



No-Till Farming Practices Observation Checklist

Field Preparation & Initial Cover

Observations regarding the pre-planting conditions and initial cover crop/residue management.

Date of Observation

Estimated Percent Crop Residue Cover (0-100)

Type of Residue Dominant (if applicable)

- ☐ Corn Stover
- ☐ Soybean Chaff
- ☐ Wheat Straw
- ☐ Cover Crop (Specify in Long Text)
- ☐ Other (Specify in Long Text)

Description of Initial Soil Conditions (e.g., compaction, moisture)

Cover Crop Present? (Select all that apply)

- ☐ Yes - Specify in Long Text
- ☐ No
- ☐ Unsure

If Cover Crop Present, Describe Species and Approximate Density

Write something...

Evidence of Previous Tillage?

- ☐ Yes
- ☐ No
- ☐ Unsure

Details on Any Evidence of Previous Tillage Observed

Write something...

Planting Equipment & Technique

Assessment of the planter used and how no-till planting is being implemented.

Planter Type Used?

- ☐ Row Planter
- ☐ Air Seeder
- ☐ Strip-Till Planter
- ☐ Other (Specify in Long Text)

If 'Other' Planter Type, please specify:

Write something...

Planter Row Spacing (inches)

Enter a number...

Planting Depth (inches)

Enter a number...

Techniques used to ensure adequate seed-to-soil contact?

- ☐ Press Wheels
- ☐ Closing Wheels
- ☐ Finned Closing Devices
- ☐ None
- ☐ Other (Specify in Long Text)

If 'Other' Seed-to-Soil Contact Technique, please specify:

Write something...

Is the planter equipped with residue clearing devices?

- ☐ Yes
- ☐ No

Describe residue clearing devices (if applicable)

Write something...

Residue Management & Distribution

Evaluation of crop residue levels, distribution, and decomposition.

Estimated Residue Cover (%)

Enter a number...

Residue Type(s) Present

- ☐ Corn Stover
- ☐ Soybean Straw
- ☐ Cover Crop (specify in LONG_TEXT)
- ☐ Other (specify in LONG_TEXT)

If 'Cover Crop' selected, specify cover crop species and planting date.

Write something...

Residue Distribution – is it uniform across the field?

- ☐ Uniform
- ☐ Patchy
- ☐ Clumped

Describe any observed unevenness in residue distribution. (e.g., areas of thick residue, areas of bare soil)

Write something...

Estimated % of field with >50% residue cover

Enter a number...

Date of last residue management operation (e.g., roller-crimping, chopping)

Enter date...

Describe any residue management equipment used and its effectiveness.

Write something...

Soil Health Indicators

Observations and measurements related to soil structure, water infiltration, and biological activity.

Soil Organic Matter (%)

Enter a number...

Bulk Density (g/cm³)

Enter a number...

Water Infiltration Rate (cm/hr)

Enter a number...

Soil pH

Enter a number...

Soil Structure (Visual Assessment)

- ☐ Excellent (Granular, Porous)
- ☐ Good (Slightly aggregated)
- ☐ Fair (Some compaction)
- ☐ Poor (Massive, Compacted)

Observations of Soil Aggregate Stability

Write something...

Evidence of Earthworm Activity?

- ☐ Abundant
- ☐ Moderate
- ☐ Limited
- ☐ Absent

Notes on Root Development (if visible)

Write something...

Weed Management

Assessment of weed control strategies employed in the no-till system.

What primary no-till weed control methods are being used?

- ☐ Cover Cropping
- ☐ Herbicides (Pre-emergent)
- ☐ Herbicides (Post-emergent)
- ☐ Mechanical Cultivation (minimal - spot treatments only)
- ☐ Crop Rotation
- ☐ Other (Specify in LONG_TEXT)

If 'Other' was selected above, please specify the weed management method.

Write something...

Estimated % of field covered by weeds (visual assessment).

Enter a number...

Dominant weed species observed (if any).

- ☐ Broadleaf weeds
- ☐ Grass weeds
- ☐ Sedges
- ☐ Unknown
- ☐ Other (Specify in LONG_TEXT)

If 'Other' was selected for dominant weed species, please specify.

Write something...

Are cover crops being used for weed suppression? If so, what types?

- ☐ Yes
- ☐ No
- ☐ Unsure

Describe any unusual weed pressure or challenges observed.

Write something...

Pest & Disease Management

Observations regarding pest and disease prevalence and control methods.

Observed Pest Presence (Check all that apply)

- ☐ No Pests Observed
- ☐ Aphids
- ☐ Wireworms
- ☐ Cutworms
- ☐ Grubs
- ☐ Other (Specify in Long Text)

Observed Disease Presence (Check all that apply)

- ☐ No Disease Observed
- ☐ Fungal Disease (e.g., blight, rust)
- ☐ Bacterial Disease (e.g., wilt)
- ☐ Viral Disease
- ☐ Other (Specify in Long Text)

Detailed Description of Pest/Disease Observations (if any)

Write something...

Primary Pest/Disease Management Strategy Used:

- ☐ Crop Rotation
- ☐ Cover Crops
- ☐ Biological Control
- ☐ Mechanical Control (e.g., hand weeding, trapping)
- ☐ Chemical Control (Specify chemicals in Long Text)
- ☐ Integrated Pest Management (IPM)
- ☐ No Active Management

If Chemical Control Used, Specify Chemicals & Application Rates

Write something...

Estimated Pest/Disease Damage Severity (Scale of 1-5, 1=No Damage, 5=Severe Damage)

Enter a number...

Date of Pest/Disease Observation

Enter date...

Any Unusual Pest/Disease Patterns Observed?

Write something...

Overall System Health & Sustainability

General assessment of the long-term viability and environmental impact of the no-till practices.

Estimated Crop Yield (compared to conventional tillage)

Enter a number...

Estimated Fuel Consumption (compared to conventional tillage)

Enter a number...

Evidence of Soil Erosion (visual assessment)

- ☐ No Erosion
- ☐ Minor Rills
- ☐ Moderate Rills
- ☐ Severe Gullyng

Observed Benefits (select all that apply)

- ☐ Improved Water Infiltration
- ☐ Reduced Soil Compaction
- ☐ Increased Organic Matter
- ☐ Enhanced Biodiversity
- ☐ Reduced Labor Costs
- ☐ Improved Soil Health

Narrative Summary of System Health

Write something...

Date of Last Soil Health Assessment

Enter date...

Farmer Perception of System Sustainability (scale of 1-5)

- ☐ 1 - Very Unsustainable
- ☐ 2 - Unsustainable
- ☐ 3 - Neutral
- ☐ 4 - Sustainable
- ☐ 5 - Very Sustainable

Upload Photos of Field & Soil

 Upload File