

## Make Your Own Weeding Spade

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This invention was declared public domain on February 15, 1996, a gift to humanity.

Here is a design for making a hand held weeding spade to weed between plants, such as a bed of garlic. The weeding spade was made from a masonry "pointing" trowel (Figure 1) by notching and sharpening the edges of the trowel. The advantages of using a "pointing" trowel to make the weeding spade include:

- High quality trowels have very strong and hard blades made of tool steel that cannot be sharpened with file. A high quality trowel will hold a sharp edge better than a hand hoe blade that can be sharpened with a file.
- Compared with a hand hoe, less effort is required for working a trowel blade below the soil surface because the trowel blade is thinner. For example, the Marshalltown pointing trowel blade (model 45-5 and 45-6) is 0.05 inch thick near the handle and 0.025 inch thick near the point; compared to the Ames hoe with a 0.1-inch thick blade.
- The "pointing" trowel blade provides both a narrow edge and a broad edge for weeding between plants.

Grind notches (1/8 inch wide, spaced 3/4 inch apart) on the edges of the trowel using an angle grinder (Figure 1). The notches permit hooking and tearing of the weeds. The edges of the trowel are beveled sharp with an angle grinder, or a grinding wheel. Be careful not to grind the blade at one spot for an extended period (more than 1 second). Otherwise heat will build up, changing the steel color to blue and the steel may become brittle at that spot. The grinding can also be done at shops that sharpen knives, scissors or saw blades. Cost of a six-inch masonry "pointing" trowel is \$3-10, depending on quality of steel, thickness of blade, and manufacturer.



Figure 1. Angle grinder for modifying the trowel; masonry "pointing" trowel; and a weeding spade.

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