

# AGR-Lite Interactive Producer Worksheet Instructions

Richard V. Llewelyn

G.A. (Art) Barnaby

May, 2008



Funding for this project provided by USDA Risk Management Agency (RMA).  
Partnership Agreement No. 07-IE-0831-0133-E.  
*"Combining AGR-Lite with Other Tools to Manage Farm Level Risk in Kansas and  
Colorado"*  
2007-2008.

# **AGR-Lite Interactive Producer Worksheet**

## ***AGR-Lite Overview***

In 2003, Adjusted Gross Revenue-Lite (AGR-Lite) was introduced. Designed with the parent program (AGR) in mind, this insurance program has a more simplified design continuing revenue protection for all crop and livestock enterprises. AGR-Lite was first developed by the Pennsylvania Department of Agriculture and for 2008 is available for sale in 29 states (AZ, AK, CO, CT, DE, HI, ID, KS, MA, MD, ME, MN, MT, NC, NH, NJ, NM, NV, NY, OR, PA, RI, UT, VA, VT, WA, WI, WV, and WY) across the U.S.

To encourage participation, maximum total liability approved for AGR-Lite for insurance year 2006 was increased from \$250,000 to \$1,000,000. However, liability is still substantially less than the maximum liability currently offered by AGR (\$6,500,000). One other distinctive feature of AGR-Lite was the elimination of the livestock restriction. AGR limits the maximum share of livestock and livestock product revenue in the guarantee to 35%. For further information on AGR and AGR-Lite refer to the RMA website at [www.rma.usda.gov](http://www.rma.usda.gov).

When comparing alternative insurance designs, AGR-Lite may be used as a stand-alone product or as an umbrella (wrap around) policy allowing producers to use AGR-Lite in conjunction with alternative crop insurance designs, excluding AGR. Farmer-paid premiums will be reduced when producers purchase additional insurance products, which reduce total liability. However, a producer may not accumulate indemnities from all insured products in excess of the total loss value.

Limitations of AGR-Lite specify that a qualifying person can generate no more than 50% of their total revenue from commodities purchased for resale. An example

would be the purchase of grapes to be converted into wine. Potato revenue must not exceed 83.35% of their revenue stream. It is important to note the resale limitation does not apply to commodities purchased for further growth, such as stockers, back-grounded cattle, or fed cattle.

Producers are able to select from three coverage levels (65%, 75%, and 80%) of average gross revenue with an indemnity payment rate of 75% and 90%. For 2008 virtually all producers will qualify for 65% and 75% coverage levels with a one commodity requirement. To qualify for higher coverage levels (80%), producers must indicate on their intended agricultural commodity report that at least three agricultural commodities will be produced whose expected income will be greater than or equal to that determined by the diversification formula.

The intended agricultural commodity report will be submitted the beginning of each eligible insurance year and details the commodity, expected acreage, yield, expected value, and total value. Additional requirements for the policy demand that qualifying persons submit a minimum of five years of continuous, verifiable tax records for the same entity, preferably Schedule F 1040 filings or equivalent tax forms to document historical revenue and expenses. To encourage participation in AGR-Lite, RMA pays 59%, 55%, and 48% of the total premium for coverage levels of 65%, 75%, and 80% respectively. Calculations for revenue guarantee are derived from the lesser of the 5-year average gross revenue based on tax returns or the expected farm income times the producer's elected coverage level percentage. When a producer realizes a shortfall in gross revenue, below the guarantee level, an indemnity is paid based on the producers selected payment rate percentage.

AGR-Lite provides protection for otherwise uninsurable commodities such as organic and direct marketed production; provides farm operations with a bottom line from severe economic loss; provides individual protection based on personal yield, price history, plus low price protection; and finally it may provide an alternative for farms with reduced APH caused by multiple years of crop losses. AGR-Lite possesses great potential in filling the voids or gaps in the current FCIC product line as this product caters to small, diversified, livestock, and specialty crop farms.

Despite such potential, the market for AGR-Lite in approved states has struggled, as the following illustrates. In 2003, only 74 policies were sold with subsequent year sales of 88 in 2004, 162 in 2005, and 348 in 2006. Reasons or speculations for such stagnant sales include the initial maximum liability of \$250,000 which has since been raised to \$1,000,000. Furthermore, a statement by Keith Collins, Chief Economist at the USDA, argues that poor participation levels may be attributed to, "the learning curve of a financial as compared to a production agricultural type of insurance product, as well as the cost of delivery." Since its debut in 2003, AGR-Lite has undergone a series of revisions and in light of recent complaints will continue to do so.

### ***Instructions For Using Interactive AGR-Lite Spreadsheet***

When opening the spreadsheet, click "Enable Macros" when asked. Macros in the spreadsheet are used for printing and navigation and do not contain viruses. The opening page ("*Instructions*") includes a brief summary of the purpose of the spreadsheet and general instructions. As noted, **BLUE cells** are for data entry. Cells with **RED tabs** in the corner indicate a description for the cell. By placing the mouse cursor over the cell the dialogue box will appear providing a description of what each

cell value reveals. At the bottom of every page is a link to take you back to the worksheet. To go to the “Farmer Worksheet”, click the “**BEGIN**” button.

Select the year to insure in Line 3. The year selected will determine the years included in the base period which is used to determine the 5-year average base period for allowable farm income (AFI) and allowable expenses (AE). Click on the cell to select the year to be insured from the drop down menu.

Then select the coverage rate and the payment rate, using the dropdown menus in Lines 5 and 7. These are used to calculate potential indemnity payments as well as liability. Values for revenue and expenses are entered in the dark blue cells in Lines 10-14 for their respective years. These are from IRS Form 1040, Schedule F. There is a separate sheet (“*Schedule F*”) which may be viewed and printed to help in ensuring that the correct data are entered for revenue and expenses.

Once the revenue and expense data are entered, the worksheet will calculate several values, including the average revenue and expenses as well as index eligibility, and approved revenue and expenses (AR and AE). These values are used for calculating final values and potential indemnity payments.

The next input value to be entered is “Expected AFI” in Line 19, which is the expected revenue for the year to be insured. This should be estimated for the upcoming production season based on given the acreage, yield history for the farm and RMA prices.

AGR-Lite eligibility and the expected loss inception point are calculated based on the data entered to this point. AGR-Lite eligibility is shown in the red cell in Line 25 as “Approved” or “Not Approved”, depending on the results of the calculation. The

expected loss inception point, shown in yellow in Line 27, estimates the level of qualifying revenue below which an indemnity payment would be made under the provisions of the program. If actual revenue is below this level, indemnification would occur at the selected payment rate (75% or 90%).

The analysis is completed at this point if the user is simply wanting to determine eligibility and the expected loss inception point. If further analysis is required, more data will need to be collected and entered.

To determine the potential indemnity payment, the allowable farm income and expenses for the insured year will need to be entered in Line 29. The revenue value may or may not be the same as what was entered in Line 19. If this analysis is prior to enrollment, enter the AFI value from Line 19. If this analysis is using actual data at the end of the production year, enter the actual value of both revenue and expenses in these cells.

In Lines 31 and 33, enter the accrual **CHANGE** (not the actual amount) which occurs in Accounts Payable and Pre-Paid Expenses throughout the insured year. This value may be positive (if the value increased from the beginning to the end of the year) or negative (if the value decreased) and should be entered as such. If there was no change or if these accounts are not used, enter 0 (zero). The Adjusted Loss Inception Point will be calculated based on the Allowable Farm Income, Allowable Expenses and the changes in Accounts Payable and Pre-Paid Expenses. This value appears in the light blue cell in Line 35.

Five more input values are needed, beginning with the accrual **CHANGE** in Accounts Receivable and the accrual **CHANGE** in Livestock and Crop Inventory. As

before, the values entered should be the changes which have occurred between the beginning of the current (insured) year and the end of the year.

Following are Non-Insured Crop Disaster Payments (**total amount**), in Line 41, then the **NET GAIN (OR LOSS)** from Commodity Hedges in Line 43, and finally the Gross Crop Insurance Indemnity Payments (**total amount**) in Line 45. Enter 0 (zero) if there is no value for these.

The results are summarized in the table to the right of these final input values in Lines 33-43. Two new values are included the table: AGR (Adjusted Gross Revenue) to Count in Determining Indemnity (Line 41) and an estimate of the Potential Indemnity Payment (Line 43) which may be due this farm based on data provided.

Results may be printed using the “Print Sheet” button below the input and results table. Alternatively, the values in the worksheet may be reset for a new evaluation. Buttons which take the user to the supplemental information sheets (Schedule F and AGR-Lite Information) are also found here.

Users are reminded that this worksheet merely provides guidance to farm managers in deciding whether this particular insurance program fits your farm and may not reflect the actual performance or outcomes of AGR-Lite for individual farms.

Questions or comments should be directed to:

**Dr. Art Barnaby**  
304E Waters Hall  
Manhattan, KS 66506  
785-532-1515  
[barnaby@ksu.edu](mailto:barnaby@ksu.edu)

**Dr. Rich Llewelyn**  
345 Waters Hall  
Manhattan, KS 66506  
785-532-1504  
[rllewely@ksu.edu](mailto:rllewely@ksu.edu)