

mandarin variety fact sheet



Miho Satsuma

Origin

Japan, developed from a seed produced by controlled pollination of Miyagawa satsuma in 1940 (at the same time as Okitsu). Imported into Australia in 1991 and released to selected nurserymen in 1996.

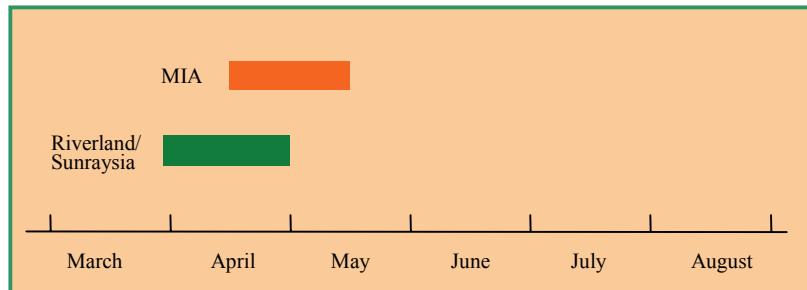
Type

Early season maturity, seedless, easy peel.

Market

Fresh, domestic. Export potential. Similar to Okitsu satsuma, but could enter market one week earlier.

Marketing season (estimated)



Internal quality

Preliminary juice testing has shown Miho to have a lower °Brix and citric acid content than Okitsu satsuma. This has been reflected in taste test comparisons between the 2 Japanese satsumas. Okitsu has been the preferred selection. A °Brix level of 8.5 and citric acid % of 0.77 was reached on 30th March, 1999.

Satsuma fruit segments separate easily, but the membranes can be tough and 'chewy'. As the fruit matures, the segments separate from the thin skin. Slightly 'off' flavours were detectable in Miho fruit in the last week of April in the Sunraysia region.

External quality

Skin colour is slower to develop in Miho satsuma than with Okitsu satsuma. Skin texture was also coarser than Okitsu, which may be related to the lower fruit set on reworked (by budding) Miho trees as compared to Okitsu which were reworked by the bark grafting method in an evaluation trial.

Postharvest performance

Fruit is likely to tear if not clipped from the tree. Comments for Okitsu satsuma are also applicable to Miho. It is reported that satsumas are difficult to de-green and Miho may require some degree of skin colour enhancement for the very early marketing of this variety.

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Field performance

Comments for Okitsu satsuma are also applicable to Miho. Miho is recorded as being a more vigorous tree than Okitsu satsuma, but this has yet to be determined in Australia. Japanese satsuma mandarins showed the capacity to produce a commercial crop, 3 years from being grafted to 9 year old Valencia orange trees at Daretton Agricultural Research and Advisory Station in 1999. Careful crop load management of young trees is essential or satsumas can develop a severe alternate bearing pattern. In New Zealand it is suggested that newly planted trees are not allowed to crop for the first two seasons. Pruning is timed as a pre-bloom treatment in late winter/early spring. The aim is to remove vigorous upright shoots and retain horizontal growth that will carry the higher quality fruit. Outer canopy fruit positioning by thinning and pruning are high priorities of Japanese satsuma production. A compromise has to be achieved in future Australian production between the need for high quality (higher °Brix) fruit and the risk of sunburn.

Pest and disease

No specific pest and disease problems have been noted to this point (January 2002). New Zealand information states 'that satsumas have been selected over the centuries in Japan for their tolerance to wet weather diseases. The fruit rinds are resistant to Alternaria and Botrytis, and only very slightly susceptible to citrus scab. Melanose is the main rind blemishing disease, but is only a problem during excessively wet springs and early summers'.

Extent of plantings

Commercial: Commercial plantings established.
Budwood demand lower than for Okitsu.
Research: Research agency arboreta, small trials and trees planted for budwood supply.

State of knowledge

Last Revised: January 2002

Disclaimer:

Information contained in this publication is provided as general advice only.
For application to specific circumstances, professional advice should be sought.

Growers should ensure that trees are propagated from Approved Budwood obtained from AusCitrus.



Miho satsuma has received favourable reports from both South Africa and New Zealand. Preliminary industry evaluation in Australia has rated Okitsu satsuma as having a greater market potential. The assessment is based on the external appearance of the 2 Japanese satsumas (Miho, Okitsu) and taste testing by citrus growers and local market agents in April 1999. This initial viewpoint may change as trees mature and more fruit becomes available for assessment.