

## Let's Enjoy Japanese Old Citrus Cultivars®

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*Citrus* is one of the most important fruit trees in the world and grows in temperate, sub-tropical, and tropical areas. From ancient times *Citrus* species have been used as fresh fruits, and for cooking, medicines, and ornamentals in Japan. Although the origin and time of introduction is unclear, many old species such as tachibana [*Citrus tachibana* (Makino) Tanaka], koji (*C. leiocarpa* Hort. ex Tanaka), shekwasha (*C. depressa* Hayata), daidai (*C. aurantium* L.), yuzu [*C. junos* (Sieb.) C. Tanaka], and kabosu (*C. sphaerocarpa* Tanaka) have been traditionally cultivated in Japan. Kishu-mikan (*C. kinokuni* Tanaka) was one of the earliest species commercially cultivated in Japan during the Edo era. Satsuma mandarin (*C. unshiu* Marc.) originated in Kagoshima prefecture, as a chance seedling of some *Citrus* fruit or form imported from China and has been the main *Citrus* species to support the modern citrus industry of Japan. More than 200 cultivars have been developed through bud mutation and breeding program. In addition, some species of *Citrus*, such as natsudaikai (*C. natsudaikai* Hayata), hassaku (*C. hassaku* Hort.), iyo-kan (*C. iyo* hort. ex T. Tanaka), hyuganatsu (*C. tamurana* Hort. ex Tanaka), sanboukan (*C. sulcata* hort. ex Takahashi), and pummelo cultivars originated in Japan. Indigenous and old species have been cultivated and maintained in limited areas as local products with small consumption. On the other hand, many species have disappeared due to low economical value. Indigenous and old cultivars adapted to the Japanese climate condition for a long time have the potential as materials for breeding program as well as gardening plants. Kinki University maintained old *Citrus* species for taxonomic studies to pursue the origin of species (Fig. 1). Let's enjoy the planting old Japanese *Citrus* cultivars in your gardens.



1a.



1b.



1c.

**Figure 1.** Diversity of orange fruits, 1a and 1b: Chimera fruits of satsuma mandarin (*C. unshiu*). 1c: Chrysanthemum-shaped orange.