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Grain Crushings and Co- Products Production 2016 Summary

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2016 Grain Crushings and Co-Products Production

As part of the Current Agricultural Industrial Reports (CAIR) program, the 2016 Annual Summary of the Grain Crushings and Co-Products Production contains data and annual totals for January through December 2016.

Total corn consumed for alcohol for 2016 was 5.39 billion bushels, up 1 percent from 2015. Corn for beverage alcohol in 2016 totaled 34.1 million bushels, up 1 percent from 2015. Corn for fuel alcohol was 5.29 billion bushels in 2016, up 1 percent from 2015.

Dry mill co-product production of distillers dried grains with solubles (DDGS) was 23.2 million tons during 2016, up 4 percent from 2015. Distillers wet grains (DWG) 65 percent or more moisture was 15.3 million tons in 2016, down 5 percent from 2015. Distillers dried grain (DDG) was 4.86 million tons in 2016, down 5 percent from 2015.

Wet mill corn gluten feed production was 3.95 million tons during 2016, up 1 percent from 2015. Wet corn gluten feed 40 to 60 percent moisture was 3.67 million tons, down 1 percent from 2015.

Dry and wet mill carbon dioxide captured was 2.53 million tons in 2016, up 1 percent from 2015.

Dry and Wet Mill, Corn Consumed – United States: 2016

Purpose	January 2016	February 2016	March 2016	April 2016	May 2016	June 2016	July 2016
	(1,000 bushels)						
Consumed for alcohol production							
Beverage alcohol	3,141	2,462	2,712	2,689	2,846	2,600	2,609
Fuel alcohol	444,036	420,937	438,381	400,731	425,684	427,558	456,422
Dry mill	397,028	377,530	390,918	358,391	379,474	382,797	408,504
Wet mill	47,008	43,407	47,463	42,340	46,210	44,761	47,918
Industrial alcohol	5,505	6,301	6,126	6,173	5,923	4,913	5,772
Consumed for other purposes							
Total wet mill products other than fuel	41,331	40,558	44,136	43,587	44,555	43,026	44,564

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Dry Mill, Sorghum Consumed – United States: 2016

Purpose	January 2016	February 2016	March 2016	April 2016	May 2016	June 2016	July 2016
	(1,000 cwt)	(1,000 cwt)	(1,000 cwt)	(1,000 cwt)	(1,000 cwt)	(1,000 cwt)	(1,000 cwt)
Fuel alcohol	6,939	8,719	10,156	7,499	6,301	5,978	5,980

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Dry and Wet Mill, Co-products and Products Produced – United States: 2016

Co-products and products	January 2016	February 2016	March 2016	April 2016	May 2016	June 2016	July 2016
	(tons)	(tons)	(tons)	(tons)	(tons)	(tons)	(tons)
Condensed distillers solubles (CDS - syrup)	135,339	122,291	137,541	130,324	131,318	132,798	140,639
Corn oil (Corn Distillers Oil - CDO)	125,826	123,806	128,948	114,127	125,311	130,964	144,020
Distillers dried grains (DDG)	383,131	367,436	384,739	374,750	411,467	392,438	404,758
Distillers dried grains with solubles (DDGS)	1,905,165	1,795,472	1,919,507	1,717,024	1,845,238	1,893,816	2,047,520
Distillers wet grains (DWG)							
65% or more moisture	1,313,632	1,249,676	1,320,322	1,264,745	1,234,315	1,220,639	1,228,286
Modified distillers wet grains (DWG) 40% to 64% moisture	454,248	401,370	456,256	429,972	425,343	360,904	359,613
Wet mill							
Corn germ meal	63,787	65,123	68,140	67,530	63,859	58,121	65,032
Corn gluten feed	321,956	312,012	342,668	306,464	332,975	331,812	339,700
Corn gluten meal	87,266	83,643	91,945	84,916	88,177	84,034	89,125
Corn oil	45,976	46,490	51,415	51,455	50,262	48,531	57,325
Wet corn gluten feed 40% to 60% moisture	291,882	277,434	290,565	301,283	306,424	312,497	331,949
Dry and wet mill							
Carbon dioxide captured	202,150	193,590	204,371	199,101	203,264	228,221	230,934

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Dry and Wet Mill, Corn Consumed – United States: 2016 (continued)

Purpose	August 2016	September 2016	October 2016	November 2016	December 2016	Total 2016
	(1,000 bushels)					
Consumed for alcohol production						
Beverage alcohol	3,132	2,793	3,184	3,361	2,595	34,124
Fuel alcohol	458,357	435,220	455,819	452,039	473,997	5,289,181
Dry mill	411,406	388,472	407,491	407,858	424,893	4,734,762
Wet mill	46,951	46,748	48,328	44,181	49,104	554,419
Industrial alcohol	5,810	6,135	6,247	6,489	6,108	71,502
Consumed for other purposes						
Total wet mill products other than fuel	43,670	41,035	42,568	(D)	43,272	(D)

(D) Withheld to avoid disclosing data for individual operations.

Dry Mill, Sorghum Consumed – United States: 2016 (continued)

Purpose	August 2016	September 2016	October 2016	November 2016	December 2016	Total 2016
	(1,000 cwt)	(1,000 cwt)	(1,000 cwt)	(1,000 cwt)	(1,000 cwt)	(1,000 cwt)
Fuel alcohol	4,366	2,530	4,519	4,914	5,422	73,323

Dry and Wet Mill, Co-products and Products Produced – United States: 2016 (continued)

Co-products and products	August 2016	September 2016	October 2016	November 2016	December 2016	Total 2016
	(tons)	(tons)	(tons)	(tons)	(tons)	(tons)
Dry mill						
Condensed distillers solubles (CDS - syrup)	143,040	146,764	145,853	126,968	138,747	1,631,622
Corn oil (Corn Distillers Oil - CDO)	142,000	134,269	141,775	147,336	143,942	1,602,324
Distillers dried grains (DDG)	428,748	398,124	448,355	423,892	442,824	4,860,662
Distillers dried grains with solubles (DDGS)	2,072,699	1,964,214	1,927,282	1,995,252	2,095,550	23,178,739
Distillers wet grains (DWG) 65% or more moisture	1,230,155	1,194,344	1,288,256	1,281,029	1,428,635	15,254,034
Modified distillers wet grains (DWG) 40% to 64% moisture	353,754	375,641	376,028	389,038	434,498	4,816,665
Wet mill						
Corn germ meal	65,783	54,996	58,988	63,635	63,600	758,594
Corn gluten feed	336,916	326,211	342,589	309,305	349,226	3,951,834
Corn gluten meal	87,793	86,725	86,227	84,092	89,092	1,043,035
Corn oil	53,970	50,524	47,860	49,393	58,248	611,449
Wet corn gluten feed 40% to 60% moisture	309,077	303,504	300,808	326,550	317,759	3,669,732
Dry and wet mill						
Carbon dioxide captured	224,408	213,022	213,115	213,244	201,315	2,526,734

Statistical Methodology

Survey Procedures: *Grain Crushings and Co-Products Production* is part of the Current Agricultural Industrial Reports (CAIR) program. CAIR reports are administered under NASS's Census of Agriculture program. Response to CAIR surveys are required by law (Title 7, U.S. Code). Data are collected from all known mills that produce ethanol.

The census universe was determined during operation profile interviews which were completed for each potential facility to identify the presence of ethanol production in 2014. During the operation profile, facilities that met the survey criteria were asked for the nameplate production capacity. The operation profile also documented the manner in which the firm will report. A firm headquarters can report for all milling locations or each location can report separately.

In the Dry Mill Producers and Wet Mill Producers survey questionnaires, mills are asked for previous calendar month data on feedstocks consumed, products and co-products produced. Mills are mailed questionnaires with the options of completing the survey by mail or by Electronic Data Reporting (EDR). For surveys not received in a reasonable amount of time, telephone follow-up is conducted.

Estimating Procedures: Imputation is done for operations with non-response by using historical data and current data relationships. Data for reporting firms are added to estimates for non-reporting firms to obtain National totals.

Revision Policy: Data are revised the following month based on late reports or corrected data. Final figures are published in the annual summary of the following year.

Reliability: Approximately 130 reports are received each month which represent about 90 percent of total capacity. Monthly data can vary due to different firms reporting month to month. Survey data are also subject to non-sampling errors such as omissions and mistakes in reporting and in processing the data. While these errors cannot be measured directly, they are minimized by carefully reviewing all reported data for consistency and reasonableness.

Information Contacts

Listed below are the commodity statisticians in the Environmental, Economics, and Demographics Branch of the National Agricultural Statistics Service to contact for additional information. E-mail inquiries may be sent to nass@nass.usda.gov.

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