| Exhibit Name: Indemnity Calculations <br> Exhibit Number: P21-13, Plans 16 \& 17 <br> Record Name: Acreage Claim <br> Record Code: P21 |  |  |  | Reinsurance Year: 2020 <br> Version: Approved <br> Release Date: 7/31/2020 |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Insurance Plan Code 16 Margin Protection | 17 Margin Protection with Harvest Price Option |  |  |  |  |  |
| Commodity Code 0011 Wheat | 0018 Rice |  |  | 041 Corn |  | 0081 Soybeans |
| Calculations | Field <br> Name | Record <br> Number | Field <br> Number | Field <br> Format | Field <br> Rounding | Rules |
| Section 1: Stage Guarantee Calculation |  |  |  |  |  |  |
| When Insurance Plan Code equals 16:$\begin{gathered} \text { Trigger Margin Amount }=\begin{array}{c} \text { Expected Margin Amount }-[(\text { Expected Revenue } \\ \\ \text { Amount }) *(1.00-\text { Coverage Level Percent })] \end{array} \end{gathered}$ | Trigger Margin Amount | Internal |  | 99999999.99 | Round to 2 decimals |  |
|  | Expected Margin Amount | ADM |  | 99999.999999 |  | Edit with ADM Price, "A00810". |
|  | Coverage Level Percent | P14 | 34 |  |  |  |
|  | Expected Revenue Amount | ADM |  | 99999999.99 | Round to 2 decimals | Edit with ADM Price, "A00810". |
| When Insurance Plan Code equals 17:$\text { Trigger Margin Amount = } \begin{aligned} & \text { Expected County Yield } * \text { MAX(Projected Price, Harvest } \\ & \text { Price })-(\text { Expected Revenue Amount }- \text { Expected Margin } \\ & \text { Amount })-[\text { Expected County Yield } * \text { MAX(Projected } \\ & \text { Price, Harvest Price) }]^{*}(1-\text { Coverage Level Percent }) \end{aligned}$ | Trigger Margin Amount | Internal |  | 99999999.99 | Round to 2 decimals. |  |
|  | Expected County Yield | ADM |  | 99999999.99 | None | Edit with ADM Price, "A00810". Expected County Yield will be stored in Expected Index Value in "A00810". |
|  | Projected Price | ADM |  | 99999.9999 |  | Edit with ADM Price, "A00810". |
|  | Harvest Price | ADM |  | 99999.9999 |  | Edit with ADM Price, "A00810". |
| For Both Plans: | Acre Stage Guarantee Amount | P21 | 58 | 99999999.99 | Round to 2 decimals | The larger of subtraction or zero. |
| $\begin{aligned} & \text { Acre Stage Guarantee }=\text { MAX(Trigger Margin Amount }- \text { Final Margin Amount, } 0) \\ & \text { Amount } \end{aligned}$ | Final Margin Amount | ADM |  | 99999.999999 |  | Edit with ADM Price, "A00810". |
| Section 2: Loss Guarantee Calculation |  |  |  |  |  |  |
|  |  |  |  |  |  |  |
| MIN(Dollar Amount of Insurance, Acre Stage Guarantee Loss Guarantee Amount $=$ Amount * Price Election Percent) * Determined Acreage <br> * Insured Share Percent * Liability Adjustment Factor | Dollar Amount of Insurance | Internal |  | 99999999.99 | None | The P11 Dollar Amount of Insurance used in determination of P11 Liability. |
|  | Determined Acreage | P21 | 18 | 99999999.99 | None |  |
|  | Insured Share Percent | P11 | 43 | 9.9999 | None |  |
|  | Price Election Percent | P14 | 35 | 9.9999 | 2 decimal places | Protection Factor. This will be the Price Election Percent reported on the P14 and used in determination of P11 Dollar Amount of Insurance. <br> If Native Sod applies to the associated P11 record, the Price Election Percent MUST equal 0.65 (65\%). |
|  | Liability Adjustment Factor | P21 | 39 | 9.999999 | None |  |


| Exhibit Name: Indemnity Calculations  <br> Exhibit Number: P21-13, Plans $16 \& 17$ Reinsurance Year: 2020 <br> Record Name: Acreage Claim Version: Approved <br> Record Code: P21 Release Date: $7 / 31 / 2020$ |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Insurance Plan Code 16 Margin Protection | 17 Margin Protection with Harvest Price Option |  |  |  |  |  |
| Commodity Code 0011 Wheat | 0018 Rice |  |  | 0041 Corn |  | 0081 Soybeans |
| Calculations | Field <br> Name | Record <br> Number | Field <br> Number | Field <br> Format | Field <br> Rounding | Rules |
| When Insurance Plan Code equals 17: $\begin{gathered} \text { Final Dollar Amount of }=\text { MAX(Projected Price, Harvest Price) * Expected County } \\ \text { Insurance } \end{gathered}$ | Final Dollar Amount of Insurance | Internal |  | 99999999.99 | None | Calculated Value. This is not the Dollar Amount of Insurance used to determine the P11 liability. |
| Loss Guarantee Amount =MIN(Final Dollar Amount of Insurance, Acre Stage <br> Guarantee Amount *Price Election Percent) * <br> Determined Acreage * Insured Share Percent * Liability <br> Adjustment Factor | Loss Guarantee Amount <br> Liability Adjustment Factor | P21 | 60 39 | 99999999.99 <br> 9.999999 | Round to whole number <br> None |  |
| Section 3: Indemnity Calculation |  |  |  |  |  |  |
| With Base (companion) policy (all unit structures):$\begin{aligned} \text { Preliminary Indemnity } \\ \text { Amount } \end{aligned}=\begin{aligned} & \text { Loss Guarantee Amount - Base (Companion) Policy } \\ & \text { Preliminary Indemnity Amount } \end{aligned}$ | Preliminary Indemnity Amount | P21 | 62 | S9999999999 | Round to whole number |  |
|  |  |  |  |  |  | This value is read in from the Base Policy's P21 record, Field Number 63. When there is no base policy claim, please treat the "Base (Companion) Policy Preliminary Indemnity Amount" as a 0. |
|  | Base (Companion) Policy Preliminary Indemnity Amount | Internal |  | S9999999999 | Round to whole number | Amounts paid on the base policy for stage codes P2, PF, PT, R or P are not included in the MP indemnity calculation. <br> If the base policy claim lines that are eligible to be included in the margin unit sum up to a negative number (after excluding unisurable base policy acreage), then treat the "Base (Companion) Policy Preliminary Indemnity Amount" as a 0. |
| $\begin{array}{r}\text { Total Preliminary } \\ \text { Indemnity }\end{array}=\Sigma$ Preliminary Indemnity for the Margin Unit | Internal |  |  | S9999999999 | Round to whole number |  |
| When Total Preliminary Indemnity is less than or equal to 0 : <br> Indemnity Amount $=0$ | Indemnity Amount | P21 | 63 | S9999999999 | Round to whole number | When the Total Preliminary Indemnity for the Margin Unit is 0 or less, then no indemnity is due and all lines within the Margin Unit can be treated as a 0 . |
| When Total Preliminary Indemnity is greater than 0 : <br> Indemnity Amount $=$ Preliminary Indemnity Amount | Indemnity Amount | P21 | 63 | S9999999999 | Round to whole number | The Indemnity Amount on an individual line within a Margin Unit can potentially be negative when the Total Preliminary Indemnity is positive for the Margin Unit. |



