

Weed Control Without Chemicals

David C. McCoy, Fredericktown, Ohio, has switched from the use of commercial fertilizers and weed control chemicals to almost total dependence on manure and mechanical weed control. In the process he's had to solve a lot of problems, including "compacted pastures, excessively cloddy fields after primary tillage, and 100 times as many foxtail plants as corn plants in the row. We haven't completely solved these problems but we've come a long way," he told FARM SHOW. "I'm pretty satisfied with my primary tillage - my subsoiler and offset disc. It's the secondary tillage I'm unhappy with. There's some new rotary equipment coming out - such as the Dyna Drive and the Aer-way but I couldn't justify the price tag,' says McCoy.

McCoy finally solved the problem when he saw a Lilliston rolling harrow that looks like a disk but, in place of discs is equipped with large spider wheels. When he learned that Lilliston no longer makes the decadeold product, he decided to build his own.

"I used an old Deere BW disk and an extra set of spider wheels I had for my rolling cultivator. I modified the hubs on the spiders to fit the gangs on the disc and made the entire "rolling harrow' for about \$80, plus the \$450 cost of the disk which I bought 5 years ago.

"I never would have believed how well it works. It prepares a much better seedbed than a disc or field cultivator, eliminating a pass through the field. It saves one or possibly two passes in preparing corn stalk ground for oats and hay. And I think that, by changing the angle of the gangs to a less critical angle, it could also be used for pasture renovation.

"It does an unbelievable job of intermixing the crop and animal residues in the top $2\frac{1}{2}$ to $3\frac{1}{2}$ in. of topsoil. It doesn't leave ridges like a disk sometimes does and it breaks up clods much better than a cultivator. I don't use chemicals but I think it would also do an excellent job of incorporation.

"I think the Lilliston rolling harrow was an example of an excellent tool that was made before its time. Now that we're moving to conservation tillage, it's the tool we need."

Contact: FARM SHOW Followup, David C. McCoy, Rt. 1, Fredericktown, Ohio 43019 (ph 614 397-4664).

Electric Change-Over Kit For 4000 Series Deere Tractors

"I've used this system on my own tractor for 14 years. It's solved all my electrical problems," says Edmund Kilzer, New Leipzig, N. Dak., who's begun marketing a change-over kit that, he says, improves the wiring which once caused a fire on his tractor.

"There are three electrical systems on the tractor and they're unbalanced in such a way that one battery or the other is always undercharged. This kit makes it charge evenly and grounds the system properly" says kilzer

Deere 4000 series tractors start on 24 volts and have a 24-volt generator, but the lights and accessories operate on 12 volts. Lights and accessories on the left side are run by one battery and lights and accessories on the right side are run by the other. According to Kilzer, because the 24-volt generator charges only one battery at a time, the battery not being charged often runs down.

Kilzer's kit consists of a seriesparallel switch, a 12-volt alternator, wiring and ground straps. The series-parallel switch, which wires into the circuit between the two batteries, automatically starts the tractor on 24 volts and then switches back to 12 volts for everything else. Once the wiring kit has been installed, the alternator charges both batteries at once, thanks to the parallel hookup.

Deere offers an aftermarket kit for the tractors that includes circuit breakers designed to improve the wiring system. Kilzer has designed kits to fit both modified and unmod-



Editor's Note: Have you got a "best idea" you'd like to share with FARM SHOW readers? It might be a new wrinkle in cropping, live-stock, machinery or whatever. Maybe it's still experimental but looks promising. Or, maybe you've already proven it works. We'd like to hear about it. Write to: Best Ideas, c/o FARM SHOW, P.O. Box 1029, Lakeville, Minn. 55044.



Old Deere Cultivator Rebuilt For Ridge-Till

Bob Reimann, Olivet, S. Dak., could get almost nothing in trade for his used Deere RG4 row crop cultivator so he rebuilt it for ridge-till by equipping it with chisel shanks, Deere disk-hillers, and Hinniker sweeps and ridgers.

"It's similar to Hiniker's ridge-till cultivator, complete with stabilizer disks, disk hillers and the same sweep and ridger set-up," says Reimann, who bought the sweeps and ridgers direct from Hiniker. "I needed a new cultivator, primarily because the spring shanks on the Deere cultivator weren't strong enough for notill and had too little penetration."

Reimann replaced each row gang of 5 spring shanks with one chisel shank. To do that, he built brackets across the mounting supports to which he attached the shanks. The large RG4 stabilizer discs remain in place ahead of the smaller Deere disk hillers, which Reimann says Hiniker also uses on their cultivator, mounted just ahead of the ridger unit.

"It works great. I can cultivate at 4 mph and it'll penetrate even the hardest ground. I was surprised how well it works. When I built it I installed a solid shaft 4-in. dia. bar across the top for extra weight but I don't think I even need it because it penetrates so well," says Reimann.

Contact: FARM SHOW Followup, Bob Reimann, Rt. 1, Box 26, Olivet, S. Dak. 57052 (ph 605 583-2286).

ified wiring systems, and has a kit that includes an ammeter and oil meter to replace the warning lights installed as standard equipment on the tractors. The kits range in price from \$349 to \$369.

Contact: FARM SHOW Followup, Edmund Kilzer, Prairie Sales, Rt. 1, Box 28, New Leipzig, N. Dak. 58562 (ph 701 824-2434).