

How to use a Power Thresher

Why is proper usage of a thresher important?

Improper maintenance, machine settings or operation of a power thresher can increase losses and fuel consumption, and potentially endanger the operator's health.

Before operating the thresher

Make sure that the thresher is in good condition (see separate fact sheet on Power Thresher Maintenance)

1. Position the thresher

- Choose a leveled area close to the crop stack.
- Spread a canvas underneath the thresher.
- Assemble the thresher if it was dismantled.
- Position the thresher so that the straw is thrown with the direction of the wind.

2. Check the machine

- Check belt alignments and tension.
- Check pegs for wear and tightness.
- Rotate the threshing cylinder several times.
- Check engine oil and fuel levels.
- Check lubrication of bearings.

Operating the thresher

Three to four persons are needed for operation: for loading the tray, for feeding the machine, and for bagging.

- **Start the engine** and check speeds (peg tooth threshing drum: ~ 600 rpm, blower: ~ 800 rpm, sieve: ~ 200 rpm)
- **Load the feed tray** with harvested crop with the panicle towards the feed opening.
- **Feed the crop at a uniform rate.** Adjust the feed rate to match the condition of the material. Maintain maximum feeding rate without overloading the engine.
- **Adjust the cleaner** to suit the threshing conditions.
 - Close blower openings and open slowly until a small amount of mature grain flows over the wind-board.
 - Adjust the angle of the wind-board.
- Always use a stick to **remove clinging straw** from the oscillating screen to prevent injury.



Optimizing thresher operation

- **Long straw:** briefly hold the crop bundles at the feed opening for partial threshing.
- **Short straw:** Recycling the straw if unthreshed loss is high.
- **Hard to thresh varieties:** Install stripper bars. The stripper bars prevent straw from wrapping around the cylinder and aid in threshing. Only install if necessary because they reduce capacity and increase the amount of small straw.
- **Wet or partially decomposed crop:** Reduce feeding rate to avoid overloading. Keep cleaning screen free of clinging straw. Open the cylinder cover periodically to clean the lower concave.



Stripper bars

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