

The Agricultural Act of 2014: Update on STAX, SCO & Farm Bill Implementation

**West Region
December 2014**



2014 Farm Bill

- Fundamental changes in cotton's safety net
 - DP and CCP programs discontinued
- Greater reliance on crop insurance products
- Maintains marketing loan
- Across commodities, growers faced with new program choices
- Targeted for phase-in over '14 and '15 crops
- Unless otherwise noted, sequestration applies to FSA programs but not crop insurance

2014 Cotton Transition Assistance

- New insurance products available in 2015
- Transition program for cotton for the 2014 crop
 - Equates to 5.4 cents/lb. on all 2013 base acres and DP yield;
- Subject to separate limit of \$40k/legal entity
- Eligibility not affected by other program choices or planting decisions
- Payments occur on/after Oct 1, 2014

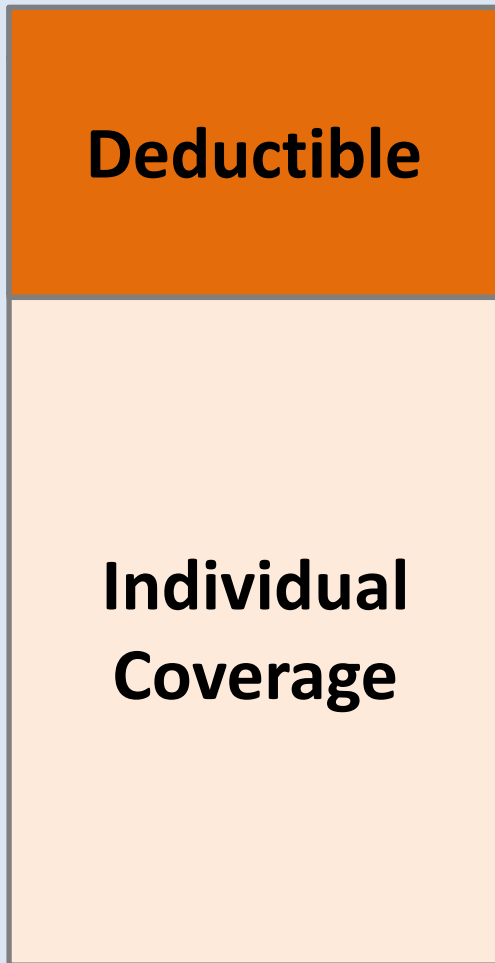
Basic STAX Concept

Stacked Income Protection Plan

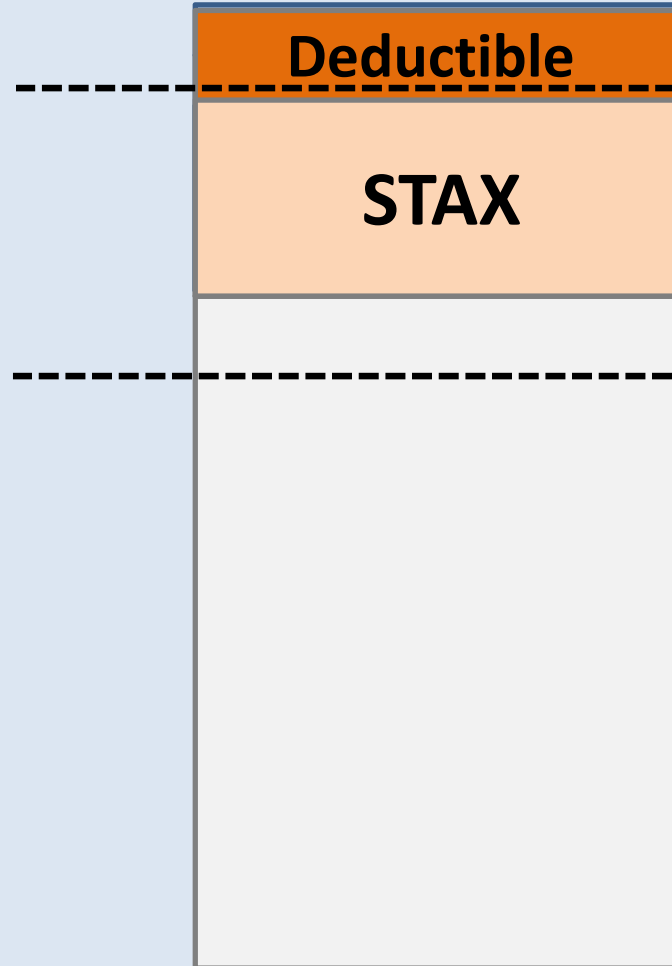
- STAX – new revenue insurance product available in 2015 for purchase on all acres planted to upland cotton; administered by USDA's RMA
- Indemnities triggered by revenue experience at county level (or combined counties if necessary for actuarially sound product); STAX indemnities **NOT** based on individual experience
- Offered by irrigated/non-irrigated practice to greatest extent possible

Basic STAX Concept

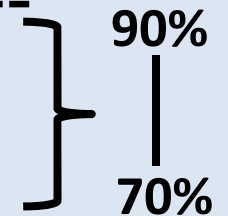
Individual Revenue



County Revenue



County Revenue > 90%, then no STAX indemnity



County Revenue at or below 70%, STAX indemnity at max

Basic STAX Calculations

Description		Example
Expected County Revenue = Insurance Projected Price x Expected County Yield	Insurance Projected Price	\$0.65
	Expected County Yield	1,000 lbs
	Expected County Revenue	\$650
Actual County Revenue = Insurance Harvest Price x Actual County Yield	Insurance Harvest Price	\$0.60
	Actual County Yield	850 lbs
	Actual County Revenue	\$510
Indemnity is lesser of amount that 90% of Expected County Revenue exceeds Actual County Revenue or 20% of Expected County Revenue	90% of Exp. County Revenue	\$585
	20% of Exp. County Revenue	\$135
	Indemnity	\$75

STAX Availability

Availability of STAX

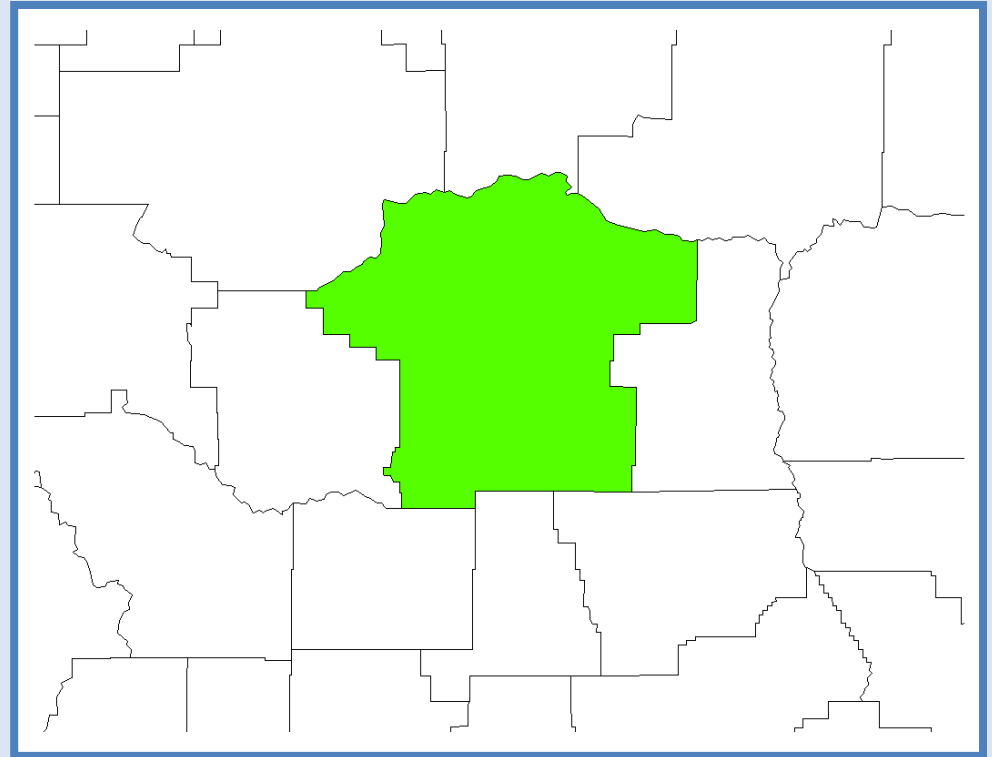
- STAX will be offered in all counties in which underlying cotton crop insurance products are offered – includes more than 700 counties
- Offer at a county-level to the greatest extent possible
- If county does not have enough acres & producers for actuarial soundness, then counties will be combined.

Stand-alone or Primary County

County has (by practice)

- ✓ 10+ years of history
- ✓ 10,000+ acres in past 5 years
- ✓ 20+ producers in past 5 years

- Actuarial offer will include yield history and final yield of only that county (by practice)
- Some room for judgment for counties that miss criteria by a small amount
- Accounts for 80% of acres



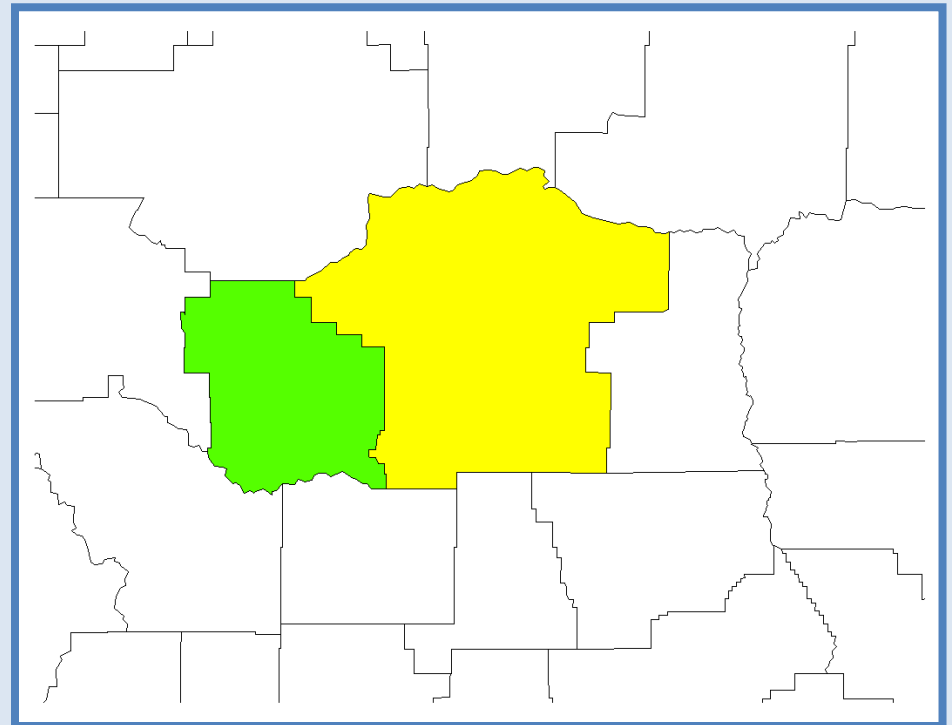
Two County Group (or Proxy County)

County missing one (+) criteria and:

- ✓ Is adjacent to a stand-alone
- Actuarial offer will include yield history and final yield of that county and the adjacent county
- If more than one adjacent county qualifies one is picked considering:
 - A. Yield correlation
 - B. Acreage of stand-alone county

Primary county continues to stand on its own.

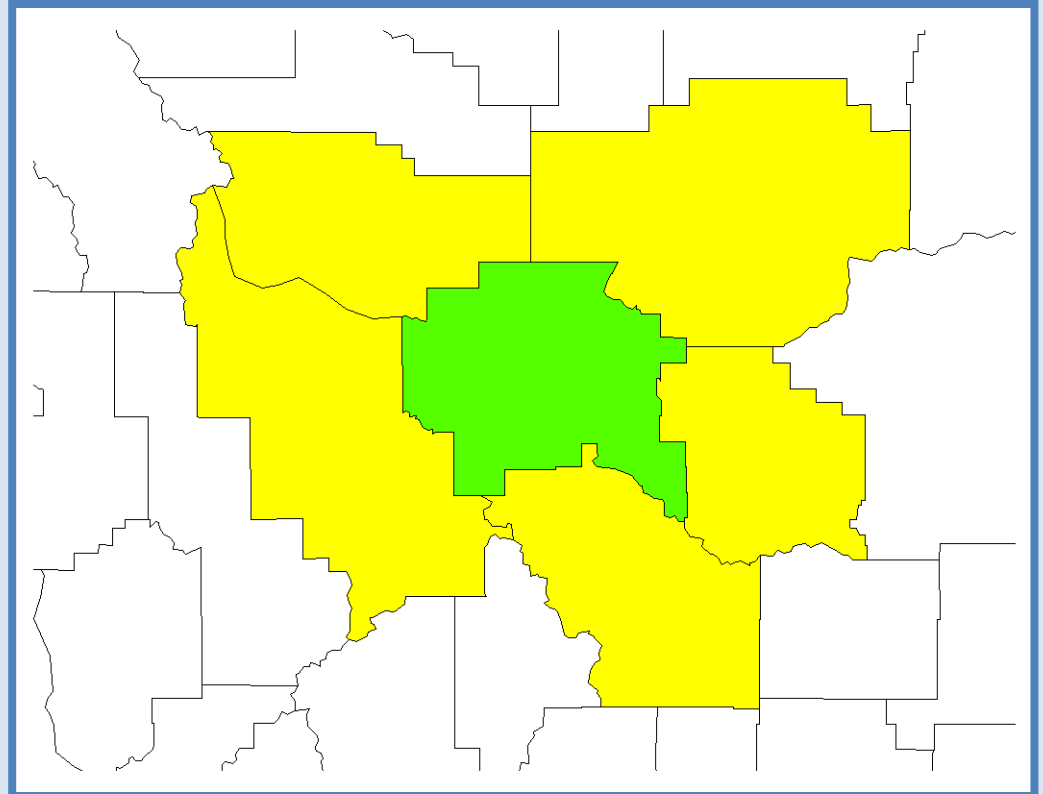
Accounts for another 7-8% of acres.



Circle Group

County missing criteria and:

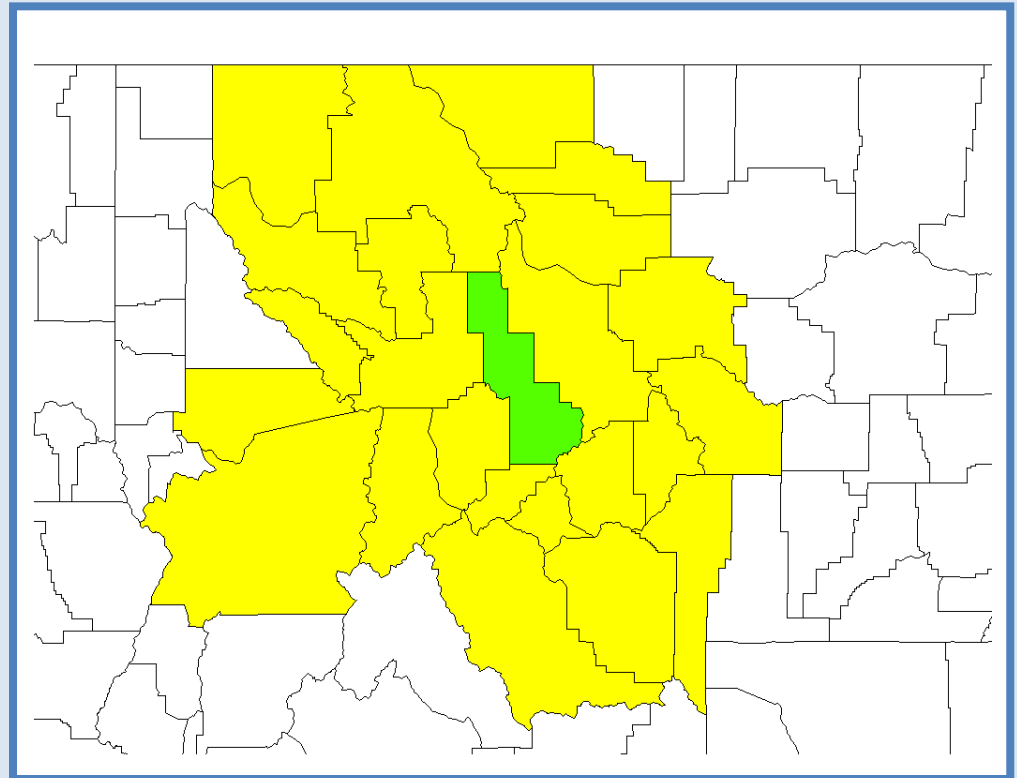
- Is adjacent to a stand-alone
- ✓ Can meet criteria when combined with surrounding adjacent counties?
- Actuarial offer will include yield history and final yield of that county and all of the adjacent counties
- Covers another 7-8% of acres.



Double Circle and NASS District

County missing criteria and:

- Is adjacent to a stand-alone
 - Can meet criteria when combined with adjacent counties
 - ✓ Can meet criteria when combined with counties at double circle or NASS crop reporting district level
-
- Actuarial offer will include yield history and final yield of that county and (the option with fewer acres):
 1. All of the adjacent counties and counties adjacent to them
 2. All counties in the NASS district



Outliers

Possible Group Options

- A. Nearest stand-alone county
 - Practice specific
- B. Triple Circle
- C. Non-irrigated practice in the county
 - For irrigated practice only
 - Yield variance of practices considered
- D. Geographic grouping
 - e.g. a series of counties that all have similar soil, climate, etc.

Finding Your Production Area

- RMA refers to the counties and county groupings as Production Areas
- Production Areas will be reevaluated periodically to determine if still appropriate
- Maps of Production Areas are posted at <http://www.rma.usda.gov/news/currentissues/staxsco/>

STAX Yields

STAX Expected & Actual Yields

- Expected & Actual Yields for STAX are based on crop insurance data
 - Allows for practice specific data in more areas
 - Enables aggregation into larger groups
- RMA yields for area plans are based on future projection of yields
 - Includes projection of yield trends (by practice)
 - Exceptional years (high or low) can be given less weight when calculating projected yield
- STAX Expected Yield may also be based on 5-yr Olympic average
 - Only if the Olympic average is higher than RMA's projected yield

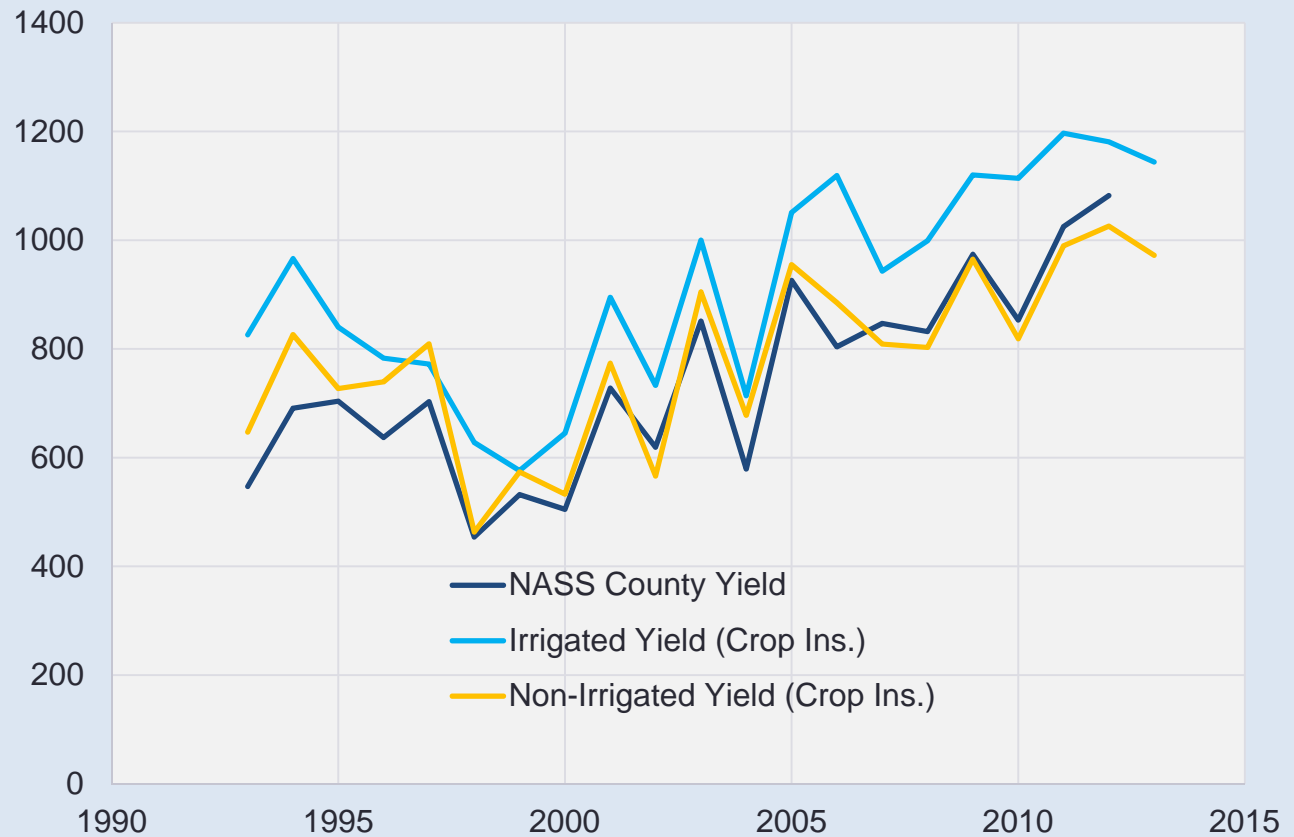
Crop Insurance and NASS Data

Data reflect a sample county

Note that NASS published an aggregated yield for this county

RMA has published their historical yields

Comparison of NASS County Yield and Crop Insurance Yield by Practice



[Available at http://www.cotton.org/econ/cropinfo/cropdata/rma-yield-data.cfm](http://www.cotton.org/econ/cropinfo/cropdata/rma-yield-data.cfm)

STAX Choices

STAX & Harvest Price Option

- As with existing revenue products, producers have choice to include or exclude the Harvest Price Option (HPO)
 - If the Harvest Price is above Projected Price, then HPO will indemnify yield losses at the higher harvest price
 - Overwhelmingly, purchases of individual revenue policies include HPO
- Choices are:
 - STAX – Revenue Protection or
 - STAX – Revenue Protection with Harvest Price Exclusion

STAX & Coverage Band

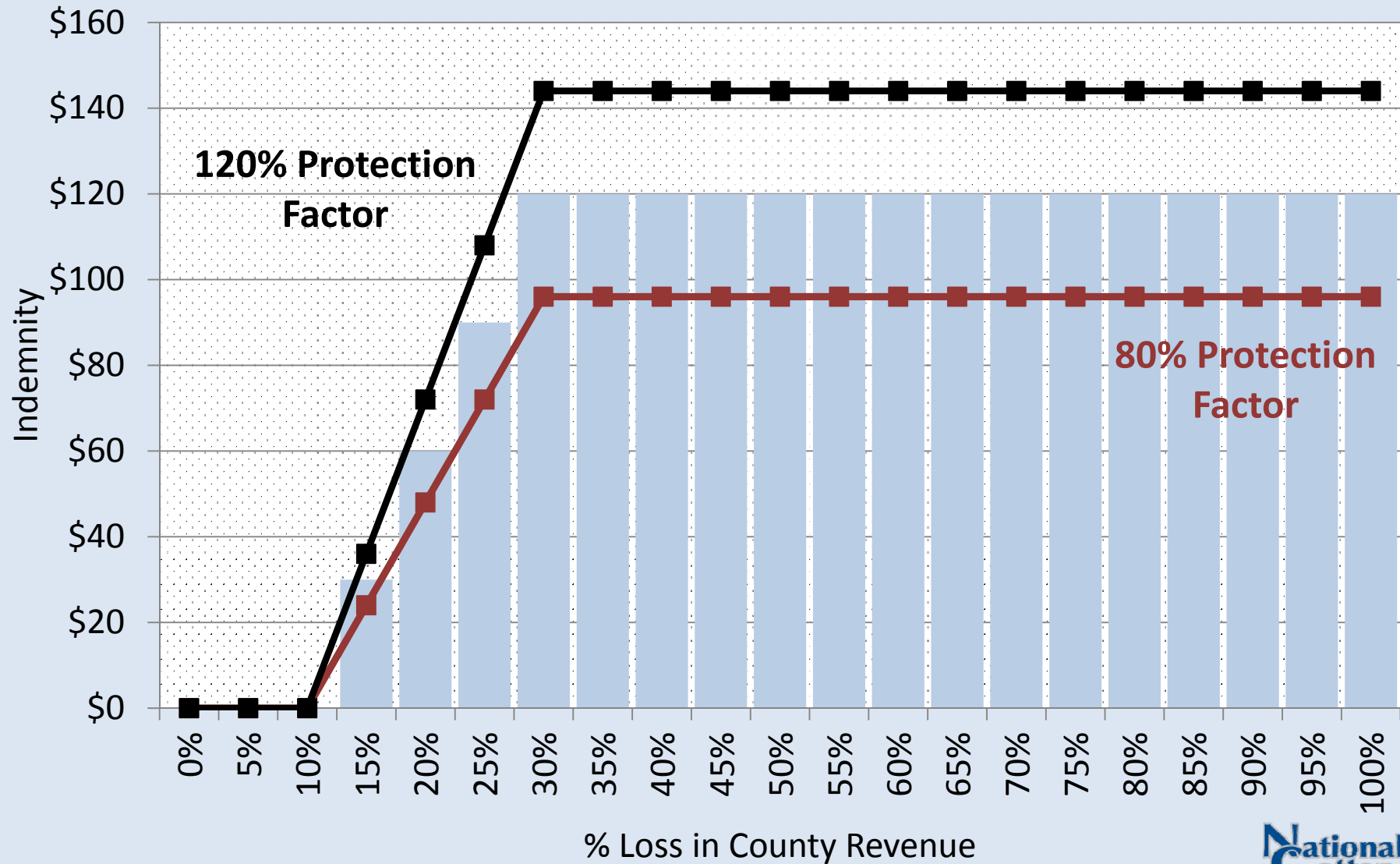
- The widest STAX coverage band is from 90% to 70%
- Both upper and lower end of the range are adjustable in 5% increments
- 10 coverage bands:
 - 90-70%, 90-75%, 90-80%, 90-85%
 - 85-70%, 85-75%, 85-80%
 - 80-70%, 80-75%
 - 75-70%

STAX & the Protection Factor

- Select Protection Factor
 - Feature in existing area-wide insurance products
 - Choose in 1 percentage point increments between 80% and 120%
 - Under a 90-70% STAX policy, the Protection Factor doesn't change when an indemnity is triggered, i.e. there must be a 10% loss in county revenue
 - But the Protection Factor will adjust any indemnity up or down by up to 20% based on selected factor
 - Increases liability and increases premium

Impact of Protection Factor

Assuming Expected County Revenue = \$600



STAX Liability & Premiums

STAX Yields & Premium Rates

- RMA has released expected yields for all counties
- Premium rates also published
 - Since a revenue policy, rates published across a range of price volatility factors
- Information available at Actuarial Information Browser of RMA website
<http://webapp.rma.usda.gov/apps/actuarialinformationbrowser2015/CropCriteria.aspx>

STAX Premium Subsidy

- Premium subsidy is 80%, equals highest available under existing products

	Coverage Level %	50	55	60	65	70	75	80	85	90
Individual Yield & Revenue	Basic & Optional	67	64	64	59	59	55	48	38	
	Enterprise	80	80	80	80	80	77	68	53	
Area-wide Yield/Revenue						64	64	59	59	55

Maricopa Co, AZ STAX Calculations*

		Irrigated
1.	Insurance Projected Price (Assumed)	\$0.65
2.	Expected County Yield/Pltd Acre (RMA)	1,582
3.	Expected County Revenue (#1 * #2)	\$1,028
4.	90% of Expected Revenue (90% * #3)	\$925
5.	Maximum Indemnity @ 1.2 Prot Factor (1.2*(20% of #3))	\$247
6.	Premium Rate per \$ of Liability (RMA)	0.1827
7.	Total Premium (#6 * #5)	\$45
8.	Producer Premium (#7 * 0.2)	\$9

* Premium based on STAX with Harvest Price Option an assumes price volatility factor of 0.15. Final volatility factor will be determined during price discovery period.

Pinal Co, AZ STAX Calculations*

		Irrigated
1.	Insurance Projected Price (Assumed)	\$0.65
2.	Expected County Yield/Pltd Acre (RMA)	1,550
3.	Expected County Revenue (#1 * #2)	\$1,008
4.	90% of Expected Revenue (90% * #3)	\$907
5.	Maximum Indemnity @ 1.2 Prot Factor (1.2*(20% of #3))	\$242
6.	Premium Rate per \$ of Liability (RMA)	0.2099
7.	Total Premium (#6 * #5)	\$51
8.	Producer Premium (#7 * 0.2)	\$10

* Premium based on STAX with Harvest Price Option an assumes price volatility factor of 0.15. Final volatility factor will be determined during price discovery period.

Fresno Co, CA STAX Calculations*

		Irrigated
1.	Insurance Projected Price (Assumed)	\$0.65
2.	Expected County Yield/Pltd Acre (RMA)	1,606
3.	Expected County Revenue (#1 * #2)	\$1,044
4.	90% of Expected Revenue (90% * #3)	\$940
5.	Maximum Indemnity @ 1.2 Prot Factor (1.2*(20% of #3))	\$251
6.	Premium Rate per \$ of Liability (RMA)	0.1875
7.	Total Premium (#6 * #5)	\$47
8.	Producer Premium (#7 * 0.2)	\$9

* Premium based on STAX with Harvest Price Option an assumes price volatility factor of 0.15. Final volatility factor will be determined during price discovery period.

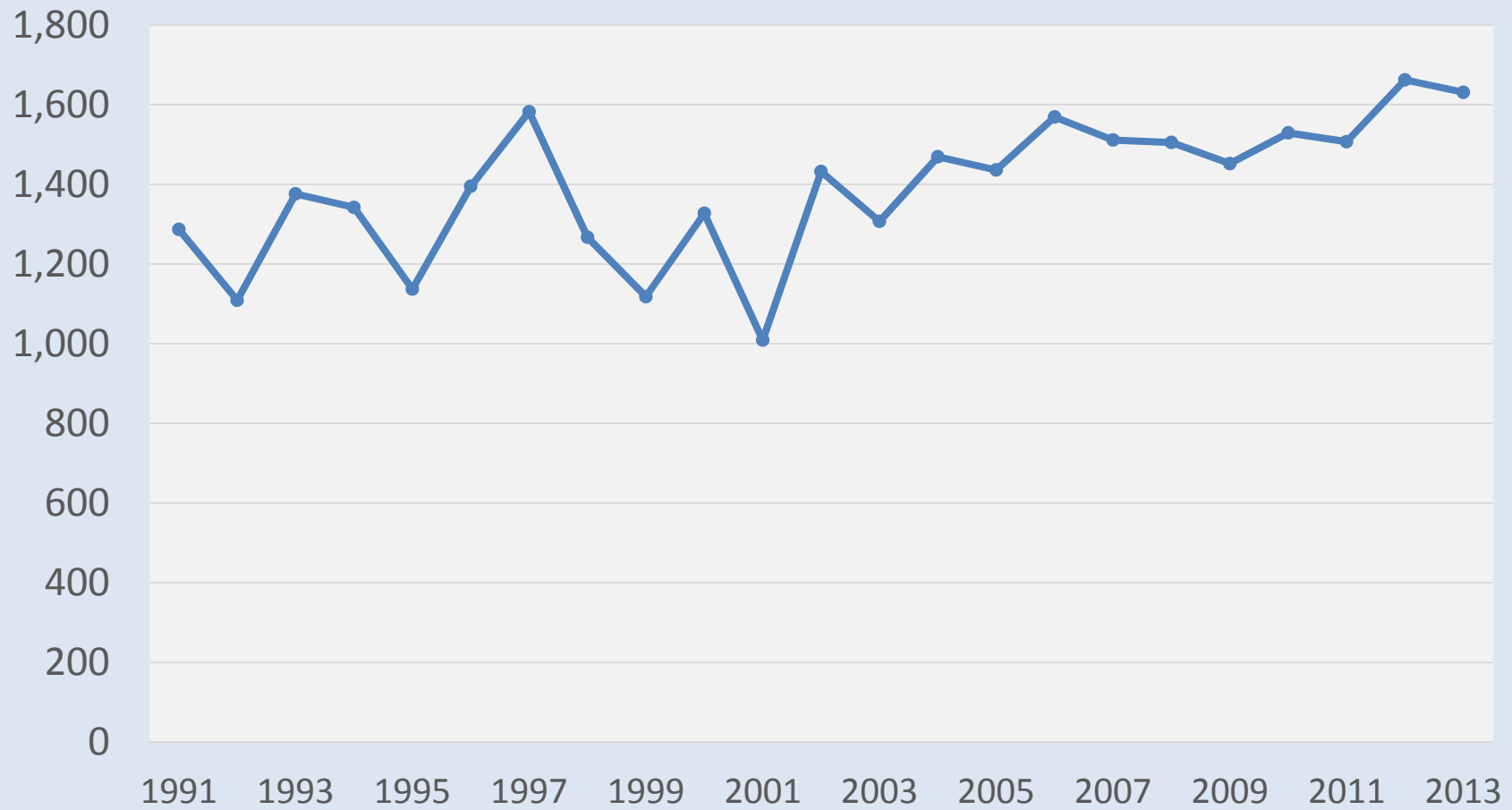
Lea Co, NM STAX Calculations*

		Irrigated	Non-Irrigated
1.	Insurance Projected Price (Assumed)	\$0.65	\$0.65
2.	Expected County Yield/Pltd Acre (RMA)	1,072	156
3.	Expected County Revenue (#1 * #2)	\$697	\$101
4.	90% of Expected Revenue (90% * #3)	\$627	\$91
5.	Maximum Indemnity @ 1.2 Prot Factor (1.2*(20% of #3))	\$167	\$24
6.	Premium Rate per \$ of Liability (RMA)	0.3098	0.6384
7.	Total Premium (#6 * #5)	\$52	\$16
8.	Producer-paid Premium (#7 * 0.2)	\$10	\$3

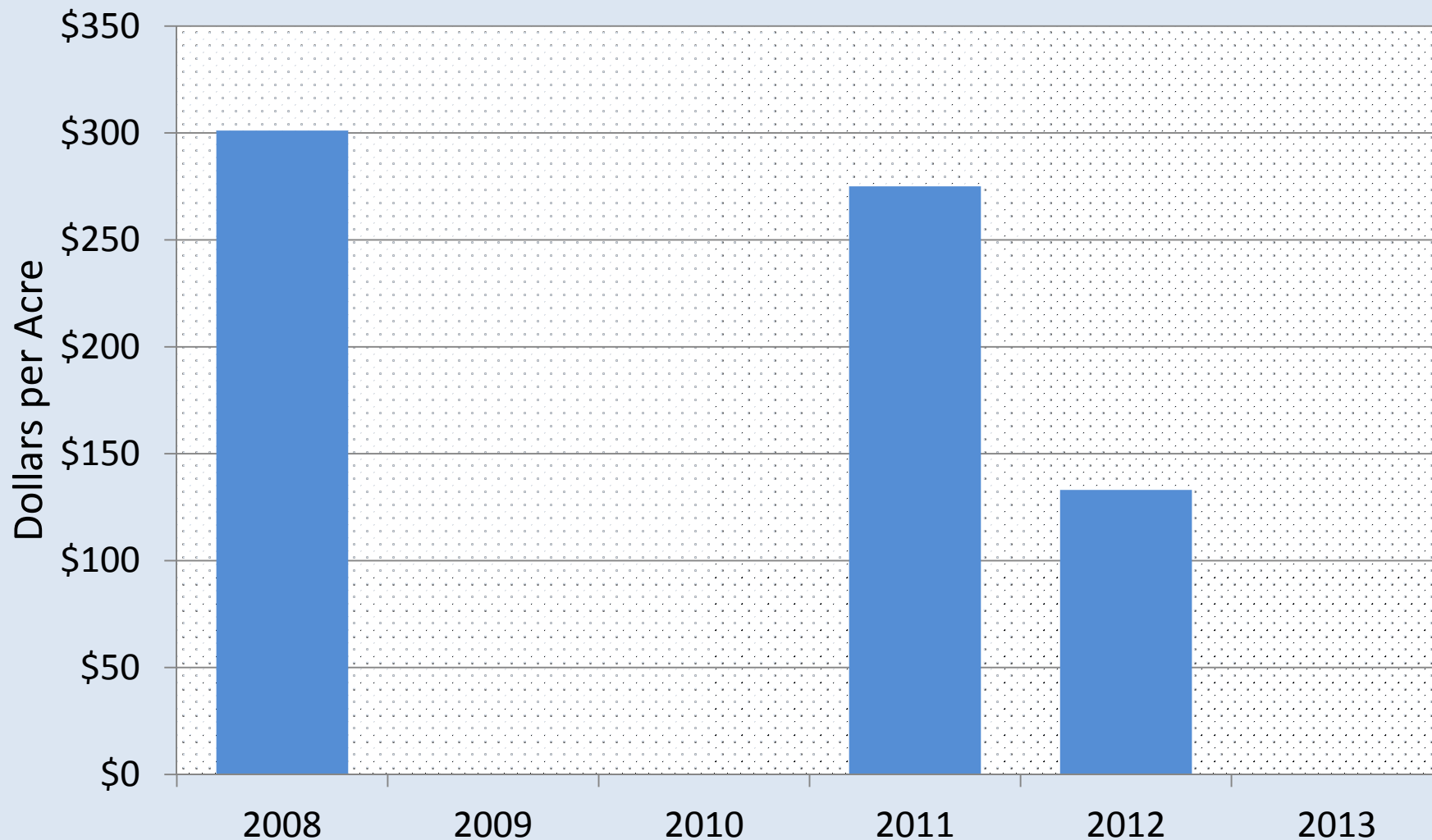
* Premium based on STAX with Harvest Price Option an assumes price volatility factor of 0.15. Final volatility factor will be determined during price discovery period.

RMA Yields

Maricopa County Yields

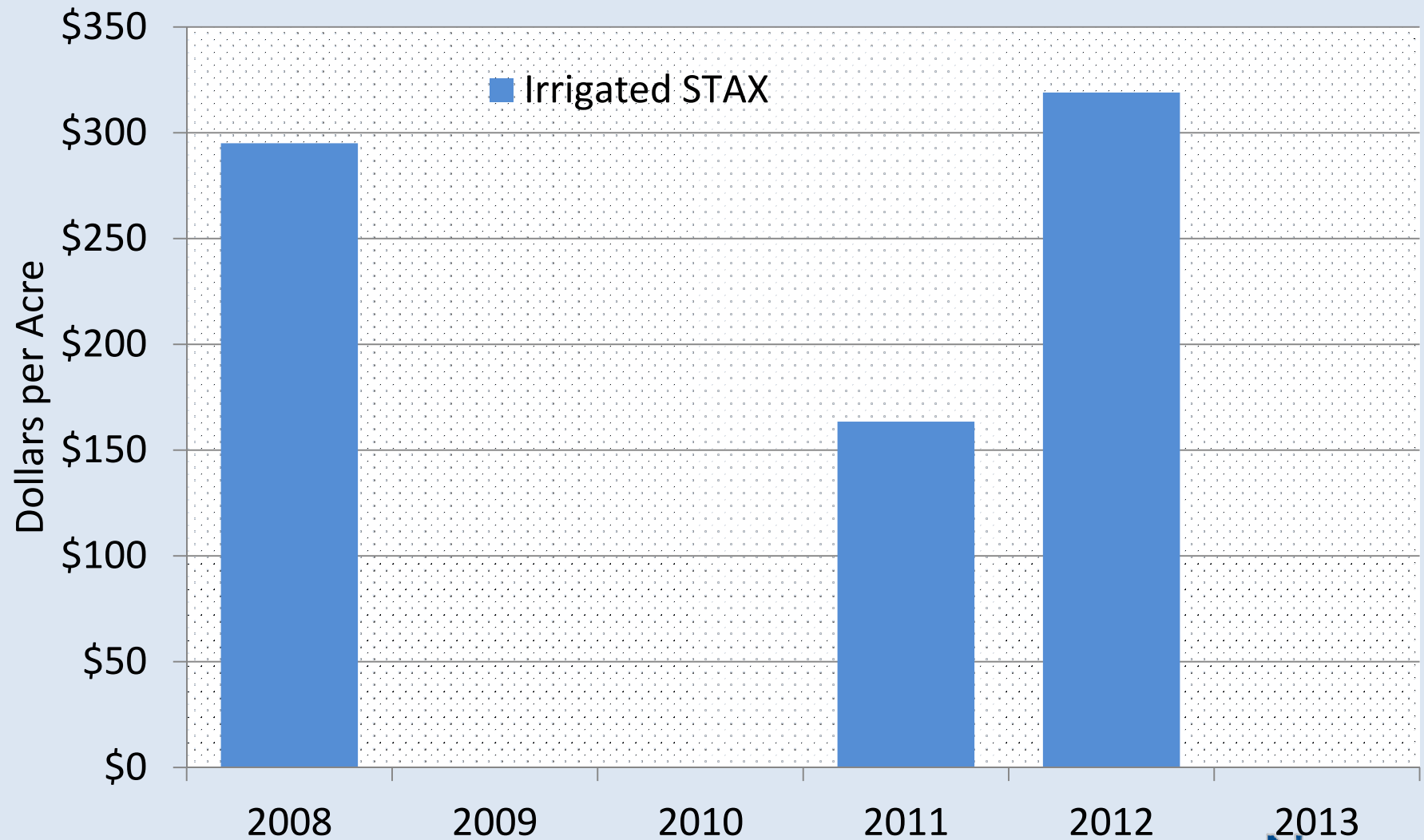


Historical Illustration of Maricopa Co. STAX Indemnities



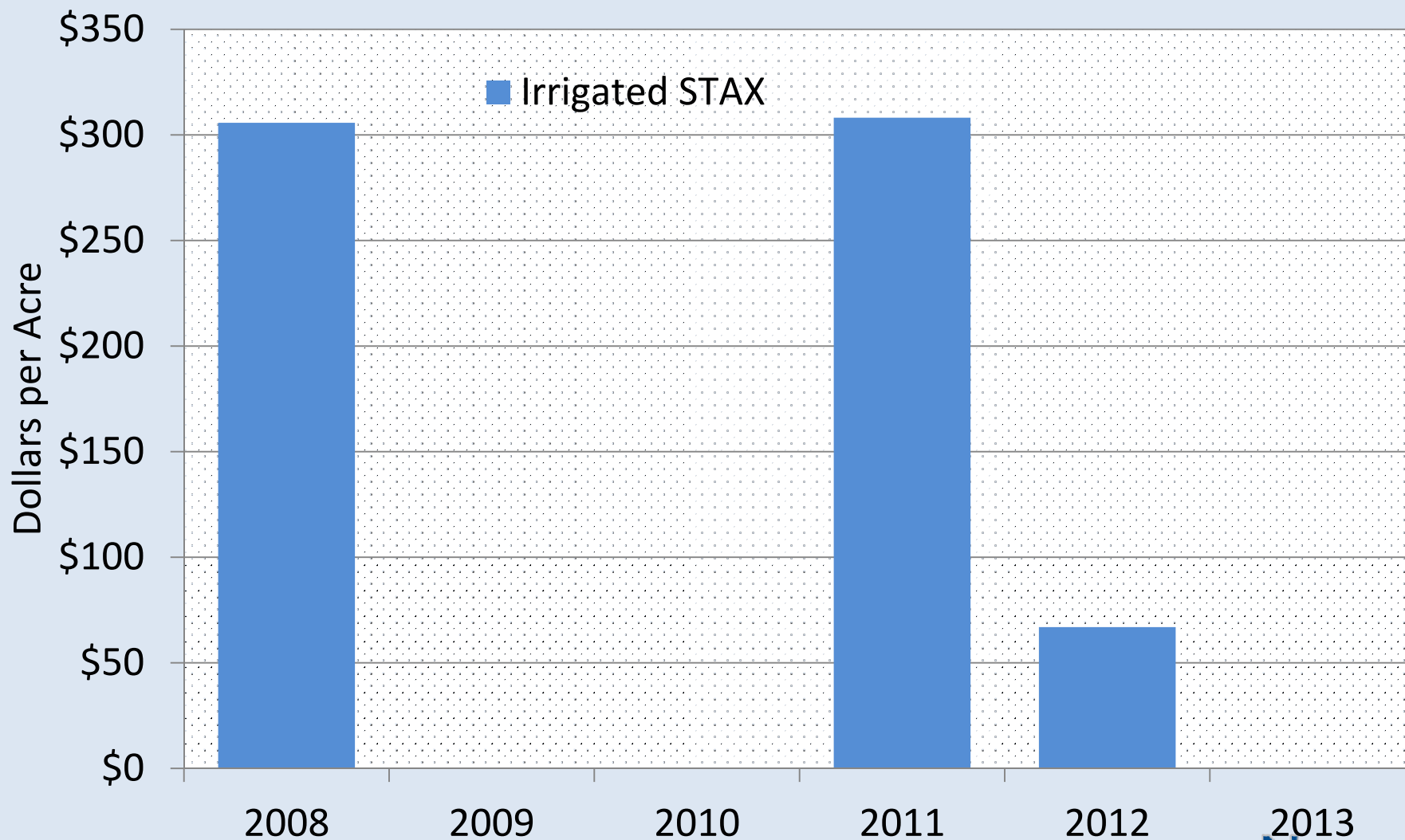
Assumes 90-70% STAX and 120% Protection Factor

Historical Illustration of Pinal Co. AZ STAX Indemnities



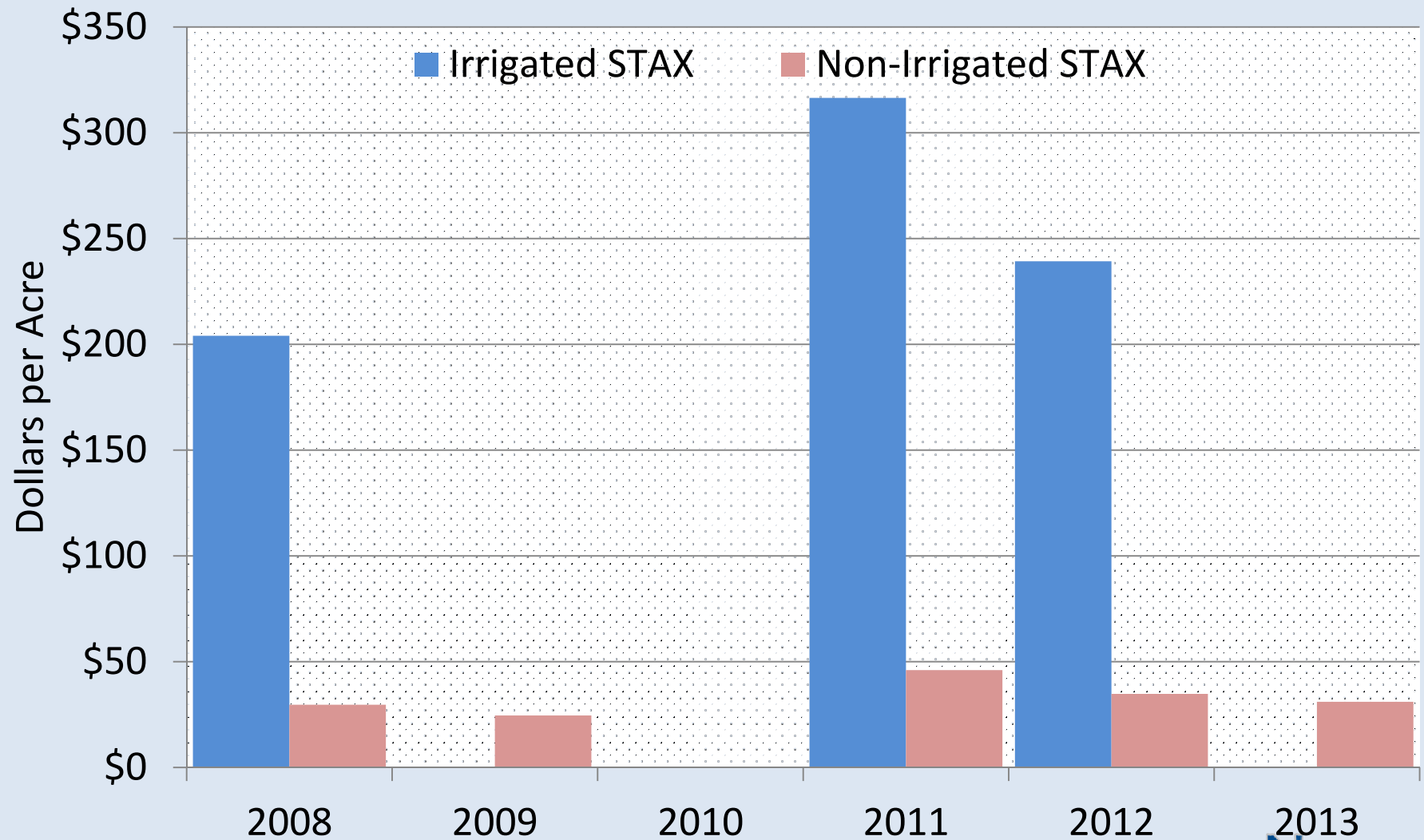
Assumes 90-70% STAX and 120% Protection Factor

Historical Illustration of Fresno Co. CA STAX Indemnities



Assumes 90-70% STAX and 120% Protection Factor

Historical Illustration of Lea Co. NM STAX Indemnities



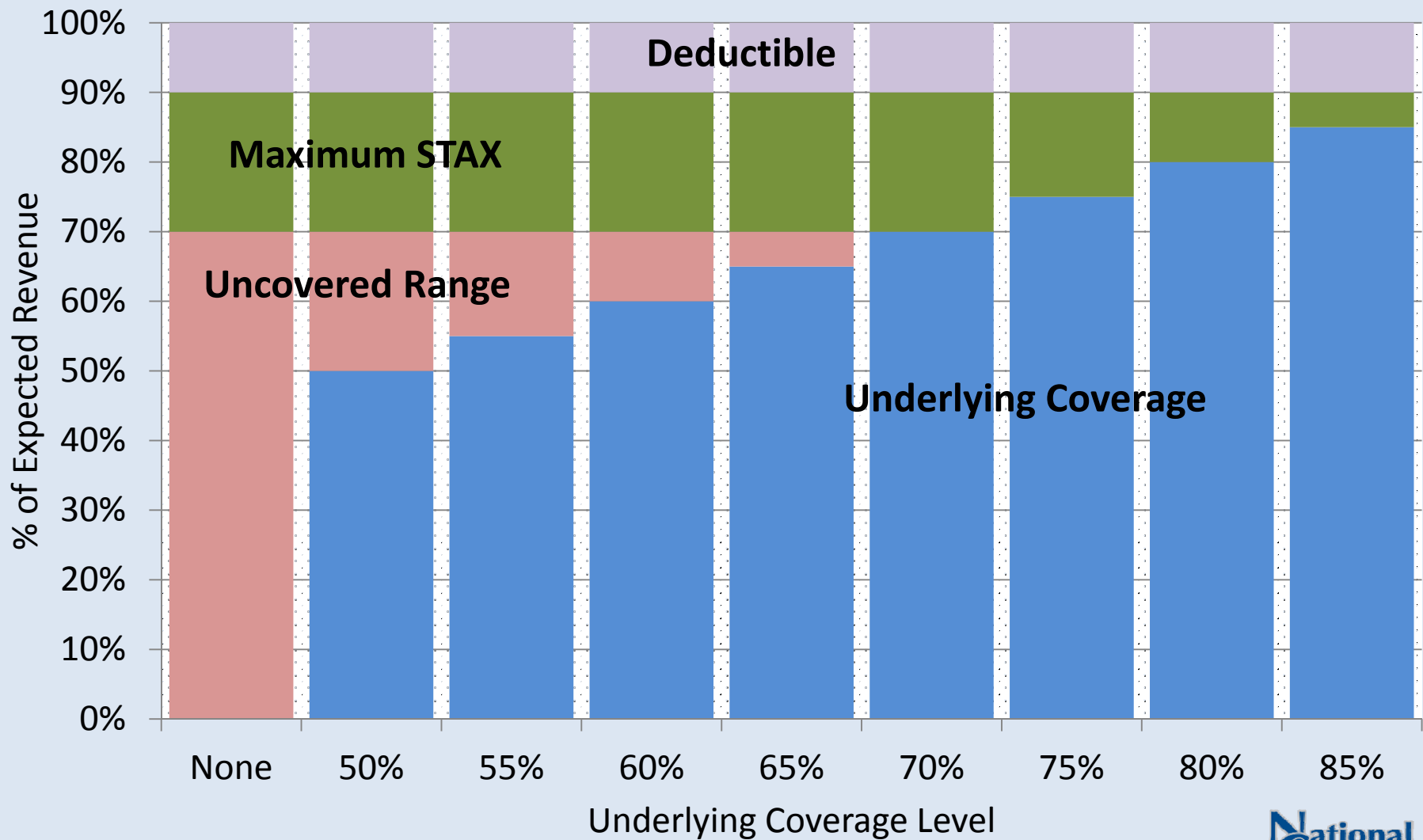
Assumes 90-70% STAX and 120% Protection Factor

STAX & Underlying Coverage

STAX & Existing Insurance Coverage

- Designed to be a complement to existing coverage
- May be purchased as the only insurance policy covering that acre; or purchased in addition to CAT coverage or existing buy-up product
 - Note: Lower band of STAX coverage may not overlap the coverage level of another insurance policy on that same acre

Insurance Coverage Choices



Considerations if Coverage >70%

- Premium savings
- Area-wide coverage vs. individual coverage
 - Does individual yield experience correlate with area-wide experience?

Supplemental Coverage Option

Supplemental Coverage Option

- New product for upland cotton & other crops beginning in 2015
- May not be purchased on cotton acres covered by STAX
- Must purchase underlying insurance policy
 - Provides coverage for portion of a producer's deductible
- Indemnities triggered on county yield or revenue experience, depending on underlying coverage

Additional SCO Features

- SCO deductible is 14%
 - Indemnities triggered if county yield/revenue falls below 86% of expected yield/revenue
 - % by which county yield/revenue falls below 86% determines indemnity that is adjusted based on value of the producer's individual indemnity
- SCO coverage extends down to the coverage level of the underlying policy
- SCO premium subsidy is 65%

Considerations for STAX or SCO

	SCO	STAX
Underlying Coverage Required	Yes	No
Area-wide Trigger	Yes; Yield or Revenue; depending on ind. policy	Yes; Revenue
Deductible	14% fixed	10% minimum
Coverage Band	Down to underlying coverage	Down to 70%
Premium Subsidy	65%	80%
Indemnity	Paid on % of Individual's deductible	Paid on county shortfall, adjusted by protection factor

Key Questions

- Is your individual APH well above the expected county yield?
- Is your underlying coverage less than 70%?
- Remember that both STAX and SCO trigger off county experience, at 90% & 86%, respectively.

Maricopa Co, AZ STAX & SCO*

		STAX: 90-70%	SCO: 86-70%	SCO: 86-60%
1.	Insurance Projected Price (Assumed)	\$0.65	\$0.65	\$0.65
2.	Expected County Yield/Pltd Acre (RMA)	1,582	1,582	1,582
3.	Expected County Revenue (#1 * #2)	\$1,028	\$1,028	\$1,028
4.	Trigger % of Expected Revenue (90% or 86% * #3)	\$925	\$884	\$884
5.	Maximum Indemnity (STAX:1.2*(20% of #3), SCO:16% or 26% of #3)	\$247	\$165	\$267
6.	Premium Rate per \$ of Liability (RMA)	0.1827	0.1415	0.0897
7.	Total Premium (#6 * #5)	\$45	\$23	\$24
8.	Producer Premium (#7 * 0.2 or 0.35)	\$9	\$8	\$8

* Premium based price volatility factor of 0.15.

Pinal Co, AZ STAX & SCO*

		STAX: 90-70%	SCO: 86-70%	SCO: 86-60%
1.	Insurance Projected Price (Assumed)	\$0.65	\$0.65	\$0.65
2.	Expected County Yield/Pltd Acre (RMA)	1,550	1,550	1,550
3.	Expected County Revenue (#1 * #2)	\$1,008	\$1,008	\$1,008
4.	Trigger % of Expected Revenue (90% or 86% * #3)	\$907	\$866	\$866
5.	Maximum Indemnity (STAX:1.2*(20% of #3), SCO:16% or 26% of #3)	\$242	\$161	\$262
6.	Premium Rate per \$ of Liability (RMA)	0.2099	0.1755	0.1337
7.	Total Premium (#6 * #5)	\$51	\$28	\$35
8.	Producer Premium (#7 * 0.2 or 0.35)	\$10	\$10	\$12

* Premium based price volatility factor of 0.15.

Fresno Co, CA STAX & SCO*

		STAX: 90-70%	SCO: 86-70%	SCO: 86-60%
1.	Insurance Projected Price (Assumed)	\$0.65	\$0.65	\$0.65
2.	Expected County Yield/Pltd Acre (RMA)	1,606	1,606	1,606
3.	Expected County Revenue (#1 * #2)	\$1,044	\$1,044	\$1,044
4.	Trigger % of Expected Revenue (90% or 86% * #3)	\$940	\$898	\$898
5.	Maximum Indemnity (STAX:1.2*(20% of #3), SCO:16% or 26% of #3)	\$251	\$167	\$271
6.	Premium Rate per \$ of Liability (RMA)	0.1875	0.1441	0.0921
7.	Total Premium (#6 * #5)	\$47	\$24	\$25
8.	Producer Premium (#7 * 0.2 or 0.35)	\$9.40	\$8.42	\$8.75

* Premium based price volatility factor of 0.15.

Lea Co, NM STAX & SCO*

Irrigated Practice

		STAX: 90-70%	SCO: 86-70%	SCO: 86-60%
1.	Insurance Projected Price (Assumed)	\$0.65	\$0.65	\$0.65
2.	Expected County Yield/Pltd Acre (RMA)	1,072	1,072	1,072
3.	Expected County Revenue (#1 * #2)	\$697	\$697	\$697
4.	Trigger % of Expected Revenue (90% or 86% * #3)	\$627	\$599	\$599
5.	Maximum Indemnity (STAX:1.2*(20% of #3), SCO:16% or 26% of #3, adjusted based on individual APH yield)	\$167	\$111	\$181
6.	Premium Rate per \$ of Liability (RMA)	0.3098	0.2728	0.2331
7.	Total Premium (#6 * #5)	\$52	\$30	\$42
8.	Producer Premium (#7 * 0.2 or 0.35)	\$10	\$11	\$15

* Premium based price volatility factor of 0.15. Assume producer APH = county expected yield.

Lea Co, NM STAX & SCO*

Non-Irrigated Practice

		STAX: 90-70%	SCO: 86-70%	SCO: 86-60%
1.	Insurance Projected Price (Assumed)	\$0.65	\$0.65	\$0.65
2.	Expected County Yield/Pltd Acre (RMA)	156	156	156
3.	Expected County Revenue (#1 * #2)	\$101	\$101	\$101
4.	Trigger % of Expected Revenue (90% or 86% * #3)	\$91	\$87	\$87
5.	Maximum Indemnity (STAX:1.2*(20% of #3), SCO:16% or 26% of #3, adjusted based on individual APH yield)	\$24	\$26	\$42
6.	Premium Rate per \$ of Liability (RMA)	0.6384	0.6254	0.5908
7.	Total Premium (#6 * #5)	\$16	\$16	\$25
8.	Producer Premium (#7 * 0.2 or 0.35)	\$3	\$6	\$9

- Premium based price volatility factor of 0.15. Assume producer APH = 250 pounds.

Other Crop Insurance Changes

- Enhanced coverage options by enterprise units
 - Makes permanent 80% premium subsidy
 - Allows for enterprise unit coverage by irrigated and non-irrigated practices
- Allows for different coverage levels by irrigated/non-irrigated practice

Other Crop Insurance Changes

- Adjustment in APH insurable yields
 - Producer may opt to exclude any year from APH if yield in county in that year is less than 50% of ten-year county average; Also applies to contiguous counties and allows for the separation of irrigated and non-irrigated acres
 - More details in December
 - Peanut revenue coverage
- Conservation compliance required for insurance premium subsidy
 - Must file AD-1026 by June 1, 2015

Other Farm Bill Issues

Key Decision Dates

- Sep 29, '14 – Feb 27, '15: Retain or re-allocate covered commodity bases and update payment yield by landowner
- Nov 17, '14 – Mar 31, '15: PLC or ARC per farm per covered commodity base by all producers (POA)
- April '15 – Summer '15: '14 and '15 crop annual sign-up
- Oct '15 – '14 PLC/ARC payments due

Payment Acres for PLC or ARC-CO

- 85% of sum of base acres for each covered commodity and any generic base attributed to the covered commodity
- When generic acres planted to one or more covered commodities, special rules for calculating total payment acres

Understanding Generic Base

- Did the farm have cotton base in 2013?
 - If yes, then those base acres became generic base in 2014 through 2018.
- Are there (or will there be) covered commodities (grains, oilseeds, rice, peanuts) planted on the farm in '14-18?
 - If yes, then all or a portion of generic base acres eligible to receive PLC/ARC payments in that year.

Attributing Generic Base

2015 Base	Generic	Wheat	Total
# of Base Acres	100	100	200
2015 Planted	Cotton	Wheat	Total
# of Planted Acres	100	100	200
(Individual Covered Commodity Planted) as % of (Total Covered Commodity Planted)		100/100 = 100%	
Generic Base Attributed		100	
2015 Effective Base for PLC/ARC		200	200
2015 Payment Acres for PLC/ARC	0	85%*200	170

Upland Cotton Marketing Loan

- Loan rate set by formula using average of AWP for 2 most recently completed marketing years, as of Oct 1 in year prior to planting
 - Loan rate does not change during marketing year
- Loan rate for base quality not less than 45 cents or greater than 52 cents
- For 2015, base loan rate set at 52 cents
- MLGs & LDPs now subject to payment limit

Payment Limits

- \$125K limit/entity for PLC, ARC, MLG, LDP
 - Separate limit for peanuts
 - Does not apply to eligibility for crop insurance premium subsidies
- USDA developing interim and longer-term process for applying MLG/LDP to payment limit
- Coops or producer responsible for overpayment
- NCC Briefing Paper included in handout

AGI Means Test

- If 3-yr avg AGI > \$900K, then ineligible for PLC, ARC, MLG and LDP
- New procedure for AGI certification/verification
 - Producer must file CCC-941
 - IRS will verify eligibility
 - Coops and LSAs can redeem loans at AWP w/o verifying certification/verification
 - Producer can redeem loans at AWP/receive LDP if certification on file prior to verification by IRS
 - If determined ineligible, repayment required

Resources

- Texas A&M Ag and Food Policy Center decision tool <https://decisionaid.afpc.tamu.edu/>
- University of Illinois farm bill toolbox <http://farmbilltoolbox.farmdoc.illinois.edu/>
- USDA-RMA Farm Bill page <http://www.rma.usda.gov/news/currentissues/farmbill/index.html>
- USDA-FSA website <http://www.fsa.usda.gov/FSA/>
- Check your state university extension website

Final Questions?

Presentation and Summary
available for NCC members
at www.cotton.org

Producers Cooperatives
Ginners Cottonseed Merchants
Warehouses Manufacturers