



Two hydraulic cylinders raise and lower caddy. A third cylinder controls disk gang.

## UP-FRONT DISK GANG RAISES AND LOWERS HYDRAULICALLY INDEPENDENT OF CADDY

# Caddy Converts 3-Pt. Implements To Pull-Type

New caddy converts any 3-pt. mounted implement to pull-type, eliminating the need for a 3-pt. hitch and letting you mount a hydraulically-controlled disk gang up front, says manufacturer Rich Follmer, Hudson, Ill.

A pair of hydraulic cylinders raise and lower the caddy and a third cylinder raises and lowers the disk gang.

"As far as I know, this is the only caddy equipped with a hydraulically-controlled disk gang that converts 3-pt. mounted im-

plements, including V-ripper subsoilers, grain drills, and planters, to pull-type," says Follmer.

The caddy is available in two widths - a 12-ft. model that sells for \$6,150 and a 15-ft. model that sells for \$6,500. Both units can be converted into no-till drill caddies by removing the disk gang and adding a no-till coupler package available from Follmer.

For more information, contact: FARM SHOW Followup, Rich Follmer, RR 1, Box 17, Hudson, Ill. 61748 (ph 309 454-1564).



Moe's "lifters" raise either side of topper 2 1/2 ft. for easy access to entire pickup bed.

## THEY LET YOU GET IN FROM THE SIDE

# Spring-Loaded "Lifters" For Pickup Toppers

Gilmore Moe liked having a topper on the back of his pickup but he didn't like having to climb into the back of the truck whenever he needed something at the front of the bed. To solve the problem he came up with new lift brackets that let him get in under the topper from the side.

Moe's spring-loaded "lifters" install easily on both sides of the topper using ordinary tools. Once installed you can easily raise either side of the topper about 2 1/2 ft. for easy access to the entire pickup bed. When you lift one side of the topper, the brackets on the other side serve as the hinge.

Moe says the trickiest part of making the brackets was figuring out how to make the spring-loaded joint. "They let you easily

raise up the topper yet don't take up much room inside the box. No maintenance is required. Once installed, you can forget about them. They'll fit any topper," he says.

The topper has a key lock for security. Lets you remove the topper easily when necessary. Each bracket attaches to the top of the pickup box with two bolts.

Sells for \$199. "I've had 50 prototype units out for 2 years to work out the bugs. Haven't had any problems at all with them," notes Moe.

For more information, contact: FARM SHOW Followup, Gilmore Moe, Tip A Top Corporation, Rt. 2, Box 209, Alexandria, Minn. 56308 (ph 612 762-1655 or 218 729-7123).

## \$350 SYSTEM LETS YOU CHECK BARN FROM COMFORT OF YOUR BED OR EASY CHAIR

# Closed Circuit TV For Livestock Barns

"It lets you see and hear what's happening in the barn and has a 2-way audio system so you can actually talk back to the camera and the animals or anyone in the barn will hear you," says Ed Mueller of Mueller's Audio Visual, Davis, Ill., about his "affordable" new closed circuit TV system designed for use on farms.

Priced at \$350, the system can be wired into your regular TV so that while watching other shows, you can punch up the "barn channel" to see what's happening. "Farmers are tired of constantly running out to the barn only to find out that nothing has happened. We now have affordable technology that lets you see what's happening so you only make the trip outside when necessary," says Mueller.

His system consists of a camera that can be mounted anywhere and a monitor that can be positioned as much as 300 ft. away. It can be located even further away but the picture will start to get grainy over 300 ft. The camera is housed in a special all-weather housing that's designed to stand up to moist and dusty barn conditions.

The camera is fitted with a speaker. The 2-way audio system only works with Mueller's special monitor. If you wire the system into a regular TV you'll be able to hear what's happening in the barn but you won't be able to talk back.

The basic system consists of the camera, an all-weather case, 100 ft. of cable, and the monitor. The standard camera is fitted with a 16 mm lens which provides a 30 degree viewing range. An optional 8 mm wide angle lens is also available as are panning



Closed circuit TV system has a 2-way audio system that lets you talk back to the camera, animals, or anyone in the barn.

motors. Mueller says most farmers buy a second camera rather than a panning motor since the motor costs almost as much as a camera (\$250). He also notes that some farmers have devised their own panning motor by mounting the camera on the body of an oscillating fan.

The 12-in. monitor can handle as many as four cameras at once. It automatically scans all four in intervals of 4 to 60 seconds.

"We've already sold more than 100 systems to farmers for use in all types of barns. Interest is tremendous because the cost of equipment is finally low enough that most farmers can easily justify it," says Mueller.

For more information, contact: FARM SHOW Followup, Ed Mueller, Mueller's Audio Visual, 17768 Riche Road, Davis, Ill. 61019 (ph 800 869-6412 or 815 865-5508).

## Watchdog Camera "Walks" Through Barn

Running out to the barn in the middle of winter to check on pregnant ewes is a job Minnesota sheep farmer Bart Pederson used to hate. Now he just turns on his TV and sends his home-built robot camera on a trip through the barn. Pederson raises registered Montadale sheep. "They start lambing in January when it's usually below zero. They're in a barn, which helps, but they need to be checked every couple hours, even at night.

"When I was a junior in high school I had to do a science project and got the idea of a remote observation system. The problem with it is that one camera by itself wouldn't allow me to see many of the sheep because of the way my barn is partitioned. So I designed a motorized apparatus to swivel the camera 360° back and forth and almost 360° up and down. It also travels from one end of the barn to the other, providing a perfect view of every animal in the barn.

"One of the best things about the system is that it lets me see the sheep without them seeing me, which keeps them from getting jumpy and nervous. I can check the sheep without getting out of bed.

"Camera movement is controlled by three windshield wiper motors powered by a 6 or 12-volt battery charger. Price of everything in the system was only about

\$75, not counting the camera.

"I made the track for the system out of 1/8-in. thick, 5/8-in. dia. steel pipe. It's about 35 ft. long, made out of three sections of pipe hooked together. One of the wiper motors powers an old combine pulley that rolls along the pipe track. The other two wiper motors pivot the camera back and forth and up and down through chains and sprockets.

"Any battery charger should work to power the system, transforming AC current to DC. I chose a Century 10-amp model because it was inexpensive. You can use the 6-volt setting if you want the camera to move real slow. I use 12-volt because it provides good speed the way I have the motors geared.

"All motors are controlled from inside the house, which is about 300 ft. away. I use a Magnavox observation camera, which can be bought from Sears. Despite the mess of wires around the camera, they don't tangle up and there's no fire hazard because they only carry 12 volts.

"I have detailed plans, complete with wiring diagrams and a materials list, which I could sell."

Contact: FARM SHOW Followup, Bart Pederson, Blacksmith Farm Montadales, HCR 70, Box 399, La Porte, Minn. 56461 (ph 218 224-2662).