



Front-Mount Spray Tank

By Gary Owen

Front-mount spray tanks are handier to fill and easier to see around than saddle tanks or in-between trailer tanks, according to two Marshalltown, Iowa farmers who built a sturdy mount for their 4-WD 8630 Deere tractor.

Jim Beem and Steve Harre built a front frame to support a 500 gal. tank using two pieces of 8 in. wide, 3/8-in. thick plate steel for the frame and 2 by 6-in. tube steel for the cross frame. The two lengths of plate steel weld directly to the tractor chassis.

"It's important to extend the tank frame back about as far as the tractor door," Beem says. "That eliminates twisting and a lot of the bounce that can shorten frame life."

Beem and Harre mounted headlights on front of the tank frame. The two men supplement their farm income by doing custom welding for neighbors in their farm shop.

Contact: FARM SHOW Followup, Steve Harre, 2561 Reed Ave., Marshalltown, Iowa 50158 (ph 515 752-5873).



"Repowered" Deere 5020 Tractors Fitted With 4640 Cabs

"Our repowered Deere 5020 tractors are quiet, cheap and extremely dependable," says Russ Day, Grimes, Iowa, who helped his father Dennis and friend Ed Meade replace the original 110-hp diesel engines on three used 5020's with used 318-hp Detroit V-8 diesel truck engines and also installed Sound Gard cabs removed from Deere 4640 tractors.

"These are our big horsepower tractors," says Russ. "The 5020 tractor came factory-equipped with an underpowered 110 hp diesel engine which had a lot of problems, and it also needed better power steering. The Detroit 871 engine we replaced it with is normally used in semi-trucks. It's factory-rated at 318 hp, and we turbocharged one engine to deliver 350 hp. However, the implements we pull don't demand that much power so we reduced horsepower to 250 hp. At that rate the engines should last virtually forever."

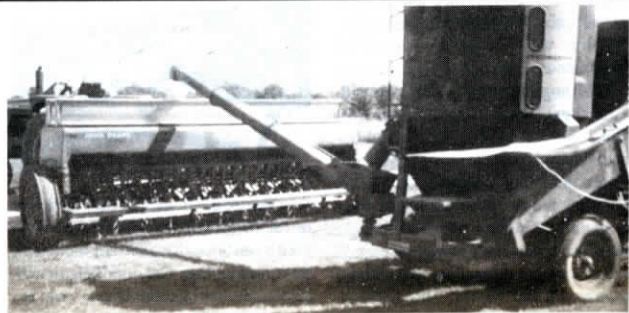
"We paid less than \$5,000 for each of the tractors. One had been wrecked in a train accident, one had a burned out cab, and one didn't have an engine or cab. We spent less than \$6,000 to repower each tractor and install new cabs. Now they do the same work day in and day out as new \$80,000 tractors. They aren't equipped with power shift transmissions, but the engines have so much reserve torque that we can run them at half throttle so we don't have to constantly shift gears. These

truck engines are twice as powerful and four times more reliable than tractor engines. One engine had already worn out two semi trucks before we bought it. We repowered our first tractor in 1973 and it has more than 6,000 hours on it. We've never touched it."

The Days use the tractors to pull a 24-ft. wide tandem disk at 6 1/2 mph as deep as it will go in the ground, as well as a 30-ft. finishing disk and a 30-ft. field cultivator. They use one tractor without fluid in its tires for light duty row crop and field cultivator work. The tractors equipped with naturally aspirated engines have dual exhausts mounted on the sides of the tractors. Frame rails welded to the sides of all three tractors support an extra front-mounted 50-gal. fuel tank and air cleaner.

The 5020s were built before Deere made the Sound Gard cab. In order to make room for the Sound Gard cabs, which were designed for 4640s, the Days had to replace the power steering on all three 5020's with the power steering from a Deere 4640 tractor and remount the gear shifters. "The newer cabs are much quieter, less dusty, and ride much smoother because of the hydraulically cushioned seat," says Russ, who notes that it took about four months to repower each tractor.

Contact: FARM SHOW Followup, Russ Day, Rt. 2, Grimes, Iowa 50111 (ph 515 270-8188).



Grinder-Mixer "Drill Fill"

"This modified grinder-mixer is the biggest labor-saver on our farm," says Carl Stemple, Coleman, Mich., who turned an old grinder-mixer into a "drill fill" for treating seed and augering it into drills and planters.

To convert it for seed-handling, Stemple disengaged the hammers in his Farmhand grinder and removed the screens. No other modifications were needed. It'll hold about 90 bu. of seed.

Stemple dumps seed out of gravity wagons into the grinder-mixer and treats

seed by pouring chemicals directly and slowly into the hopper. The machine can be quickly converted back to grinding feed, although it would have to be cleaned thoroughly to eliminate seed treatment chemicals.

Stemple uses the grinder-mixer to load and treat bin run wheat, oats and other small grains. It could also be used on corn and soybeans.

Contact: FARM SHOW Followup, Carl L. Stemple, 4341 Barden Rd., Coleman, Mich. 48618 (ph 517 465-6070).

Built-It Yourself Parts Washer

You can make a first class parts washer using miscellaneous junked parts that cost almost nothing, according to Bob Hamilton, Gobles, Ontario, who spent just \$75 to come up with his washer design.

"Factory-built parts washers cost \$500 and up and then you have to buy the cleaning fluid on top of that. The main cost for my washer was for a remote filter housing, which was \$50," says Hamilton.

The washer consists of an old enamel sink mounted on top of a 45 gal. barrel. The barrel is about a third full of cleaning fluid. The fluid is pumped out through an outlet pipe near the bottom of the barrel, through a spin-on oil filter (he used a Fram disposable spin-on filter) and up through an in-line filter to the outlet nozzle in the sink. A wash brush is fitted to the outlet nozzle to help in cleaning parts. Dirty fluid drains out the bottom of the

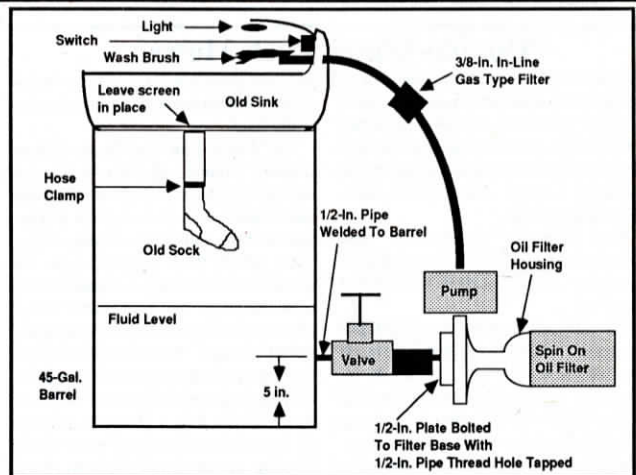
sink and filters through an old sock that's changed often.

"I've used it for 10 years or so and I've never pumped a single piece of dirt or debris back up to the sink," says Hamilton.

The outlet pipe should be positioned at least 5 in. above the floor of the barrel so dirty dirt will settle below it. A valve just outside the barrel lets you close off the flow of fluid when changing filters.

Hamilton used a rebuilt washing machine pump, which he bought for \$20, to pump the cleaning fluid. Both the pump and hoses must be resistant to the corrosive effects of gas, oil and the varsol cleaning fluid.

"I normally keep about 15 gal. of varsol in the barrel. When I put new fluid in the washer I add about a gallon of transmission fluid. It keeps the fluid from evaporating and makes it easier on your hands.



You can also buy commercial cleaning fluid but it isn't cheap." Contact: FARM SHOW Followup, Bob

Hamilton, Rt. 1, Gobles, Ontario N0J 1V0 Canada (ph 514 458-8024).