Heads at left injured by "Hidden Smut," those on the right destroyed by "Loose Smut." The center head is not affected.

The loss to the farmers of Illinois due to smut in the oat crop is usually underestimated. The percentage of smutted heads in the fields of oats as reported by a large number of farmers from nearly every
county in the state last year would indicate a loss of not less than $2,250,000. In view of the great importance of a more complete knowledge of the extent of the injury from this fungus disease it is desired that you cooperate with the Agricultural Experiment Station and kindly assist us in gaining information in regard to the amount of loss for 1902.

You can help us very greatly in this work if you will determine the per cent. of smut in the fields of oats on your farm, and if possible, on your neighbors' farms. In order to determine the per cent. of smutted heads, take an ordinary barrel hoop or light frame of any kind of convenient size and throw over a spot in the field selected at random. Count all of the stalks inside of the hoop and record the number on the blank given on last page of this paper. Now count the stalks affected by smut, and set down in the proper column of the same blank. Repeat this operation in three or more places in every field in order to get an average of smutted stalks for the field.

Caution.—Care should be taken that none of the smutted stalks are passed by unnoticed.

1. The smutted stalks are usually shorter than the healthy ones and consequently are overlooked in counting.

2. The smutted heads do not always push out of the sheath and these stalks are counted as merely dwarfed plants, when if the sheath is unrolled the head will be found to be smutted.

3. The smut appears early, and by the time the oats are ripe, has been mostly whipped off by the wind, in many instances leaving only a bare stalk or stub.

The so-called blighting of oats is generally caused by smut, although the smut may have disappeared entirely. The counting of the smut in the oats should be done as soon as they are fully headed out.

Several hundred farmers have used the hot water, formalin or other treatment of seed oats for smut this season. If you have done so will you please count the smutted heads in the fields where the seed was treated according to the above directions and report the result. It would be very desirable to have a record of the per cent. of smut from treated and untreated fields.

You will confer a great favor upon the Agricultural Experiment Station of the University of Illinois, by filling out the following blank and mailing to the Agricultural Experiment Station, Urbana, Illinois.

A. D. Shamel,
Instructor in Farm Crops.
<table>
<thead>
<tr>
<th>Field 1</th>
<th>Test 1</th>
<th>Test 2</th>
<th>Test 3</th>
<th>Test 1</th>
<th>Test 2</th>
<th>Test 3</th>
<th>Test 1</th>
<th>Test 2</th>
<th>Test 3</th>
</tr>
</thead>
<tbody>
<tr>
<td>Field 2</td>
<td>Test 1</td>
<td>Test 2</td>
<td>Test 3</td>
<td>Test 1</td>
<td>Test 2</td>
<td>Test 3</td>
<td>Test 1</td>
<td>Test 2</td>
<td>Test 3</td>
</tr>
<tr>
<td>Field 3</td>
<td>Test 1</td>
<td>Test 2</td>
<td>Test 3</td>
<td>Test 1</td>
<td>Test 2</td>
<td>Test 3</td>
<td>Test 1</td>
<td>Test 2</td>
<td>Test 3</td>
</tr>
</tbody>
</table>

**Seed Treated for Smut.**

<table>
<thead>
<tr>
<th>Test 1</th>
<th>Test 2</th>
<th>Test 3</th>
<th>Test 1</th>
<th>Test 2</th>
<th>Test 3</th>
<th>Test 1</th>
<th>Test 2</th>
<th>Test 3</th>
</tr>
</thead>
<tbody>
<tr>
<td>Test 1</td>
<td>Test 2</td>
<td>Test 3</td>
<td>Test 1</td>
<td>Test 2</td>
<td>Test 3</td>
<td>Test 1</td>
<td>Test 2</td>
<td>Test 3</td>
</tr>
</tbody>
</table>

Name of variety, if known: _______________________

Where was seed obtained? _______________________

Early or late variety? _______________________

How was ground prepared for seed? _______________________

Date of seeding _______________________

Amount of seed sowed per acre _______________________

Did you screen or fan your seed oats? _______________________

Yield per acre _______________________

Name ______________________

Postoffice address ______________________

County ______________________