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Remarks on *Thesium parnassi*

Poznámky o *Thesium parnassi*

Radovan Hendrych

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The paper presents the taxonomic, morphological and geographical characteristics of *Th. parnassi* A.DC. in DC. as well as a brief comparison with the species which are similar in their distribution area and apparently in their florogeny. A survey of the revised material is also added, on the basis of which this study was carried out.

Department of Botany, Charles University, Benátská 2, 128 01 Praha 2, Czechoslovakia.

The recognition of *Th. parnassi* as a new species was made by A. DECANDOLLE (1857 : 643), based on the plants collected by GUICCIARDI (in HELDREICH, Fl. Graec. exsicc. no. 2941) in the Parnassos Mts. *Th. parnassi* was in fact recorded for the first time by GUSSONE (1826 : 98), but this author erroneously held the plants of this species collected in the Abruzzi Mts. for *Th. linophyllon* L., and in this sense he denominated them *Th. intermedium* which was attributed to BERTOLONI by him. The same evalution and denomination was left to the plants of *Th. parnassi* by TENORE (1831 : 103), who denominated them afterwards *Th. intermedium* var. *minimum* TENORE (1835, sec. FIORI 1923 : 387) or included them partly in *Th. alpinum* L.

An incorrect denomination for the plants of *Th. parnassi* from its Illyric subarea was also used by VISIANI (1842 : 222), who identified them with *Th. arvense* HORV., while he mentioned them under the name *Th. ramosum* HAYNE. VISIANI also used erroneously the diagnosis of *Th. ramosum* which, of course, does not agree with the plants of *Th. parnassi*, but from his observation note it is quite unequivocally evident that he was aware of the difference of the plant involved from *Th. ramosum*. The same error was committed by GRISEBACH (1844 : 323) and later, even after DECANDOLLE, by ARCANGELI (1882 : 609), too.

It is interesting that the erroneous taxonomic evaluation of the plants of *Th. parnassi*, as used by GUSSONE (1826 : 98), is reflected later in FIORI (1896—98 : 286), who determined the species *Th. parnassi* as *Th. linophyllon* L. β *parnassi*, and also in ZODDA (1954 : 73), who evaluates this species as a variety, *Th. linophyllon* L. var. *parnassi*. Analogous was also the reminiscence of VISIANI (1842 : 222) and of GRISEBACH (1844 : 323), when ASCHERSON et KANITZ (1877 : 29) attached *Th. parnassi* to the species *Th. arvense* HORV. and denominated it as a variety, *Th. ramosum* HAYNE var. *parnassi*. Both evaluations, i.e. the attachment of *Th. parnassi* to *Th. linophyllon* L. or to *Th. arvense* HORV., arose from a very cursory, not sufficiently profound taxonomic view of the phylogenetic position of *Th. parnassi*. The phylogenetic relations of *Th. parnassi* to the species mentioned above

(HENDRYCH 1972 : 338, cf. 1969a : 122, 1969b : 246) are only remote (*Th. arvense* HORV.) to very remote (*Th. linophyllon* L.).

Thus, the erroneous views, as given above, bear rather the character of a determination error or of determination difficulties. This was evident also from the ample material I had the opportunity to investigate; the erroneous determinations, including the exsiccate collections,

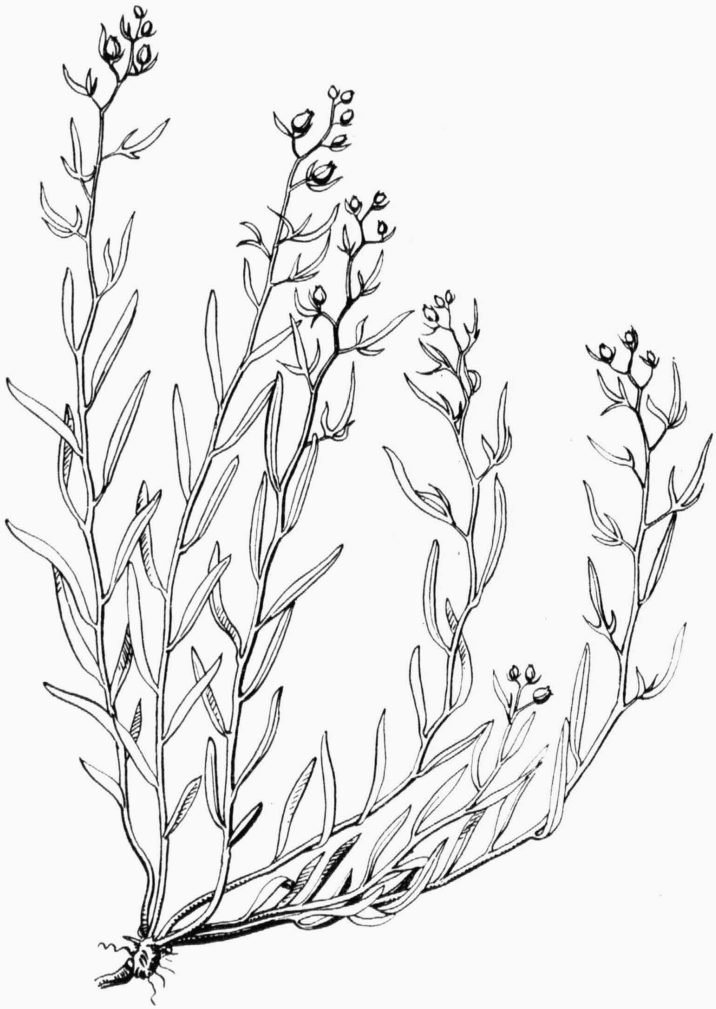

Fig. 1. — Habit of *Thesium parnassi* (Del. P. Vanke).

were rather frequent in this species, and besides, many specimens were undetermined. Confusions not only with *Th. arvense* HORV. and *Th. linophyllon* L., but also with *Th. alpinum* L., *Th. divaricatum* JAN ap, MERT. et KOCH, and even with *Th. humifusum* DC. in LAM. et DC. and *Th. italicum* A. DC. in DC. were stated. The published data on this species therefore lack credibility.

The variability of *Th. parnassi* is very slight and concerns evidently the growth character only; anyway it appears to be immediately influenced only by ecological conditions. This is also reflected in the literature, so that only the variety *Th. parnassi* β *affine* BECK (1906 : 141) was described, which by its nature (v. in herb. PRC) falls in the category of that variability which is briefly mentioned here; it is of no greater taxonomic value.

Th. parnassi belongs to series *Micrantha*, which BOBROV (1936 : 430) described and delimited by the species *Th. brachyphyllum* BOISS., *Th. parnassi* A. DC. in DC. and *Th. libanoticum* EHRENB. ap. A. DC. in DC., where, however, also the species *Th. brachystegium* POST, *Th. sommieri* HENDRYCH, *Th. kyrnosum* HENDRYCH and *Th. hispanicum* HENDRYCH (HENDRYCH 1962: 20—21, 1964a : 21, 1964b : 120, 1966 : 75, 1972 : 352) belong. In comparison with the majority of the other groups of this genus, especially of the species from the Palaeoarctis, they are plants of relatively low growth, almost unbranched, with rather few flowers in racemose inflorescences. Their leaves are linear and relatively short, the length of their bracts and bractles do not differ much from each other, their flowers are funnel-bell-shaped, and their fruits are only longitudinally veined; the deflorate dry perigon is short.

The distribution area of the whole series *Micrantha* spreads over the European and Asiatic parts of the Mediterranean, from the Caucasus and Middle East westwards to the Pyrenean Peninsula, with a stronger agglomeration of species rather in the eastern part of the whole synarea, as given here, clean-cut allopatrically, without any sympatry (HENDRYCH 1966 : 73). Even more conspicuous are their numerous interspecific and in some cases also intraspecific (*Th. brachyphyllum* and *Th. parnassi*) disjunctions, the extent of which, however, is not very large.

They are throughout pronounced oreophytes of the montane to alpine sites, with a strong and distinct binding to the limestone or dolomite rocks. Not only the individual species, but also the whole series is of an oreophytic character and probably of a palaeo-oreophytic origin, apparently of the rather deep Tertiary Age (HENDRYCH 1972 : 343). I incline to the opinion of their origin at least from the Upper Miocene or even from the Lower Miocene, as it could be concluded on the basis of palaeogeographic data (HENDRYCH 1966 : 74).

Besides the species *Th. brachyphyllum*, the most extensive distribution area in the series *Micrantha* is occupied by *Th. parnassi*. A little more continuously it is distributed in the Illyric-Hellenic part of the Balkan Peninsula (Fig. 2). It is very conspicuous that eastwards it does not cross the Vardar line, which is in general phytogeographically very significant and important from the viewpoint of florogeny. The other parts of the distribution area of *Th. parnassi* are distributed partly on the Apennine Peninsula (in the central and southern part); with these is the place of occurrence in Sicily disjunctively connected.

The explanation of the genesis of the distribution area of *Th. parnassi* is admittedly refugial (HENDRYCH 1966 : 74, 1968 : 46), but the probability cannot be excluded that the recent distribution area originated in the territory of the hypothetical Adriatis (TROTTER 1912).

For a comparison I wish to suggest that of the species whose distribution is very similar to that of *Th. parnassi*, in the first place *Prunus cocomilia*

TEN. may be mentioned. A slighter similarity in this respect is to be found in *Anchusa cretica* MILLER, which unlike these two species reaches from central to northern Italy. An other diversity is seen in *Elaeoselinum asclepium* (L.) BERTOL. subsp. *asclepium*, which, on the contrary, is absent in Yugoslavia; if need be, the species *Fritillaria messanensis* RAFIN. in DESV. also can be mentioned, which, in contradistinction to *Th. parnassi*, grows also in Crete.

Fig. 2. — Dot cartogram of the area of *Thesium parnassi* (Orig.).

By their Illyric-Apennine-Sicilian distribution area, *Brassica incana* TEN. and *Physospermum verticillatum* (WALDST. et KIT.) VIS. bear resemblance to those mentioned above; however, they are missing in Greece and Albania. It may concern also the species *Convolvulus cneorum* L., *Potentilla calabra* TEN., *Marrubium incanum* DESR. in LAM. and *Onosma echioides* L.; the two last-mentioned of them, however, penetrate farther northwards, especially in Italy.

A greater number of species or subspecies of similar distribution as that of *Th. parnassi* are found among those which are absent in Sicily, so that their distribution areas bear the Illyric-Hellenic-Apennine character only. They are: *Alyssum bertolonii* DESV., *Athamanta macedonica* (L.) SPRENGEL in ROEMER et SCHULTES, *Campanula foliosa* TEN., *Centaurea weldeniana* REICHENB., *Erigeron epiroticus* (VIERH.) HÁLÁCSY, *Onobrychis alba* (WALDST. et KIT.) DESV. subsp. *laconica* (ORPH. ap. BOISS.) HAYEK, *Saxifraga glabella* BERTOL., *Senecio scopolii* HOPPE et HORNSCH. ap. BLUFF et FINGERH.,

Stachys tymphaea HAUSSKN., *Trinia delechampii* (TEN.) JANCHEN and *Verbascum sammiticum* TEN.

To the species mentioned above also *Crepis rubra* L. and *Ranunculus brevifolius* TEN. may be partly attached, which in addition occur in Crete.

With a certain distance approach to the examples with the distinct Adriatic disjunction, as given above, the likewise disjunct area of species which are missing in Greece (or have not yet been found there), so that their distribution is confined only to the Illyric (not Hellenic) part of the Balkan Peninsula, over which some of them reach up to Istria and further they occur in the Apennine part of Italy, too. They are: *Carduus micropterus* (BORBÁS) TEYBER, *Dianthus ciliatus* GUSS., *Gentiana dinarica* G. BECK, *Portenschlagiella ramosissima* (PORTENSCHL.) TUTIN, *Scabiosa silenifolia* WALDST. et KIT., *Sesleria tenuifolia* SCHRAEDER and *Verbascum niveum* TEN.

In comparison with *Th. parnassi*, even narrower distribution areas (although the common feature of them is preserved) is to be found in the species or subspecies occurring besides the Apennine Peninsula in Yugoslavia only (they are absent or have not yet been found in Albania), viz. *Alyssum leucadeum* GUSS., *Capanula marchesettii* WITASEK, *Centaurea rupestris* L. subsp. *rupestris*, *Chamaecytisus spinescens* (C. PRESL) ROTHM., *Crocus thomasii* TEN., *Euphrasia dinarica* (G. BECK) MURB., *Jurinea mollis* (L.) REICHENB. subsp. *moschata* (DC.) NYMAN, *Picris scaberrima* GUSS. in TEN. and *Silene catholica* (L.) AITON f. in AITON.

More remote is the similarity of distribution of *Th. parnassi* with the species and subspecies occurring on the Balkan Peninsula, but only in Albania and Greece (they are absent in Yugoslavia), and in the Apennine Peninsula, as *Campanula garganica* TEN., *Carum heldreichii* BOISS., *Leontodon crispus* VILL. subsp. *graecus* (BOISS. et HELDR.) HAYEK, *Verbascum mallophorum* BOISS. et HELDR. in BOISS. and *Viola magellensis* PORTA et RIGO ex STROBL; or with the species or subspecies of only Hellenic-Apennine area: *Silene auriculata* SIBTH. et SM. and *Taraxacum glaciale* HUET ap. HAND.-MAZZ., eventually also *Crepis neglecta* L. subsp. *corymbosa* (TEN.) NYMAN, which also occurs in Sicily.[1])

It may be assumed that most of the examples given here, among which the oreophytic types also prevail, possess the same or at least similar area development as *Th. parnassi*, with the distribution of which they can be more or less compared. The majority of them — together with *Th. parnassi* — evidence by their distribution the existence of the Vardar dividing line, which is, as mentioned above, of pre-eminent phytogeographic and florogenetic importance for the Balkan Peninsula, as regards the evolution not only of the Balkan flora, but in this connection also of the flora of the Mediterranean. Its analysis and collation with the geological and especially with the palaeogeographical data is important but it exceeds the framework of the present study.

SUMMATIM CONSCRIPTUM

Thesium parnassi

Planta rhizomate breviter stolonifero, caule humili, foliis uninervibus, inflorescentia racemosa fere laxa, ramulis floriferis (racemi partis inferioris imprimis) ca 2—3 mm longis vel paululum longioribus, floribus pentameris, subsessilibus vel brevissime stipitatis, perigonio infundibuliter campanulato, bractea flore conspicue longiore, bracteolis flore subaequilongis et fructu brevioribus, perigonio sicco fructu solum longitudinaliter nervato quadruplo breviore.

[1]) The species and subspecies survey as given here was made by reference to the volumes of Flora Europaea issued to date, as well as to the respective floras of the Balkan Peninsula and Italy.

Nomen: *Thesium parnassi* A. DC. in DC. (1857) Prodromus 14 : 643.

Synonyma: *Th. intermedium* Guss. (1826) Pl. Rarior. 98, quoad pl. et tab. 20., fig. 1., non diagn.; Ten. (1831) Syll. Fl. Nap. 103, non Bertol., nec Meyer C. A., vel Moris, nec non Schraeder. — *Th. alpinum* Ten. (1835) sec. Fiori, Nuov. Fl. Anal. It. 1 : 387 (1923), non L., nec non auct. al. — *Th. ramosum* Vis. (1842) Fl. Dalm. 1 : 222, quoad pl. et observ., non diagn.; Griseb. (1844) Spicil. Fl. Rumel. Bithyn. 2 : 323, quoad pl., non diagn.; Arcangeli (1882) Comp. Fl. It. 609, ex p., non Hayne, nec Ledeb., vel Turcz., nec non Boiss. — *Th. italicum* A. DC. in DC. (1857) Prodromus 14 : 644, ex p. min. — *Th. humile* Strobl (1881) in Flora 64 : 495, probab., non Vahl vel auct. al. — *Th. ambiguum* Rigo (1905) in sched. ad It. in Apulio 1905, no 10, non Ten. — *Th. intermedium* var. *minimum* Ten. (1832) sec. Fiori, Nuov. Fl. Anal. It. 1 : 387 (1923). — *Th. ramosum* var. *parnassi* (A. DC. in DC.) Ascherson et Kanitz (1877) Catal. Corm. Anth. Serb., in Append. ad Magy. Növ. Lap. 1 : 29. — *Th. linophyllon* β *parnassi* (A. DC. in DC.) Fiori in Fiori et Paol. (1896—98) Fl. Anal. It. 1 : 286. — *Th. linophyllon* var. *parnassi* (A. DC. in DC.) Zodda (1954) in Webbia 10/1 : 73. — *Th. pratense* e) *ambiguum* Rigo (1905) in sched. ad It. in Apulio 1905, no 10. — *Th. humifusum* var. *alpina* Levier in sched. herb. Florent. — *Linosyris parnassi* Kuntze (1891) Rev. Gen. Pl. 2 : 588.

Descriptio

Planta perennis. Rhizoma plerumque abbreviatum, breviter stoloniferum, in radicem relative longam crassamque transiens et caules multos (cca 10—25) emittens.

Caulis breviter ascendens usque erectus, raro fere decumbens vel longe ascendens, (5)7—13(16) cm altus, rite simplex, rarius subsimplex, tenuiter exilis, 1—1,5 mm in diametro, glaber, foliosus, plerumque a parte tertia (rarius a quinta) superiore in inflorescentiam transiens.

Folia ima subsquamiformia, anguste linearia, ca 2—4 mm longa viridiaque. Folia caulina linearia usque anguste linearia, ca 1—2 cm longa et plus minusve 1 mm lata, uninervia, glabra, acuminata, intergerrima, viridia, sessilia, vaga vel paene subsecunda.

Inflorescentia racemosa, simplex, vaga, non secunda, plus minusve laxa.

Bractea anguste oblongo-linearis, aut flore aut fructu duplo (usque triplove) longior, longe acuminata, uninervis, glabra, integerrima, conspicue albide marginata et in nervo inconspicue carinata. Bracteolae duae, lineares, flore subaequilongae et fructu breviores, aliter bracteae consimiles.

Ramuli floriferi 2—3 mm longi vel paulo longiores, erecto-patuli, angulati, laeves et tantum uniflori.

Flores infundibuliter campanulati, 2—3 mm longi, pentameri, subsessiles vel brevissime stipitati. Perigonium intus album, extus flavo-viride, ad dimidiam vel tertiam partem dissectum; laciniae integerrimae subacuminataeque.

Fructus ellipsoideus, 2,5—3 mm longus, subconspicue tantum longitudinaliter nervatus, dilute viridis, valde brevissime stipitatus. Perigonium siccum defloratum breve, 0,8—1 mm longum, cylindricum vel usque conicum, contractum involutumque.

Floret: Junio—Julio. Fructificat: Juli—Augusto.

Stationes: In caespitibus herbosis, pratis pascuisque alpinis, declivibus petrosis, locis glareosis lapidosisque vel in fissuris rupium, praesertim solis calcareis dolomiticisque, praecipue regionis alpinae vel subalpinae, rarius supramontanae aut montanae crescens.

Locus classicus: E monte eminente Parnassus regionis Phocidis graecae descriptum.

Typus (a me ut holotypus electus): In herbario Horti botanici Genevensis, Genova et isotypus (Heldreich, Fl. Graeca exsicc. no 2941) in herbariis Musei nationalis historiae naturalis, Paris, conservantur.

Etymologia: Secundum montem Parnassus (vide supra) denominatur.

Positio in systemate generis: In serie *Micrantha* Bobrov sectionis subgenerisque *Thesium* positum.

Icones: Gussone, Pl. Rarior., tab. 20, fig. 1 (1826) sub *Th. intermedio*; Visiani in Mém. Inst. Venet., vol. 16, tab. 4 (1841), non vidi; Visiani, Fl. Dalm., Suppl., tab. 4 (1842) sub *Th. ramoso*; mea fig. 1.

Exsiccata: Rigo, It. Ital. quartum 1898, no 363b (sub *Th. italico*) et no. 505; Rigo, It. Ital. quintum 1899, no. 9 (sub *Th. italico*): Rigo, It. Apulio 1905, no. 10 (sub *Th. pratensi* var. *ambiguo*); Porta et Rigo, Ex itinere II. Ital., 1875, no. 468; Huter, Porta et Rigo, Ex itinere III. Ital., no. 784; Fl. Ital. exsicc. no 523; Pl. Ital. selec., no. 217 (sub *Th. italico*); It. Graec. 1893 (Grimburg), no. 458 (sub *Th. ramoso*); Bornmüller, Pl. Macedon. no. 1870 et 4893; Dörfler, Reise in alban.-montenegr. Grenzgebiete 1914, no. 396 et 411; Dörfler, Reisen in Nord-Alban. 1918, no. 803; Bornmüller, It. Graec. 1926, no. 1373; Heldreich, Fl. Graec. exsicc. no. 2941 (sine determ.).

Differentia

A speciebus sympatricis vel subsympatricis haec species differt: A *Th. alpino* et *Th. pyrenaico* perigonio sicco deflorato fructu satis breviore, a *Th. alpino* insuper floribus plerumque pentameris. A *Th. auriculato* absentia disci loborum discoideorum inter laciniam perigonii. A *Th. arvensi* rhizomate breviter stolonifero, inflorescentia plusminusve coarctiore et ramulis floriferis brevioribus. A *Th. linophyllo* laciniis perigonii absque dentibus, ramulis tantum unifloribus, foliis angustioribus et habitu humiliore. A *Th. divaricato* ramulis floriferis solum unifloribus et inflorescentia racemosa. A *Th. bergeri*, *Th. humili* et *Th. procumbenti* fructibus unice longitudinaliter, non reticulate nervatis. A *Th. italico* inflorescentia subconstipata et floribus infundibuliformibus. A *Th. macedonico* caule, folii, bractea, flore fructuque glabris imprimis distat.

Affinitas

A speciebus *Th. parnassi* affinibus differt: A *Th. sommieri* rhizomate breviter stolonifero, caule tenuiter exili, foliis brevioribus, inflorescentia non elongata, ramulis floriferis brevioribus differt. A *Th. kyrnoso* inflorescentia laxissima et multiflora, ramulis floriferis longioribus, bractea flore solum triplo longiore. A *Th. hispanico* rhizomate abbreviato et breviter stolonifero, inflorescentia laxissima maxime multiflorisque et a *Th. brachyphyllo* habitu altissimo, foliis, inflorescentiaque vagis, non secundis, inflorescentia laxissima differt. A *Th. libanotico* et *Th. brachystegio* inflorescentia laxissima et ramulis floriferis longioribus differt.

Cum speciebus commemoratis haec species in characteribus sequentibus convenit: Plantae potius inaltae, eramosae, potius pauciflorae, folia plus minusve linearia, uninervia et relative brevia, bracteae relative sublongae, flores infundibuliter campanulati, fructus longitrorse nervatus, perigonium siccum defloratum breve.

Area geographica

Haec species solum in peninsula Appennina et in insula Sicilia, nec non in peninsulae Balcanicae parte occidentali (Fig. 2) plus minusve disjunctive distributa est.

In Italia, praesertim in montibus Appennini centralis meridionalisve regionum Abrutiae a catena montium Gran Sasso d'Italia dicta ad Campaniam Lucaniamque et usque ad Calabriam ad meridiem versus valde disjunctive dissipata est. In Sicilia *T. parnassi* adhuc colum e montibus Nebrodi Madinique (verosimiliter ut rarum) cognitum est.

E territorio Jugoslaviae, in Croatia, imprimis in montibus Velebit et in montibus Sv. Juro dictis occurit. Simili modo in Bosnia-Hercegovina occidentali a montibus Dinaricis usque ad montes Maglić et Orjen satis disjunctive attingit. In Montenegro plantae huius speciei evidenter non rarae sunt, sed in Serbia unice in territorio Kosovo-Metohija partis occidentalissimae et in Macedonia tantum e parte a flumine Vardar ad occidentem versus adhuc raro repertae sunt. In Albania finitima tantummodo in parte boreali *Th. parnassi* praeter opinionem detectum est.

In Graecia haec species e montibus Gramos Pindus reperta est et porro usque in montes Parnassos attingit. Praeterea in montibus inter Patras et montem Kilini e Peloponneso septentrionali cognita est.

Specimina visa

Italia:

Abrutia: Mons Amaro Magellae, in pascuis alpinis "alle Rapina", 1900—2500 m s.m. (LEVIER, FI, sub *Th. humifuso*). Pascua alpina montis Majella, in regione *Pini magalensis* ("alla Rapina" supra Sta Eufemia), 2200—2400 m s.m. (LEVIER, FI). Gran Sasso, Monte Corvo, 2600 m s.m. (FIORI, FI). In cortina "Coppa pinola" sub cacumine montis Serrione ad Villavallelonga (GRANDE, CL, FI). Cortina "Coppo cico" ad Villavallelonga, 1900 m s.m. (GRANDE, FI). In alpinis editioribus montis Velino, Passo del Vortichio (LEVIER, FI). Ad fontes Majella in Femmina Morta, 2000—2300 m s.m. Item locis commemoratis, prope fontes, 1500 m s.m. descendit (VACCARI, FI). Mons Velino, 1500—2400 m s.m. (VACCARI, FI, sub *Th. divaricato*). Sopa il Cantro negli Appennini (ROLLI, FI, sub *Th. alpino*). In monte Majellone, pascua alpina, 1600 m s.m. (SOMMIER, FI). Gran Sasso d'Italia, 2500 m s.m. (SAUERI, FI; MARCHESETTI, FI, sub *Th. alpino*). In montibus prope Duchessa (STEINBERG, FI). Trunceso de Pardelli, Gran Sasso (MARTELLI, FI, sub *Th. ramoso*). In alpinis rupestribus Vallis Canella (ad orient. a Majella vers.), 1800 m s.m. (LEVIER, FI). Scorina Cavallo Majella, 1900 m s.m. (GROVES, BRNM, FI, G). In regione alpina prope Majella, Valle Andrea, 2200 m s.m. (GUADAGNO, BP, GOET, JE, LD, MA, PR, PRC). Pascua montis Majella, solo calcareo, 1350—1600 m s.m. (PORTA et RIGO, BRSL, G, JE, PRC). In pascuis alpinis montis Majella, 200—2400 m s.m. (Rigo, JE). Ad cavernam Grotte Caprara in monte Majella, 2000 m s.m. (PORTO et RIGO, BP). Provincia Aquila, Villavallelonga, in glareosis rupibusque alpinis frequens, loco dicto Coppa dell'Orso, 1700—1900 m s.m. (LORETO, BP, FI; GRANDE, FI). In monte Corno (ORSINI, P, sub *Th. linophyllo*).

Campania: In monte Cavallo (TERRACCIONO, FI, sub *Th. alpino*).

Lucania: In monte Dolcedorne, 2250 m s.m. (CAVARA et GRANDE, GOET).

Calabria: Prov. Cosenza, S. Donato, in cacumine montis Calvia, 1800 m s.m. (RIGO, BPU).

Sicilia: In herbidis montis Nebrodes (Anonymus, LD, sub *Th. italico*).

Jugoslavia:

Croatia: Montes Velebit: In lapidosis montis Sveto brdo, 1000 m s.m. (LENGYEL, BP; ROSSI, PRC, SARA). In herbidis montis Vaganski vrch supra pag. Raduc, 1500 m s.m. (LENGYEL, BP; ROSSI, SARA). Locis herbidis montis Visočica supra pag. Počitelj, 1200—1400 m s.m. (LENGYEL, BP, BPU; ROSSI, PRC, SARA; DEGEN, BRSL, PRC; WATZL, WU). Mons Siljevo Brdo prope Šugarka Duliba, 1450 m s.m. (ROSSI, PRC, SARA). In monte Poštak (ROSSI, PRC, SARA, sub *Th. divaricato*). In alpe Malovan, 1700 m s.m. (ROSSI, SARA, PRC). Mons Kiza ad Ostarici (ROSSI, PRC, sub *Th. divaricato*). Mons Višenura ad Madák. Mons Visočica ad Čítluk, 1600—1700 m s.m. (BORBÁS, BPU). In monte Kruži vrch supra Počitelj (LENGYEL, BP). Prope Odredio (PETTER, SARA, PRC, sub *Th. ramoso*). In clausuris montium non procul a via publica super pag. Brušane, 1350 m s.m. (HENDRYCH, PRC). In alpe Badanj (ROSSI, SARA). Montis Badanjski vrch pars septentrionalis, 1450—1500 m s.m. (WATZL, WU). In devexis sept.-orient. montis Malovan contra vallem profundiorem Bunjevac, 1300—1600 m s.m. In devexis or. m. Sveto brdo, 1500—1700 m s.m. In devexis saxosis m. Krug, 1300—1340 m s.m. (JANCHEN et WATZL, WU). In dorso montis Crnopac, 1350—1400 m s.m. (JANCHEN, WU). Montes Biokovo planina, in devexis septentrio-oriental. montis Sveti Juro, supra opp. Makarska, 1500—1700 m s.m. (MEYER, LJU).

Bosna-Hercegovina: In Volujak (BECK, PRC; BRANDIS, BRNM). In monte Orjen (KORB, W; ADAMOVIĆ, SARA, sub *Th. alpino*). In planitia montana ad austro-occid. a monte Jankovo brdo vers., 1500—1600 m s.m. Ad marginem austro-orient. montis Jankovo brdo, 1500—1600 m s.m. In valle angusta Male poljanice inter montes Jankovo brdo et Troglav, 1500—1700 m s.m. Ad marginem orientalem cortinae sub monte Troglav, 1700—1800 m s.m. In rupibus et lapidosis mobilis ad meridiem a cacumine montis Dinara, 1700—1800 m s.m. Dorsum montis Ilica planina, in parte centrali, 1450—1600 m s.m. In dorso montis Vršina, 1600—1750 m s.m. (JANCHEN et WATZL, WU). Montes Šator planina, in tergo inter Babina Greda et lacum, 1650 m s.m. (HANDEL-MAZZETTI, WU). Montes Čvrsnica planina, in regione cacuminali montis Čvrsnica, 2200 m s.m. (STADLMANN et soc., WU). In monte Jelenak (BUCALOVIĆ, SARA). In monte Drinača (LORSCHIGG, SARA). Montes Vran, in monte Vran mali, 2000 m s.m. (STADLMANN et soc., WU). Ad rupes in clivo montis Kamešnica supra Otoki stan, 1200—1800 m s.m. (HANDEL-MAZZETTI, WU, GOET). Locis Guila gredu supra val. Dobrido. Mons Prasa planina supra val. Dobrido. Montes Orjen planina, supra castellum Vrbanje. Montes Jelenak planina, supra Bledinje. In montibus Visin planina prope Letni stan. In montibus Lebršnik planina prope Čemešno. Loca graminosa summi montis Vuči zub prope montem Orjen. Montes Lelia planina, prope montem Jablan vrch. Montes Kakelia planina, prope castellum Zelengora (VANDAS, PR). Mons Šato planina in montibus Visin planina (VANDAS, PRC).

Montenegro: In monte Lovčen (Pojer, PRC; Kašpar, PRC). In montibus Ledenica planina (Rohlena, PRC, SARA, M). Mons Vojník (Rohlena, PRC). Ad pag. Nedajno in montibus Pivska planina (Rohlena, PR). Mons Maglić in distr. Piva, 2200 m s.m. (Rohlena, PR, PRC, BP, LU). Montes Durmitor (Rohlena, PRC). In monte Jablan vrch supra pag. Kolašin, 2200 m s.m. (Rohlena, PR, PRC). In montibus Durmitor, locis graminosis saxosisque montis Savin Kuk in *Dryadeto octopetalae*, 2300 m s.m. (Sillinger et Deyl, PR, PRC). Ad Andrijevica, in pratis alpinis montis Kosubazojevicki (Skřivánek, herb. priv.). Mons Hirovnik ad Lovčen (Korb, WU). In declivis saxosis montis Kukavica supra Peč, 1500 m s.m. (Vandas, PR). In montibus Ledenica planina (Rohlena, PR).

Serbia (Kosovo-Metohija): In declivibus graminosis montis Škorlja prope Peč, 2100 m s.m. Montes Ljuboničke planina supra Štavnjice Gornaja prope Peč, 1900 m s.m. Declivitates graminosae montis Kožujer prope Peč, 2100 m s.m. In declivibus graminosis prope Peč (Vandas, PR).

Macedonia: Popova Sapka, 30 km ad occid. ab opp. Skopje vers. 2600 m s.m. (Stainton, E). Golečnica planina, in cacumine montis Pepelak, 2000—2300 m s.m. (Bornmüller, JE, PRC). In montibus Dobro pole planina dictis (Mrkvička, PRC). Prizren, in herbidis alpinis montis Paštrik (Skřivánek, herb. priv.). In monte Peristeri prope oppidum Bitolj (Adamović, WU). In summo cacuminis Kobeliva, in Scardia occid., 2340—2370 m s.m. (Bornmüller, JE). Montes Šar planina, in monte Čanšica, 2300 m, in monte Šeklić, 2400 m s.m. et in montes Nidže planina loco Milutina kosa (Staněk, herb. priv.).

Albania:

Prope Rikavac, 1700 m s.m. Distr. Krajina, in monte Čafa Velja ad occid. a Rikovac, 1800 m s.m. Distr. Kalis, in clivibus saxosis super Cafa Korabit, 2300 m s.m. (Dörfler, WU). In monte Dea (Mali Dejs, 2246 m) supra pag. Macokul, 2100 m s.m. In monte Kunora Lurs (2110 m) supra pag. Lurja-eper, 1100 m s.m. Montes Prokletije, in monte Maja Elbunit, 2400 m s.m. et in monte Maja Raba, 1820 m s.m. Montes Mali Alamanit, in monte M. Bunéit, 1900 m s.m. In declivibus orientalibus montis Tomor. Montes Tomor, in monte Tomorica-Abbas Ali (cota 2396). In monte Omšul supra vallem Boga (omnia Staněk, herb. priv.).

Graecia:

Epirus: Montes Smolika, supra pag. Kerasovo, 2200 m s.m. (Rechinger, E). Pindus borealis, in monte Smolikas (2574 m) supra pag. Paljoseti (Staněk, herb. priv.).

Thessalia: Olympos, pars merid. supra Sparmos, 1500 m s.m. (Hayer, GOET). In monte Parnassi, in regione super. (Guicciardi, G, P).

Pelopponnesos: Achaia, in monte Chelmos (Arvania), 2000—2200 m s.m. (Bornmüller, LU). Patras (Grimburg, WU, sub *Th. ramoso*).

SUMMARY

Thesium parnassi is one of the seven known species of series *Micrantha*, which is — according to the results of previous studies — widespread between the Caucasus and the Pyrenean Peninsula. The series includes entirely oreophytic species, apparently of deeply Tertiary Age. *Th. parnassi* itself is restricted to the western part of the Balkan Peninsula (westwards of the Vardar line), to the Illyric and Hellenic part, further to Sicily and to the southern to central part of the Apennine Peninsula. Most related to it appear to be the species *Th. sommieri* and *Th. kyrnosum*. The distinct Adriatic disjunction, which in various forms is to be found also in other species mentioned in the present paper, does not eliminate the explanation of the evolution of these distribution areas by means of the hypothetical Adriatis.

A detailed survey of nomenclature, diagnostics, area etc. is given for the entire species.

SOUHRN

Thesium parnassi je jedním ze sedmi známých druhů series *Micrantha*, podle dosavadních výsledků studia rozšířené mezi Kavkazem a Pyrenejským poloostrovem. Series představuje vesměs oreofytní druhy, zcela zřejmě hluboce terciérního stáří. Samotné *Th. parnassi* je vázané na západní polovinu Balkánského poloostrova (západně od vardarské linie), na její části illyrskou i helenskou, dále na Sicilii a jižní až střední část Apeninského poloostrova. Nejblíže mu příbuznými druhy jsou asi *Th. sommieri* a *Th. kyrnosum*. Výrazná adriatická disjunkce, kterou shledáváme v různých podobách i u jiných, v pojednání uvedených druhů, nevylučuje vysvětlení vývoje těchto areálů hypotetickou Adriatidou.

K práci je připojen přehled nomenklatury, diagnostika, jakož i areál druhu, včetně přehledu materiálu, na jehož studiu celé pojednání vzniklo.

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