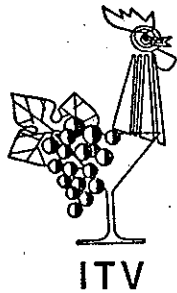


# 'Birebent' graft is hailed as a breakthrough in viticulture



## COMITÉ D'ENCOURAGEMENT A LA RECHERCHE TECHNIQUE ET CONCOURS DE L'INGÉNIOSITÉ

PALMARES 1988

### PALME D'OR DE L'INGENIOSITE

P. BIREBENT — WORLDWIDE VINEYARDS, chemin de la Lauve, 83700 Saint-Raphaël :  
*Greffe aérienne d'été.*

#### Section « Equipements Viticoles »

##### ■ Travaux en vert

1<sup>er</sup> PRIX : Sté INFACO, 81140 Cahuzac-sur-Vère :  
*Scie pour travaux en vert.*

MENTION : J. NINORELLE, 1, rue Saint-Ulrich, 67120 Avolsheim :  
*Matériel de relevage des rameaux.*

##### ■ Entretien des sols

MENTION : R. BERTRAND, « Les Petites Rochettes », 84820 Visan :  
*Chasse-pierres niveleuse.*

##### ■ Matériaux de palissage

1<sup>er</sup> PRIX : CLEARPLAS FRANCE S.A., B.P. n° 6 G, zone industrielle, route du Mans, 61130 Belleme :  
*Manchon pour réparation de piquets de palissage.*

##### ■ Récolte mécanique

MENTION : M. LIGONES - EDRAL, Saint-Alexandre, 30130 Pont-Saint-Esprit :  
*Dispositif de secouage continu pour machine à vendanger.*

#### Section « Techniques Viticoles »

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Worldwide Vineyards Consultants will go anywhere.

The firm supplies consulting and management services in viticulture and enology from offices in France and the U.S. The U.S. address is P.O. Box 714, St. Helena, Calif. 94574. In France the address is Imperators-Tibere, 104 Chemin de la Lauve, 83700 St. Raphael, France.

*Almost a decade ago, a French viticulturist came to the Napa Valley to learn about grafting. Now he returns, offering to teach something new.*

The use of grafting to change the variety of a vine is a fairly common practice in the United States. However, in France the traditional methods of "T-bud" and "chip-bud" were not used at all until recently. In 1981 Paul Birebent of the French consulting firm Worldwide Vineyards first learned of these methods in the Napa Valley, and helped to introduce them to the French viticultural community. Although these grafting techniques have proven to be highly successful, they do pose certain drawbacks. First and foremost is the loss of one year's harvest. Another inhibiting factor, primarily in France, is the specific time of year that the procedure must be implemented: April through June, normally a period during which the vineyard manager is already sufficiently occupied.

It was for these reasons that Birebent decided to develop a new technique which he introduced at the 1988 Montpellier SITEVI. Such was the success of this new method that he was awarded the gold medal of ingenuity. The "greffe Birebent" permits the harvest of the current variety, and then the production of the grafted variety the following year. Thus, one can change the variety without

**The variety can be changed without the loss of a year's crop**

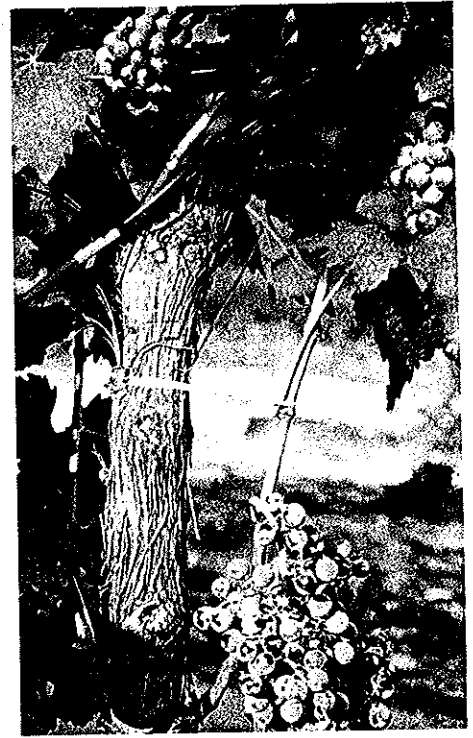
sacrificing one year's crop. In addition to this, the major difference between this new procedure and those traditionally used are the period of the growing season.

Based on the principle of the dormant vine, the "greffe Birebent" is performed after the lignification of the vine, approximately sometime between August 15 and September 15. The incision made on the base of the vine trunk is similar to that of the "chip-bud" method; however, in this case, both the top and the bottom incisions are like that done for the bottom of the "chip-bud." A dormant bud is then inserted, laterally like a piece of a puzzle, so that both angles above and below the bud will fit flush into the vine trunk. Then the entire bud is completely sealed with tape which will remain intact through the winter, protecting the bud

from any harsh exterior conditions. In the following spring, the bud appears swollen beneath the tape, at which time an incision is carefully made to allow the bud to sprout and continue to develop. In the case of threatening frost conditions, this step can be delayed until late spring. It is also preferable, though not essential, to make a few thin incisions encircling the vine trunk above the grafted bud. This will help slow down the flow of sap, assuring the growth of the new variety.

The new shoot will continue to grow along side the pre-existing variety, just as if it was a sucker. During harvest, it is no problem to sort the small percentage of the new fruit when picking by hand. In fact, if the new variety is Merlot, for example, grafted onto a vine already producing Sauvignon blanc, it can be quite a surprise to see them existing side by side. Also, the joint of the grafted vine is sufficiently strong to endure mechanical harvesters, should that suit the needs of the prospective winemaker. Following this harvest, the part of the trunk containing the old variety is now cut, and as a precautionary measure the vine is covered with a protective sealer at the site of the cut. This can be done either at the onset of winter or when regular pruning takes place. The one or two canes of the new variety are kept, and trimmed (if need-

**This photo shows the vine one year after grafting. The vine is actually producing two varieties of grapes.**



ed) and tied in preparation for the following season. As with other methods of grafting, usually two buds are used per vine to insure success.

In addition to the apparent advantage

of not losing a crop, which is unavoidable with the "T-bud" and "chip-bud" methods, there are other important advantages which are not exclusive to French grape production. Because the

grafting takes place after the vine has ripened, it is easy to obtain the dormant buds of the new variety from other vines possibly already existing in the same vineyard. Even if this is not the case, there is still no need to keep the wood which is to be grafted in cold storage. Furthermore, if the graft does not take on some of the vines, (which could be determined in the spring following the grafting), there is still time to revert to either "T-bud" or "chip-bud" as a second attempt. Thus, it is both more convenient and economical than the traditional methods.

As for the success rate of the "greffe Birebent," it is equally competitive to the

"T-bud" or "chip-bud." In eastern Corsica where Birebent developed and perfected this method, using vines from 6 to 15 years old, 90-95% of the graftings were successful in 1988. Since then, Birebent has been hired to perform his new technique throughout France's varying (climatic and topographical) wine producing regions: the south of France, the Loire Valley, Bordeaux, Burgundy, and the Rhône Valley—all with equal success. 1990 will see his first effort in the U.S., in the upper Napa Valley near his St. Helena based office.

During an interview shortly after his 1988 presentation, when asked why this

method had never been attempted before, Birebent replied quite frankly, "No one has ever thought of it. I, myself, didn't think of it until I started experimenting with it in 1985." Just as with other advances in the fields of enology and viticulture, progress is a result of need and demand. The "greffe Birebent" offers profitable advantages that are certain to make it an asset to the grape growers of the U.S., particularly for the ever-changing and highly competitive market of northern California.

For more information, Birebent can be reached at Worldwide Vineyards, P.O. Box 714, St. Helena, Calif. 94574. ☐