



continued

dept. end

well end



# Build A Low-Cost Shed

With some imaginative planning this 40- by 60-foot shed went up for \$25,000.

BY DAN MILLER  
PHOTOGRAPHY ROB LAGERSTROM

There are as many building designs as there are stars in the night sky. But we think this simple 40- by 60-foot tractor shed illustrates design techniques that apply to any out building.

Site. The site is large enough for the building and for “traffic lanes” wide enough around the outside of the building to allow for easy maneuvering of equipment.



Here's the old machine shed this new barn replaced.

Design. The building has a 20-foot wide center alley and a pair of 10-foot wings on either side.

Space. The owner drew onto a sheet of grid paper blocks of space equal in scale to his equipment to ensure it would all fit. He added extra space for walkways and any future expansion of his equipment line.

Material. The barn is built with treated, Southern yellow pine. It is low maintenance, resists rot and holds up to the elements. The floor is crushed limestone. The roof is made from long-lasting galvanized steel.

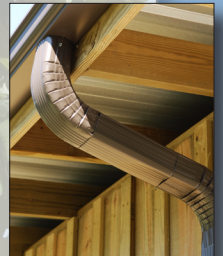
FOR A COPY OF THE FLOOR PLANS to this equipment shed go to [www.progressivefarmer.com](http://www.progressivefarmer.com). You will also find a video describing construction of this building.

**SPANPINE**

The Southern Pine Awareness Network

Lumber for this project was provided courtesy of the Southern Pine Awareness Network. For detailed information on southern yellow pine go to: [www.spanpine.com](http://www.spanpine.com).

Not every machine shed includes gutters. They are an added cost. However, the concern here was that storm water would flow off the roof, onto gradually sloping ground and cause erosion. One inch of rain on this roof creates about 1,600 gallons of water. Gutters then, gather this storm water to four down spouts that direct water away from the building in a more controlled manner.



Except for the pair of locked storage areas in front, this building was designed with open sides. It makes it more flexible. Equipment can be easily moved through the sides, instead of maneuvering everything through the middle of the building.

The outside support posts are 12 feet apart. The next row of supports are in 10 feet from them, creating 10- by 12-foot spaces that can later be converted to horse stalls.



The steel roof will probably out last the machine shed. Metal is more expensive than a more traditional roof made of wood sheeting and shingles. But the lack of maintenance and the longevity of metal means this roof will pay for itself over the long term. The silver color of the galvanized roof also is more reflective of the sun and its heats. An added benefit is that metal gives the barn a traditional look.



The joists are wooden. Instead of a steel truss system, the builder simply nailed together two, 2- by 12- inch pieces of yellow pine lumber. Those joists support the roof. And, they are hefty enough to span the 20 feet of the center. The joists are supported by a post and beams running down either side of the alley. There is 10 feet of clearance between the ground and joists.



The barn features a spacious, 20-foot center alley. Running lengthwise, 60-feet through the shed, it creates a convenient route for moving equipment around the building. For example, larger pieces of equipment, such as trailers, can be pulled directly into—and through—the barn. Establishing a sensible traffic pattern for equipment is essential in planning any building. The alley is wide enough for parking pickup trucks and equipment side by side.



To store equipment and supplies that are more prone to “walk away,” the owner built two secure storage areas, each 10- by 12-feet. These areas are large enough to hold equipment, such as chainsaws and mowers. With room for shelves, there also is ample space to store mechanical and field maintenance supplies off the floor. The double doors were built with materials available at the construction site.

