Mangers That Slow-Feed Horses

Mahlon Yoder designed his grazing mangers with horses' stomachs in mind. The unique design mimics natural grazing.

"I wanted to slow down the eating process and get horses feeding in a natural position," explains Yoder, M.D.Y. Horseshoeing & Harness Shop.

Yoder notes that horses will naturally graze for up to 18 hrs. a day. Anything they eat moves out of their stomach within 2 hrs. Spreading their intake throughout the day keeps something in the stomach and, as Yoder puts it, "makes for a happy horse".

His feeders promote the effect of grazing by collapsing against the hay as it is removed. In the case of the large bale feeder, the two opposing feeding sides are hinged at the bottom and collapse inward from the top. Leaves and small stems that break loose fall to the floor of the manger to be eaten later, not to the ground where they will likely be stepped on. One side panel swings open for loading bales.

Small bale or loose hay feeders have a top grate that presses downward as hay is removed. Two vertical rods on one side of the feeder secure the grate, while allowing it to float downward as hay is removed. The top of the rods are shaped like candy canes. This allows the grate to be lifted up and tipped to the side when refilling the feeder.

In both basic designs, the small holes in the grated sides or top prevent the horse from pulling large amounts from the feeder.

"Other feeders allow the horse to reach up and pull down hay, but with mine they are either looking ahead or down and are limited in how much hay can be pulled out at one time," says Yoder. "By stretching out the process with the grazing manger, you will see less boredom, waste, ulcers, cribbing, bossiness and obesity."

The mangers are made with all-welded, all-steel construction, powder-coated for long life. The large grazing manger, with room for a large square or large round bale, is priced at $1,500 with a rain roof.

Small bale or loose hay feeders are available in multiple sizes, including a 3 or 4-bale feeder that can accommodate several slabs from a large square bale. These smaller feeders stand 30 in. high with drain holes in the floor. They start at $295.

"The large feeder has 6 ft. of feeding space on each of the 2 feeding sides and can accommodate from 1 to 5 horses," says Yoder. "The smaller feeders also work well with sheep and goats."

Yoder also makes wall-mounted mangers with or without a detachable feed box.

Contact: FARM SHOW Followup, M.D.Y. Horseshoeing & Harness Shop, 1455 S 1100 W, Middlebury, Ind. 46540 (ph 574 825-8161).

Manger promotes the effect of grazing by collapsing against the hay as it's removed, limiting how much hay the horse can pull out at one time.

Russ Wilson uses slatted fence panels mounted on running gears to make portable windbreaks that can be easily moved.

Cattle Like Portable Windbreaks

Russ Wilson keeps winter feed costs down by keeping cattle comfortable with portable windbreaks. Mounted to running gears, the 8-ft. tall wind barriers can be moved from paddock to paddock for winter grazing and feeding hay. Moving them around throughout the winter also spreads out manure.

"I move the windbreaks every day," says Wilson. "The cattle graze alongside and then tuck back behind the windbreaks to warm up before going back out again to graze."

Wilson quotes researchers at the University of Saskatchewan who say that a 25 mph wind at 0 degrees can reduce a cow's energy by 30 percent. With his windbreaks, he eliminates the wind and the need for extra feed to replace lost energy.

To make the portable windbreaks, he stretched out 5 running gears to their maximum 16-ft. length. On 3 of them, he mounted 20-ft. slatted fence panels fabricated from 1 by 8-in. rough-cut pine boards. Slatted panels on the other 2 were fabricated from 8-ft. tall, 8-in. wide, 16-gauge steel purlins. Slats are mounted about 4 in. apart.

"I mounted the panel on the first one with steel braces welded to the running gears," says Wilson. "On the next ones, I bolted the braces to the running gear."

Using bolts allows Wilson to remove a windbreak panel and replace it with a flatbed and 330-gal. totes. He uses it to provide water to cattle on a rented pasture without water access.

For added stability, Wilson mounted salvaged 16-ft. long, 6 by 6-in. and larger, steel I-beams on each running gear. Combined with the wind-breaking spaces in the panels, the design even stood up to a tornado that knocked down trees in Wilson's front yard.

"I figured I would find nothing but twisted steel and broken boards," says Wilson. "It didn't even move them."

When Wilson does want to move them, they are light enough that he can do so easily.

"I can use the side-by-side with differential lock until the snow gets more than 20 in. deep," he says. "Then I use my 4-WD, 45 hp. tractor."

Contact: FARM SHOW Followup, Wilson Land & Cattle Co., 1532 Stitzinger Rd., Tionesta, Penn. 16353 (ph 814 354-2325; ancattle@gmail.com; www.russwilson.net).

The 8-ft. tall wind barriers can be moved from paddock to paddock for winter grazing and feeding hay.

Low Cost Yield Monitor Fits Old And New Combines

FarmTRX retrofit yield monitors can be used with any age combine, installed in a few hours, and calibrated in minutes. Using the FarmTRX subscription service web app, data is cleaned, processed and interpolated within seconds of being uploaded to the cloud. Moments later, yield maps appear.

Frustrated with high-cost commercial yield monitors producing low quality data, Perry Casson decided to build his own. The fact that Casson had one foot on his Saskatchewan farm and another in the world of high technology software didn't hurt in creating FarmTRX. After making his mark developing software and hardware for cell phone networks in the 1980's and 1990's, he returned home to the family farm in 2003. A year later he co-founded a software company specializing in GPS-based tracking of flights and vehicles.

While running variable rate fertilizer tests with Cavalier Agro in on-farm plots in 2015, his frustration with available yield monitors peaked. In a few days time he built a data logger. His software company helped with the programming. Within 3 years he had introduced the yield monitor and a subscription service to process the data and produce yield maps.

"We've priced the yield monitor at $1,849," says Braden Wyatt, FarmTRX. "Our optional subscription service cleans up the data, correlates multiple combines and produces useable yield maps for 10 to 50¢ an acre."

The monitor can be installed in 4 hrs. or less. It includes a GPS receiver and rooftop antenna, Bluetooth connectivity and data storage sufficient for at least 5 years on an internal SD card. Self-cleaning optical sensors measure the height of grain on each passing paddle.

The unit's Bluetooth connection eliminates the need for a dedicated in-cab display. The mobile app for Android or Apple IOS allows a phone or tablet to be used for real-time data review.

At its most basic, the yield monitor measures and displays yield data in real time in the cab, at a terminal or on a mobile device. Later analysis is what gives such data its value, but only if the data is accurate.

FarmTRX yield monitor measures and displays yield data in real time in the cab, at a terminal, or on a mobile device.

"When we looked at yield monitor data coming off of other yield monitors, it was shocking how difficult it was to get accurate data with some of them," says Wyatt. "Some yield monitors require a huge investment in learning. We try to make ours as easy as possible to use. Monitoring yields doesn't have to be a strenuous activity."

Using the GPS point location, uploaded data is automatically located within the field boundary.

Calibration is simple and can be done immediately after installation or automatically in the cloud at a later time using the web app. All that's needed is to enter total known yield from particular fields. Calibration is needed only once a season.

Raw data can be shared with others in various formats. It can be moved to Climate Fieldview or one of the other default export settings. Bluetooth sharing eliminates the need for cards or flash drives and their potential loss.

FarmTRX emphasizes that all yield data and maps are the property of the farmer.

Wyatt says more changes are ahead for the FarmTRX. "We'll be introducing a moisture sensor later this summer," he says. "We are looking to add some other precision technologies in 2020."

Contact: FARM SHOW Followup, Troo Corporation, 43 Auriga Dr., Ottawa, Ont. Canada K2E 7Y8 (ph 877 702-8766; sales@farmtrx.com; www.farmtrx.com).