



UNDERSTANDING THE CME LEAN HOG INDEX®

The CME Lean Hog Index® is a two-day weighted average of average net prices for slaughtered barrows and gilts (hogs). This data is collected by the U.S. Department of Agriculture (USDA) in its National Daily Direct Hog Prior Day Report-Slaughtered Swine (USDA Report LM_HG201):

USDA NATIONAL DAILY DIRECT HOG PRIOR DAY REPORT - SLAUGHTERED SWINE (LM_HG201)

Slaughter Data for Tuesday, January 3

	NEGOTIATED	OTHER MARKET FORMULA	SWINE OR PORK MARKET FORMULA	OTHER PURCHASE ARRGMENT	TOTALS/ WTD AVG
Producer Sold					
HEAD COUNT	11,269	39,201	159,633	60,199	270,302
CARCASS BASE PRICE	78.90	82.06	80.38	81.30	80.80
AVERAGE NET PRICE	82.05	85.19	82.30	83.39	82.96
LOWEST NET LOT	72.55	73.23	69.10	67.98	72.03
HIGHEST NET LOT	86.46	93.32	89.64	103.20	92.41
AVERAGE LIVE WT	262.19	280.61	279.72	273.52	277.43
AVERAGE CARCASS WT	197.39	210.94	211.22	205.30	209.32

USDA NATIONAL DAILY DIRECT HOG PRIOR DAY REPORT - SLAUGHTERED SWINE (LM_HG201)

Slaughter Data for Wednesday, January 4

	NEGOTIATED	OTHER MARKET FORMULA	SWINE OR PORK MARKET FORMULA	OTHER PURCHASE ARRGMENT	TOTALS/ WTD AVG
Producer Sold					
HEAD COUNT	10,553	41,289	149,459	63,721	265,022
CARCASS BASE PRICE	78.49	81.88	79.85	80.61	80.33
AVERAGE NET PRICE	80.61	84.91	81.83	82.84	82.51
LOWEST NET LOT	63.31	71.40	67.19	72.25	70.80
HIGHEST NET LOT	90.78	94.40	90.69	104.40	96.00
AVERAGE LIVE WT	267.70	281.86	278.97	273.11	277.29
AVERAGE CARCASS WT	202.92	211.69	210.81	205.32	209.33

To calculate the Index, first using data for producer-sold negotiated hogs, the number of hogs slaughtered is multiplied by the average carcass weight to determine the total pounds of producer-sold negotiated hogs slaughtered. Then, multiply all three USDA figures (head count x weight x average net price) to determine the total value in cents. The same process is then used with data for producer-sold swine-pork market formula hogs to determine that total poundage and total value. The negotiated poundage is combined with the formula poundage and the negotiated value is combined with the formula value. To get the CME Lean Hog Index® value, add two consecutive combined daily total values, then divide by the sum of the two day's combined total poundage. The result is a two-day weighted average of slaughter values quoted in cents per pound.

How to Calculate the CME Lean Hog Index®

$$\text{CME Lean Hog Index}^{\text{®}} = \frac{\text{2-Day Combined Total Value}}{\text{2-Day Combined Total Weight}}$$

Combined Total Value = Total Head (negotiated) x Average Carcass Weight (negotiated) x Average Net Price (negotiated) plus Total Head (swine-pork market formula) x Average Carcass Weight (swine-pork market formula) x Average Net Price (swine-pork market formula)

Combined Total Weight = Total Head (negotiated) x Average Carcass Weight (negotiated) plus Total Head (swine-pork market formula) x Average Carcass Weight (swine-pork market formula)

To calculate the Index for the 2 days ending on Wednesday, January 4:

- 1) Use USDA data for Tuesday, January 3 and Wednesday, January 4
- 2) Combined Total Value for Tuesday, Jan. 3
 - Negotiated hogs $10,553 \times 80.61 \times 202.92 = 172,619,443.80$
 - Swine/pork formula hogs $149,459 \times 81.83 \times 210.81 = 2,578,254,779.98$
 - Combined Total Value = 2,750,874,223.78
- 3) Combined Total Value for Wednesday, Jan. 4
 - Negotiated hogs $11,269 \times 82.05 \times 197.39 = 182,511,028.02$
 - Swine/pork formula hogs $159,633 \times 82.3 \times 211.22 = 2,774,965,250.00$
 - Combined Total Value = 2,957,476,278.01
- 4) 2-Day Combined Total Value = 5,708,350,501.79
- 5) Combined Total Weight for Tuesday, Jan 3
 - Negotiated hogs $10,553 \times 202.92 = 2,141,414.76$
 - Swine/pork formula hogs = 31,507,451.79
 - Combined Total Weight = 33,648,866.55
- 6) Combined Total Weight for Wednesday, Jan. 4
 - Negotiated hogs $11,269 \times 197.39 = 2,224,387.91$
 - Swine/pork formula hogs $159,633 \times 211.22 = 33,717,682.26$
 - Combined Total Weight = 35,942,070.17
- 7) 2-Day Combined Total Weight = 69,590,936.72
- 8) 2-Day Combined Total Value/2-Day Combined Total Weight= Index
 $5,708,350,501.79 / 69,590,936.72 = 82.027$ (round to 82.03)

DAILY DISSEMINATION OF INDEX VALUES

The current Index value is disseminated to data vendors. The Index spreadsheet is posted to the web at <http://www.cmegroup.com/market-data/reports/cash-settled-commodity-index-prices.html>