Managing Your Farm in Challenging Times

Chris Hurt, Professor, Department of Agricultural Economics

Craig Dobbins, Professor, Department of Agricultural Economics

Michael Langemeier, Associate Director, Center for Commercial Agriculture

James Mintert, Director, Center for Commercial Agriculture

PURDUE UNIVERSITY | Center for Commercial Agriculture

August 22, 2018

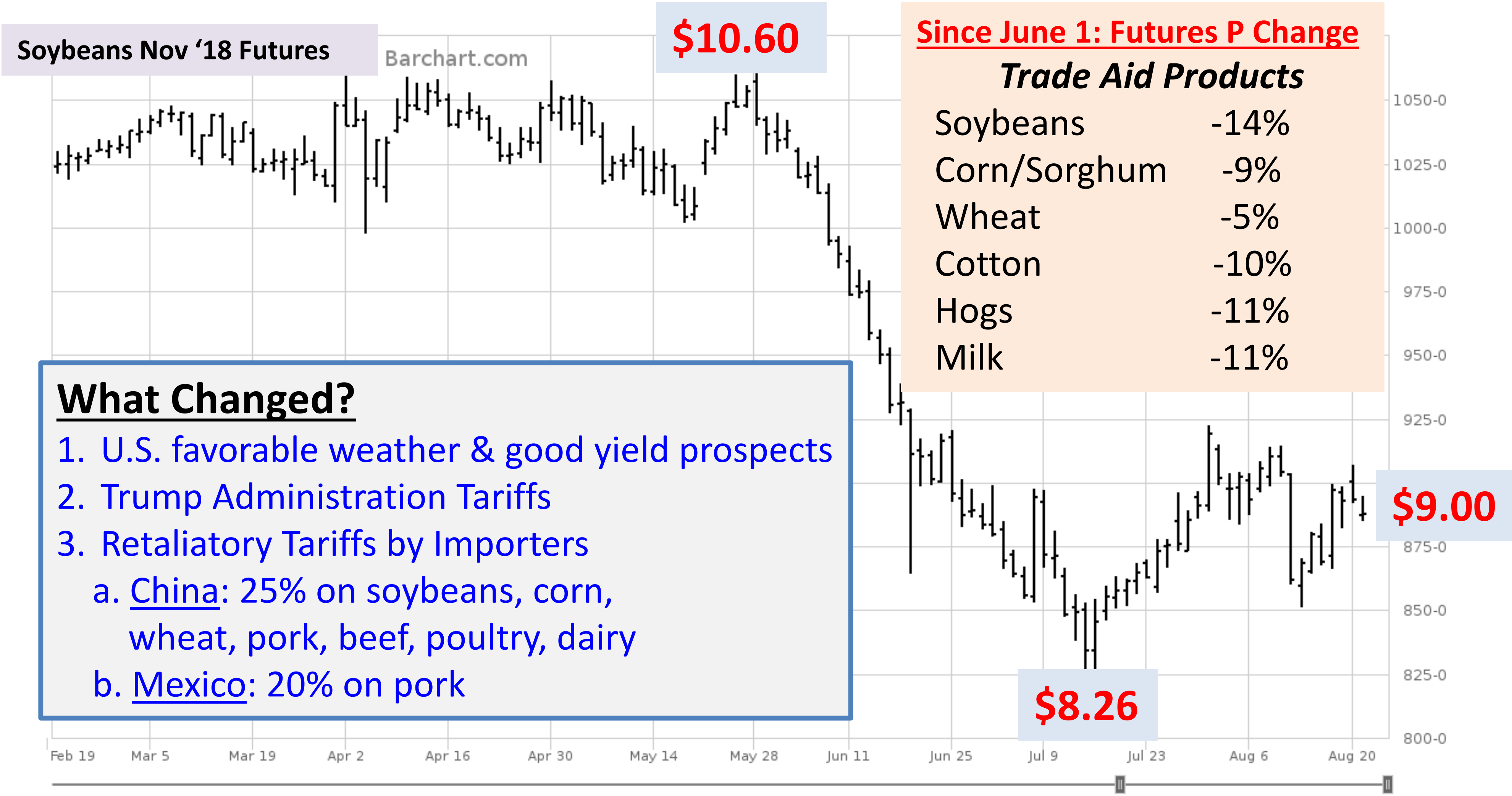
Spring 2018: Ag Emerging from Financial Darkness

Weak Grain & Soybean Prices and Incomes from 2014 to 2017

But In Spring 2018 Optimism Returned – "Ag Was Turning the Corner"

Reasons for optimism in Spring 2018

1. **Declining grain inventories**
2. **Strong U.S. economic growth**
3. **Strong world economic growth**
4. **Result: Strong new crop cash bids: $10 soybeans and $4 corn**



Since June 1: Futures P Change

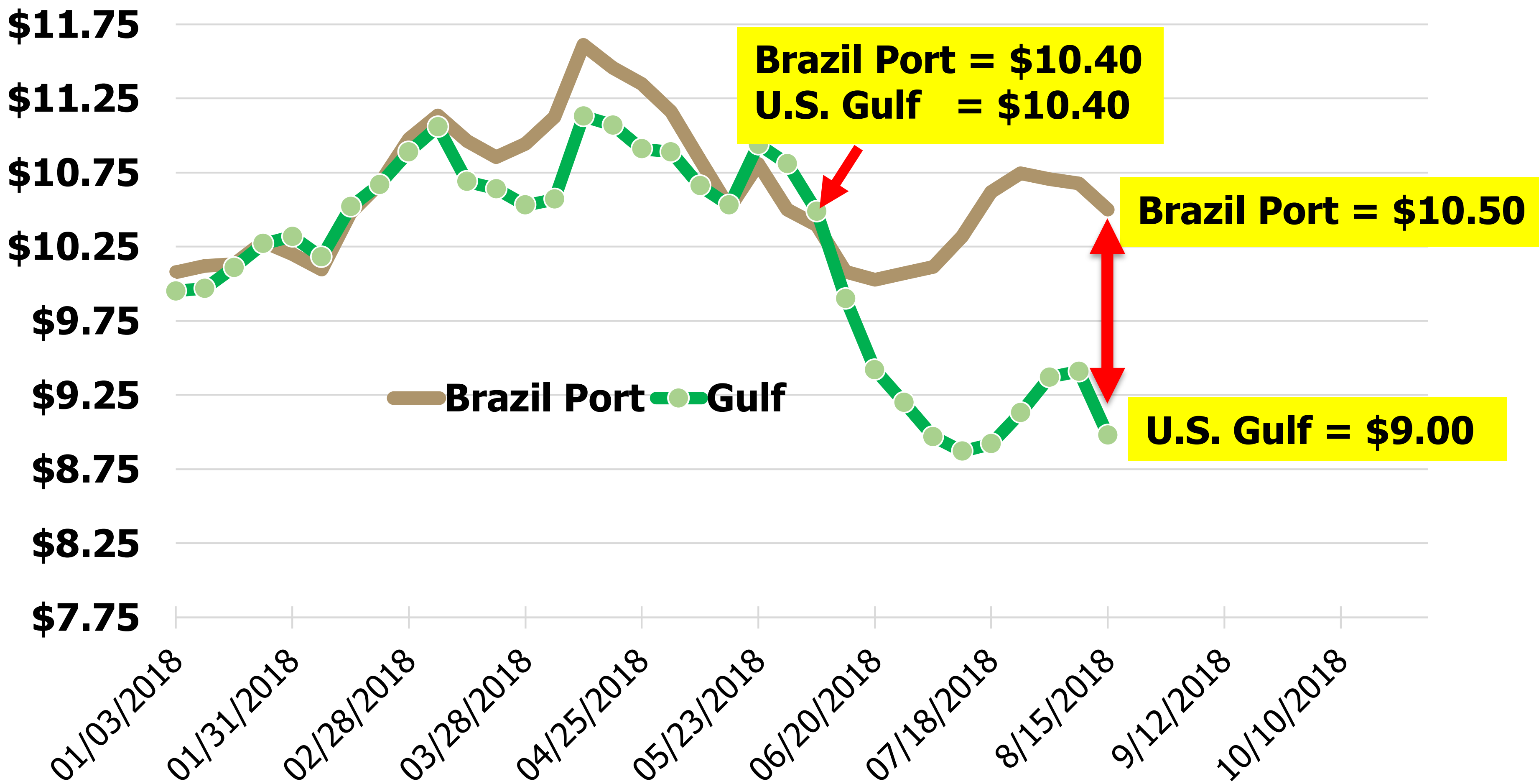
Trade Aid Products

Soybeans	-14%
Corn/Sorghum	-9%
Wheat	-5%
Cotton	-10%
Hogs	-11%
Milk	-11%

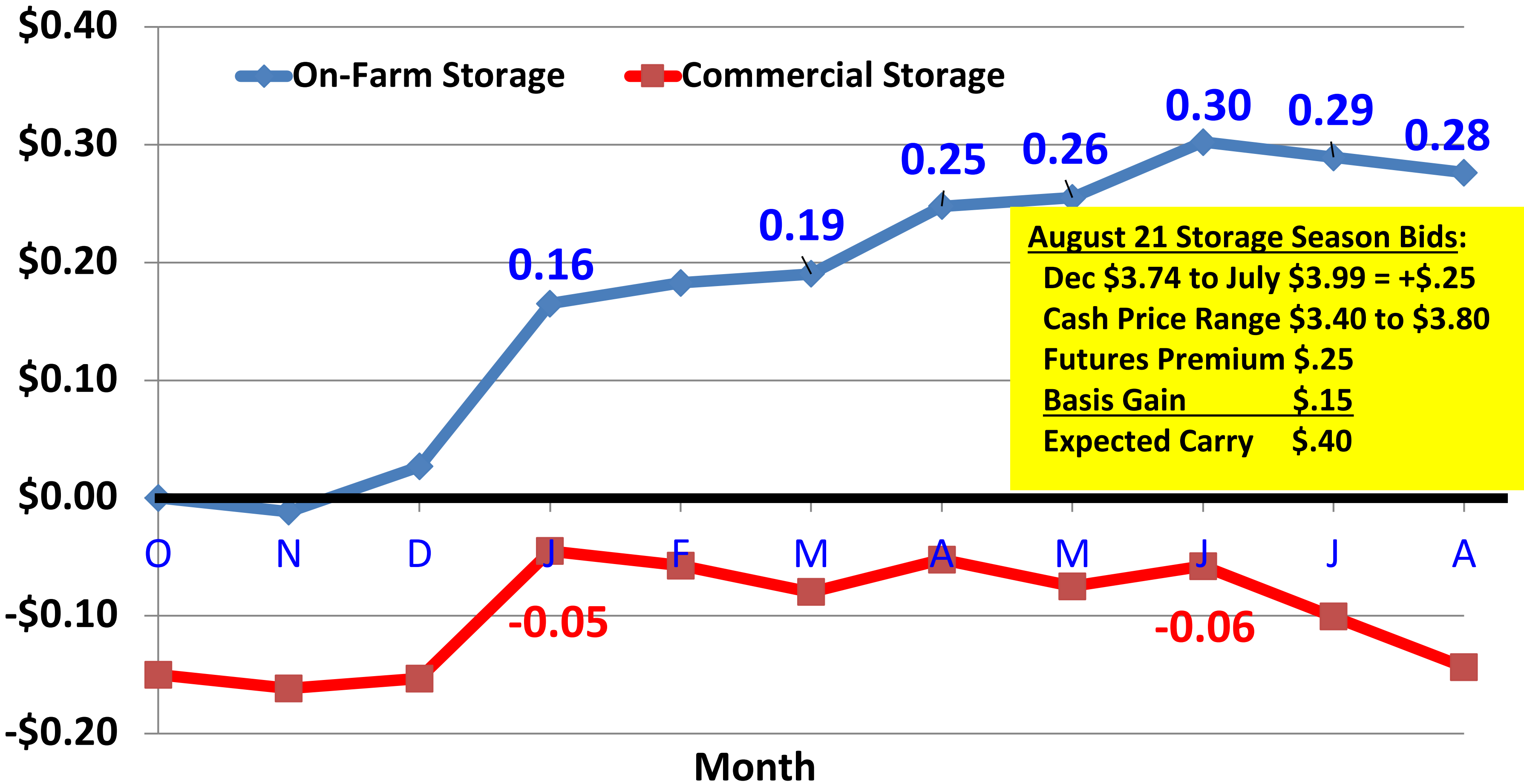
What Changed?

1. U.S. favorable weather & good yield prospects
2. Trump Administration Tariffs
3. Retaliatory Tariffs by Importers
   a. China: 25% on soybeans, corn, wheat, pork, beef, poultry, dairy
   b. Mexico: 20% on pork

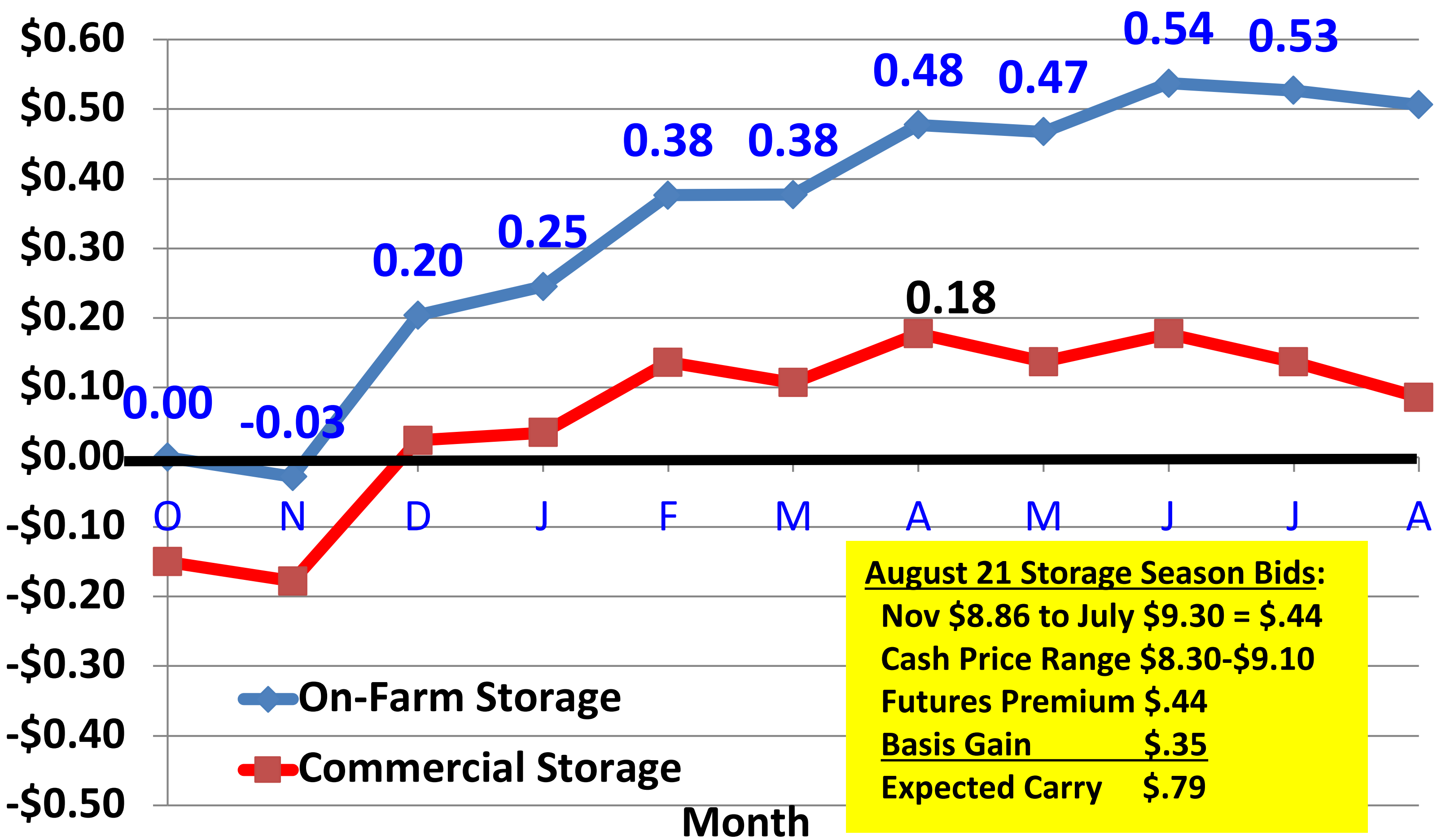
Soybean Prices, Brazil Port vs. U.S. Gulf



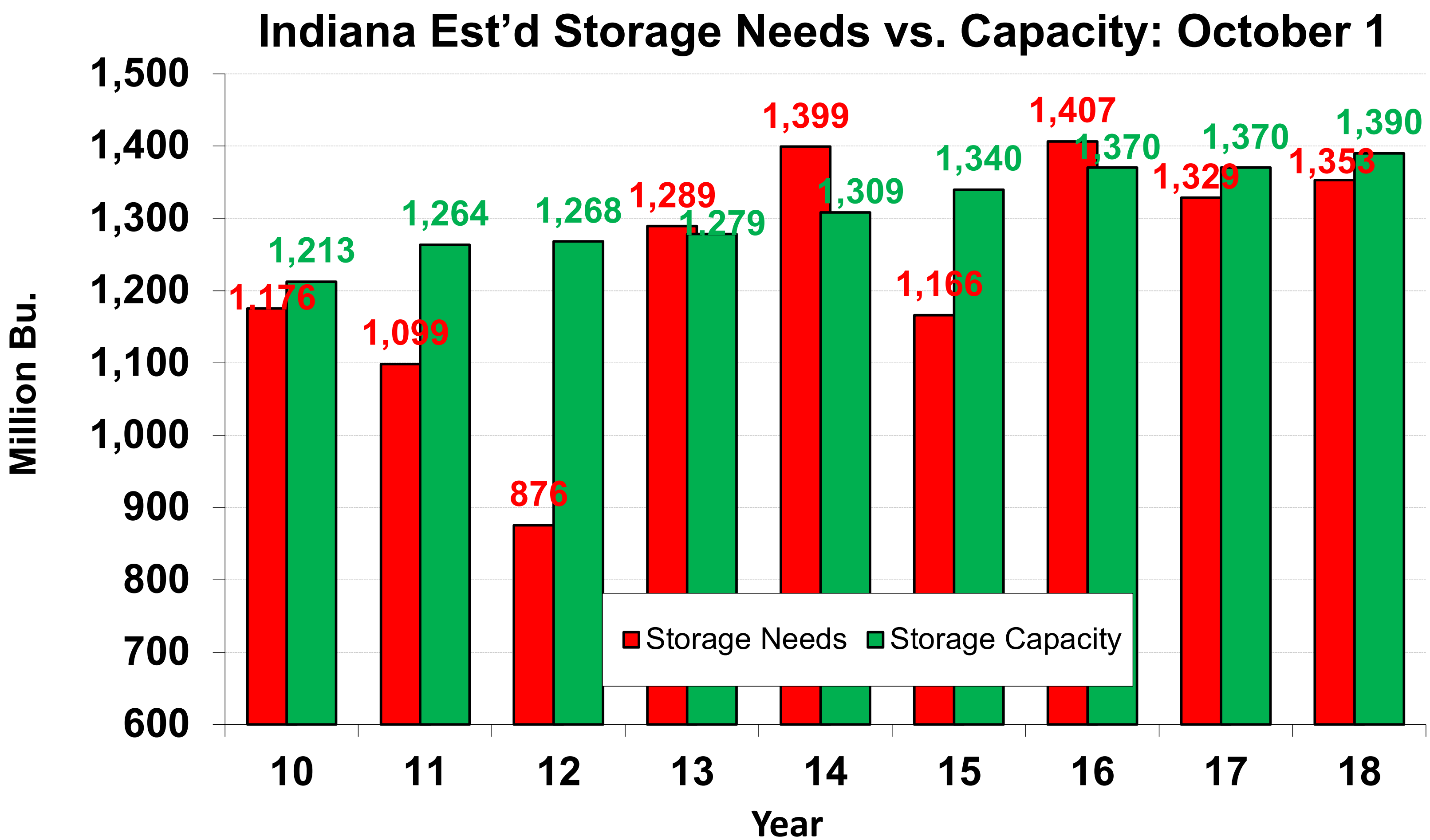
Estimated 2018 Crop Net Corn Storage Returns



Estimated 2018 Crop Net Soybean Storage Returns



Purdue Center for Commercial Agriculture *Managing Your Farm in Challenging Times* Webinar, August 22, 2018


Indiana Est'd Storage Needs vs. Capacity: October 1
1,500
1,400
1,300
1,200
1,100
1,000
900
800
700
600
Million Bu.
1,176
1,213
1,099
1,264
876
1,268
1,289
1,279
1,399
1,309
1,166
1,340
1,407
1,370
1,329
1,370
1,353
1,390
10
11
12
13
14
15
16
17
18
Year
Storage Needs
Storage Capacity

Corn:

Current storage season bids $3.40 to $3.80

Tightening inventories and strong demand give $.20+ upside

Tariff's settlement would add more—Maybe $.25+

Storage season range $3.40 to $4.25

Store On-Farm Unpriced

Do not store commercial-Buy Futures or Calls

Soybeans:

Current storage season bids $8.30-$9.10

Record U.S. crop & Big South American increase ahead

Huge inventories in U.S. & World gives $.40 lower prices

No settlement of trade conflicts, range of $7.90 to $8.70

Settlement of trade conflicts could add $1.25 to $1.50

Then storage season bids would range from $7.90 to $9.95

Store on-farm and commercial unpriced

Store on-farm and commercial priced

Tariff Outlook:

Mexico and U.S.---August

Canada HOPE for Sept.

China:

-Lower level talks-August

-High level talks in November

Possible Bullish Outcome-

China Buys More Ag products

Indiana Farmland Values
2018 Survey Results, State Averages

Land Quality	Yield (Bu./A)	Value ($/A)		Percent Change
		2017	2018	
Top	204	$8,529	$8,668	1.6%
Average	173	$6,928	$7,072	2.1%
Poor	141	$5,280	$5,407	2.4%

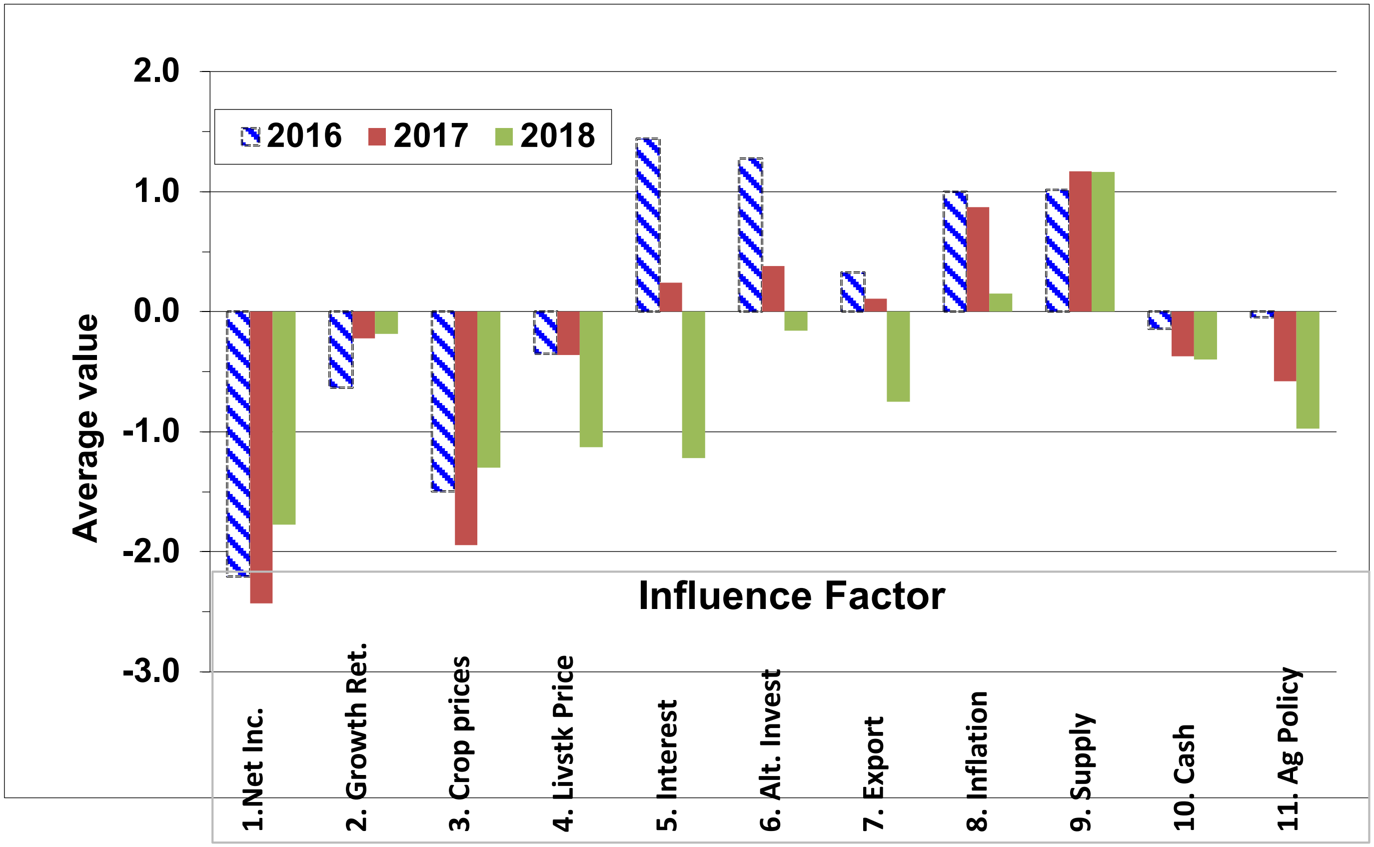
2017/18 Six-Month Land Value Changes

Land Quality	6/2017 – 12/2017	12/2017– 6/2018
Top	1.7%	-0.1%
Average	2.5%	-0.4%
Poor	3.1%	-0.7%

Land Value Change
Actual and Forecast

Land Quality	Actual 12/2017 – 6/2018	Forecast 6/2018– 12/2018
Top	-0.1%	-0.7%
Average	-0.4%	-0.9%
Poor	-0.7%	-0.7%

Survey Respondents View of Land Value Drivers



Indiana Cash Rental Rates
2018 Survey Results, State Averages

Land Quality	Yield (Bu./A)	Value ($/A)		Percent Change
		2017	2018	
Top	204	$253	$261	3.2%
Average	173	$205	$210	2.4%
Poor	141	$163	$168	3.1%

Short–Term Expectations

Cash Rent Projections for 2019

Change	% Respondents	Average % Change
Higher	22%	6.8%
No Change	51%	0.0%
Lower	27%	-6.4%

5-Year Forecast By Survey Respondents

Where do you expect farmland prices to be in 5 years?

Direction	% Respondents	Change
Increase	52%	6.8%
No change	30%	0.0%
Decrease	18%	-9.0%

82%

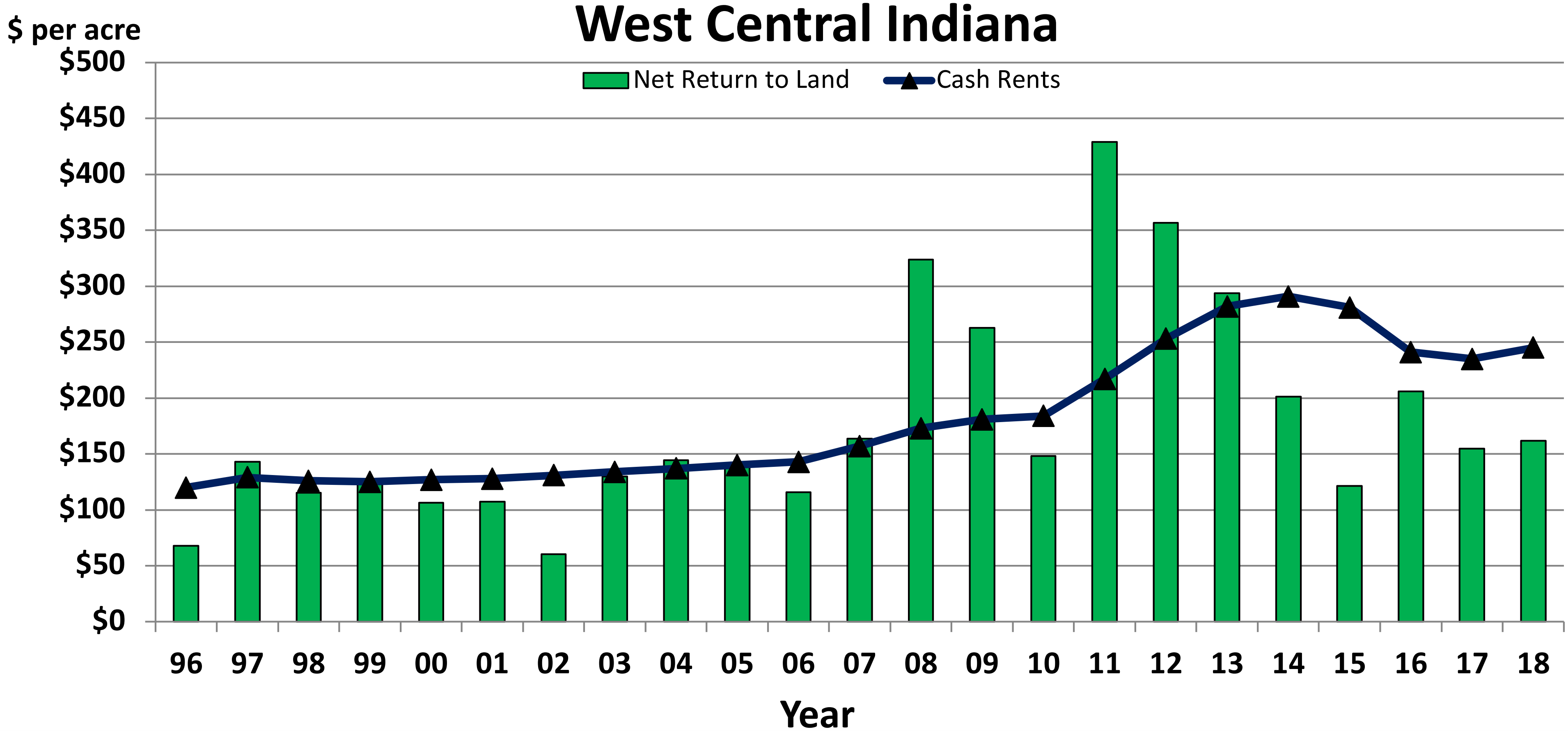
48%

Net Returns to Land and Cash Rental Rates

- Net returns to land are more variable than cash rents
- Though more variable, net returns to land still have a significant impact on cash rents
- Factors Impacting Net Returns to Land
  - Crop Yields
  - Crop Prices
  - ARC-CO / PLC Payments
  - Economic Loss from Trade Payments
  - Production Costs
- Cash rents also depends on lagged cash rent and liquidity considerations

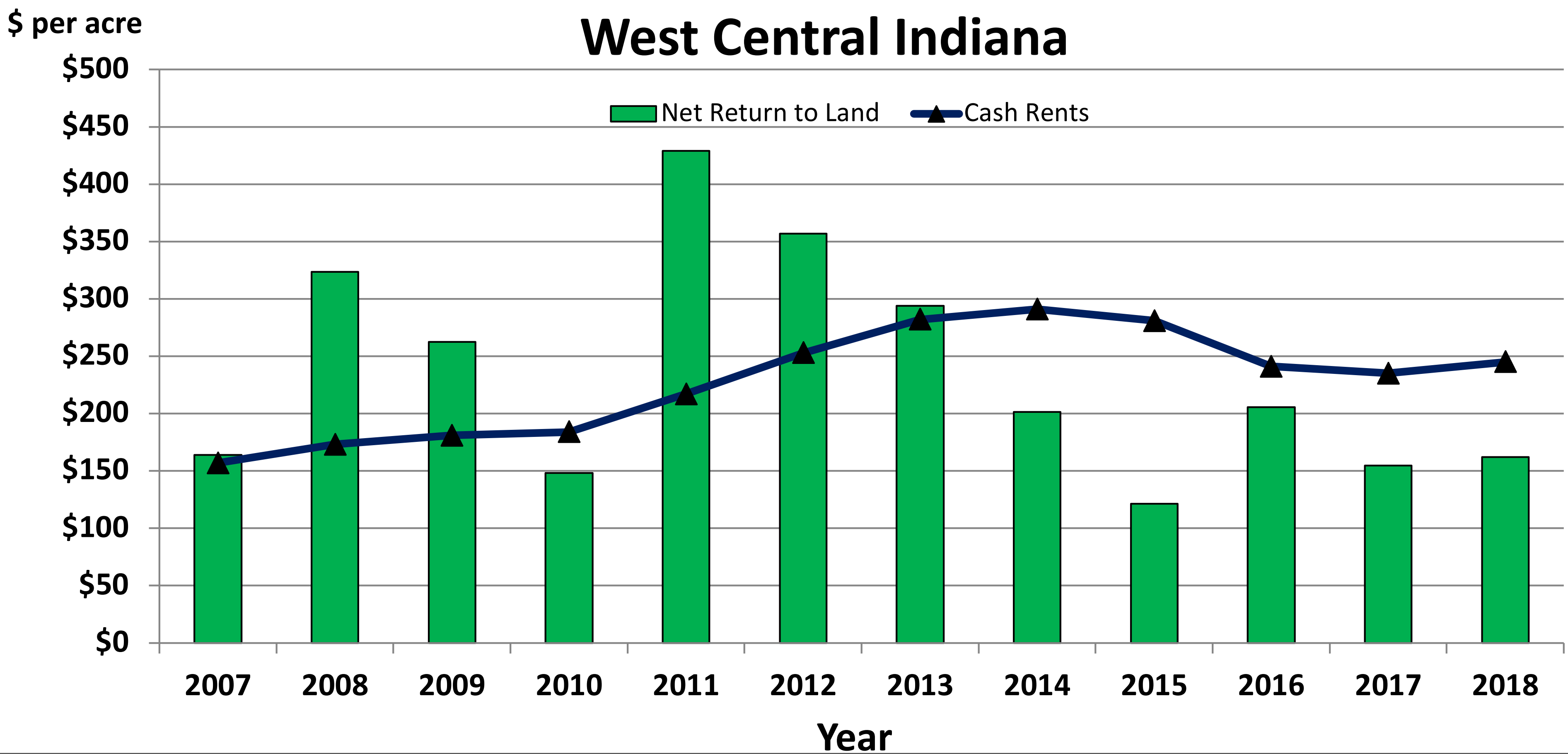
Cash Rental Rates and Est'd Net Returns to Land

West Central Indiana

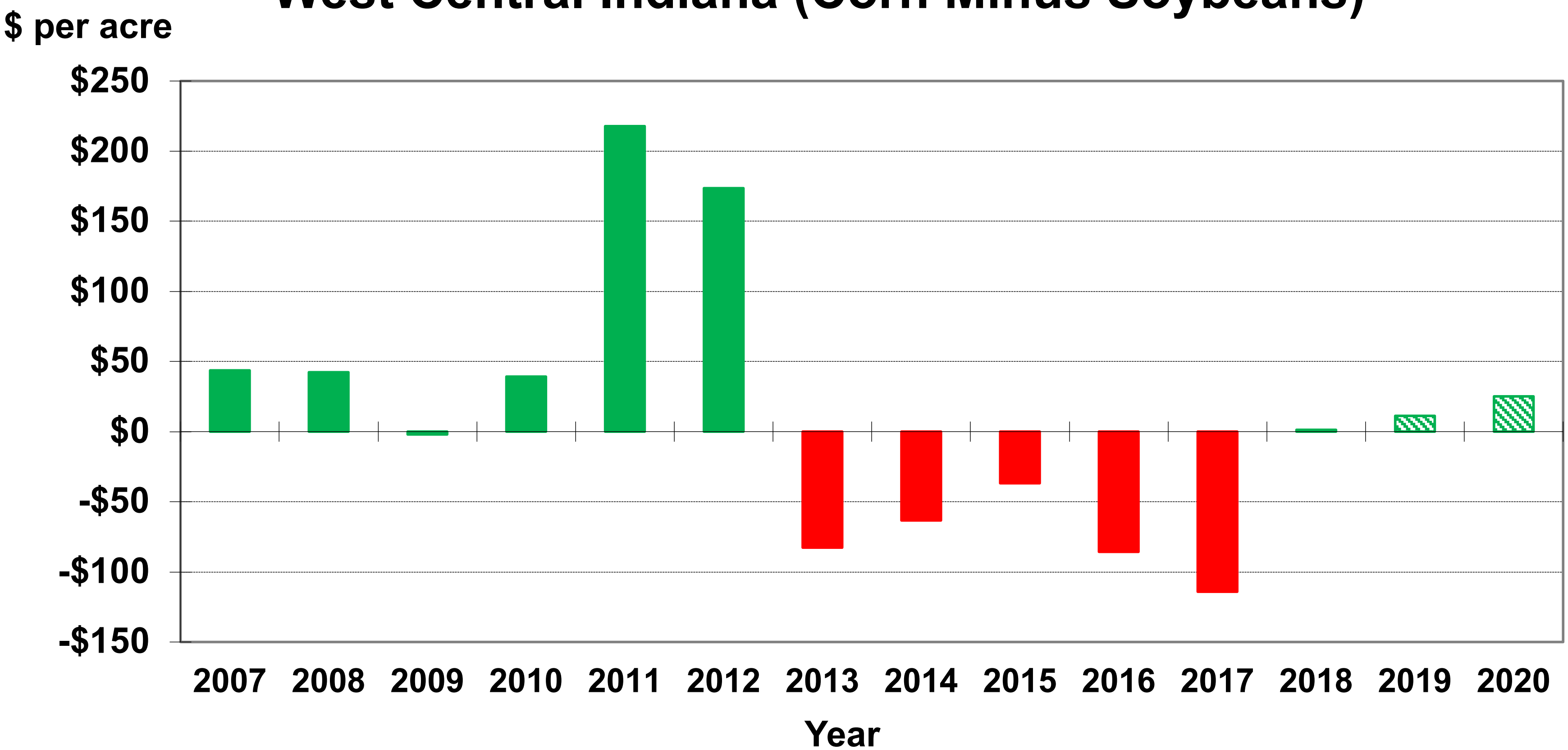


Cash Rental Rates and Est'd Net Returns to Land

West Central Indiana



Difference in Earnings per Acre
West Central Indiana (Corn Minus Soybeans)



Possible Cash Rent Adjustments 2019 and Beyond

Scenario	Corn Price	Soybean Price	Short-Term Impact (2019)	Long-Term Impact (Multi-Year)
#1	$3.25	$8.00	-3.8%	-23.1%
	$3.50	$8.50	-2.1%	-13.1%
#3	$3.75	$9.00	-0.5%	-3.1%

Consider moving to a Flexible Cash Lease based upon revenues

For a detailed version of the Purdue Land Values Survey, go to
purdue.edu/commercialag
Under Resources tab, select "Purdue Agricultural Economics Report"

Next Webinar:
September 13, Fall 2018 Crop Outlook

PURDUE UNIVERSITY | Center for Commercial Agriculture

August 22, 2018