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Risk Scenario Planning tool trumps fiscal 'best guesses'

Most crop and livestock producers have completed some form of partial budgeting, perhaps deciding on a cropping change or keeping replacement females, or other alternatives.

A common thread in many partial or enterprise budgets tends to be that many of the variables being considered are imperfect. A "best guess" is often used for expected prices or yields; this can lead to flawed decisions due to an inability to account for risk in the form of variability with this "best guess."

The Risk Scenario Planning (RSP) tool can help producers account for at least some of this variability and make better production decisions.

Central Wyoming Cattle Producer Example

Our fictional example couple Jim and Sally Butler operate a cow-calf operation in central Wyoming. They run 200 cow-calf pairs and are looking to market 95 steer and 65 heifer calves this year. They usually market their calves at 550 pounds in the fall.

Due to rather abrupt decline in fall calf prices, they are trying to decide whether or not to keep and feed their calves an additional 120 days and get them to an average weight of 775 pounds.

Assume that this year they could sell their 95 steer calves for $125/cwt weighing 550 pounds. Looking at futures market and video auction prices for March (120 days), they believe they could possibly get $115/cwt for their cattle.

This plan has some inherent risk; the price uncertainty in 120 days needs to be accounted for. The Butlers are considering using Livestock Risk Protection (LRP) insurance to protect against a decline in calf price (for detailed information on LRP, visit www.rma.usda.gov or RightRisk.org).

The Butlers could purchase a policy with a 17-week coverage period and coverage price of $112/cwt for a premium of $6.30/cwt. An indemnity will be paid if the price at the end of the coverage period is lower than $112/cwt.

RSP Tool Setup

Under the added benefits category in the RSP tool, the Butlers would enter the value of the LRP contract in the form of coverage price ($112/cwt) and their expected LRP price in March ($112/cwt), and the expected cash sale value of the calves in March (736.25 cwt at $115/cwt). The LRP premium cost ($6.30/cwt) is entered in the added cost section of the RSP tool.

The expected cash sale value and the LRP index are the uncertain values to be considered. Assume an expected cash sale price of $115, minimum price of $90/cwt, and a maximum of $120/cwt; likewise assume an expected LRP index of $112/cwt, a minimum price of $100/cwt, and a maximum price of $115/cwt.

This data is summarized above. With all of our assumptions entered, the RSP tool estimates a net benefit of $80,030.38 ($108.70/cwt). This total includes no LRP indemnity payment but does include the LRP premium of $4,638.38. Of course, this is only one of the alternative scenarios for how things could turn out for the Butlers when it comes time to sell their calves.

In the next installment, we will take a look at how RSP results change when the effect of risk is included and how those results help the Butlers make their decision.

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RightRisk™ — Partial Budget For: LRP Insurance Decision

Positive Effects — Added Returns	Quantity	Value	Total
			$ -
LRP Price Index		$ 112.00	$ -
LRP Coverage Price		$ 112.00	$ -
			$ -
Calf Sales (cwt.)	736.25	$ 115.00	$ 84,668.75
			$ -
Total Added Returns			$ 84,668.75

Negative Effects — Added Costs	Quantity	Value	
			$ -
LRP Premium	736.25	$ 6.30	$ 4,638.38
			$ -
			$ -
			$ -
			$ -
Total Added Costs			$ 4,638.38

Total Positive Effects (Added Returns + Reduced Costs)	$ 84,668.75	Total Negative Effects (Added Costs + Reduced Returns)	$ 4,638.38

Net Benefit of: LRP Insurance Decision $ 80,030.38

Risk Scenarios — Uncertain Value 1	Cell	Include
Description		
LRP Price Index	D7	
Current Value (Most Likely)	112	
Minimum Value	100	
Maximum Value	115	

Uncertain Value 2	Cell	Include
Description		
Cash Sales Price	D10	
Current Value (Most Likely)	115	
Minimum Value	90	
Maximum Value	120	

The Risk Scenario Planning tool From RightRisk.org

The Risk Scenario Planner tool (RSP) from RightRisk.org is designed to help producers consider a wide range of values when making budgeting projections or production decisions.

The RSP tool can help a producer quantify the risk values associated with a particular decision or change and gives results showing a probability distribution for the variables entered.

A user guide for the RSP tool is also available to help start the process, as well as several crop and livestock examples to show how the tool can be applied.

To begin using the tool or view the user guide:

- Logon to RightRisk.org.
- Under the Resources Tab, select Risk Management Tools.

The Worker Protection Standard – employer responsibilities

What do I need to do according to WPS, as an ag employer, to keep my workers and handlers safe?

Last month, I provided information on what the Worker Protection Standard is and to whom it applies. We'll now look at exceptions.

What exceptions are there from the WPS?

- Owners and immediate family members on wholly family-owned farms are exempt from many of the WPS requirements.
- Certified or licensed crop advisers and persons under their direct supervision who perform crop adviser tasks are exempt from certain WPS provisions except for pesticide safety training.
- The Worker Protection Standard does not apply when pesticides are applied on an agricultural establishment in the following circumstances:
  - » For mosquito abatement, Mediterranean fruit fly eradication, or similar wide-area public pest control programs sponsored by governmental entities.
  - » On livestock or other animals, or in or about animal premises.
  - » On plants grown for other than commercial or research purposes, which may include plants in habitations, home fruit and vegetable gardens, and home greenhouses.
  - » On ornamental plants in private lawns and grounds.
  - » By injection directly into agricultural plants. Direct injection does not include "hack and squirt," "frill and spray," chemigation, soil-incorporation, or soil-injection.
  - » In a manner not directly related to the production of agricultural plants, such as structural pest control, control of vegetation along rights-of-way and in other non-crop areas, and pasture and rangeland use.
  - » For control of vertebrate pests not related to production of the agricultural crop.
  - » As attractants or repellents in traps.
  - » On the harvested portions of agricultural plants or on harvested timber.
  - » For research uses of unregistered pesticides.

Employer Requirements

A two-page document titled "Quick Reference Guide to the Worker Protection Standard (WPS) as revised in 2015" (at bit.ly/pesticideinfo) summarizes the maximum requirements for employers to keep their workers and handlers safe under the revised WPS.

An employer of ag workers or pesticide handlers has a responsibility to ensure employees will be informed about exposure to pesticides. The WPS requires:

- Employers must provide pesticide safety training for workers and handlers.
- Pesticide safety information – basic safety concepts (on a poster or otherwise displayed) available at a central location and some decontamination sites.
- Pesticide application information must be posted *(within 24 hours of application and for 30 days after application)* in a central location. Pesticide hazard information found on product Safety Data Sheets (SDS) must be available to all workers and handlers (*for a period of two years post application)*.
- Workers must be notified about treated areas – posting signs or providing oral notification to avoid inadvertent pesticide exposures.
- *Fields must be posted if indicated on the product label – review the "How to Comply Manual" on rules governing posting warning signs.*

Training records and application records must be kept for two years on the establishment and must be provided to the employee, medical personnel, or the employee's designated representative upon written request.

- Information exchange – between commercial pesticide handler employers and agricultural employers.

Next month, we'll look at the employer's responsibility to protect employees.

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