Crop Insurance for Organic Operations

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Organic University
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JARGON

Terms

• Liability- the value of what is insured (never 100% for crop insurance)

• Indemnity- the value of the pay-out for insurable loss

• Premium- the cost of insuring (farmer & taxpayer)

• Let me know when I use insurance jargon you don’t know
Do Organic Farmers & Ranchers Need Insurance?

Image source: https://www.rma.usda.gov/en/Topics/Prevented-Planting
AG Risk Viewer Assessment

Ag Risk Viewer
Yield or Revenue Protection?

2019 Data

<table>
<thead>
<tr>
<th></th>
<th>Liability*</th>
<th>Subsidy*</th>
</tr>
</thead>
<tbody>
<tr>
<td>Major Yield Policies:</td>
<td>$ 21.60</td>
<td>$ 1.08</td>
</tr>
<tr>
<td>Major Revenue Policies:</td>
<td>$ 80.00</td>
<td>$ 5.18</td>
</tr>
<tr>
<td>Totals:</td>
<td>$111.60</td>
<td>$ 6.36</td>
</tr>
</tbody>
</table>

* Billions of $
## Federally Subsidized Organic Crop Insurance

### 2018 Data

<table>
<thead>
<tr>
<th></th>
<th>% of Total Liability</th>
<th>$ Indemnity*</th>
</tr>
</thead>
<tbody>
<tr>
<td>Organic Revenue</td>
<td>52%</td>
<td>66</td>
</tr>
<tr>
<td>Organic Yield</td>
<td>41%</td>
<td>70</td>
</tr>
<tr>
<td>Non-organic Revenue</td>
<td>69%</td>
<td>4700</td>
</tr>
<tr>
<td>Non-organic Yield</td>
<td>12%</td>
<td>1220</td>
</tr>
<tr>
<td>WFRP organic &amp; Non</td>
<td>2.5%</td>
<td>110</td>
</tr>
</tbody>
</table>

* Millions of $
Options for Organic farmers

- Individual commodity-based: revenue or yield per crop
- There are some livestock related products, not covered in this presentation
- Whole Farm Revenue Protection (WFRP)
What’s Available by County

RMA Map viewer

Actuarial Information Browser
WHY Whole Farm Revenue Protection?

• Is major purpose of insurance to assist farmers to stay in business and keep farming?
• Farmer decides what to grow, taxpayers help protect revenue of farmers whatever they grow.
• Covers almost any product in any place in U.S.
• Incentivizes crop and livestock diversity, good for productive and economic sustainability
• Revenue risk spread across all products grown
• Package deal, premiums less then buying separate policies for each crop.
## Montana Use of WFRP Products and Expected Value, 2017

### Top Twenty

<table>
<thead>
<tr>
<th>Non-Organic</th>
<th>Value in 2017</th>
<th>Organic</th>
<th>Value in 2017</th>
</tr>
</thead>
<tbody>
<tr>
<td>Wheat</td>
<td>$41,209,662</td>
<td>Wheat</td>
<td>$929,110</td>
</tr>
<tr>
<td>Dry Peas</td>
<td>$11,950,421</td>
<td>Other Small Grains</td>
<td>$206,048</td>
</tr>
<tr>
<td>Lentils</td>
<td>$11,442,047</td>
<td>Dry Peas</td>
<td>$193,338</td>
</tr>
<tr>
<td>Cattle</td>
<td>$8,051,000</td>
<td>Barley</td>
<td>$173,433</td>
</tr>
<tr>
<td>Barley</td>
<td>$5,475,950</td>
<td>Lentils</td>
<td>$111,674</td>
</tr>
<tr>
<td>Canola</td>
<td>$2,697,580</td>
<td>Clover Seed</td>
<td>$72,000</td>
</tr>
<tr>
<td>Dry Beans</td>
<td>$1,919,197</td>
<td>Wheat Seed</td>
<td>$68,530</td>
</tr>
<tr>
<td>Corn</td>
<td>$1,728,335</td>
<td>Cattle</td>
<td>$106,017</td>
</tr>
<tr>
<td>Alfalfa</td>
<td>$856,094</td>
<td>Flax</td>
<td>$31,639</td>
</tr>
<tr>
<td>Flax</td>
<td>$846,599</td>
<td>Oats</td>
<td>$27,922</td>
</tr>
<tr>
<td>Mustard</td>
<td>$556,623</td>
<td>Wheat (Seed)</td>
<td>$21,286</td>
</tr>
<tr>
<td>Hay</td>
<td>$543,367</td>
<td>Seed (Other)</td>
<td>$21,000</td>
</tr>
<tr>
<td>Other Small Grains</td>
<td>$391,805</td>
<td>Alfalfa</td>
<td>$8,100</td>
</tr>
<tr>
<td>Wheat Seed</td>
<td>$250,689</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Dry Pea Seed</td>
<td>$226,410</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Other Crops</td>
<td>$166,184</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Canola Seed</td>
<td>$165,376</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Seed (Other)</td>
<td>$164,707</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Grass Hay</td>
<td>$146,283</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Forage Production</td>
<td>$143,683</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Totals</td>
<td>$88,932,012</td>
<td></td>
<td>$1,970,097</td>
</tr>
</tbody>
</table>

35 distinct products insured $90,902,109 worth of products
WFRP Limitations

• Have to have to be in 6\textsuperscript{th} year of farming or 4\textsuperscript{th} year of farming if a beginning farmer (10 years or less)

• Livestock and Nursery/Greenhouse Restrictions
  – Coverage of expected revenue from animals and animal products is limited to $2 million in liability;
  – Coverage of expected revenue from greenhouse and nursery is limited to $2 million in liability;

• Good records are required and significant forms to fill out
## Coverage Limits Depend on # of Products Insured

<table>
<thead>
<tr>
<th>Coverage Level</th>
<th>Commodity Count (minimum Required)</th>
<th>Maximum Farm Approved Revenue</th>
</tr>
</thead>
<tbody>
<tr>
<td>85</td>
<td>3</td>
<td>$10,000,000</td>
</tr>
<tr>
<td>80</td>
<td>3</td>
<td>$10,625,000</td>
</tr>
<tr>
<td>75</td>
<td>1</td>
<td>$11,333,333</td>
</tr>
<tr>
<td>70</td>
<td>1</td>
<td>$12,142,857</td>
</tr>
<tr>
<td>65</td>
<td>1</td>
<td>$13,067,923</td>
</tr>
<tr>
<td>60</td>
<td>1</td>
<td>$14,166,167</td>
</tr>
<tr>
<td>55</td>
<td>1</td>
<td>$15,454,545</td>
</tr>
<tr>
<td>50</td>
<td>1</td>
<td>$17,000,000</td>
</tr>
</tbody>
</table>
WFRP Opportunities and Limitations

- Hemp and WFRP
  - The Whole-Farm Revenue Protection, or WFRP, is available beginning the 2020 crop for hemp grown for fiber, flower, or seeds.

- New direct marketing option. Combine crops and products into one commodity.

https://www.farmers.gov/manage/hemp - 11/7/2019
WFRP Practical Limitations

• Recordkeeping
  – WFRP requires farmer to provide yield and revenue data per crop/livestock product
  – Some farms may need to start collecting this data
  – Recordkeeping less onerous on farms that
    • Grow on contract
    • Sell to wholesale
    • Derive the majority of their income from 3-7 crops or animal products
Montana Hill County
An Example of WFRP
How to Request a Quote

- Contact crop agent
  - Agent locator tool:

- Provide the agent with
  - Your farm’s tax forms (Schedule F’s or equivalent)
  - Your expected revenue in year of insurance. (based on history or valid third party sources)
  - Organic System Plan can help with this effort
An Example of WFRP

• This is just an example!
  • WFRP policies are unique and individual to each farm and ranch.
  • The premium cost and indemnity payment for your operation may differ considerably from the information provided in this example.
  • Contact a crop insurance agent for information for your operation.
Historic Approved Revenue and Expenses

• Historic approved* average revenue based on tax forms (5 years or 3 years if beginning farmer)

* Approved is sorted out by agent...
An Example of WFRP

Gross Revenue History (from tax records)
3500 acre organic dryland grain farm in Hill County, Montana

<table>
<thead>
<tr>
<th>YEAR</th>
<th>Gross Revenue</th>
</tr>
</thead>
<tbody>
<tr>
<td>2014</td>
<td>$ 400,000</td>
</tr>
<tr>
<td>2015</td>
<td>$ 190,000</td>
</tr>
<tr>
<td>2016</td>
<td>$ 600,000</td>
</tr>
<tr>
<td>2017</td>
<td>$ 100,000</td>
</tr>
<tr>
<td>2018</td>
<td>$ 500,000</td>
</tr>
<tr>
<td>Total</td>
<td>$ 1,790,000</td>
</tr>
<tr>
<td>Average</td>
<td>$ 358,000</td>
</tr>
</tbody>
</table>
## An Example of WFRP

### Insurance Year Expectations

3500 acre organic dryland grain farm in Montana

<table>
<thead>
<tr>
<th>Hill County</th>
<th>Acres</th>
<th>2019 T-Yield** (bu or lbs)</th>
<th>Price * 2019 Projected</th>
<th>Revenue/acre</th>
<th>Total Revenue</th>
</tr>
</thead>
<tbody>
<tr>
<td>Winter Wheat (cc), bu</td>
<td>1000</td>
<td>18</td>
<td>9.82</td>
<td>$ 176.76</td>
<td>$ 176,760.00</td>
</tr>
<tr>
<td>Spring Barley (cc), bu</td>
<td>1000</td>
<td>11</td>
<td>6.68</td>
<td>$ 73.48</td>
<td>$ 73,480.00</td>
</tr>
<tr>
<td>Spring Lentils, lbs</td>
<td>1000</td>
<td>408</td>
<td>0.16</td>
<td>$ 65.28</td>
<td>$ 65,280.00</td>
</tr>
<tr>
<td>Hemp Seed, lbs</td>
<td>200</td>
<td>320</td>
<td>0.68</td>
<td>$ 217.60</td>
<td>$ 43,520.00</td>
</tr>
<tr>
<td>Safflower, lbs</td>
<td>300</td>
<td>715</td>
<td>0.27</td>
<td>$ 193.05</td>
<td>$ 57,915.00</td>
</tr>
</tbody>
</table>

** Totals 3500 | $ 726.17 | $ 416,955.00

** There is no T-yield for Hemp seed, data from yield from MSU experiment station field trials.
An Example of WFRP

3500 acre organic dryland grain farm in Hill County, Montana

Historical Approved Average Gross Revenue: $358,000
Expected Whole Farm Gross Revenue, 2020: $416,955

Premium and liability coverage is based on lower of two

$358,000
## An Example of WFRP

### Payout for 50% Loss

MT Organic Dryland Farm example 50% loss Scenarios

<table>
<thead>
<tr>
<th>Method</th>
<th>Liability Covered</th>
<th>Farmer</th>
<th>Indemnity</th>
<th>Net</th>
<th>Final</th>
<th>Net Loss</th>
<th>Net</th>
</tr>
</thead>
<tbody>
<tr>
<td>@ 85%</td>
<td>¥ 328,032</td>
<td>¥ 26,702</td>
<td>¥ 119,554</td>
<td>¥ 92,852</td>
<td>¥ 373,470</td>
<td>¥ (187,765)</td>
<td>¥ 15,470</td>
</tr>
<tr>
<td>60% substitution</td>
<td>¥ 354,412</td>
<td>¥ 34,251</td>
<td>¥ 145,934</td>
<td>¥ 111,683</td>
<td>¥ 392,301</td>
<td>¥ (168,934)</td>
<td>¥ 34,301</td>
</tr>
<tr>
<td>Exclusion of bad year</td>
<td>¥ 306,000</td>
<td>¥ 21,946</td>
<td>¥ 97,522</td>
<td>¥ 75,576</td>
<td>¥ 356,194</td>
<td>¥ (205,041)</td>
<td>¥ (1,806)</td>
</tr>
</tbody>
</table>

Historic average revenue of farm= ¥358,000

Expected Whole Farm Revenue in 2020= ¥416,955

50% loss of revenue in 2020= ¥208,478

Previous approved revenue: ¥400,000
• Alternative best ways to insure organic crops in Hill County, Montana @ 85% coverage:
  – Organic Wheat Revenue Protection: $20,845 premium
  – Organic Barley Revenue Protection: $10,401 premium
  – Organic Spring Lentils Yield Protection: $18,273 premium
  – Organic Hemp Seed: NO insurance available yet
  – Organic Safflower Yield only (max 75%): $8,007 premium

Total Premium with individual policies: $57,526
WFRP premium: $34,251
Impact of Diversity

Diversity lowers WFRP premium costs. Moving from five to only three products, and using the same historic and expected price and yields but for only winter wheat, barley and hemp:

- The farmer’s premium raises to $35,555 compared to $34,251 for the five products. So diversity lowers premium costs by 4%, slightly encouraging diversity.

- Important to note, the discount amount is dependent on the relative risk of the crops we removed and location. So there is not a standard discount per product insured.
Vegetable Producer Example

Expected 2021 gross revenue is $40,000

- Potatoes-- $10,000
- Tomatoes-- $10,000
- Melons- $10,000
- All other Direct Market Commodities- $10,000

Historic approved gross revenue $38,000

Cost estimator Premium is $1,663 Revenue Guarantee is $32,300
Is WFRP Worth the Money/Time

- Time to collect tax forms, yield and price data

- Premium cost (investment or cost? Catastrophic or Price?)

- Alternative methods of protecting against risk
Determining Expected Price

- Work with agent to validate your sources of what your expected prices for products are going to be in the year you insure
Determining Expected Yields

- Must be reasonable, realistic, and consistent with available local agronomic information; and supported by verifiable records.
- Usually based on historic average yields.
- RMA county average yields may be used in some cases if a farm has no historic average yields.
- Other sources see agent for details.
DEADLINES

Sales Closing Date      03/15/2021
Cancellation Date       03/15/2021
Acreage Reporting Date  07/15/2021
Premium Billing Date    08/15/2021
Contract Change Date    08/31/2021
Conclusions-Take Homes

- WFRP has improved and needs further improvement, but could be a way to lower public cost of crop insurance while incentivising sustainable diversity. See our detailed recommendations for improvement: [https://attra.ncat.org/product/is-organic-farming-risky/](https://attra.ncat.org/product/is-organic-farming-risky/)

- WFRP may particularly useful when there is NO alternative to the highly specialized and often very valuable products that organic farmers produce.

- Determining details of a policy is a kind of negotiation between you and the agent/company. With WFRP be satisfied that the historic and expected value of what you are insuring is ok with you, otherwise don’t buy it so you won’t be disappointed later.

- Crop insurance is not private insurance, only serviced by private companies. Rules are set by USDA RMA. The agent and company serves you, so you have the right to demand good service. If not complain to RMA.
For More information References on Crop Insurance

ATTRA publications about Crop Insurance

• **Crop Insurance Options for Specialty, Diversified, and Organic Farmers**
  https://attra.ncat.org/attra-pub-summaries/?pub=413

• **Documentation and Recordkeeping for Whole-Farm Revenue Protection (WFRP)**
  https://attra.ncat.org/attra-pub-summaries/?pub=612

• **Primer on Whole-Farm Revenue Protection Crop Insurance: Updates for 2018**
  https://attra.ncat.org/attra-pub-summaries/?pub=595

• **Noninsured Crop Disaster Assistance Program and Whole-Farm Revenue Protection: Understanding the Differences**

  https://attra.ncat.org/crop-insurance/
NCAT/ATTRA: informational assistance to farmers and ranchers

Publications and Guides, Videos, Newsletters, Data Bases, Short Courses,

https://attra.ncat.org/
English: 1-800-346-9140
Bilingual: 1-800-411-3222
Questions?