

wheels are skirted to prevent accidents and to protect them and the basement from the weather. The side walls contain no windows, since the sun never shines on them. Two ventilation ducts can be seen on the "west" wall, to the left of the main door. Near the peak or ridge can be seen the photocell units which trigger the rotation when they "see" the sun, stop the motor when shaded, and reverse the motor at night. At the left is part of the cooling equipment, including water evaporator and the heat-exchanger.

### Sunlight distribution

Sunlight is more evenly distributed in this room than in the stationary room, horizontally, vertically, and throughout the day, because only the altitude of the sun changes. Much light reaches plants from the front wall, the roof, and by reflection from the back wall. Seasonal performance is summarized briefly in the table. The average intensity is relatively constant for three fourths of the year, and the average percentage of sunlight admitted approximates 100% over the day. With higher-altitude sun, the noon maxima are reduced. At all seasons the intensities early and late in the day are enhanced in general over outdoor values.

### Intensities

Maximum intensities, regardless of angle of light meter with the horizontal, average 113, 118, and 139% of horizontal values in summer, equinox, and winter conditions, respectively; these indicate actual higher total light available to plants than represented by horizontal values. Maximum intensities of about 9,000 foot-candles are obtained in all seasons, with higher values in some locations for short periods of time. Admission of sunlight in this rotating room is considerably greater than in the earlier stationary plastic room (28% more in winter, 67% more in spring and fall, and 102% more in summer), about 66% more over the year. Refrigeration of solar heat in such an insulated room is very economical.

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# SUNDAR PEACH

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**S**UNDAR (Sanskrit for beautiful) originated in 1940 from four generations of crossing with many different parents in its pedigree—including Elberta, Late Champion, Krummel's October, Luken's Honey, and Peento. The fruit is large, up to 200 grams, with a distinct red blush on a white skin, slightly fuzzy, and without a prominent beak. The flesh is white with much red next to the stone. The aroma is agreeable, as in most white-fleshed varieties, and the flavor sweet with moderate acidity and little bitterness. The flesh is very juicy but rather tender; the skin is tough and semi-adherent. At full maturity the fruit requires careful handling and is rather inclined to drop. When picked just before it softens, the fruit keeps well. The tree grows vigorously. The flower has large petals and is pollen-fertile; and the leaf glands are globose.

Sundar matured about September 7, 1965, at Riverside, a week later at Santa Paula, and even later on the Beaumont mesa (where there is a small commercial planting). Accordingly, it ripens about 10 days later than the Rio Oso Gem. Sundar appears not to be especially susceptible to monilia brown rot. It has produced a crop regularly in the San Ber-

This large, late-maturing, white-fleshed, freestone of superior quality, requiring only a moderate amount of winter chilling, is recommended for home use in California's intermediate valleys and southern mesas.

nardino, Hemet, and Santa Clara (Ventura County) valleys, at Saticoy, and east from Santa Paula. The yield at Riverside has been satisfactory in 18 of the past 22 years and very light in 3 years—1958, 1959, and 1961, following extremely mild winters—and was not recorded in one year. At Riverside, about 700 hours of winter chilling are required at or below 45°F.

Production has been irregular on the south coastal plain—near Oxnard and Ventura or within about 10 miles of the coast—owing to insufficient chilling; and in 1961, following an extremely mild winter, it failed completely. Information on commercial sources of nursery stock or of scion wood may be obtained by writing to R. L. Baldwin, Farm Advisor, Agricultural Extension Service, 684 Buena Vista Street, Ventura, California 93001 or J. W. Lesley, Department of Horticultural Science, University of California, Riverside, California 92506.

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