## **CDE DAIRY MARKETS & MANAGEMENT UPDATE** All prices — TUESDAY, SEPT. 10, 2019 — except where noted

## Per capita milk consumption and fluid milk sales:

There are many factors that contribute to the price dairy farmers are paid for the milk their cows produce. Supply and demand certainly have their influence on how milk price is determined across the country. Recently, the USDA's Economic Research Service (ERS) released two annual spreadsheet updates, Dairy Products: Per Capita Consumption, United States and Fluid Beverage Milk Sales Quantities by Product. The two spreadsheets report annual per capita consumption and fluid milk sales from 1975 to 2018. These spreadsheets provide insight into how the demand side of the milk price equation has done over the last 43 years. The spreadsheets can be accessed on the ERS webpage at https://www.ers.usda.gov/data-products/dairy-data/.

In 2018, fluid milk sales continued to decline. Milk sales in 2017 were 48.65 billion pounds and fell to 47.67 billion pounds to end 2018 with a 2% drop.

Fluid milk sales were 53.31 billion pounds in 1975. Over the last 43 years, fluid milk sales have dropped 5.64 billion pounds or 11%. This is discouraging news to the dairy community, but sales of some fluid milk products are growing. Both whole milk and flavored whole milk have experienced increased sales for the last several years.

Whole milk sales have increased every year since 2014. The 2013 whole milk sales reached a 13.91-billion pound low and increased to 16.04 billion pounds in 2018, or an increase of 15% over 5 years. Flavored whole milk increased 36% from a low of 539 million pounds in 2011 to 732 million pounds in 2018. Despite the current positive trend for whole milk and flavored whole milk, sales are still about half of what they were in 1975.

Fluid milk consumption tells a scarier story. Per capita fluid milk consumption has fallen 41% from a high of 247 pounds (29 gallons) per person in 1975 to a low of 146 pounds (17 gallons) per person in 2018. How can there be an 11% drop in fluid milk sales but a 41% drop in fluid milk consumption? Per capita is based on population. The drastic difference in the decline rates of sales and consumption is explained by an increasing population drinking less milk. Consumption is not keeping up with population growth

**SEP-19** 

18.20

17.72

13.55 01/18

1.82

7.43

AUG-18

10.24

10.04

3.60 13.10

4.00 03.30

3,600

3.584

291.0

298.5

PA 1.33

\*AVG 1.32

MPP JUL-18

JUL-18

9.62

10.26

SEP-19

3 4 8 2

3.460

**SEP-19** 

289.6

294.6

JULY

\*PREV MO

вох

17.89

14.85

MAILBO \$18.73 \$18.56 \$17.92 \$17.69 \$17.52 \$17.35 \$17.39 \$17.45 \$17.24

\$17.12

**COWS Fresh** 

1025

1030

YR AGO

\*=NEW

FEED

\$/CWT

IOFC = \$/COW

NGI

Price

averages

do not

include

lower-end 'common'

cows and

heifers

\*\*USDA MAY 2019\* ALL-MILK MAILBO

6 72

\*AVG =

Average

basis for

North-

East and

Mid-East

\*MARGIN

= Milk

Price

over Feed

Cost

per cwt

YFLLOW

=

payment

triggered

It is not all bad news though Per capita consumption of all dairy products has been variable from year to year but has





pounds per person in 1975 to a high of 646 pounds per person in 2018. Overall demand for dairy products is growing with cheese and yogurt consumption being the main drivers. Per capita consumption of yogurt has increased 570%, American cheese con-sumption has increased 91%, and other cheese (not American) consumption has risen 269% since 1975.

This does not mean we should give up on fluid milk. The dairy industry must continue to work to reverse the trend of declining fluid milk sales. Having increased consumption of all dairy products is important to keeping up with increasing milk production. For the last 10 years, milk production has increased at rate of 1.5% per year. Growth in total consumption is helping to clear milk from the market.

Total Consumption Versus

## Fluid Milk Consumption 700 400 200 500 2010 2012 2016 2018 2002 8008 ã 8 Per Capita Consumption (Ibs/person) Prices change daily. This market information is an example for educational purpos-es. The market data below are compiled weekly by Farmshine, via CME & USDA reports Fluid M ilk Consumption (Ibs/person) CME DAILY FUTURES & OPTIONS TRADING — SEPT. 10, 2019 AT THE CLOSE OCT-19 NOV-19 DEC-19 FEB-20 MAR-20 APR-20 MAY-20 JUL-20 AUG-20 TREND **JAN-20 JUN-20** CLASS III MILK FUTURES (\$/CWT) 18.16 17.67 17.13 16.45 16.29 16.29 16.42 16.49 16.63 16.83 17.00 MIXED WEEK AGO 16.40 17.64 17.39 16.98 16.50 16.33 16.48 16.59 16.78 16.94 16.97 HIGHEST & LOWEST DAILY SETTLE PRICE OVER LIFE OF CONTRACT AND MONTH/YEAR IT OCCURRED 16.83 07/19 16.80 07/19 16.89 07/19 16.98 07/19 17.08 07/19 17.05 07/19 14.63 11/18 14.59 11/18 14.65 11/18 15.01 11/18 15.01 11/18 17 98 07/19 17 99 06/19 17.83 07/19 17.30 07/19 16.96 07/19 14.08 11/18 14.60 11/18 14.62 11/18 17 10 07/19 14.62 11/18 13.75 01/18 14.99 11/18 MILK BASIS (\$/CWT) PA BASIS & 2014-16 AVG OF PA/NY/VT/OH PA 1.33 1.87 1.70 2.75 2.30 1.81 1.58 YOUR INDIVIDUAL BASIS WILL VARY (MAILBOX - CLASS 3) 2.30 0.85 1.01 1.19 1.60 1.28 1.80 2.70 2.02 1.25 1 65 2.72 2 2 5 2 14 1.12 0.90 MPP/DMC OFFICIAL GROSS MARGINS per cwt.(USDA All-Milk, com/alfalfa hay & Illinois soybean prices, feed for all classes of dairy cattle on the farm) AUG-18 SEP-18 **0CT-18 NOV-18 DEC-18** DMC JAN-19 **FEB-19 MAR-19 APR-19 MAY-19** \*JUL-19 **JUN-19** 11 8.26 8.96 8 66 7 85 7 71 7 91 8 66 8 82 9.00 8 63 \*9 27 U.S. AVG MILK MARGIN per 100 lbs milk based on 75-lb herd avg & USDA's All-Milk price, USDA-reported com & alfalfa hay & III. soybean prices (lactating feed only) SFP-18 **0CT-18** NOV-18 DEC-18 **JAN-19 FFB-19 MAR-19** APR-19 **MAY-19** \*JUN-19 \*JUL-19 11.00 11.73 11.40 10.63 10.79 11.00 11.63 11.61 11.76 \*11.82 \*12.24 11 PA AVG MILK MARGIN per 100 lbs milk based on 75-lb herd average and USDA's PA All-Milk price, USDA com & alfalfa hay & Buff., NY soybean prices (lactating feed only) 10.46 11.01 11.68 10.37 11.34 11.39 11.21 11.54 11.29 \*11.52 \*12.74 CLASS III MILK (\$/CWT) OPTIONS - PUTS - Daily Strike Price / Premium 17.25 0.38 16.50 0.41 16.25 0.42 16.25 0.45 18.25 0 05 18.25 0 19 17.75 0 27 16.50 0 54 16.50 0 51 16.75 0 60 16.75 0 54 17.00 0 63 DEC-19 MAR-20 **JUL-20 SEP-20** DEC-19 MAY-20 1111-20 **SEP-20** Example CORN (\$/BU) OPTIONS -CALLS **Daily Strike** SOYMEAL (\$/TON) **OPTIONS** CALLS 280 3.70 19.20 4.00 20.00 4.30 14.00 Price / Premium **280** 16.80 28.15 **290** 25.75 **290** 29.05 5.00 01.40 5.00 03.50 5.20 03.30 **325** 01.45 **390** 01.25 380 02.40 380 03.15 CORN FUTURES (\$/BU) TREND DEC-21 **DEC-19 MAR-20 MAY-20** JUL-20 SEP-20 DEC-20 **MAR-21 MAY-21 JUL-21** SEP-21 4,020 3 7 2 2 3,890 3.942 4 194 4 234 4 1 2 6 4 140 11 3.816 4 1 3 0 WEEK AGO 3.716 3.804 3.876 3.926 3.996 4.104 4.172 4.212 4.116 4.126 SOYMEAL FUTURES (\$/TON) **OCT-19 DEC-19** JAN-20 **MAR-20 MAY-20** JUL-20 AUG-20 SEP-20 **OCT-20** DEC-20 **JAN-21** TREND 294.7 296.6 300.0 304.3 308.7 310.8 312.4 313.3 315.5 316.9 Ш VEEK AGO 300.1 303.0 306.6 310.8 312.7 314.4 315.3 318.1 318.7 318.5 CME DAIRY CASH-SET SEP OCT TLED FUTURES (\$/LB NOV DEC JAN SPOT CASH TREND **09/10/19** FEB MAR PA MILK MARGIN & IOFC-LATEST PSU VALUES -\* JULY 2019 PA MILK MARGIN FEED COST IOFC (\$/COW 1.103 II 1.0375 川 1.042 1.071 1.095 NFDM 1.049 1.060 1.084 (\$/CWT milk) @ 75 lbs milk) (\$/CWT milk) WHEY 0.362 0.355 0.356 0.353 0.347 0.350 0.346 ↓↓ 0.3800 🔱 \*7.31 \*9.56 11 \*12.74 11 BUTTER 2.218 2.234 2.232 2.222 2.211 2.220 2.241 Ш 2.2000 11 \*7 28 \*11 52 \*8.64 **CHEESE** 1 900 1 898 1 851 1 7 9 6 1 7 2 9 1710 1 7 1 2 11 See Below 5.90 7.70 11.10 1.8200 / 40 LB BLOCKS 2.0525 CME SPOT CHEESE: BARRELS \* = NEW ANNOUNCED FEDERAL ORDER PRICES (\$/CWT) CURRENT FEDERAL ORDER VALUES (\$/LB) \* = NEW CL I ADV↓↓ \*CL II↓↓ \*CL III11 \*CL IV↓↓ ALL-MILK-U.S ALL-MILK-PA WEIGHTED AVG. 4-WK AUG. 1 - SEP. 2, 2019 \*AUGUST 2019 17.85(sept) \*17.60(aug) \*17.60(aug) \*16.74(aug) 18.70(jul) 119.10(jul) 11 PRODUCT VALUE MAKE ALLOW NET **COMPONENTS** CHEESE 1.8239 0.2003 1.6236 \* PROT 2.4430 11 MONTH AGO BUTTER 2.3659 0.1715 2.1944 \*B.FAT 2.6575 Ħ 17.61 17.55 16.90 18.10 18.80 \*NFDM 1.0335 0.1678 0.8657 Ш \*N.FAT 0.8570 $\downarrow \downarrow$ YEAR AGO 14.95 16.20 \*DRYWHEY 0.3671 0.1991 0.1680 11 \*OTHER 0.1730 11 15.07 14.63 15.40 CATTLE - DAIRY PURPOSES (\$/HD) NORTHEAST (Avg. SEPT. 4, 2019 sale New Holland, PA) \*MOST RECENT REPORT BULLS (600-1800 lb) 300-600 lbs 600-900 lbs **HEIFERS**: Bred Springing Open: 900-1200 lbs Bred Springing 975 735 1065 300 550 885 N/A 825 FOUR WEEK RUNNING AVG 885 1000 725 1025 350 500 600 750 FED HOLSTEIN STEERS (\$/CWT LIVEWEIGHT) Avg. of prices reported by USDA Market News for CURRENT WFFK AGO YR AGO & NY Auction Markets Sept. 5 - 10, 2019 Ш Choice & Prime 1250-1550 lbs liaht test N/A 81 35 79 00 CULL MARKET COWS (\$/CWT LIVEWEIGHT) Ш BULL CALVES: No. 1 & 2, 90-130 lbs 40.00 43 00 75 00 **Breakers** Boners Lean **BEEF CROSS** 200.00 200.00 NO COMPARISON 66.6011 65.5011 56.6011 brought to you by:

N/A Average to high dressing WEEK AGO N/A 66.25 YEAR AGO N/A 57.75

Premium White



56.50

51.50

65.35

57.75

pennsylvania FARMSHINE