Solar Drier
For Fruits
And Vegetables
THE ALUMINUM SCREEN INSERT IS TO BE A STANDARD 28" x 46" ALUMINUM WINDOW SCREEN

PLAN VIEW - BASE

SECTION

VIEW

2 x 2 FRAMING

5/8" x 5/8" GLUE & NAIL

ALUMINUM SCREEN INSERT

REMOVE ALUM. SCREEN INSERT FOR CLEANING

INSECT PROOF SCREENING

LATTICE

2 x 2 FRAMING NOTCHED FOR 1 x 3 BRACES

LATTICE
PLAN VIEW - COVER

LATTICE

2 x 2 FRAMING NOTCHED FOR 1 x 3 BRACE

VIEW

COVER TO BE ATTACHED TO BASE WITH HOOK & EYES

PERSPECTIVE
PURPOSE AND PRINCIPLES OF DRYING

Bacteria and molds are the two main causes of spoilage in raw foods. You can prevent growth of these by removing most of the water present in raw foods. Drying is an effective way to remove this water, but it must be done correctly. Best results occur when the food is exposed to dry air with a temperature high enough to assure drying at a fairly rapid rate but not so high as to produce “cooking” or “scorching.” Detailed instructions on preparing fruits and vegetables for drying are given in HEB 205 “Home Drying of Food,” HGIC Leaflet 3080 “Drying Foods,” HGIC Leaflet 3084 “Drying Fruits,” HGIC Leaflet 3085 “Drying Vegetables,” and HGIC Leaflet 3086 “Drying Herbs, Seeds and Nuts.”

FACTORS INVOLVED IN DRYING

Two main factors involved in successful drying are:

• Temperature of the air surrounding the product.
• The rate of air movement.

Warm dry air moving over the exposed surfaces of the product to be dried will absorb moisture from it. The higher the temperature of the air the more moisture it will absorb, and the greater the air movement the faster the moisture will be carried away. Air at a temperature of 82 °F will carry over twice as much moisture as 62 °F air, and air at 130 °F has over eight times the moisture-carrying capacity of 62 °F air.

BILL OF MATERIALS

4 pcs. 2" x 2" x 4'-2" - sides of top and bottom
4 pcs. 2" x 2" x 2'-8" - ends of top and bottom
3 pcs. 1" x 3" x 2'-8" - cross braces
2 pcs. *5/8" x 5/8" x 4'-2" - support for window screen
2 pcs. 5/8" x 5/8" x 2'-8" - support for window screen
4 pcs. lattice x 4'-2" - nailing strips for screen wire and clear plastic
6 pcs. lattice x 2'-8" - nailing strips for screen wire and clear plastic
4'-2" x 32" 6-mil clear plastic
28" x 46" aluminum window screen
4'-2" x 2'-8" screen wire - galvanized
tacks, staples and nails
4 screen door hooks and eyes

* dressed lumber size

NOTE: This dryer will hold approximately 3/4 bushel of fruit.

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