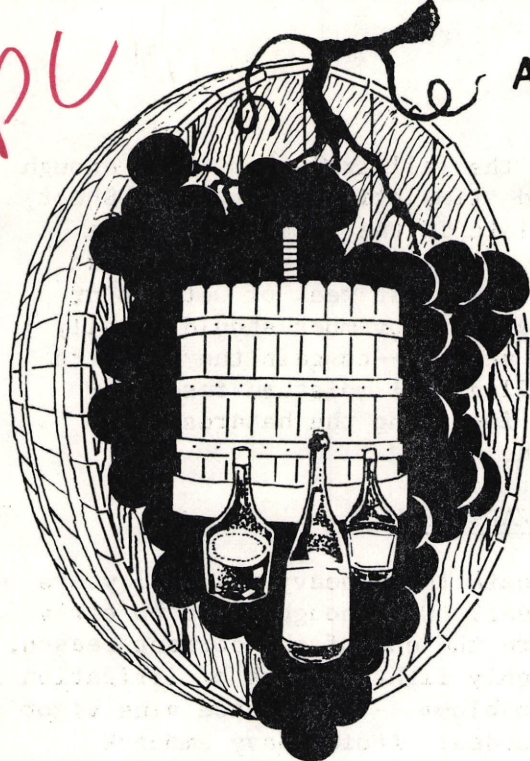




Central Coast Counties

Grape Squeezes

NOVEMBER 1971

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ROOT INSURANCE?

Most of us can't afford to not have auto insurance---in case we might "bang up" the front end of our car.

How about "root insurance"---in case we might ruin the "rear end" of our vines' root system?

The insured conditions we want for optimum root growth must include a continuous, ample supply of both moisture and aeration ---at least during the growing season.

Can you depend on rainfall in sufficient amounts each year---to supply the moisture needs of those deep roots? But if it doesn't rain enough we can always apply an irrigation in the spring to make up for the deficit. Right?

Well....maybe? Certainly we can put on enough water in the spring to make up for a moisture deficit....but how about an aeration deficit?

But is aeration that important?---try holding your breath for about two weeks---then tell us about it!!

Let's face it...for our non-uniform coastal grape soils, it's likely that a heavy, pre-bloom irrigation will greatly limit aeration and discourage or kill deep roots.

The question is---how do we guarantee those deep roots an ample supply of both moisture and aeration!

HOW ABOUT A FALL IRRIGATION?

A late fall irrigation makes sense. As an "insurance policy," it may guarantee your vines an optimum root environment for maximum vine production capacity. Moreover, with deep roots guaranteed a full moisture reservoir---during the dormant period when lack-of-aeration is not so critical---you don't have to put on a heavy pre-bloom irrigation---which may "louse up" aeration and ruin the "rear end" of your vines' root system.

✓ Encourage deep root growth. Guarantee that deep soil moisture is replenished---with the help of "iffy" rainfall. Prime the top-soil layers with an irrigation to make sure. Make it happen, now!!

Strive to have the lower soil layers rewetted by the end of the dormant season in December-January.

Allow adequate drainage and aeration to occur before and during the period when maximum root growth occurs (by the time pruning wounds bleed until about bloom).

Refrain from applying unnecessary or excessively heavy irrigations during the pre-bloom period when root growth and tender new roots can't do without aeration.

Conserve soil moisture in the spring by eliminating weed competition. Apply herbicides and disk under those weeds as soon as possible to prevent excessive moisture loss.

Add water in the spring in proportion to the amount that has been withdrawn from the soil. Don't over-irrigate and lose those new roots!

✓ Insure ample uptake of needed nutrients. Make it happen---each year---by applying a late fall irrigation. Rainfall, alone, may not get the job done soon enough--or adequately.

✓ Encourage leaching of harmful salts. Salts applied in your irrigation water remain in the root zone unless you apply water in excess of what the vine needs for optimum growth and production.

Flush those salts below the root zone during the dormant period with the help of rainfall---at a time when lack of aeration is not critical.

Remember, in many cases a fall irrigation to prime the soil for winter rainfall leaching...is all that is needed to prevent harmful salt accumulations.

Apply the fall irrigation late enough to avoid stimulation of growth. Shoot growth late in the season is at the expense of stored materials for next season. The last week of October or first part of November should usually be late enough---to gain the benefits of a filled soil moisture reservoir without incurring the hazards of regrowth.

PLAN AHEAD---NOW

Duplicate those heavy rainfall years every year? Get enough water on early ---before the end of the dormant season. Put on only light amounts of irrigation prior to bloom---to increase vine vigor ---if needed. Avoid heavy amounts (over 2-3") until there is enough foliage and moisture withdrawl.

Apply irrigations in proportion to the moisture withdrawl rate. Amounts that exceed withdrawl may cost you in terms of lost roots---and in terms of production of quality grapes.

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