



Article

Validation of the name *Typha ×volgensis* Krasnova (Typhaceae)Alla N. Krasnova¹ and Vladimir M. Vasjukov^{2,*}¹I.D.Papanin Institute for Biology of Inland Waters Russian Academy of Sciences, Borok, Nekouz District, Yaroslavl Region, 152742 Russia²Institute of Ecology of the Volga River Basin, Russian Academy of Sciences, 10 Komzina St., Tolyatti, Samara Region, 445003 Russia*Corresponding author. Email: vasjukov@yandex.ru

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Abstract

The name *T. ×volgensis* Krasnova, which has been widely used in the Russian literature, is validated.

Keywords: nothospecies, Russia, *Typha ×volgensis*, Typhaceae, validation

Introduction

A revision of the genus *Typha* L. within Russia and adjacent regions was undertaken in the monograph by Krasnova (2011). A new taxonomic system was suggested there. In the studied territory the genus is represented by the subgenus *Rochbachia* (H.Riedl) Krasnova, 34 species, one subspecies *Typha latifolia* subsp. *bethulona* (Costa ex Kronf.) Krasnova, two varieties – *T. laxmannii* var. *bunnei* Krasnova & Durnikin and *T. laxmannii* var. *turczaninovii* Krasnova & Durnikin, and three intersectional hybrids. In this monograph an identification key was published and new taxa were described. Comprehensive information on the ecology and distribution of the previously known species was also provided. The results of this research led the author to a number of conclusions regarding the widely distributed species, the so-called macrospecies or linneons, which had been accepted previously. A study of the variability of inflorescences with pistillate flowers of *Typha angustifolia* L. and *T. latifolia* L. showed a number of anomalies, which could be a result of the impact of anthropogenic factors and subsequent hybridisation. The genus *Typha* originated in the Cretaceous Period and later became as dominant as the ruderal grasses on all continents. Introgressive hybridisation played a major part in the evolution of this genus. In the Holocene speciation was slightly down. However, intensification of anthropogenic impact resulted in disjunctions and mosaic distribution of many species, which led to repetitive hybridisation and introgression in unstable environmental conditions. These processes provided conditions for the outbreak of the

currently observed anomalies, which reflect the anthropogenic character of evolution of the genus *Typha*. Thus the description and registration of new hybrid taxa has become very important for monitoring the anthropogenic impact on the vegetation and environment.

In the cited monograph (Krasnova, 2011), the new nothospecies *Typha ×volgensis* Krasnova was described, but the requirement of Art. 40.7 of the International Code of Nomenclature for Algae, Fungi, and Plants (McNeill *et al.*, 2012) was not fulfilled as the single herbarium or institution where the holotype had been conserved was not specified and thus the suggested name was invalidly published. Validation of this nothospecies is provided here.

Nomenclature and taxonomy

Typha ×volgensis Krasnova *nothosp. nov.*

(urn:lsid:ipni.org:names: 77160935-1).

Description: *Typha ×volgensis* Krasnova (Krasnova 2011: 121).

(*T. laxmannii* Lepech. × *T. sibirica* Krasnova)

Type: Russia, Prov. Aquatio Volgogradskoj, sinus fl. Sestrjonki, 9.VII.1972, *L. Lisitsina* (holotype – IBIW!).

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