"One-Of-A-Kind" Flex Cultivator

"Most flex cultivators have two problems. The wings don't flex downward enough and the center section is too wide to truly flex over rolling ground." says Terry Kastens, Herndon, Kan. who, along with his brother Gary, built a one-of-a-kind flex cultivator.

The unique tillage tool consists of a folding 7 by 7-in. toolbar with three separate 3½ in. sq. bars mounted behind. Kastens points out that it could also be used as a planter, fertilizer applicator or to perform other row crop jobs.

The center section of the 8-row toolbar is 8 ft. wide and each wing is 7 ft. "Most folding cultivators don't flex down enough for truly rough ground. On our toolbar the wings drop as much as needed to follow the pitch of the land. A unique lift cylinder arrangement lets us easily raise the wings at the end of the field," says Kastens.

One cylinder is used to lift the

wings. It pulls on a pair of levers fitted with two pin holes. The lift levers attach to a sliding lift bar connected to the wings. In the field, the lift bar is pinned to the lower set of holes, and the bar slides in and out to let the wings flex up and down freely. For transport, the lift bar is pinned to the top hole so the hydraulic cylinder can fold the wings 90°.

Changing the lift bar pins takes just seconds and Kastens notes that unlike other folding cultivators, the lift arms are designed in such a way that no adjusting of hydraulic levers is necessary when operating the cultivator. In the field you simply put the lever all the way down and, to lift, you pull it all the way up.

"Another problem with most flex toolbars is that the center section is usually too wide to follow rolling contours. When you cultivate directly down the peak of a ridge in the field, the



The same cylinder is used to control flex wings both in the field and for transport by changing pins in cultivator lift bars, center.

center sweep or planter unit tends to gouge. The reason for this is that the gauge wheels for most flex bars are placed in the middle of the two rows, directly outside the tractor tires. On our toolbar, the gauge wheels are positioned directly under the front 7-in. toolbar which means they run directly behind the tractor tires. This way the center section only needs to be three rows wide," says Kastens.

To get the wheels under the toolbar, he used short and squat

9½-in. dia. by 18-in. wide tires. Straight-up screw jacks attached to each wheel makes cultivator depth easy to adjust. Kastens says having the wheels directly under the toolbar also helps the cultivator walk through ditches and furrows without gouging because it shortens up the depth of the machine.

Contact: FARM SHOW Followup, Terry Kastens, K & K Farm, Rt. 2, Box 81, Herndon, Kan, 67739 (913 626-9573).

One-Man Wood Processor

Putting wood up for winter is a lot easier for Vince Koebensky, Buffalo, Minn., since he built his one-man wood processor equipped with both a 30-in. buzz saw and a 5-in. hydraulic ram splitting wedge.

"It's so easy to run I let my 5-year-old son run the controls while I load the saw and splitter," says Koebensky.

Power's supplied by a 4-cyl., 35 hp. Wisconsin engine that's channeled through a 2-stage, 28 gpm pump to push the 5 by 24-in. splitting ram. The 30-in. buzz saw is engaged by lowering a rubber tire clutch onto the power shaft pulley and the drive shaft pulley. Hydraulics also power a log lift alongside the splitter for lifting big logs onto the splitting table.

The wood processer has electric start and electric lights for night work.

Contact: FARM SHOW Followup, Vince Koebensky Welding, Rt. 1, Box 126-1, Buffalo, Minn. 55313 (ph 612 682-4276).



Heavy-Built Hay Loader Powered By Semi-Tractor

"It'll lift 5 tons of hay at a time," says Tony Aceti, Silver Lake, Oregon, who raises hay commercially and custom-loads hay for other growers in his area with a unique semi-tractor mounted heavy-built hay loader.

Aceti started with a Freightliner truck which he no longer needed to haul hay. He installed 2,000 psi hydraulics and removed the 5th wheel to install a rear command center, setting up steering, brake, clutch and all other controls. To handle hay, a large mast fitted with squeeze arms was mounted on the back. All controls and add-on equipment can be removed in 2 hrs. to convert back to a straight over-the-road truck.

"Shifting and braking con-

trols are mechanically linked to override truck controls. It's pretty complicated to figure out and every truck is different. This truck was already geared low so we didn't have to gear it down for close-in work," says Aceti, noting that semi-tractors are ideal for the work because of their short wheelbase and over-the-road speeds. "I can move quickly from farmstead to farmstead at highway speeds."

Aceti charges \$60 to load a semi-trailer with hay. He spent about \$20,000 to build the loader, not counting the truck, but notes that similar size commercial rigs cost \$80,000 and more. "This truck is much easier to service and it has a good, heavy-duty Cummins engine," says Aceti.

Once the hay is loaded, he



simply jumps back in the cab and drives down the road. No changeover time is required.

Aceti says it took him about 9 months, working part time, to build the loader. He says other farmers in the area have also

built their own semi hay loaders. He's interested in building units on a custom basis.

Contact: FARM SHOW Followup, Tony Aceti, P.O. Box 45, Silver Lake, Oregon 97638 (ph 503 576-2229).