

Study of Biological Features Some of *Nandina domestica* Thunb. Species in Abseron

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Aim of the study: Plantings – the main elements of architectural compositions in a city accomplishment. Many of such plants are growing in the Mardakan arboretum such as *Eucalyptus* L., *Herit.*, *Pinus* L., *Lonicera* L., *Cupressus* L., *Berberis* L., etc. Now it have been inbred as a new ornamental plants, such *Nandina domestica* Thunb.

Materials and methods: The first time in 1970 *Nandina domestica* Thunb. was introduced in the Mardakan arboretum and it was grown up in an open ground. But the next years it is a plant has not acclimatized in soil-climatic conditions of Abseron and it are parishes. In 2008 again in the conditions of the Mardakan arboretum (*Nandina domestica* Thunb.) is grown up from seeds which have received from Iran. In research have been studied some bio-ecological features (propagate, morphology of sprouts, dynamics of growth 1-3 summer plants, dynamics of seasonal development, stability to external factors, etc.) *Nandina domestica* Thunb. in the conditions of Abseron. Observation were spent during all vegetative period on following phases: a dormant period, swelling and blooming of leaf-bud, the beginning and the termination of growth of runaways, budding the beginning and the flowering end, setting and maturing of seeds, autumn colorings. The age of the first flowering is noted by supervision over the replaced plants. Accretion measurements on height and diameter spent in 10 days from the beginning of growth before its termination. *Nandina domestica* Thunb. - The representative endemically monotype sorts concerns with *Nandinaceae* Horon. family. It is decorative subtropical plant and its evergreen bush with reddish-brown branches and leaves which reaches 3 m height. Leaves difficult, it is thrice-repeated pinnate, leaflets dense, rhombic-lanceolate, pointed at top, wedge-shaped at the basis, the edge whole that have 8 cm length and 2 cm widths. Cutting 7 cm of length which in the basis is expanded, stalk of the leaf 1 cm lengths. An inflorescence whisk have 15-20 cm of length. Flowers are petalous, small, white, 4 mm in diameter. Fruits diameter reach to 0.5 cm and are berry-figuratively, bright red. The native land – damp subtropics of Japan, China, grows on hillsides. *Nandina domestica* Thunb. highly decorative plant, is used for creation of a composition and appearance of interiors.

Results. The important role in wide spreading introduced plants is played by seed reproduction. For revealing of optimum terms of crops of seeds (*Nandina domestica* Thunb.) in the conditions of Abseron seeds were sown on beds in garden soil in the autumn (November) and in the spring (March). At autumn crops amicable shoots appeared in the spring – in the second decade of April. Shooting makes 85% at spring crops shoots were observed in the autumn – in the second decade of November, shooting makes 80%. Observations have shown that in the conditions of Abseron growth *Nandina domestica* Thunb. begins in the second decade of April depending on weather conditions and comes to an end in the third decade of September or in the first decade of October. The growth period proceeds 165 days. In the first year seedlings grows slowly, and the next years they grow very intensively. Growth seedlings on the average on years reaches: in the first year – 15 cm, in the second – 35 cm, in the third – 69 cm, in the fourth – 80 cm, in the fifth – 115 cm. Lateral branch appear height of 20-25 cm from soil surface. On there-year plants their number varies from 15 to 35, the length – from 5 to 25 cm.

Keywords: *Nandina domestica* Thunb., Abseron, decorative plant.