



Multi-Peril Crop Insurance

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The [Federal Crop Insurance Corporation \(FCIC\)](#) offers three types and eight levels of taxpayer subsidized multi-peril crop insurance (MPCI) products, sold in four different unit types. The unit types are designed to define the nature of the farm area being insured. There are four types of insurable units; Optional, Basic, Enterprise, and Whole Farm. Each of these units have differences in costs per acre and are likely to create variations in indemnities. For example, a highly localized severe hail storm on a single field covered using basic units would likely have an indemnity, versus not likely to have an indemnity for the same storm on the same field when this field is 1 of 20 other fields covered with enterprise units.

Iowa State University Extension has published [a brief description of the different unit types](#) and provides some limited examples of how unit differences might affect indemnities.

It is advisable to talk with your crop insurance agent about which unit type fits the circumstances and operation for which the insurance is being sought. The distance between fields, crop type being grown, inclusion within the same county, land tenure, actual production history (APH) and other factors each play a role in what unit classification may be best for a particular operation or situation.

Unit types affect both costs and risks. Larger unit types make the insurance per acre less expensive than smaller unit types. For example, enterprise units are less expensive per acre than optional or basic units. Generally however, the larger the area a unit covers the less likely a loss is expected. This of course depends on the triggering event, size and scope, as illustrated in the previous example.

There are three types of MPCI that will be discussed here. The three types are revenue protection (RP), RP with harvest price exclusion (RP-HPE) and yield protection (YP) policies. Both RP types of insurance are designed to insure a specific level of revenue based on the selected coverage percent (rate) using average December futures contract prices for the spring (February) and/or fall (October) months and average APH yields. Be aware that these averages are based on future contract prices which do not include an adjustment relative to an operator's local cash market, known as basis. RP insurances may be triggered by a yield loss, a drop in the price, or both. YP insurance uses similar information as RP but only insures yield as a percent of APH with indemnities based on the spring projected value or price.

While both types of RP insurance are designed to insure a specific revenue, RP is the more expensive version and bases its guaranteed revenue on a floating spring or fall price whichever is highest. Whereas, RP-HPE is strictly based on the spring price for the revenue guarantee.

These MPCI products operate on an annual, automatically renewing, cycle and have coverage levels between 50% and 85% of APH, in 5% increments making eight possible levels of coverage. Table 1 below shows the subsidy levels of the four unit types, along with the eight corresponding levels of coverage starting at 50% and increasing to 85% in 5% increments. A practice sample illustrating the relative premium differences among insurance types and levels is depicted in Table 2.

Table 1. Premium subsidy rates by level of coverage and units

Coverage level	Basic and Optional Units	Enterprise Units	Whole Farm Units
50%	67%	80%	80%
55%	64%	80%	80%
60%	64%	80%	80%
65%	59%	80%	80%
70%	59%	80%	80%
75%	55%	77%	80%
80%	48%	68%	71%
85%	38%	53%	56%

Source: Shields, D. 2015. "Federal Crop Insurance: Background." CRS Report for Congress, Congressional Research Service, 7-5700, R40532. Washington, DC.

From Table 1 it is easy to see that each unit type is subsidized differently at various coverage levels. Using this information and some approximations for insurance quoted for the farm area around the University of Nebraska's West Central Research Extension and Education Center (WCREEC) Table 2 was constructed. This table shows the variation in the different premiums with two of the four available unit types (enterprise and optional units). This table does not reflect any actual premiums, but does represent the differences among premiums by insurance type and level. Each individually insurable farm has unique conditions and location that affect the premiums that would ultimately be paid.

Coverage Percent	RP Premiums		RP-HPE Premiums		YP Premiums	
	Optional	Enterprise	Optional	Enterprise	Optional	Enterprise
50%	\$3.61	\$3.00	\$2.61	\$2.25	\$3.11	\$2.60
55%	\$5.30	\$5.00	\$3.78	\$3.33	\$4.48	\$4.17
60%	\$7.22	\$6.00	\$4.98	\$3.92	\$5.93	\$4.83
65%	\$11.91	\$9.00	\$7.96	\$5.52	\$9.28	\$6.80
70%	\$16.50	\$11.00	\$10.80	\$6.52	\$12.13	\$7.74
75%	\$24.89	\$16.00	\$16.22	\$9.40	\$17.59	\$10.44
80%	\$41.09	\$23.00	\$26.91	\$13.69	\$28.35	\$13.90
85%	\$61.67	\$37.00	\$40.02	\$22.04	\$41.52	\$20.96

Table 2. A practice sample list of extrapolated MPCCI premiums at the various coverage levels for the University of Nebraska at Lincoln's West Central Research Extension and Education Center (WCREEC) in North Platte, NE.

As discussed the insurance purchaser does not pay the full value of the policy. For example the farm manager at WCREEC wishes to buy an 85% Revenue Protection (RP) policy as enterprise units, from Table 2 the premium is listed as \$37.00/ac. The actual cost of the policy however is \$78.72/ac with \$41.75/ac subsidized to the insurer by federal taxpayers. Table 1 makes it easy to identify the subsidy rate of this policy as 53%. If the farm manager instead wanted to have identical coverage and insurance type but bought it in optional units it would cost quite a bit more, \$61.67/ac, with a lower subsidy rate of 38% making the full value of that policy \$99.47/ac with a smaller \$37.80/ac subsidy. If instead the farm

manager chose to buy RP-HPE insurance with the same 85% coverage level for either enterprise or optional units the premiums would be \$22.04/ac and \$41.52/ac respectively. The actual cost of these policies would have been \$46.90/ac for enterprise units and \$64.55/ac for optional units. The subsidy rate for the different insurance types remain the same, but the premiums are different.

The subsidy is used to make crop insurance more attractive and affordable so that farmers will use it to help them be more resilient to risks, reduce government intervention, help keep the nation's food supply secure and reduce market interference.

The Risk Management Agency (RMA) offers the diagram (Figure 1) of the insurance cycle. The cycle has four parts: 1) Application process, 2) Coverage and Billing, 3) The Claims Process and 4) Program Changes. These four areas have eleven distinct sub-areas represented by numbers printed within the cycle wheel. The cycle and sub-areas can be researched further by visiting <https://rma.usda.gov/Topics/Insurance-Cycle>.

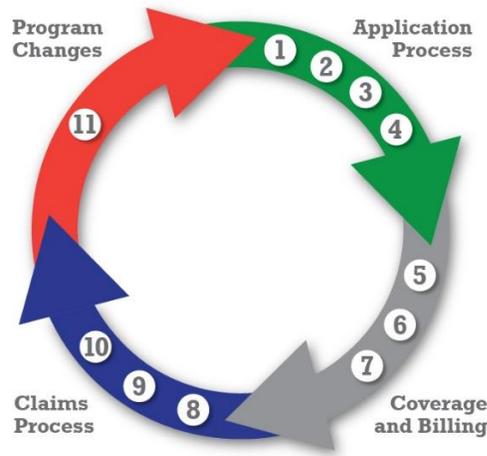


Figure 1: The Risk Management Agency's explanation of the insurance cycle.

Figure 2 on the next page depicts the annual insurance timeline and the events that sequentially occur. The list was developed from information collected from several sources: [Nebraska Department of Insurance](#), [Farm Credit Services of America](#) and [Iowa State Extension Service](#). In addition, [Iowa State University Extension and PROAG](#) have more information that explains more about crop insurance in further detail.

MPCI Timeline of Events



Figure 2: A depiction of the annual insurance timeline including important dates and deadlines.