

## **Managing Input Costs: Are There Any Good Options?**

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Paragon Economics, Inc.



# Meyer's strategy for success -- Spring 2007:

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- Buy low
- Convert efficiently
- Sell high
- Real rocket science, huh?
- THE CHALLENGE: Just what constitutes "Low" and what constitutes "High" in 2008 and beyond?



# Only one "high" higher than now!

## ... "harvest" lows in Aug '06 and July '07!



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# Wheat reminded us that it is important, too!



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# Higher SBM has exacerbated the problem ...



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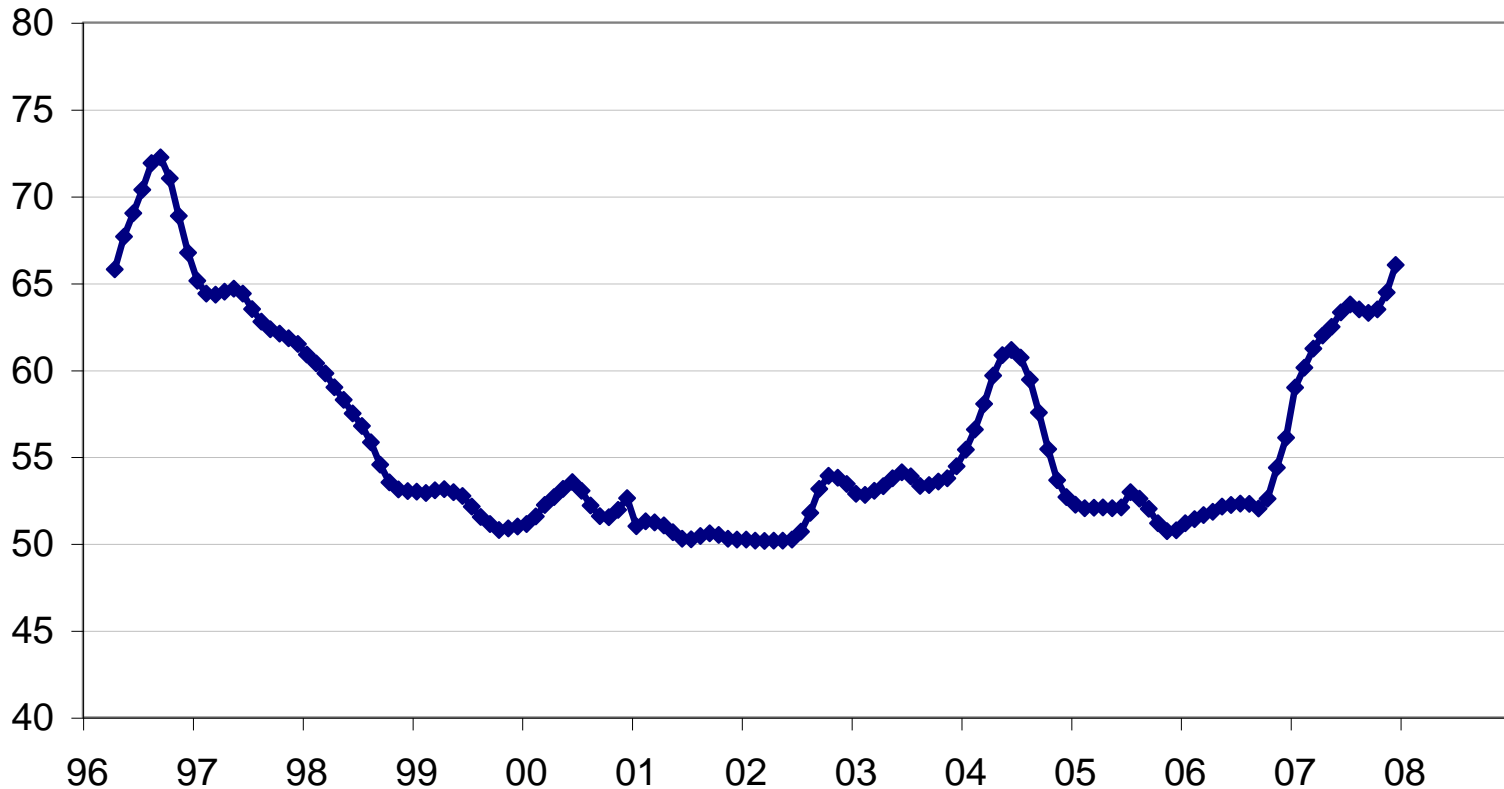


# Average costs up 27%, July '06 to Dec '07

## ESTIMATED PRODUCTION COSTS

Iowa Farrow-to-Finish Operations

\$/cwt carcass



\*Source: ISU Estimated Costs & Returns, Iowa farrow-to-finish operations, Department of Economics, Iowa State University

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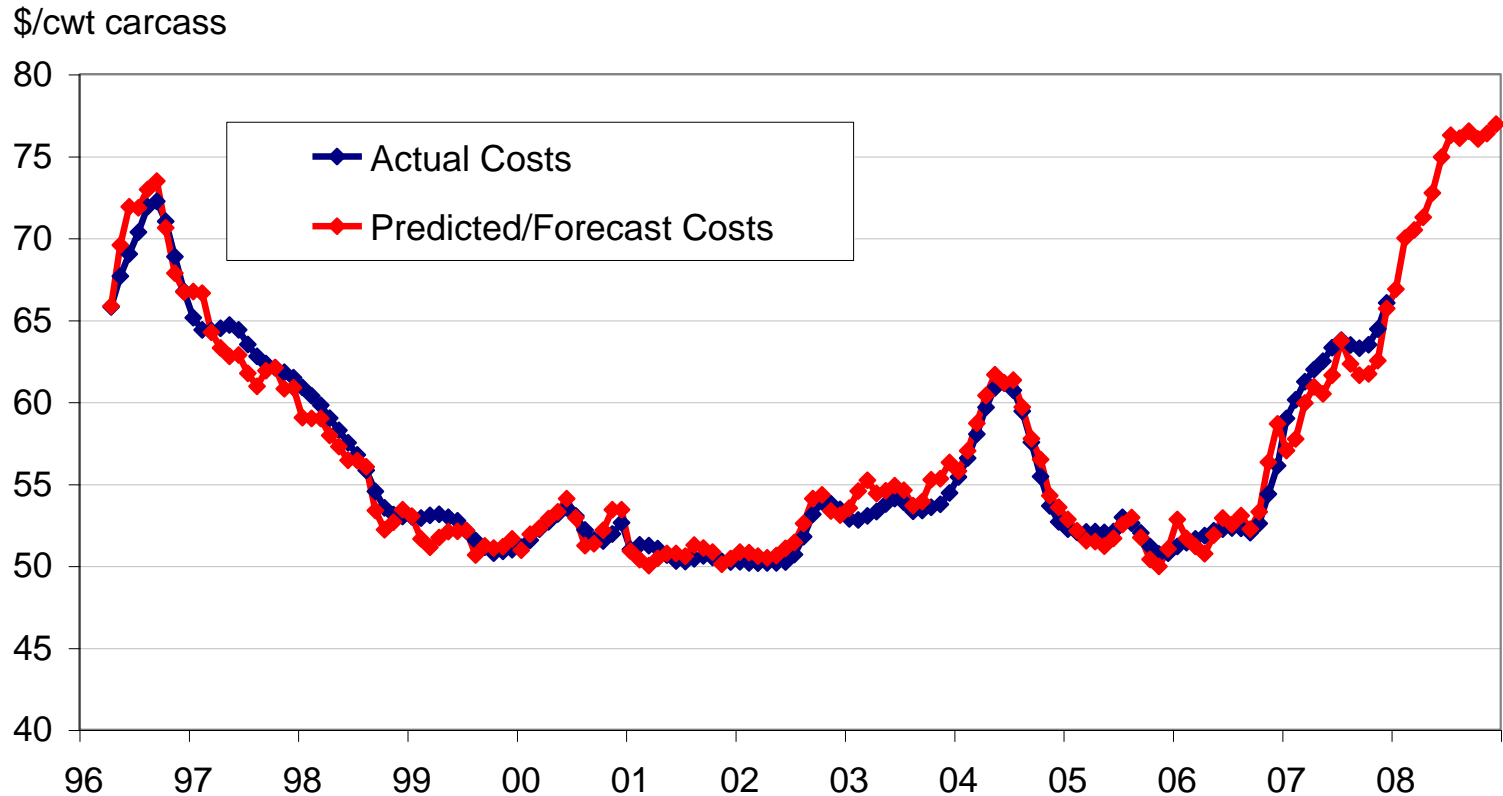
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# And where are they headed?

... there is no end in sight at present!

## ACTUAL & PREDICTED HOG PRODUCTION COSTS\*



\*Based on relationship between ISU Estimated Costs & Returns data and historic Omaha corn and Decatur soybean meal prices

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# What can you do?

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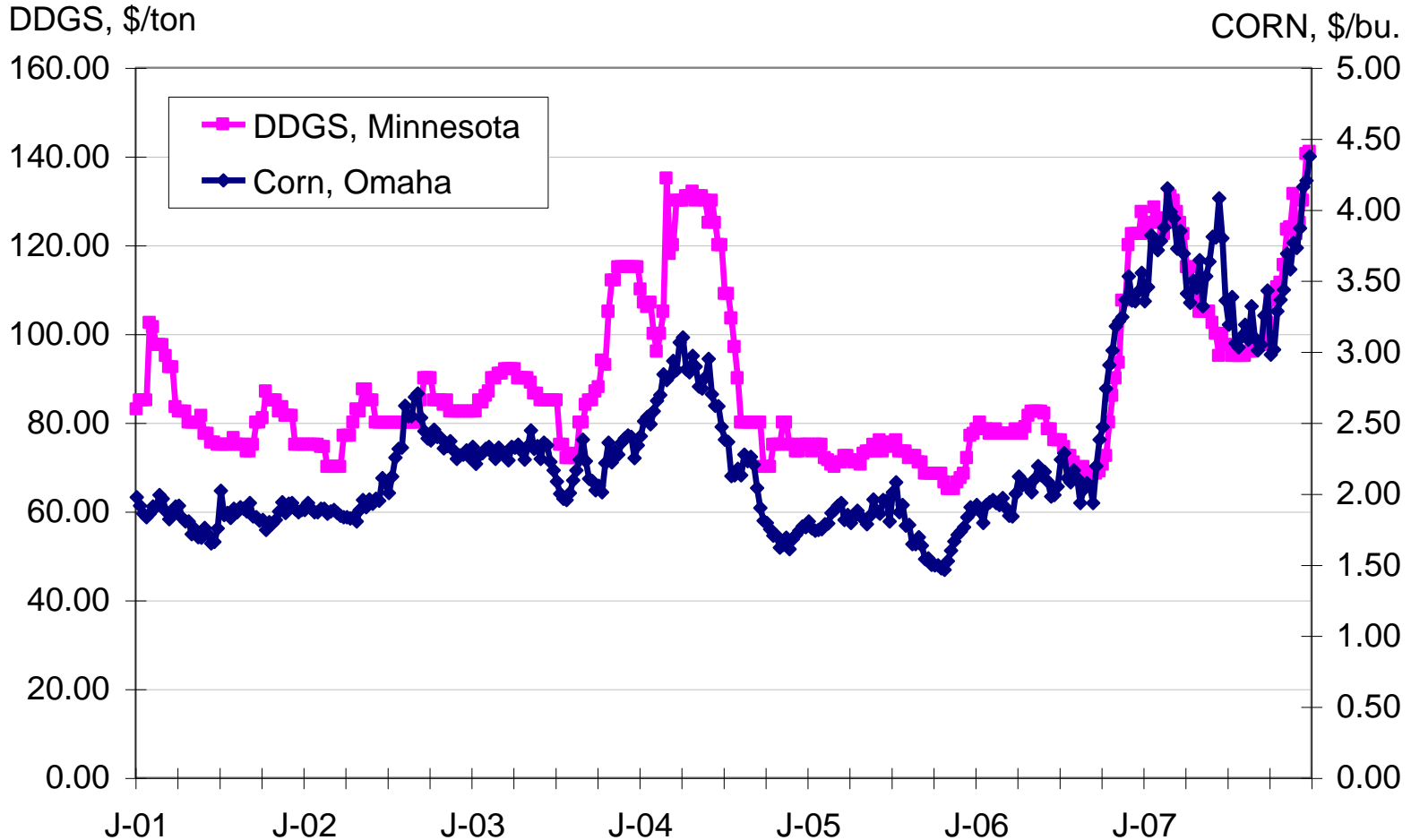
- Not much for costs at present
- Use existing inventories for as long as they will last
- Use DDGS as much as feasible
  - Price isn't a real bargain, though, vs. corn





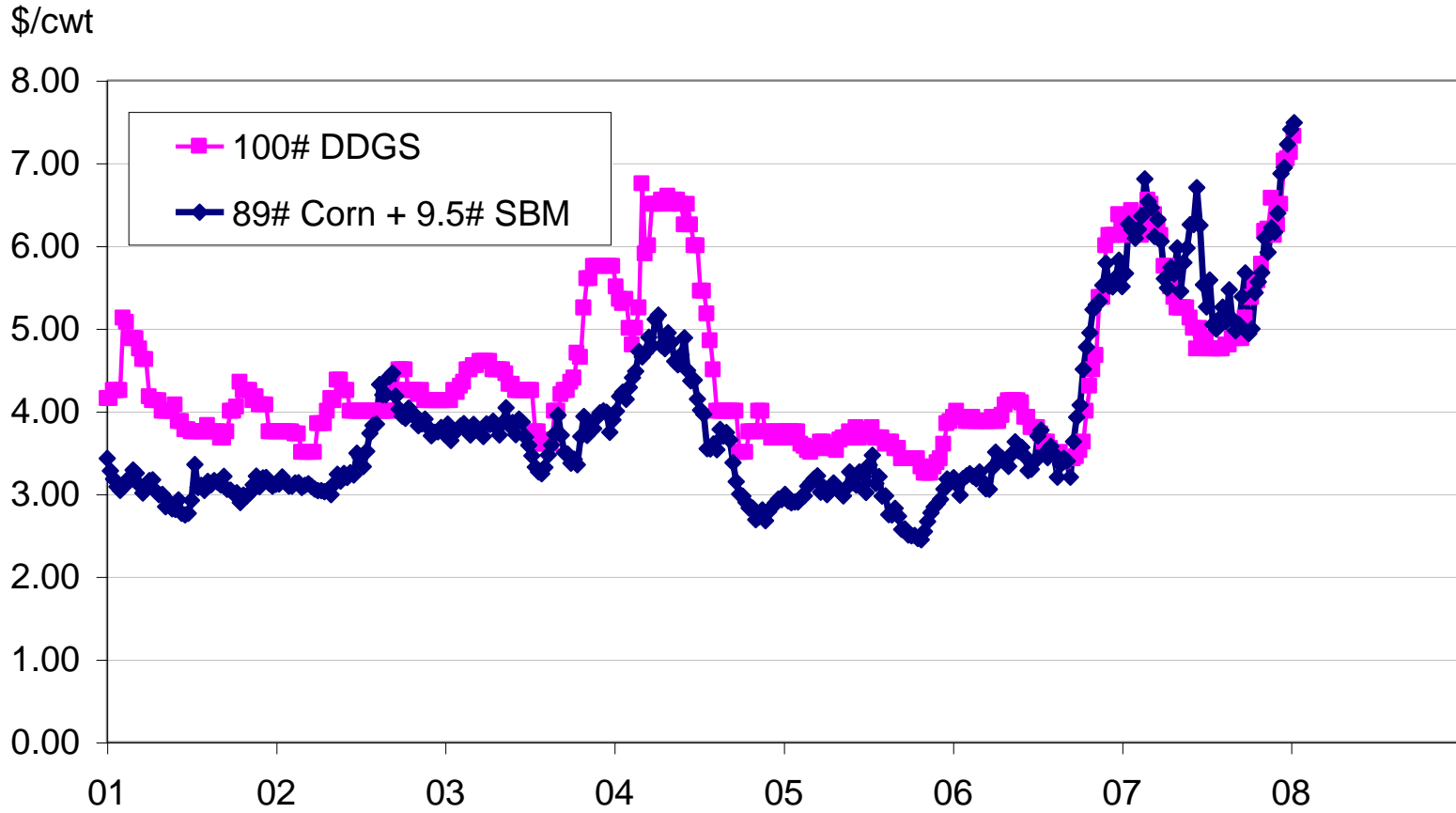
# Historic price relationship

## PRICES OF DDGS AND CORN



# But the substitution is not 1-to-1

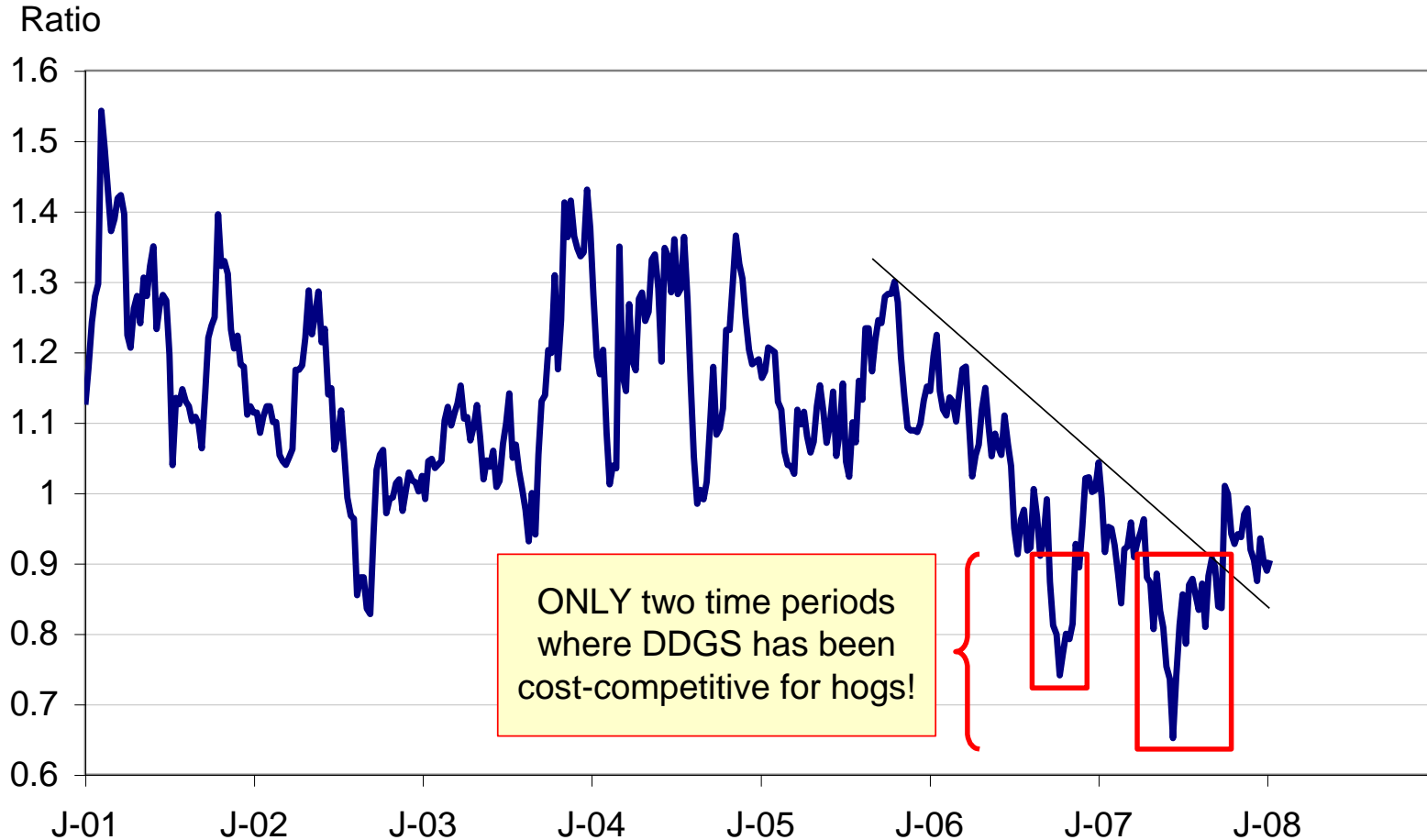
## DDGS & CORN/SBM SUBSTITUTION VALUES



# Simple method is a price ratio ...

## ... with DDGS=92% of corn the critical value

DDGS \$ PER LB / CORN \$ PER LB



# What can you do?

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- Not much for costs at present
- Use existing inventories for as long as they will last
- Use DDGS as much as feasible
  - Price isn't a real bargain, though, vs. corn
  - Reason: It is better cattle feed!
- Other alternatives are priced vs. corn (and wheat and barley!) so they are high as well



# This couldn't get worse – or could it?

## ■ ABSOLUTELY YES!

		2005/06	2006/07	2007/08		2008/09
		Actual	Actual	USDA, Dec	USDA, Jan	PEI Est.
Acres Planted	Mil A	81.8	78.3	93.6	93.6	87.0
Acres Harvested	Mil A	75.1	70.6	86.1	86.5	79.6
Yield	Bu/A	148.0	149.1	153	151.1	151.9
Beginning Stocks	Mil Bu.	2114	1967	1303	1304	1438
Production	Mil Bu.	11114	10535	13168	13074	12092
Imports	Mil Bu.	9	12	15	15	15
Total Supply	Mil Bu.	13237	12514	14486	14393	13545
Food, Seed & Ind	Mil Bu.	2981	3488	4590	4555	
Ethanol for fuel		1603	2117	3200	3200	
Feed & Resid	Mil Bu.	6155	5598	5650	5950	
Exports	Mil Bu.	2134	2125	2450	2450	
Total Usage	Mil Bu.	11270	11211	12690	12955	
Carryover	Mil Bu.	1967	1303	1796	1438	
Stocks/Use		17.5%	11.6%	14.2%	11.1%	
Nat. Wtd. Avg. Farm Price	\$/Bu.	2.00	3.04	3.35 - 3.95	3.70 - 4.30	

# And what about usage?

... "It'll never fly Wilbur!"

		2005/06	2006/07	2007/08		2008/09
		Actual	Actual	USDA, Dec	USDA, Jan	PEI Est.
Acres Planted	Mil A	81.8	78.3	93.6	93.6	87.0
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Food, Seed & Ind	Mil Bu.	2981	3488	4590	4555	<b>6100</b>
Ethanol for fuel		1603	2117	3200	3200	<b>4750</b>
Feed & Resid	Mil Bu.	6155	5598	5650	5950	<b>5450</b>
Exports	Mil Bu.	2134	2125	2450	2450	<b>2400</b>
Total Usage	Mil Bu.	11270	11211	12690	12955	<b>13950</b>
Carryover	Mil Bu.	1967	1303	1796	1438	<b>-405</b>
Stocks/Use		17.5%	11.6%	14.2%	11.1%	
Nat. Wtd. Avg. Farm Price	\$/Bu.	2.00	3.04	3.35 - 3.95	3.70 - 4.30	



# Could use Calls to prevent a bigger disaster

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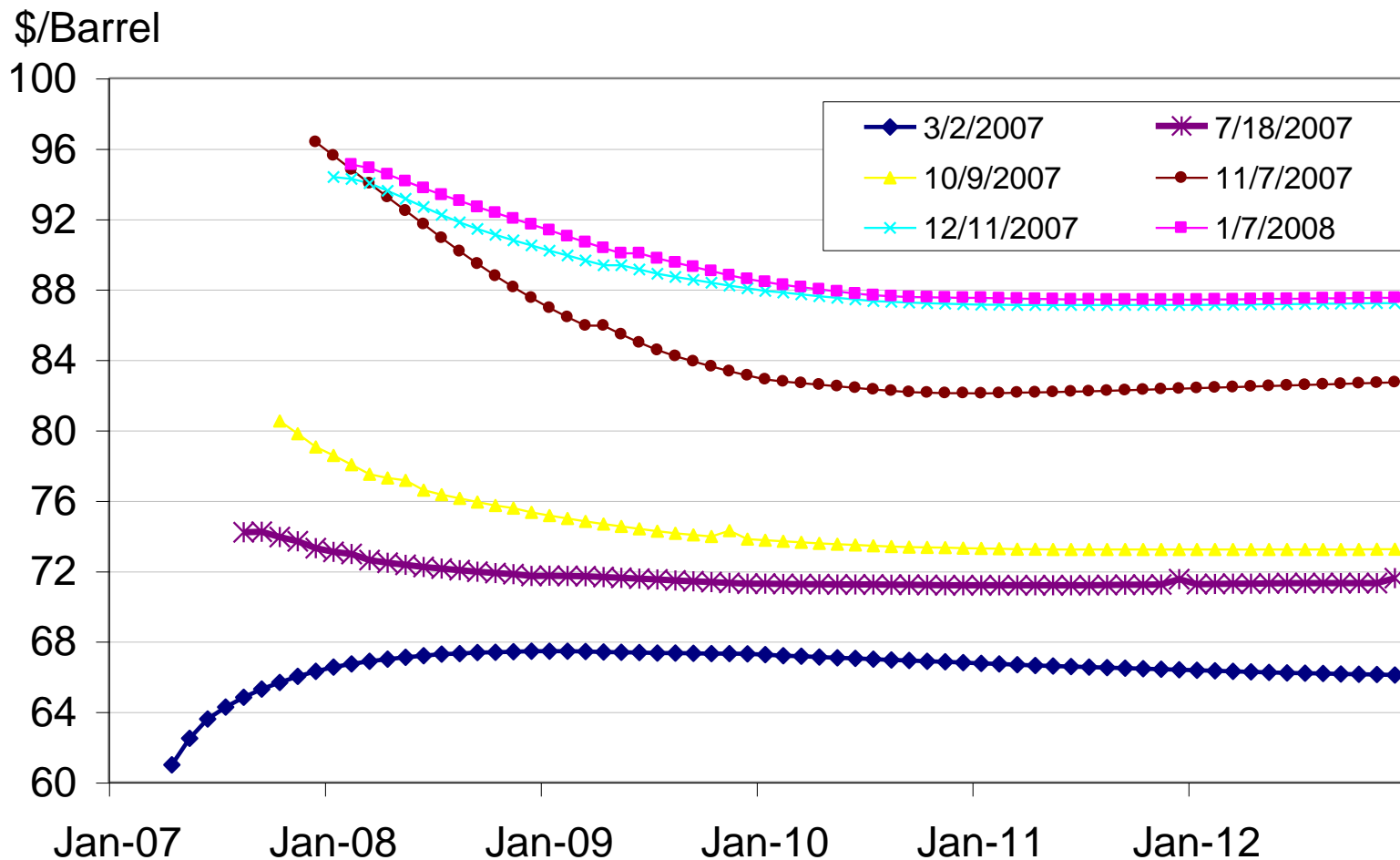
Contract	1/22 Close	ATM Call
	\$/bu	Cents/bu
March	4.89	14.3
May	5.01	27.2
July	5.10	35.5
Sep	5.04	47.6
Dec	5.04	49.7

- Still considerable time value in the deferred
- Could write Puts to pay for the Calls
  - How big will your window be?
  - You MUST manage the long position if the market drops and you are exercised on



# Crude Oil Futures Prices, 2007-2012

## CRUDE OIL FUTURES PRICES, 2007-2012



Source: NYMEX, Light Sweet Crude

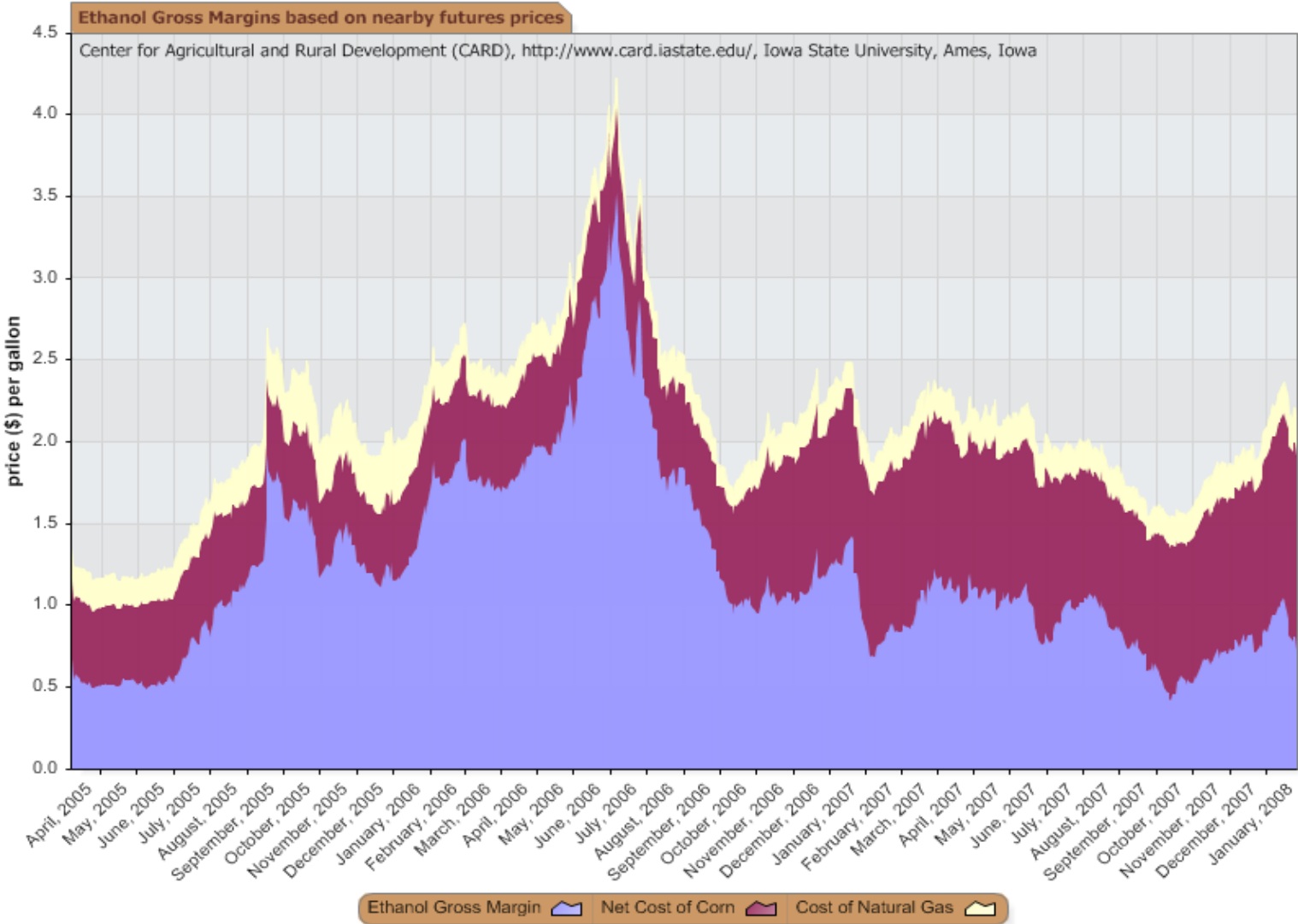
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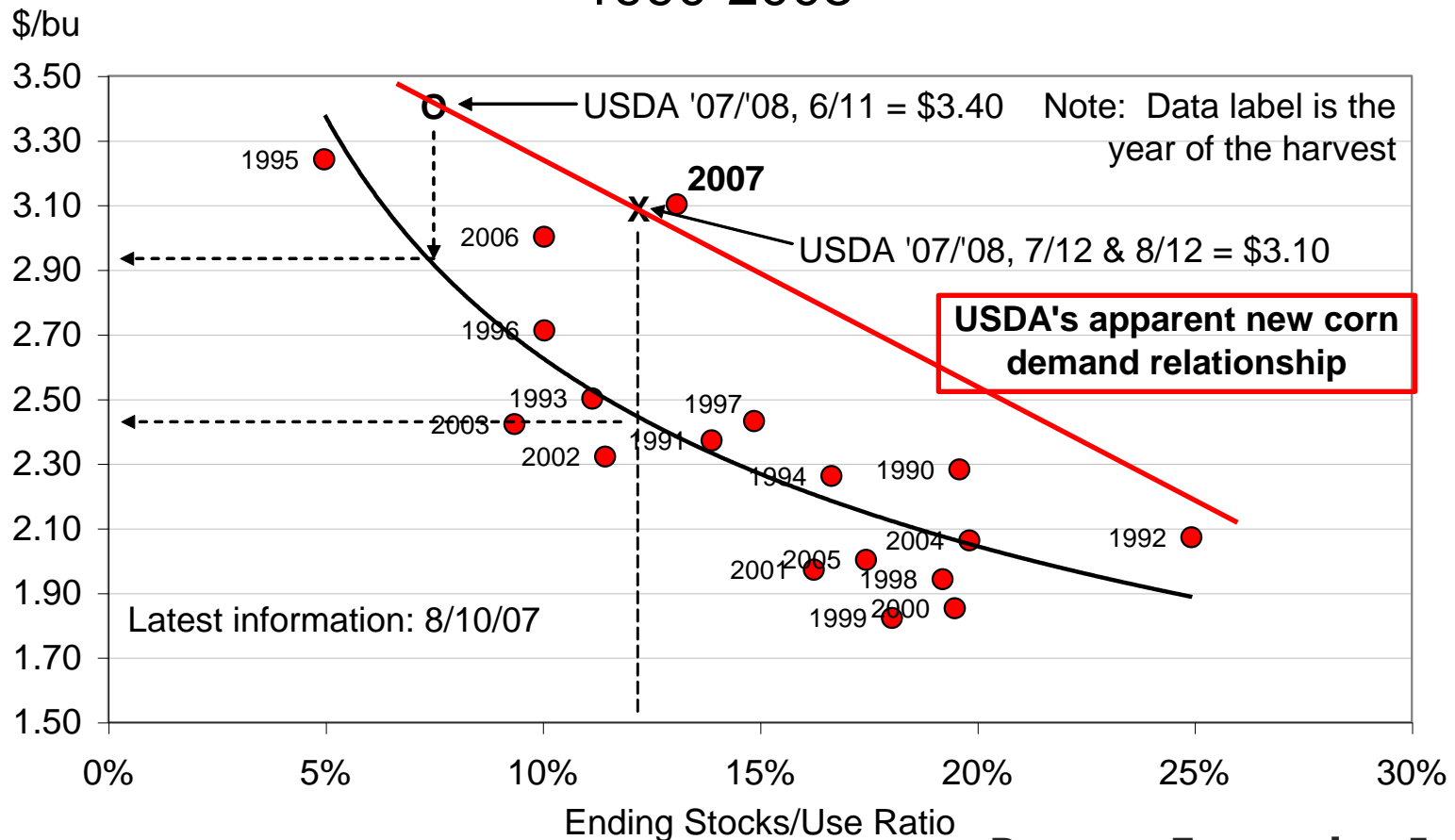
# Ethanol: Profitable again but for how long?



# USDA July forecast: S/U Ratio of 13.1% ...

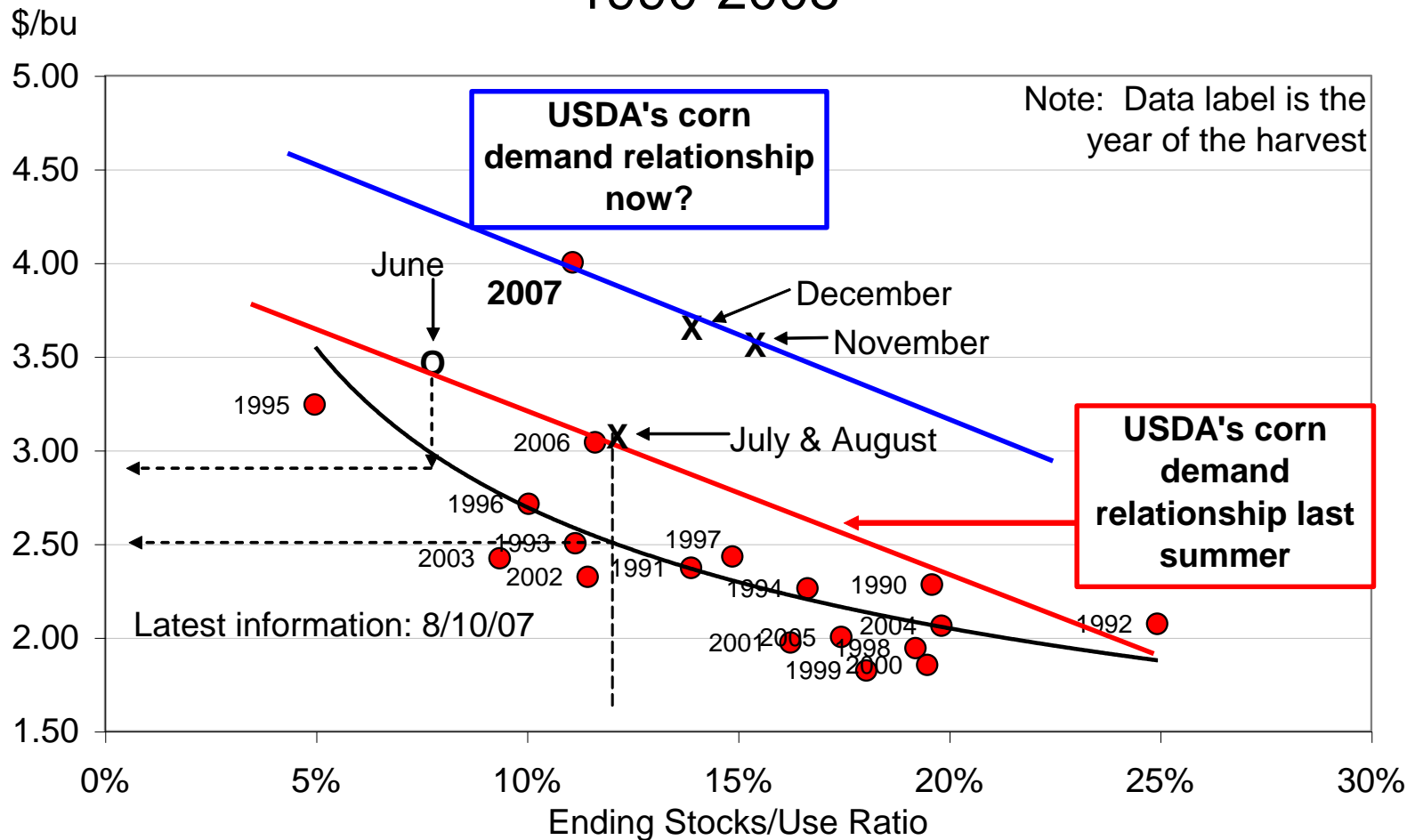
## ...and average farm price of \$2.80-\$3.40

### U.S. CORN PRICE VS. S/U RATIO 1990-2008



# January: 11.1% and \$3.70 - \$4.30!

## U.S. CORN PRICE VS. S/U RATIO 1990-2008



# Keys to prices this year

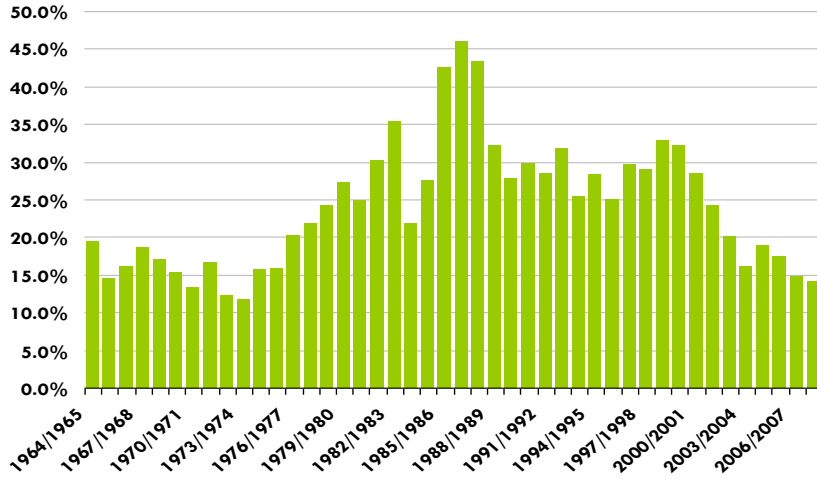
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- South American soybeans
  - Rains delayed planting in some areas
  - Conditions have been good since then, though
  - Brownfield's Peter Shinn last Friday: Brazilian contacts think Brazil's crop could be record large, near 60 million tonnes
- Just who is following whom here?

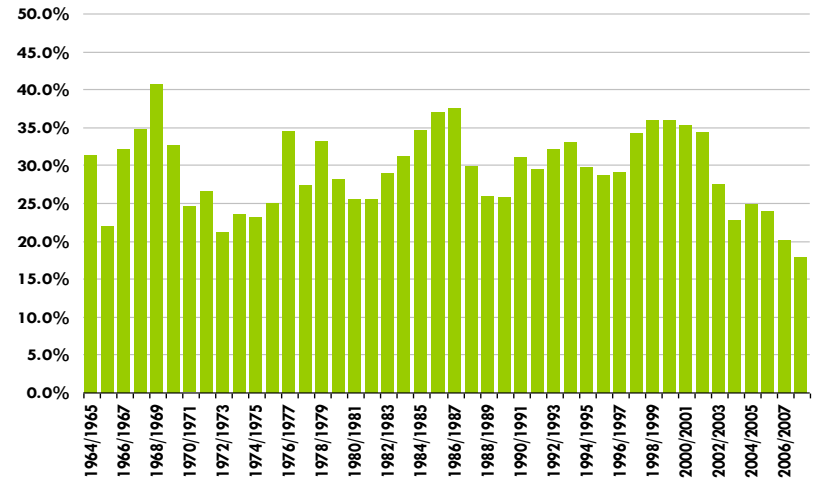


# Tight world supplies of grains and oilseeds

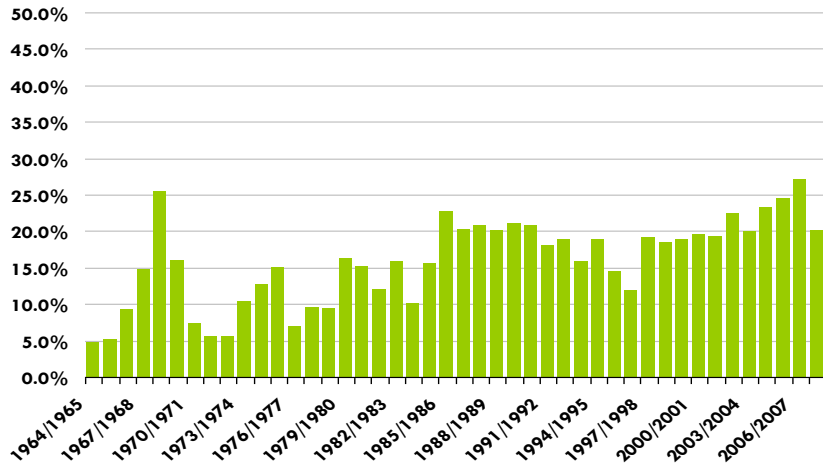
WORLD STOCKS/USE RATIO FOR CORN



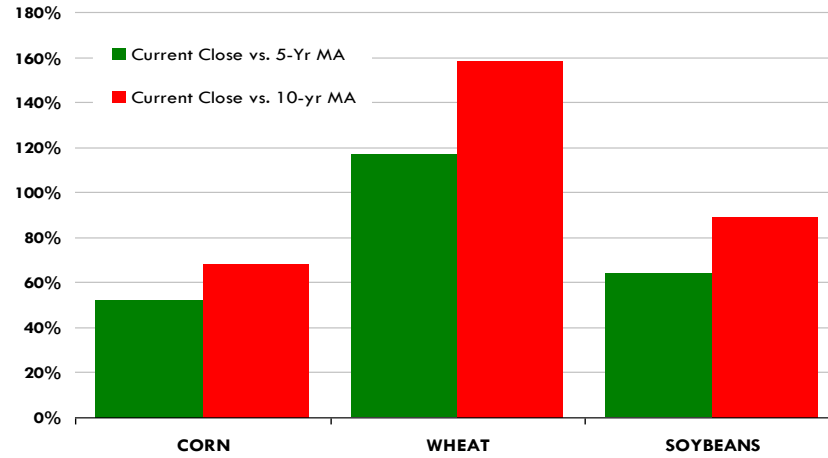
WORLD STOCKS/USE RATIO FOR WHEAT



WORLD STOCKS/USE RATIO FOR SOYBEANS



CURRENT NEARBY FUTURES PRICE VS. 5-YR AND 10-YR MOVING AVG.



# U.S. year-end SB stocks are VERY LOW!

		2005/06	2006/07	2007/08	
		Actual	Actual	USDA, Dec	USDA, Jan
Acres Planted	Mil A	72	75.5	63.7	63.7
Acres Harvested	Mil A	71.3	74.6	62.8	62.8
Yield	Bu/A	43	42.7	41.3	41.2
Beginning Stocks	Mil Bu.	256	449	573	574
Production	Mil Bu.	3063	3188	2594	2585
Imports	Mil Bu.	3	9	6	6
Total Supply	Mil Bu.	3322	3646	3173	3165
Crushings	Mil Bu.	1739	1806	<b>1830</b>	<b>1830</b>
Exports	Mil Bu.	940	1118	<b>995</b>	<b>995</b>
Seed	Mil Bu.	93	78	86	86
Residual	Mil Bu.	101	71	77	79
Total Usage	Mil Bu.	2873	3073	2988	2990
Carryover	Mil Bu.	449	573	185	175
Stocks/Use		15.6%	18.6%	6.2%	5.9%
Nat. Wtd. Avg. Farm Price	\$/Bu.	5.66	6.43	9.25 - 10.25	9.90 - 10.90
Soybean Oil Price	Cents/lb.	23.41	31.02	41.00 - 45.00	45.50 - 49.50
Soybean Meal Price	\$/ton	174.17	205.44	265 - 295	305 - 335

# Keys to price this year

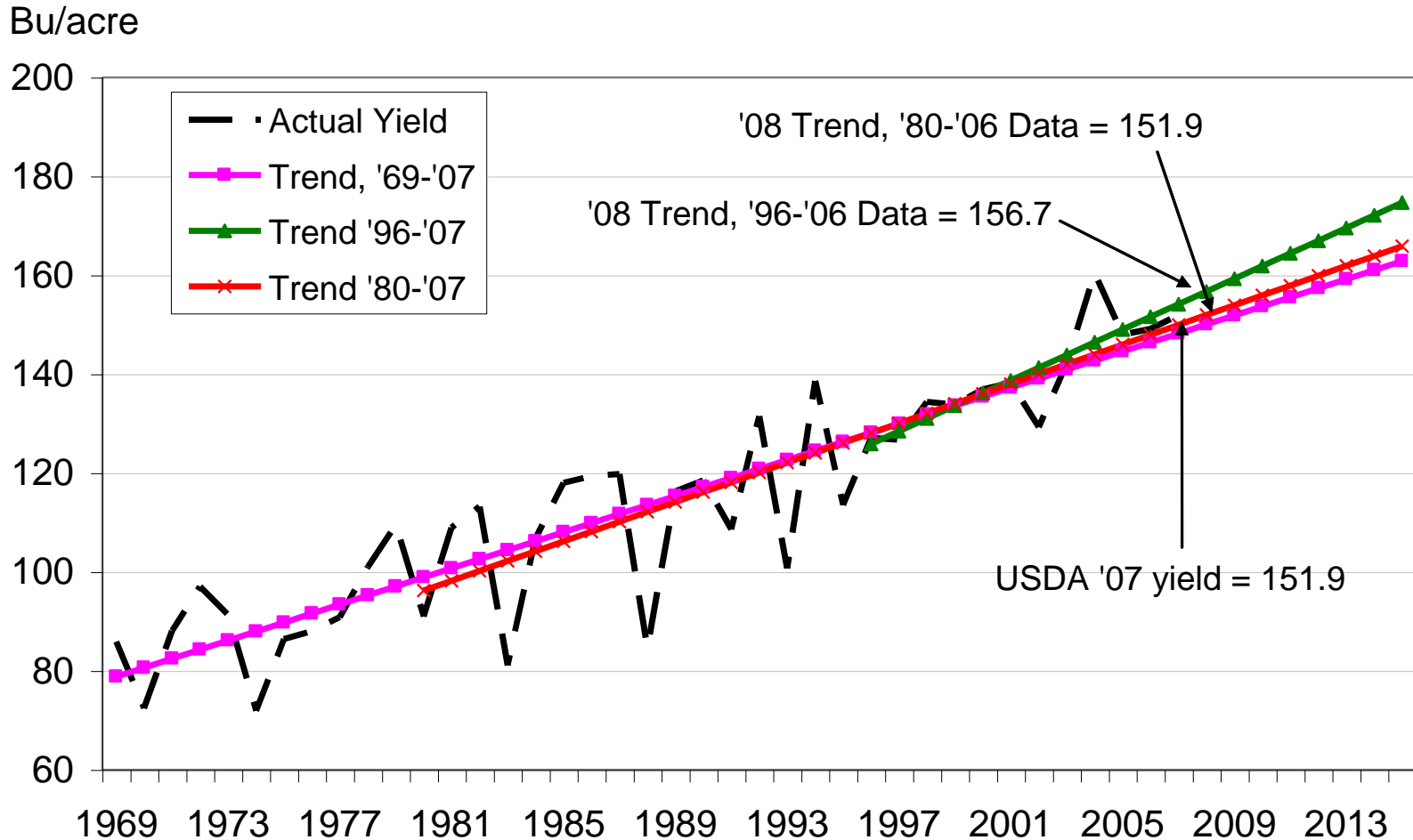
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- South American soybeans
- U.S. corn acres
  - Current futures strength is a ongoing effort to buy acres
  - Even 87 mil. doesn't appear to be enough!
- U.S. corn yields



# Which trend do you use?

## ACTUAL & PROJECTED CORN YIELDS





# Keys to price this year

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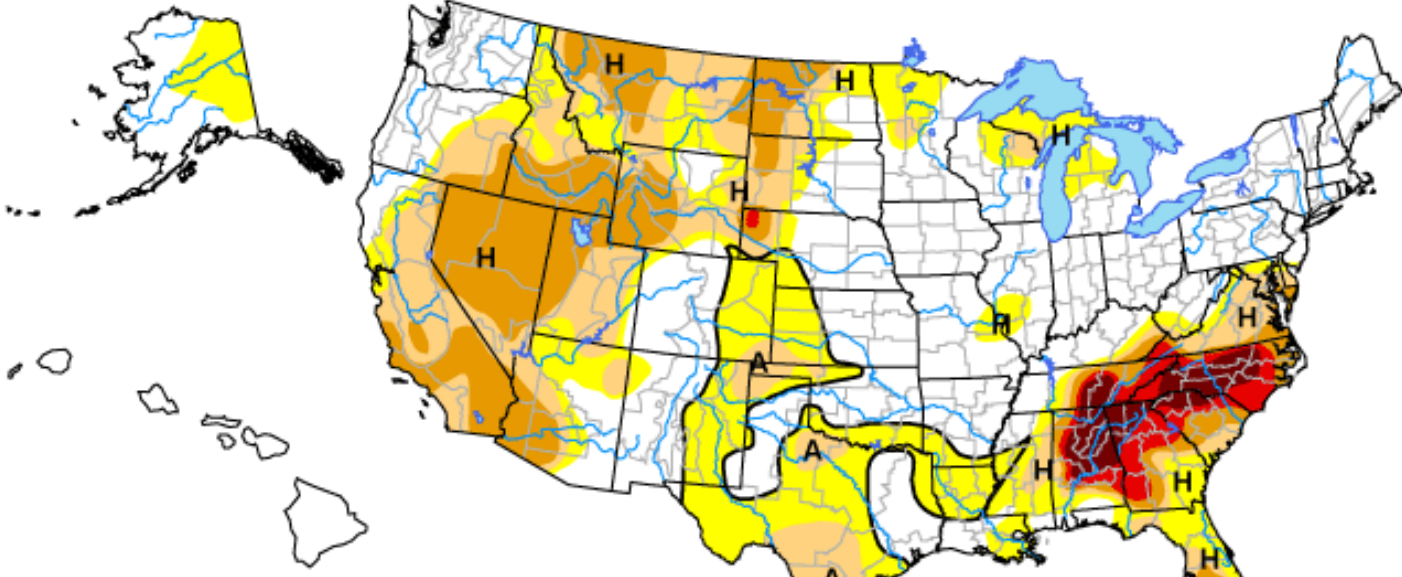
- South American soybeans
- U.S. corn acres
  - Current futures strength is a ongoing effort to buy acres
  - Even 87 mil. doesn't appear to be enough!
- U.S. corn yields
  - Which trend? – I choose the '80-'07
  - Weather?



# Okay here for now – but look at the Southeast

## U.S. Drought Monitor

January 15, 2008  
Valid 7 a.m. EST



- Intensity:**
- Yellow: D0 Abnormally Dry
  - Light Orange: D1 Drought - Moderate
  - Orange: D2 Drought - Severe
  - Red-Orange: D3 Drought - Extreme
  - Dark Red: D4 Drought - Exceptional

- Drought Impact Types:**
- ~ Delineates dominant impacts
  - A = Agricultural (crops, pastures, grasslands)
  - H = Hydrological (water)

The Drought Monitor focuses on broad-scale conditions. Local conditions may vary. See accompanying text summary for forecast statements.

<http://drought.unl.edu/dm>



Released Thursday, January 17, 2008  
Author: Rich Tinker, Climate Prediction Center, NOAA

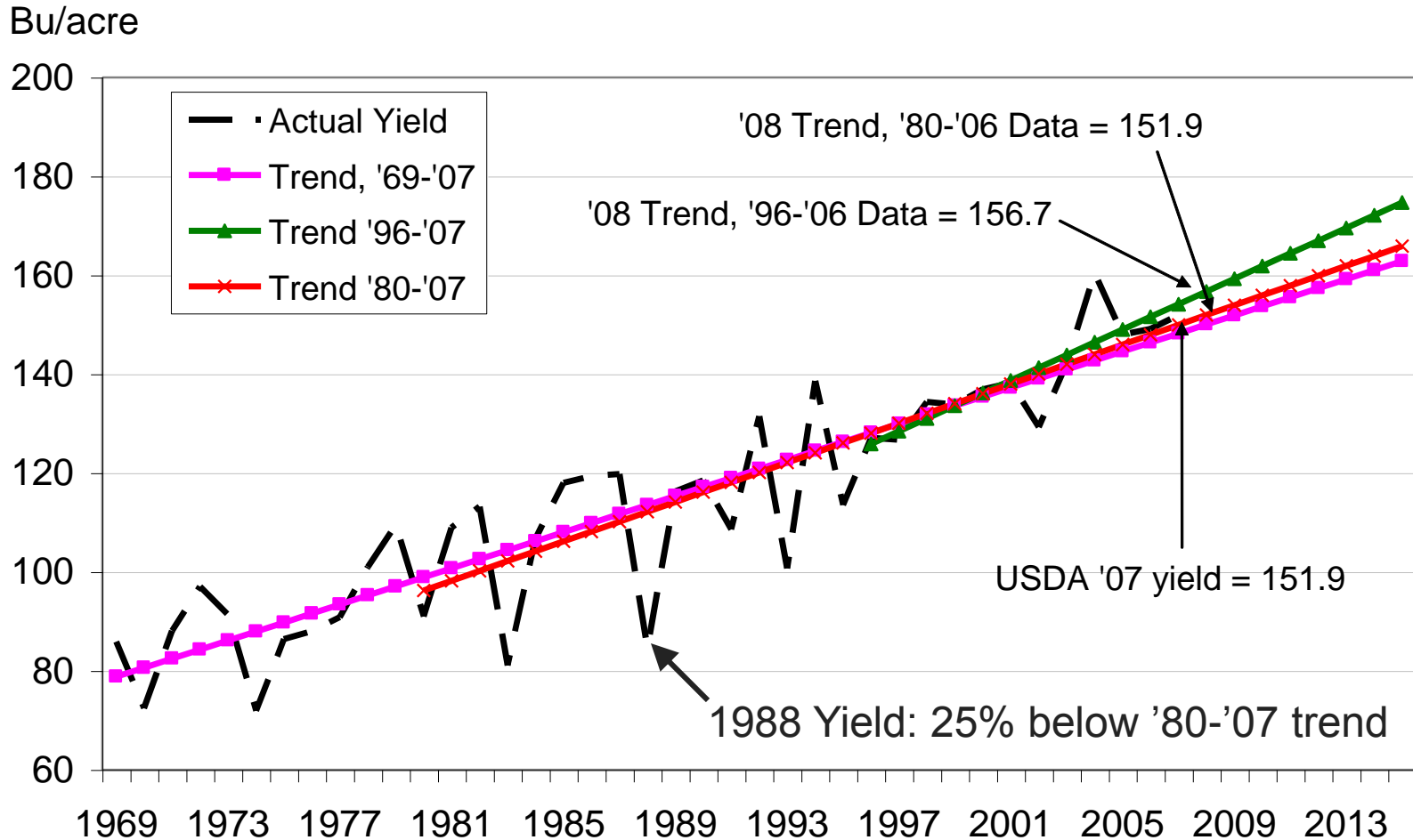
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# And our last widespread drought? 1988

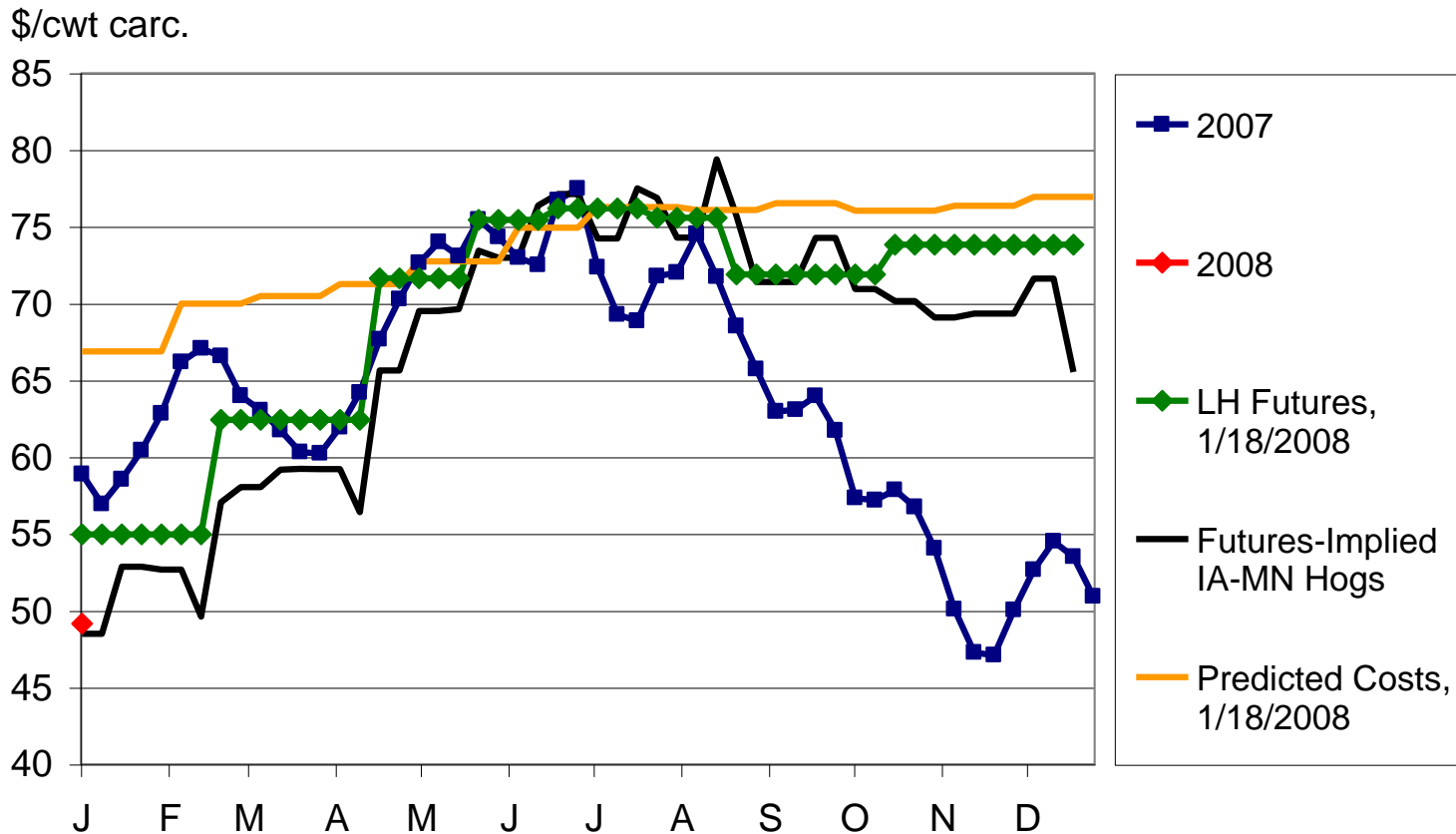
## ACTUAL & PROJECTED CORN YIELDS



# \$70/cwt may be “low” for costs

## ... Where will hog prices go?

### HOG PRICES -- CASH, FUTURES & FUTURES-IMPLIED CASH



# The Profit Challenge – You actually do this!

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- Profit =  $P_H \cdot q_H - \sum P_{x_i} \cdot x_i - FC$
- You determine: Amounts of the  $x_i$ 's (inputs) you use to produce your output ( $q_H$ )
- Market determines  $P_H$  and  $P_{x_i}$  based on everyone's collective decisions
- $P_H = f(P_{p-us}, C_{packers})$
- $P_{p-us} = g(Q_{p-us}, Q_{p-exp}, P_B, P_C, Inc, T\&P)$
- $Q_{p-us} = h(P_C, P_{SBM}, P_{Inputs}, Technology) + i \cdot Q_{p-Canada}$



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# Questions & Discussion?

**National Hog Farmers'  
North American Preview**

**[www.nationalhogfarmer.com](http://www.nationalhogfarmer.com)**

**CME's Daily Livestock Report**  
**[www.dailylivestockreport.com](http://www.dailylivestockreport.com)**

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