## Preserve Your Fruits and Veggies -- How to Make a Simple Solar Dehydrator

You can preserve your fruits and many vegetables by drying them in a solar dehydrator. Several factors to consider: Begin with fresh and ripe foods; clean them and slice into thin uniform pieces; foods that tend to turn dark can be dipped in lemon juice (ascorbic acid); high moisture foods are not practical for dehydrating; place food items in the dehydrator in the morning to utilize the whole day of sun; some vegetables store better if blanched before dehydrating; test for dryness - fruit should be somewhat flexible, but no liquid should come out when cut; vegetables are dry when they are easily broken or crushed.
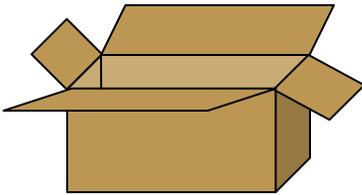
Step 1 – The simplest method is to use a cardboard box that is approximately 30" L X 20"W X 15" H for a small family. Most any size can be used, but choose one that is sufficiently deep, suitable for the amount of food that is to be dried and that can easily be taken inside at night or if rain comes. The box could also be built of wood, metal, bamboo mat material, etc.

**Step 2** – Cut off the box flaps if using a cardboard box.
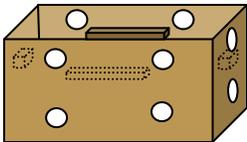
Step 3 – Glue or staple tray supports (can be made of ¾" X ¾" wood, or can be sticks, bamboo, etc.) about 4" down from the top. Cut ventilation holes above and below the tray supports allowing enough space for the tray to rest on the supports and for the top to fit down over the sides (see step 5).

Step 4 – Paint the inside and outside of box with black paint, preferably a non-toxic water based paint. If an oil or lacquer based paint is used, allow sufficient drying time so that all paint vapors are dissipated. Cover the ventilation holes with screen wire to keep bugs and flies out – may be attached with glue, staples, etc.

Step 5 – Cut a top cover from a sheet of <u>clear</u> plastic. Clear plastic for table covers is commonly found, but if not available, glass, Plexiglas (expensive!), acrylic, or even several layers of plastic wrap (not very durable) can be used. If none of these are available, screen wire can be used, but additional drying time for the food may be required due to the shading of the screen.
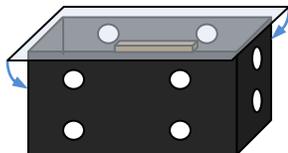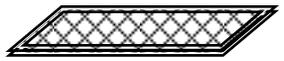
Make a frame, wood or available material, that will fit inside the box on the frame supports and then attach a grid or screen that will be the food tray. Stainless steel or plastic works best. If other material is used, be sure nothing toxic or harmful can be transferred to the food.