

**Influence of cultural practices on vegetative and yield performance
and on the efficiency of mechanical harvesting: comparison of some
cultivars with Arbequina in superintensive olive orchards
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A study was conducted in Central Italy to compare the effect of two pruning methods on two varieties with different growth habits – Arbequina and Moraiolo – in controlling tree vigour in superintensive olive orchards, which are characterised by compact trees and early entry into production. The results show that branch bending achieves better vegetative control and higher yields than pruning cuts in superintensive orchards. A further study confirmed the suitability of the Maurino variety (already proposed for cultivation in superintensive orchards in Central Italy) over cv. Arbequina as a reference standard. The results showed that the vegetative characteristics of the cv. Maurino trees were similar to those of the Arbequina, although significant albeit limited differences were observed in terms of crop production. In contrast, the oil produced from the cv. Maurino was superior to that obtained from the Arbequina olives, particularly as regards total polyphenols content. Hence, the Maurino cultivar can be recommended for cultivation in high-density plantations. Lastly, a study was conducted during the maturation of olives belonging to the Arbequina and Maurino cultivars to determine the best time to harvest, i.e. when to obtain the largest volume of premium quality oil in superintensive orchards. The results showed that the optimal harvest period for these two cultivars lies between the last ten days of October and the first week of November, depending on weather conditions. This period is when the best quality oil is obtained in terms of polyphenols content and organoleptic and nutritional characteristics and when maximum over-the-row harvester efficiency is achieved without losses through natural fruit drop.