

FIELD NOTES

March 15, 2019

One way to cut the cost of cover crop establishment:

NREC researchers have cut the cost of planting cover crops by installing an air seeder onto a corn head. Seeds can be dispersed while corn is being harvested – saving time and money. Eric Miller, farmer cooperater says, *“Our thought was, we have a machine that goes over every corn acre already. Let’s utilize that asset. Plus, we’re usually harvesting from mid-September through mid-October. That’s a perfect time to establish our cereal rye cover crop.”*

By taking advantage of timely planting, true benefits are realized. Multi-year NREC research shows that a cereal rye cover crop can offer a consistent and meaningful reduction of nitrate levels in tile drainage water. Other cover crops can be seeded using different sized seed shafts.

Implemented in Piatt County, the seeder (top photo) is part of a larger project that compares cereal rye cover crop with no cover crop. Scalability is possible for large acreages (see bottom photo, courtesy of Ty Brown). NREC is hoping this innovation will encourage more farmers to use cover crops as part of a nitrogen loss reduction strategy.



Piatt County Trial Details:

Cereal Rye is blown through individual hoses mounted under each row snout, and scattered before crop residue is sized and deposited by the corn head.

In-cab controls automatically adjust seeding rate based on ground speed, and start/stop the flow of seed when the corn head is lowered/raised.

Seeding rate = 40 lbs./acre
Hopper filled every 12 acres using seed tender with bulk boxes (larger hoppers have up to an 80 acre capacity).
Total fill time is 4 minutes.

**Cover crop seeding takes
20 seconds/acre!**