

Chuck Knipp, Palco, Kan.: "I have a lot of sockets in my shop without cases and nowhere to put them. So I made a socket holder using a piece of 1 1/2-in. angle iron mounted to the wall. I spaced the sockets out on the bar and then marked each location with chalk. Then I ground down the points on some nails and tack-welded them to the bar. After a little paint, I had a cheap, durable socket holder.

"I made a rotating screw and nail holder by welding a piece of 3/4-in. sucker rod to an old disc blade to make a stand. Then I attached metal grain leg buckets to pieces of strap iron that fit over the sucker rod. Four buckets weld to each strap iron bracket, which has a 3/4 in. hole in it. I tackwelded large washers to the sucker rod to hold each set of buckets in



place. They spin freely around the rod. It took only a couple hours to build but is a great way to organize screws, nuts, bolts, nails, staples and other small parts."



Warren Lauppe, Merced, Calif.: "I made a small cart to carry my welder, cut-off saw and air compressor. It's designed to make a tight turn to fit into a small space in my garage. And it has large tires so it will move easily over uneven surfaces. The top shelf is cantilevered over the back without rear posts so it's easy to remove the cutoff saw from the bottom when needed."

Edward E. Eveleigh, South Coffeyville, Okla.: "You had an article in FARM SHOW a while back comparing different penetrating oils and the torque needed to bust a rusty nut



Bob Bugger welded truck wheels together to build his own shop furnace. A heated antifreeze mixture is pumped through plastic tubing under his shop's floor.

They Built Their Own Shop Floor Heat System

Bob Bugger, Jr., Effingham, Ill., built his own shop furnace out of old welded-together truck wheels. He uses it to heat his shop floor.

Bob worked with his dad, Bob Sr., to build the system. "We wanted a more efficient wood burning system so we decided to build our own," says Bob. "We installed the system when we built our shop, and it really works great. We use wood in the stove so it provides very cheap heat," says Bugger.

They welded truck wheels together, one on top of the other. The base wheel is from an old Budd semi and it supports the grate for the wood fire. On top of that wheel they welded 3 Dayton wheels. To add wood to the fire they simply lift a lid on top.

Next, they enclosed the stacked wheels with a water jacket made from a used oil tank. The heated anti-freeze mixture is then pumped through plastic tubing that runs through the shop's floor. The heat is thermostatically controlled. A pair of homemade water manifolds mount on the wall and are connected by PEX Schedule 80 pvc tubing. Eight runs of the tubing were laid out over the shop floor before the concrete was poured. A pump circulates the water through the stove and floor.

The Buggers heat the water up to as high as 140 degrees. It's not boiling, but to be safe they installed a shut-off valve in the manifold just in case anything goes wrong and the water gets too hot.

"We spent only about half as much to build our manifold as a new one with copper tubing would have cost," says Bugger. "We don't use the system for air conditioning because cooled concrete can sweat from high humidity," he notes.

Contact: FARM SHOW Followup, Bob Bugger, Jr., 10095 N. 900 St., Effingham, Ill. 62401 (ph 217 433-3781). Money-Saving Repairs & Maintenance Shortcuts

Have you come up with any unusual money-saving repair methods for fixing farm equipment? What maintenance shortcuts have you found? Have you had any equipment recalled by the factory? Name a particularly tough mechanical problem you've had with a piece of equipment and how you solved it.

These are a few of the questions we asked randomly selected FARM SHOW readers. If you have a repair tip, maintenance shortcut, or other mechanical experience you'd like to share, send details to: FARM SHOW, P.O. Box 1029, Lakeville, Minn. 55044 or email us at: editor@farmshow.com.

Mark Newhall, Editor

loose after using them (Vol. 33, No. 4). It said the best one was the cheapest, a homemade 50-50 solution of acetone and transmission fluid. We started using it and it works very well. My son used it to break loose a stuck motor on an Allis tractor and a rust-frozen chain on a kid's bike. My son says he's never seen anything work this well. The only problem is that it smells a bit like cat urine. Good stuff."

Donna Barber, Crestview, Fla.: "We found mildew on the vinyl window seals in a used RV we recently purchased and couldn't remove it with conventional cleaners. We decided to try some carburetor cleaner sprayed on a rag. It worked like a charm with very little rubbing. Just don't get it on painted surfaces or decals. We now use it for all sorts of oddball cleaning. It takes ink and grease off clothes without damaging the dye in clothes or carpet. We usually try brake cleaner first, since it doesn't contain MEK, as do most carb cleaners, so there's less chance of damage."



Rex Gogerty, Hubbard, Iowa: A garden rake with a busted handle makes a nifty hanger for small shop tools.

Larry J. Snaza, Brooklyn Center, Minn.: "I've been a mechanic for 45 years and have found that saving bearing races of different sizes has been very useful for installing seals in tight spots. I use them to push the seals into place."

Chad Travis, Drasco, Ark.: "I used scrap metal to make a safety cap for the oxygen cylinder I use with my acetylene welding torch. Safety caps are used when storing or transporting the cylinder. Commercial stem caps sell for about \$50, but my only cost was time. The top ring is made from a length of 1/2-in. dia. rod rolled into a circle, and the base plate from 10-ga. metal. The ring and base plate are connected by a pair of weldedon metal plates. The cap's threaded collar,



which screws onto the oxygen cylinder, is off a commercial storage cap - I simply cut the bottom off. The safety cap is designed so I still have full access to the cylinder's shutoff valve at the center top, and to a pair of gauges on one side.

"I made a C-clamp so I could replace a U-joint on the driveshaft on my 1995 Chevy 2500 pickup. The driveshaft and yoke on



older pickups like mine are made from aluminum so I didn't want to risk beating on it with a hammer. Commercial clamps sell for \$130, but I used scrap metal for mine.

"To make the clamp I first measured, then made a pattern, traced it and cut it out of 1-in. thick plate steel. I welded one nut on top of the clamp and another nut at the bottom that serves as a spacer. To press the yoke out, I place it inside the clamp and then use a socket wrench to turn a threaded bolt that goes through the top nut."

Joe Staadegaard, Lynnville Farm Equipment Ltd., 808 Regional Road No. 4, RR 1, LaSalette, Ont., Canada NOE 1H0 ph 519 443-7591: "We offer carburetor kits for the English Zenith carburetors found on old British-made David Brown Leyland