Manual Sound Effects
Information Sheet

When a sound must be timed to coincide with other sounds or dialog, using manual SFX is the easiest answer. Creating manual SFX is fun. With imagination, experimentation, and patience almost any sound can be simulated. Creating sound effects can be time consuming, so give yourself plenty of time. It is a good idea to use a tape recorder to record your experiments and play back each trial as you perform the effect. This way you can get just the right effect, because some effects sound slightly different when they are recorded. Here are a few ideas you can experiment with:

Blows to the head:
Hit a cantaloupe, pumpkin or a melon with a wooden mallet.

Body falling:
Use some pieces of wood, pad them with wet towels, put them in a large container and dump them on a cement floor.

Car crashes:
Fill a heavy-duty box with light-weight scrap metal and chunks of wood.

Dog, Cat, and other animal sounds:
You can record the real thing of course, but probably the easiest way is to listen to examples from movies, TV, or the real thing; then imitate the sounds vocally.

Doors:
The door is probably the most often used sound effect in radio drama. When a door is required, set up the sound effects mic near a real door and open or close it at the appropriate time. If regular use is needed, you may want to build a small portable door frame. A good size for the frame is about 4 feet high by 2 feet wide. For a convenient height place the door knob near the top of the frame. Find the door before you build the frame and construct the frame to fit the door. (The wood shop teacher may be able to help you out.) An old hollow core door may be cut to the desired size and rebuilt. Use heavy hinges and a brass latch and striking plate. Two doors can be hung on this one frame—one of them could have a squeaky hinge or you could install a screen door. The weight of the door itself and a different type of latch will help to change the sound of the second door. Construct the frame of heavy wood. Casters can be installed on the bottom of the frame for portability.

A smaller door frame may be built (18" wide by 24" high for instance). This smaller frame size is convenient for moving about and setting on a table. Put a handle on the top for carrying and a flat base (12" by 18" sheet of half-inch plywood) on the bottom. Use a “C” clamp to secure the base to the table.

Fire:
Crinkle cellophane.

Footsteps:
To create footsteps walk in place on the existing floor or on specially constructed piece of flooring. When recording, experiment with mic placement until just the right distance is found.

1. Leather heeled shoes are best. A wooden floor piece can be constructed for a wood floor (see drawing at the right).
2. You can build stairs of three or four steps with 4 or 5 inch risers. Use solid wood on a 2 by 4 frame.
3. A 2 foot by 4 foot ceramic tile base can be constructed for footsteps on cement.
4. Line a box 5 or 6 inches deep, 2 feet wide and 3 feet long with old carpeting and fill it with the type of surface you want to create (gravel, dirt, etc).
5. For footsteps in snow, place cornstarch in a double or triple plastic bag (A single bag is likely to break.) and work it in your hands to simulate the proper rhythm.
6. Footsteps on dry grass can be simulated by using a pile of straw on a throw rug or a cement floor.

Hand tools:
Sounds such as sawing, hammering, filing, etc., usually sound best when done manually.

Horse footsteps:
Saw a coconut in half across the middle and clean out the pulp. (CAUTION: Sawing a coconut in half is not easy. You may be injured. Get help from a wood shop teacher or an expert in the use of tools.) The shells can be clapped together, or they can be clapped into a small box of sand or dirt. Experiment with the speed until just the right gait is achieved. For more horses use more coconut shells.

Rain:
Recorded rain is much simpler to use than trying to simulate the sound of rain. If you wish to perform rain manually, a box with an open side (pointed toward the mic) and an open top can be constructed. Stretch a piece of butcher paper tightly over the top and pour rice or sand onto the paper. Angling the open end up slightly will allow the rice to roll off the box into a container lined with cloth. Experimenting with mic distance and the thickness and tautness of paper will vary the effect.

Scratchy pen or pencil:
A lead pencil and a rough piece of paper will do it if you are close enough to the microphone.

Shots:
Slap a leather seat with a ruler.

Splintering wood:
Thin pieces of plywood can be broken.

Thunder:
For unsynchronized sound, recorded thunder is much simpler. If, however, thunder must be synchronized, a thunder sheet can be constructed. A thunder sheet consists of a thin sheet of sheet metal (about 5 feet long by 18 inches wide) fitted with 1 inch by 2 inch boards at each end. The sheet can be hung by one end from the ceiling. The operator can take hold of the loose end and move the sheet sharply to simulate rolls of thunder. Experimentation with this can create very realistic thunder.

(For additional information sources on manual sound effects, see Resources section.)