



Taxonomic re-evaluation of the enigmatic *Pyrus magyarica* (Rosaceae)

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Abstract

Pyrus magyarica was considered as a “superendemic” species of the Carpathian Basin for a long time; however, despite its presumed significance, doubts about its taxonomical status have been raised. The confusions originate from the invalidity of the description and the lack of type material. Latter interpretations are not consistent and contradict the description of the species in the protologue. The authors attempted to get access to the original material of the taxon, but no vouchers or living specimens that correspond to the protologue were found; herbarium specimens assigned as *P. magyarica* mostly refer to *P. pyraeaster*. Based on the available records, *P. magyarica* cannot be clearly defined and re-described; thus we propose to leave off the use of the name *P. magyarica* as it has no clear content.

Key words: invalid description, typification, endemism, Carpathian Basin, *Pyrus*

Introduction

Pyrus magyarica Terpó (1960: 34) was described as an endemic and relict species of the Carpathian Basin; it was assessed in major European syntheses (Terpó & Amaral 1968, Kurtto *et al.* 2013) also at species rank. Due to its singularity, *P. magyarica* was denoted as a priority species in Annex II of the EU Habitats Directive and treated as a critically endangered species in Europe (Bilz *et al.* 2011).

The taxon was described from Hungary, and it was later reported also from Northern Italy (Arrigoni 1990, 2012, Arrigoni *et al.* 2007). Furthermore, similar morphotypes were also found in Slovakia and the Czech Republic (Dostálek 1979). Works based on the “traditional” approach (e.g. Terpó 1960, Soó 1966, Terpó & Amaral 1968, Böhm 2007, 2010) have never questioned its status as a separate species; however, some sources (e.g. Király 2007) formulated explicit doubts on its status. The standpoint of Dostálek (1979) on the presence of similar types in the former Czechoslovakia was not supported by subsequent monographs neither in Slovakia (Peniašteková 1992) nor in the Czech Republic (Dostálek 2003). In Italy, Arrigoni (2012) reported several specimens revised by Terpó as *P. magyarica*, but this name has been treated synonymously for *P. cordata* Desvaux (1818: 152) in the national checklist (Conti *et al.* 2005). Nevertheless, four new species of *Pyrus* described recently from Italy confirm the above average diversity of the genus there (Marino *et al.* 2012).

After studying all accessible sources we concluded that confusions around *P. magyarica* are basically caused by the obscurity of type material. We attempted to get access to herbarium and/or living specimens, especially to original vouchers of Terpó. In this paper we review the evaluation of former records and formulate proposals for the future treatment of *P. magyarica*.

Materials and Methods

We revised the description of *Pyrus magyarica* and allied taxa following the Botanical Code (McNeill *et al.* 2012). We also considered every published records of the name, and tried to get access to every unpublished record and other sources, which could support the current treatment of the taxon. We checked all relevant Hungarian herbaria (BP, BPU, DE, acronyms follow Thiers 2013), where original material of the taxon was expected to be deposited. Additionally, the material of the herbarium of the University of Horticulture and Viticulture in Budapest, recently incorporated

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