1.5
April	8,722		1,972		17,200		
May	8,730		2,037		17,783		
June	8,733		1,941		16,947		
July	8,734		1,972		17,224		
August	8,741		1,946		17,014		
September	8,737		1,850		16,162		
October	8,731		1,914		16,710		
November	8,734		1,859		16,235		
December	8,736		1,943		16,978		
Annual	8,725		23,204		202,455		

¹ Includes dry cows. Excludes heifers not yet fresh.

² Excludes milk sucked by calves.

Estimated Milk Cows and Production by Month – United States: 2017-2018

[May not add due to rounding. Blank data cells indicate estimation period has not yet begun]

Month	Milk cows ¹		Milk per cow ²		Milk production ²		
	2017	2018	2017	2018	2017	2018	Change from 2017
	(1,000 head)	(1,000 head)	(pounds)	(pounds)	(million pounds)	(million pounds)	(percent)
January	9,359	9,407	1,937	1,959	18,128	18,433	1.7
February	9,365	9,408	1,783	1,803	16,694	16,965	1.6
March	9,383	9,406	1,997	2,019	18,740	18,987	1.3
April	9,392		1,952		18,332		
May	9,401		2,016		18,952		
June	9,404		1,920		18,060		
July	9,404		1,943		18,268		
August	9,404		1,919		18,049		
September	9,399		1,825		17,156		
October	9,395		1,891		17,769		
November	9,398		1,837		17,260		
December	9,400		1,921		18,058		
Annual	9,392		22,941		215,466		

¹ Includes dry cows. Excludes heifers not yet fresh.

² Excludes milk sucked by calves.

Milk Cows and Production – 23 Selected States: March 2017 and 2018

[May not add due to rounding]

State	Milk cows ¹		Milk per cow ²		Milk production ²		Change from 2017
	2017	2018	2017	2018	2017	2018	
	(1,000 head)	(1,000 head)	(pounds)	(pounds)	(million pounds)	(million pounds)	(percent)
Arizona	202	209	2,285	2,275	462	475	2.8
California	1,755	1,737	1,995	2,070	3,501	3,596	2.7
Colorado	158	169	2,235	2,245	353	379	7.4
Florida	124	123	1,925	1,895	239	233	-2.5
Idaho	596	605	2,025	2,075	1,207	1,255	4.0
Illinois	93	93	1,860	1,875	173	174	0.6
Indiana	186	187	1,995	2,025	371	379	2.2
Iowa	216	220	2,045	2,045	442	450	1.8
Kansas	153	155	2,030	2,025	311	314	1.0
Michigan	425	426	2,265	2,280	963	971	0.8
Minnesota	459	454	1,855	1,855	851	842	-1.1
New Mexico	327	334	2,220	2,215	726	740	1.9
New York	622	625	2,055	2,020	1,278	1,263	-1.2
Ohio	262	260	1,865	1,870	489	486	-0.6
Oregon	124	123	1,775	1,755	220	216	-1.8
Pennsylvania	525	525	1,840	1,835	966	963	-0.3
South Dakota	117	120	1,915	1,880	224	226	0.9
Texas	507	518	2,100	2,155	1,065	1,116	4.8
Utah	94	97	1,950	1,985	183	193	5.5
Vermont	129	128	1,820	1,805	235	231	-1.7
Virginia	87	86	1,795	1,760	156	151	-3.2
Washington	273	275	2,020	2,070	551	569	3.3
Wisconsin	1,280	1,274	2,030	2,040	2,598	2,599	-
23-State Total	8,714	8,743	2,016	2,038	17,564	17,821	1.5

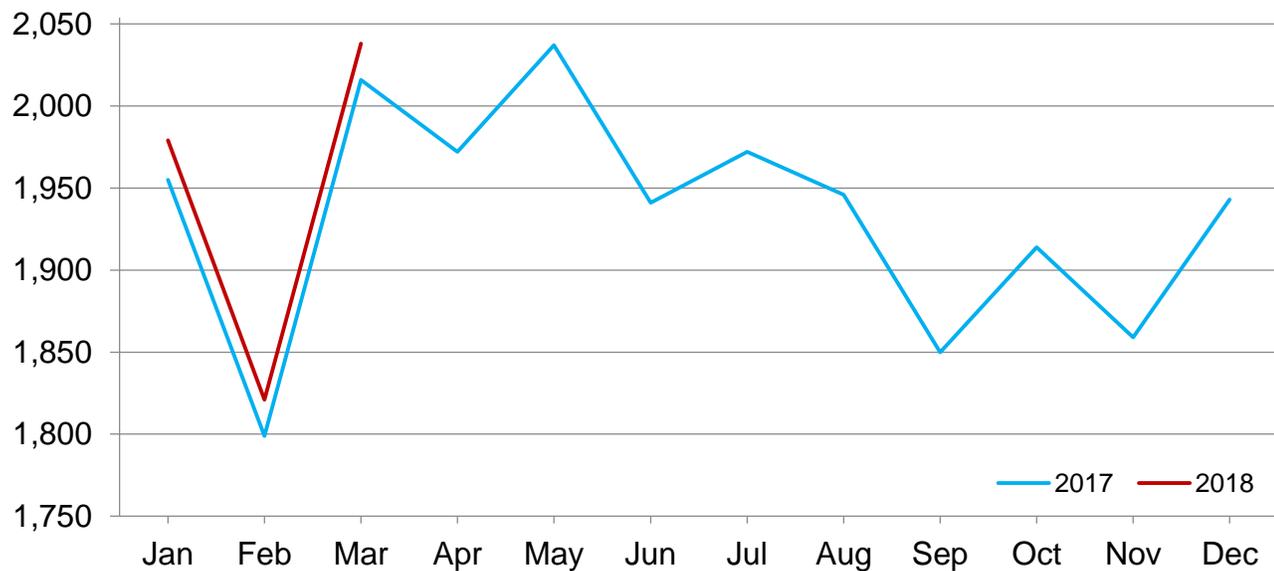
- Represents zero.

¹ Includes dry cows. Excludes heifers not yet fresh.

² Excludes milk sucked by calves.

Monthly Milk per Cow – 23 Selected States

Pounds



Milk Cows and Production – 23 Selected States: February 2017 and 2018

[May not add due to rounding]

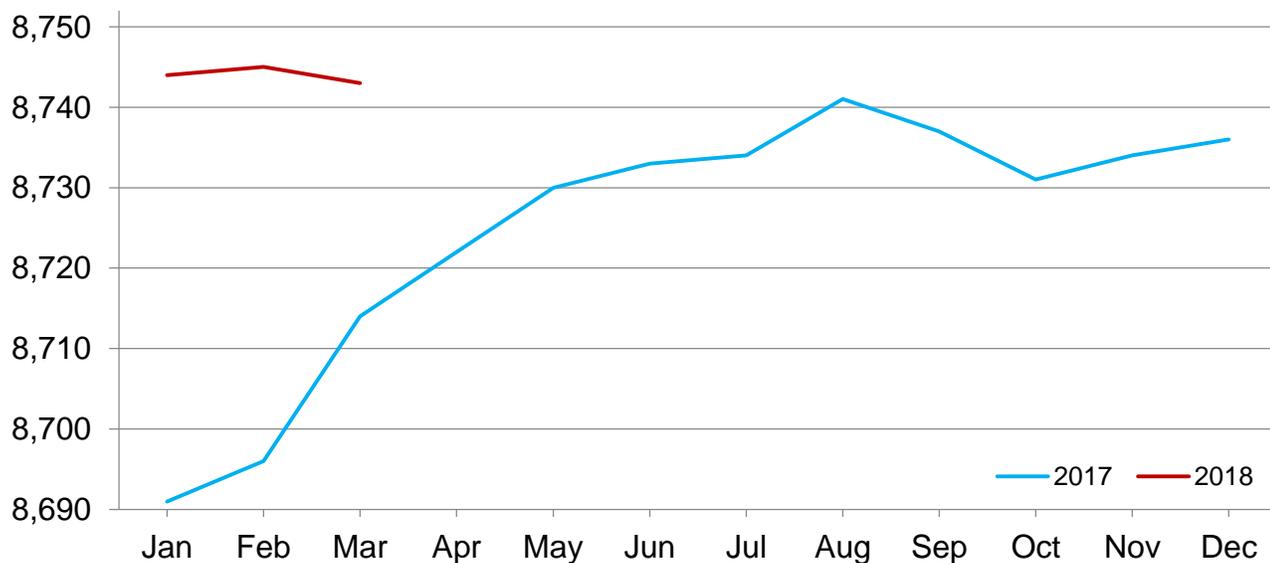
	Milk cows ¹		Milk per cow ²		Milk production ²		Change from 2017
	2017	2018	2017	2018	2017	2018	
	(1,000 head)	(1,000 head)	(pounds)	(pounds)	(million pounds)	(million pounds)	(percent)
Arizona	200	207	2,050	2,015	410	417	1.7
California	1,755	1,738	1,780	1,860	3,124	3,233	3.5
Colorado	156	168	2,005	2,005	313	337	7.7
Florida	123	124	1,730	1,695	213	210	-1.4
Idaho	596	605	1,800	1,870	1,073	1,131	5.4
Illinois	93	93	1,640	1,660	153	154	0.7
Indiana	186	187	1,780	1,780	331	333	0.6
Iowa	216	220	1,830	1,830	395	403	2.0
Kansas	151	155	1,805	1,830	273	284	4.0
Michigan	425	427	2,030	2,015	863	860	-0.3
Minnesota	460	455	1,660	1,670	764	760	-0.5
New Mexico	325	334	1,960	1,970	637	658	3.3
New York	621	625	1,860	1,805	1,155	1,128	-2.3
Ohio	262	262	1,640	1,645	430	431	0.2
Oregon	124	123	1,555	1,555	193	191	-1.0
Pennsylvania	525	525	1,635	1,640	858	861	0.3
South Dakota	117	119	1,715	1,700	201	202	0.5
Texas	499	516	1,860	1,895	928	978	5.4
Utah	92	97	1,730	1,755	159	170	6.9
Vermont	129	128	1,645	1,625	212	208	-1.9
Virginia	87	87	1,585	1,570	138	137	-0.7
Washington	274	275	1,795	1,850	492	509	3.5
Wisconsin	1,280	1,275	1,820	1,825	2,330	2,327	-0.1
23-State Total	8,696	8,745	1,799	1,821	15,645	15,922	1.8

¹ Includes dry cows. Excludes heifers not yet fresh.

² Excludes milk sucked by calves.

Monthly Milk Cows – 23 Selected States

Thousand head



Milk Cows and Production – States and United States: Revised October - December 2016 and 2017

[May not add due to rounding]

State	October - December milk cows ¹		October - December milk production ²		
	2016	2017	2016	2017	Change from 2016
	(1,000 head)	(1,000 head)	(million pounds)	(million pounds)	(percent)
Alabama	7.0	6.0	21.0	19.0	-9.5
Alaska	0.3	0.3	0.9	0.7	-22.2
Arizona	196.0	204.0	1,203.0	1,220.0	1.4
Arkansas	6.0	6.0	18.0	18.0	-
California	1,757.0	1,742.0	9,900.0	9,809.0	-0.9
Colorado	154.0	164.0	999.0	1,074.0	7.5
Connecticut	19.0	19.0	100.0	108.0	8.0
Delaware	5.0	5.0	22.1	22.5	1.8
Florida	121.0	124.0	580.0	577.0	-0.5
Georgia	83.0	85.0	439.0	434.0	-1.1
Hawaii	2.4	2.1	8.4	9.0	7.1
Idaho	599.0	600.0	3,626.0	3,606.0	-0.6
Illinois	93.0	93.0	465.0	476.0	2.4
Indiana	185.0	187.0	1,034.0	1,059.0	2.4
Iowa	215.0	219.0	1,256.0	1,303.0	3.7
Kansas	149.0	153.0	854.0	883.0	3.4
Kentucky	57.0	56.0	251.0	257.0	2.4
Louisiana	12.0	12.0	35.0	37.0	5.7
Maine	30.0	30.0	154.0	153.0	-0.6
Maryland	47.0	47.0	234.0	233.0	-0.4
Massachusetts	11.5	11.5	54.0	50.0	-7.4
Michigan	423.0	428.0	2,695.0	2,773.0	2.9
Minnesota	461.0	456.0	2,388.0	2,430.0	1.8
Mississippi	9.5	9.0	32.0	30.0	-6.3
Missouri	85.0	84.0	293.0	292.0	-0.3
Montana	14.0	13.0	72.0	71.0	-1.4
Nebraska	60.0	60.0	351.0	366.0	4.3
Nevada	30.0	32.0	169.0	181.0	7.1
New Hampshire	13.5	12.5	70.0	64.0	-8.6
New Jersey	6.5	6.0	30.0	29.0	-3.3
New Mexico	323.0	330.0	1,958.0	2,002.0	2.2
New York	620.0	625.0	3,680.0	3,639.0	-1.1
North Carolina	45.0	45.0	233.0	234.0	0.4
North Dakota	16.0	15.5	86.0	85.0	-1.2
Ohio	262.0	264.0	1,373.0	1,362.0	-0.8
Oklahoma	35.0	39.0	165.0	178.0	7.9
Oregon	124.0	124.0	617.0	618.0	0.2
Pennsylvania	525.0	525.0	2,664.0	2,676.0	0.5
Rhode Island	0.8	0.8	3.2	3.2	-
South Carolina	15.0	15.0	59.0	59.0	-
South Dakota	116.0	117.0	644.0	649.0	0.8
Tennessee	41.0	40.0	165.0	168.0	1.8
Texas	490.0	515.0	2,796.0	2,976.0	6.4
Utah	92.0	97.0	528.0	557.0	5.5
Vermont	129.0	128.0	675.0	671.0	-0.6
Virginia	88.0	87.0	418.0	428.0	2.4
Washington	275.0	274.0	1,625.0	1,609.0	-1.0
West Virginia	8.0	7.0	31.0	29.0	-6.5
Wisconsin	1,278.0	1,277.0	7,419.0	7,526.0	1.4
Wyoming	6.0	6.0	35.7	33.9	-5.0
United States	9,341.0	9,398.0	52,529.0	53,087.0	1.1

- Represents zero.

¹ Includes dry cows. Excludes heifers not yet fresh.

² Excludes milk sucked by calves.

Milk Cows and Production – States and United States: Preliminary January - March 2017 and 2018

[May not add due to rounding]

State	January - March milk cows ¹		January - March milk production ²		
	2017	2018	2017	2018	Change from 2017
	(1,000 head)	(1,000 head)	(million pounds)	(million pounds)	(percent)
Alabama	6.5	5.5	26.0	21.0	-19.2
Alaska	0.3	0.3	0.9	0.7	-22.2
Arizona	200.0	207.0	1,297.0	1,336.0	3.0
Arkansas	6.0	6.0	22.0	21.0	-4.5
California	1,755.0	1,738.0	10,038.0	10,314.0	2.7
Colorado	156.0	168.0	1,003.0	1,089.0	8.6
Connecticut	19.0	19.0	104.0	108.0	3.8
Delaware	5.0	5.0	24.8	25.2	1.6
Florida	123.0	124.0	678.0	663.0	-2.2
Georgia	84.0	85.0	502.0	479.0	-4.6
Hawaii	2.4	2.1	9.4	10.2	8.5
Idaho	597.0	605.0	3,477.0	3,629.0	4.4
Illinois	93.0	93.0	490.0	495.0	1.0
Indiana	186.0	187.0	1,061.0	1,076.0	1.4
Iowa	216.0	220.0	1,267.0	1,296.0	2.3
Kansas	152.0	155.0	876.0	904.0	3.2
Kentucky	56.0	57.0	271.0	284.0	4.8
Louisiana	12.0	12.0	47.0	46.0	-2.1
Maine	30.0	30.0	155.0	151.0	-2.6
Maryland	47.0	46.0	247.0	247.0	-
Massachusetts	11.5	11.5	54.0	50.0	-7.4
Michigan	425.0	427.0	2,757.0	2,768.0	0.4
Minnesota	460.0	455.0	2,445.0	2,437.0	-0.3
Mississippi	9.0	9.0	40.0	36.0	-10.0
Missouri	85.0	84.0	318.0	313.0	-1.6
Montana	13.5	13.0	71.0	70.0	-1.4
Nebraska	60.0	60.0	355.0	366.0	3.1
Nevada	31.0	32.0	165.0	180.0	9.1
New Hampshire	13.5	12.5	72.0	64.0	-11.1
New Jersey	6.5	6.0	31.0	30.0	-3.2
New Mexico	326.0	334.0	2,042.0	2,111.0	3.4
New York	621.0	625.0	3,694.0	3,613.0	-2.2
North Carolina	45.0	45.0	251.0	251.0	-
North Dakota	15.5	15.5	83.0	82.0	-1.2
Ohio	262.0	261.0	1,388.0	1,381.0	-0.5
Oklahoma	38.0	39.0	188.0	188.0	-
Oregon	124.0	123.0	622.0	617.0	-0.8
Pennsylvania	525.0	525.0	2,751.0	2,753.0	0.1
Rhode Island	0.8	0.8	3.1	3.1	-
South Carolina	15.0	15.0	68.0	68.0	-
South Dakota	117.0	119.0	645.0	649.0	0.6
Tennessee	41.0	39.0	184.0	181.0	-1.6
Texas	500.0	516.0	2,988.0	3,147.0	5.3
Utah	93.0	97.0	517.0	552.0	6.8
Vermont	129.0	128.0	680.0	667.0	-1.9
Virginia	87.0	87.0	442.0	436.0	-1.4
Washington	274.0	275.0	1,582.0	1,636.0	3.4
West Virginia	8.0	7.0	33.0	30.0	-9.1
Wisconsin	1,280.0	1,275.0	7,462.0	7,476.0	0.2
Wyoming	6.0	6.0	34.8	34.8	-
United States	9,369.0	9,407.0	53,562.0	54,385.0	1.5

- Represents zero.

¹ Includes dry cows. Excludes heifers not yet fresh.

² Excludes milk sucked by calves.

Statistical Methodology

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. Generally, all large producers and a sample of small 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. Additional reports are obtained by telephone, as needed, to supplement the mail response. Where feasible, States utilize state and federal administrative data to estimate milk production. This eliminates duplication of data gathering by different government agencies. Indications of milk cow inventory are also obtained in the January Cattle Surveys.

Estimation Procedures: Regional Field Offices prepare these estimates by using a combination of survey indications, historic trends, and any available administrative data. Individual State estimates are reviewed by the Agricultural Statistics Board for reasonableness.

Revision Policy: Milk production, milk per cow, and number of milk cows are subject to revision the following month after initial publication for monthly States or the following quarter for the quarterly States. Normally, administrative data from Federal Market Orders, State Departments of Agriculture, or other sources are the main basis for revisions. However, administrative data for all States may not be available in time for these revisions. Estimates are again subject to revisions in February each year based on additional administrative data. In the event that additional changes are necessary, a third revision is possible in February the following year. Estimates are again reviewed after data from the five-year Census of Agriculture are available. No revisions are made after that date.

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 on the next page. 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 production estimates over the past 20 quarters is 0.1 percent. This means that chances are 2 out of 3 that the final estimate will not be above or below the current estimate of 54.4 billion pounds by more than 0.1 percent. Chances are 9 out of 10 that the difference will not exceed 0.2 percent.

Reliability of Quarterly Milk Production Estimates

[Based on data for the past 20 quarters]

Item	Root mean square error	90 percent confidence level	Difference between first and latest estimate				
			Average	Smallest	Largest	Quarters	
						Below latest	Above latest
	(percent)	(percent)	(1,000)	(1,000)	(1,000)	(number)	(number)
Milk production	0.1	0.2	40	0	111	13	6
All milk cows	0.0	0.1	3	0	7	6	9

Information Contacts

Listed below are the commodity specialists in the Livestock Branch of the National Agricultural Statistics Service to contact for additional information. E-mail inquiries may be sent to nass@nass.usda.gov.

Travis Averill, Chief, Livestock Branch	(202) 720-3570
Scott Hollis, Head, Livestock Section	(202) 690-2424
Sherry Bertramsen – Livestock Slaughter	(202) 720-3240
Holly Brenize – Sheep and Goats	(202) 720-0585
Donnie Fike – Dairy Products	(202) 690-3236
Heidi Gleich – Cattle, Cattle on Feed	(202) 720-3040
Mike Miller – Milk Production and Milk Cows	(202) 720-3278
Seth Riggins – Hogs and Pigs	(202) 720-3106

Access to NASS Reports

For your convenience, you may access NASS reports and products the following ways:

- All reports are available electronically, at no cost, on the NASS web site: www.nass.usda.gov
- Both national and state specific reports are available via a free e-mail subscription. To set-up this free subscription, visit www.nass.usda.gov and click on “National” or “State” in upper right corner above “search” box to create an account and select the reports you would like to receive.

For more information on NASS surveys and reports, call the NASS Agricultural Statistics Hotline at (800) 727-9540, 7:30 a.m. to 4:00 p.m. ET, or e-mail: nass@nass.usda.gov.

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USDA NASS Data Users' Meeting
Tuesday, April 24, 2018

University of Chicago – Gleacher Center
450 North Cityfront Plaza Drive
Chicago, Illinois 60611
312-464-8787

USDA's National Agricultural Statistics Service will hold an open forum for users of U.S. domestic and international agriculture data. NASS is organizing the 2018 Data Users' Meeting in cooperation with five other USDA agencies – Agricultural Marketing Service, Economic Research Service, Farm Service Agency, Foreign Agricultural Service, and World Agricultural Outlook Board – and the Census Bureau's Foreign Trade Division. Agency representatives will provide updates on recent and pending changes in statistical and information programs important to agriculture, answer questions, and welcome comments and input from data users.

For registration details or additional information about the Data Users' Meeting, see the meeting page on the NASS website (https://www.nass.usda.gov/Education_and_Outreach/Meeting/index.php). Contact Tina Hall (NASS) at 202-720-3896 or tina.hall@nass.usda.gov or Patricia Snipe (NASS) at 202-720-2248 or patricia.snipe@nass.usda.gov for information.

The Data Users' Meeting precedes the Industry Outlook Conference at the same location on Wednesday, April 25, 2018. The outlook meeting brings together analysts from various commodity sectors to discuss developments and trends. For registration details or additional information about the Industry Outlook Conference, see the conference page on the LMIC website (<http://lmic.info/page/meetings>) or contact James Robb at 303-716-9933.