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INTRODUCTION

Furtos is an unprotected sour cherry variety named Ujfehertoi F rt s, identified by the Hungarian Ujfeherto Research Centre. This variety has been tested since 1991 as a rootstock for sweet cherry in the French experimental network coordinated by Ctifl. In 2003 and 2007, this rootstock was more widely tested in comparison with Maxma 14 in several locations (Ctifl and regional experimental stations) in all cherry production areas, in combination with 5 different varieties.

MATERIALS AND METHODS

The studies were conducted in 2003 and 2007.

2003

115 trees grafted on Furtos were planted and compared to Maxma 14 in 10 locations with two varieties: Burlat and Fermina*. There were 5 to 10 trees per rootstock and per site. All the plots were irrigated and the trees were trained in a vase system.

2007

47 trees grafted on Furtos were planted and compared to Maxma 14 in 9 locations with three varieties, Burlat, Folfer* and Poisdel*. There were 3 to 10 trees per rootstock and per site.

RESULTS AND DISCUSSION

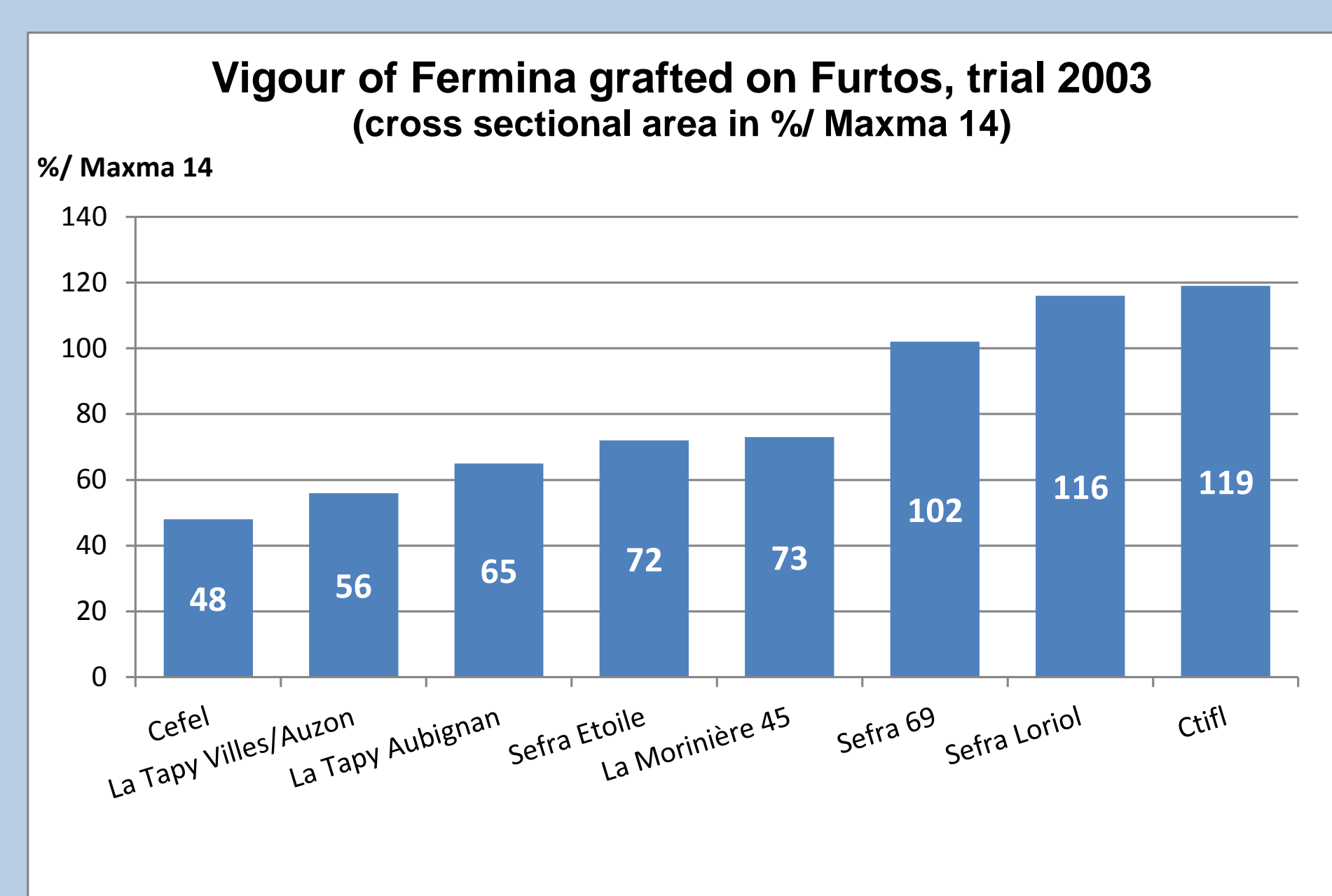
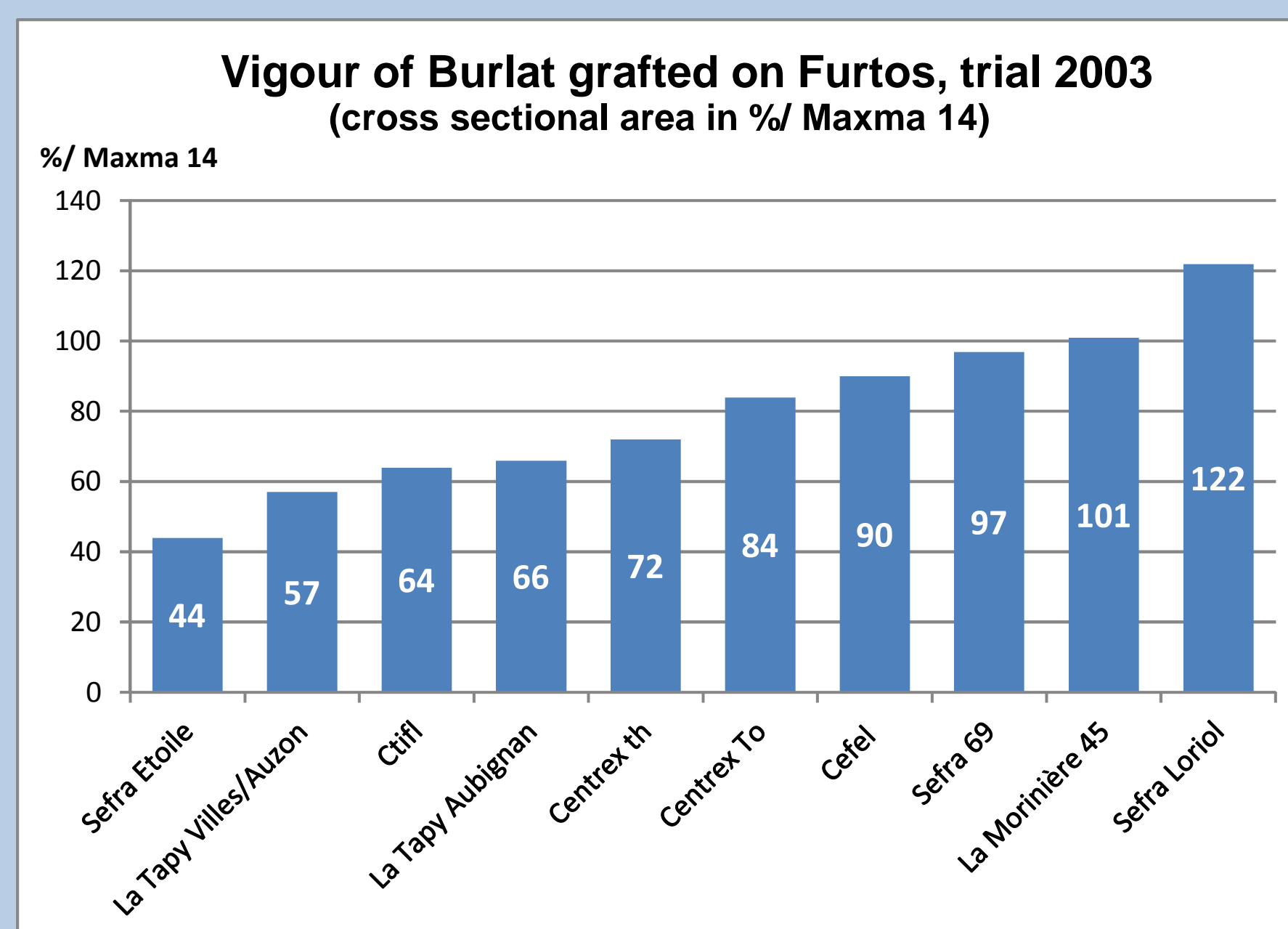
We present only the results of the trial planted in 2003.

Vigour

Most of the time, Furtos is less vigorous than Maxma 14. It might be more vigorous in good soils.

Even when Furtos is much less vigorous, its vegetative growth remains very good.

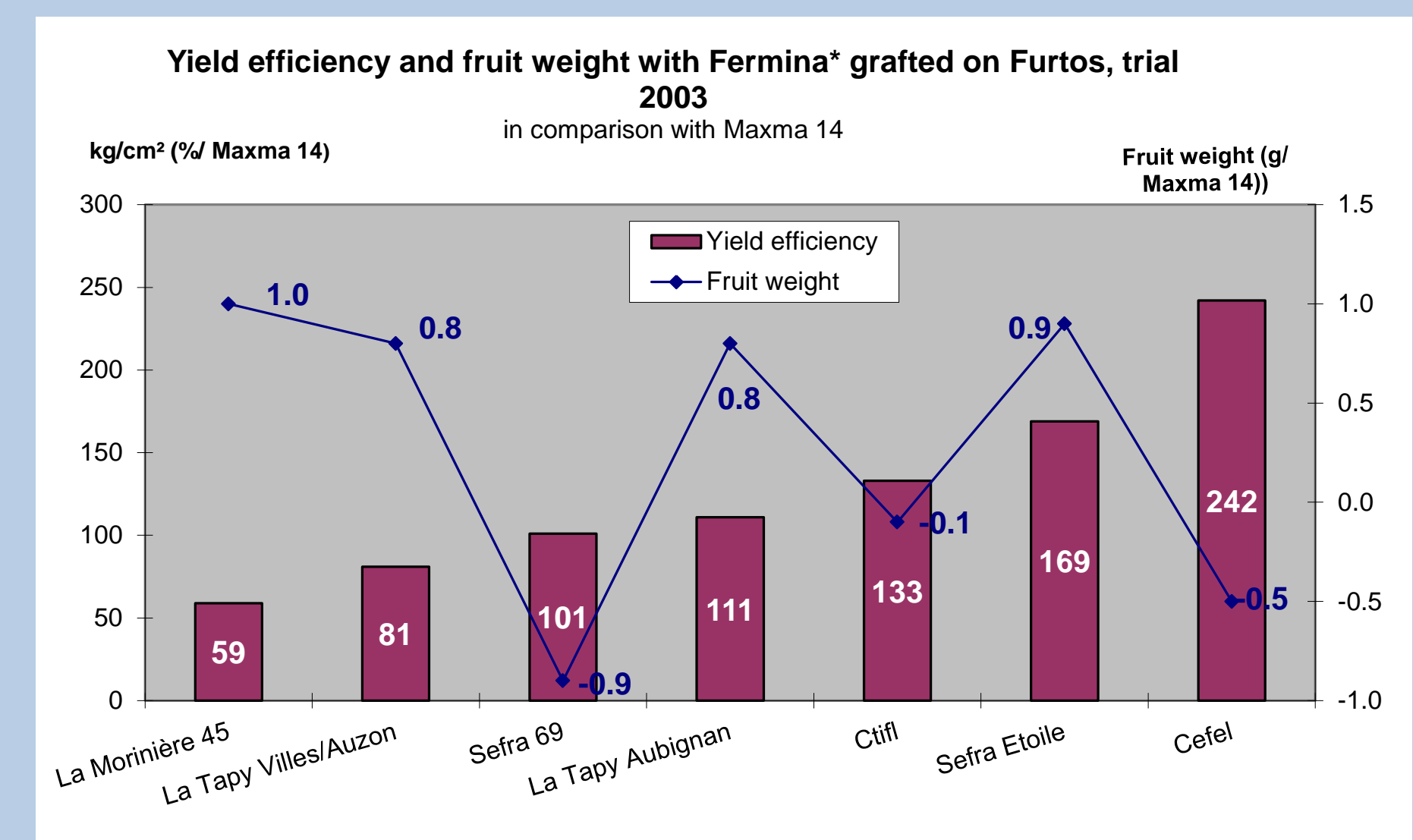
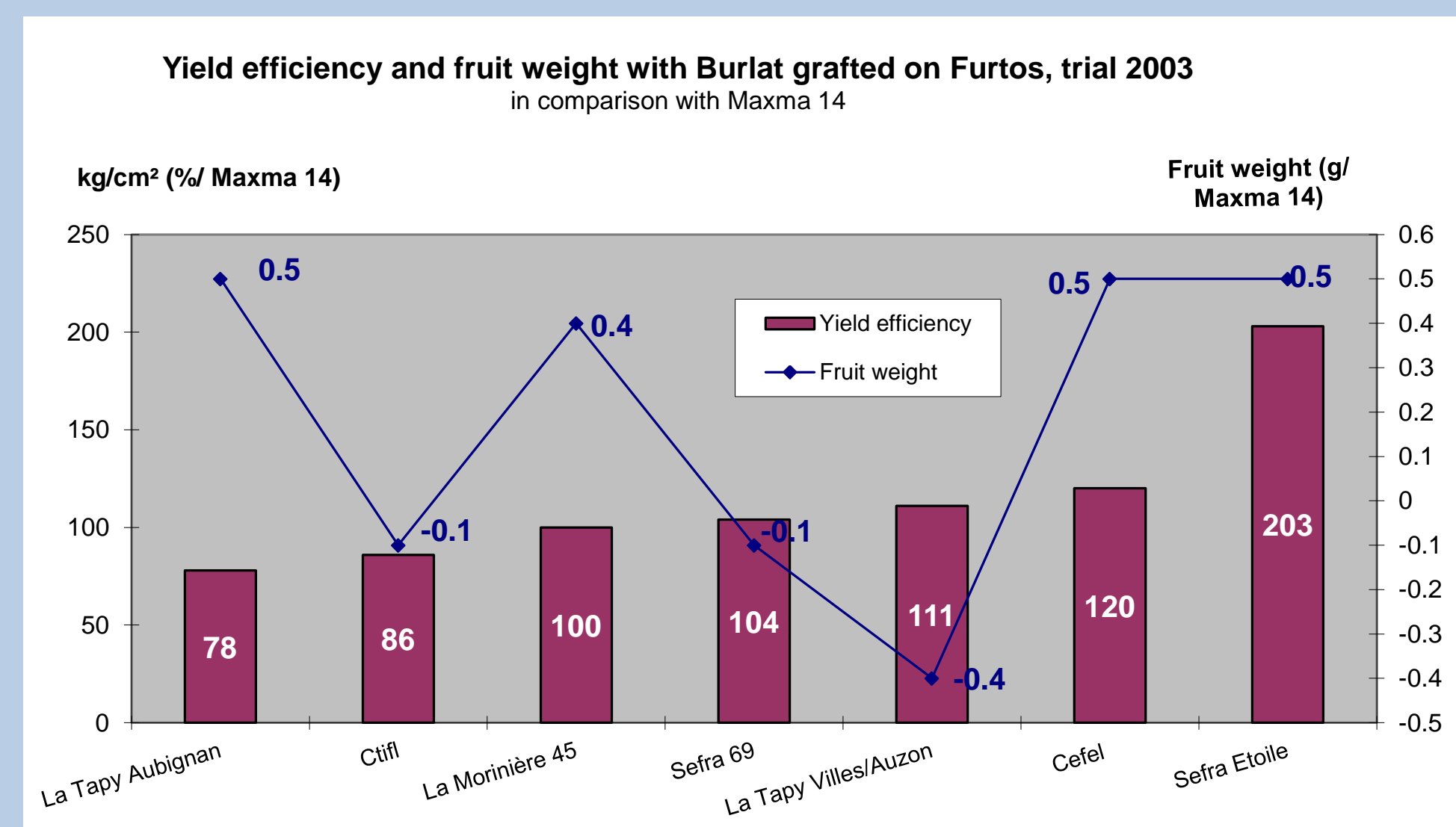
After 10 years, among the 115 Furtos that were planted, there are no declining trees (0 for Maxma 14) and only 4 dead trees (3 for Maxma 14).



Productivity and fruit size

7 times out of 14, yield efficiency is higher for Furtos than for Maxma 14; 3 times, yield efficiency is the same; and 4 times Furtos' productivity is less than that of Maxma 14.

Most of the time the average fruit weight is the same or higher for Furtos.



CONCLUSIONS

Furtos is interesting for the productive varieties planted in poor and fairly poor soils. In these situations, Furtos reduces tree vigour by 20 to 50 % compared to Maxma 14, while maintaining a healthy vegetative growth. Most of the time, productivity and fruit size are improved. With averagely productive varieties, and in good soils, Furtos does not generally outperform Maxma 14.

Furtos has more suckers than Maxma 14 but there is no difficulty to manage them.

Observations made in orchards and laboratory tests suggest that Furtos is much more tolerant to root asphyxia than Maxma 14.

The first plants will be available to the growers in 2017.



Burlat 10 years old in a poor soil: Maxma 14 left, Furtos right