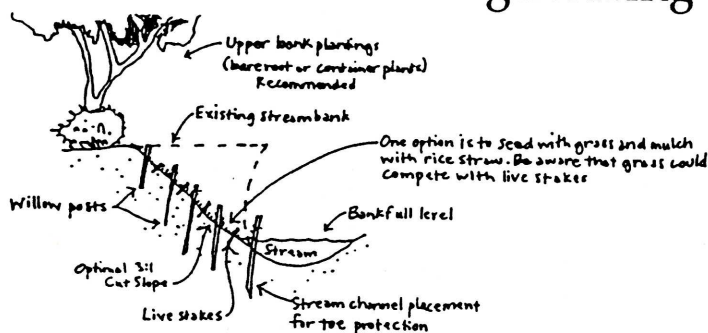
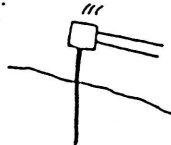


Soil-Bioengineering



1. Using a substantial sledge hammer and a construction stake (metal pole with a point) make a planting hole.



2. Wiggle stake loose after every few blows of the hammer so you will be able to remove the stake after making as deep a hole as you can.



3. Place live pole in hole started by stake. Place a board on top of the pole and then hammer the live pole in. The board protects the pole from splitting.



POLE CUTTING TREATMENT FOR STREAM BANKS
(Willows or Cottonwoods Recommended)

Ricky O'Connor

Preparation of cuttings should involve cutting the fatter stems near the base of main branches of shrubs or trees, rather than using the new growth tips, which are thinner and more vulnerable to damages. The cuttings should be at least 18 inches long and 1"-3" thick. Pole sizes are 4-10 feet long and up to 6" thick.

The butt end of the cutting is the end that is planted down in the ground and will root. This butt end should be pointed when you make the cutting. This is helpful for two reasons. The point establishes what the butt end is, so you don't accidentally plant the cutting upside down in the ground, and the point helps make it easier to drive the cutting into the soil. Use sharp tools to make the cuttings so you don't mangle them with loppers or pruners and make them vulnerable to water moisture loss and other problems.

Prepare holes for cuttings in dry soil by driving a piece of rebar into the ground and pulling it out. Gently tamp the cutting into the hole created by the rebar to prevent stripping the bark. Roots start from points in the inner bark so loosening of the bark from the wood destroys the root-sprouting ability of the cutting. Don't damage or split the cutting when hammering in because this significantly hurts its survival capabilities. The deeper the cuttings are set, the better. A good goal is to bury 4/5ths

8. If you are on a dry slope at a high elevation or in a dry Western or Southwestern environment, complete the project by watering the fascines with a water tank truck or other available means.
9. Stakes used to hold the fascines are made of 2 foot long 2" x 4" boards cut on a diagonal. Live cuttings can also be driven through the fascines to both aid in holding them in place and to help revegetate the site.

