

Ferdinand Tessendorff (1879–1924) and his Hieracium collection

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Ferdinand Tessendorff (1879–1924) and his *Hieracium* collection

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Abstract: The *Hieracium* (*Compositae: Cichorieae*) collection of Ferdinand Tessendorff (1879–1924) was recently located in the backlog of the Botanical Museum Berlin. It comprises 565 specimens, including several types, which have now been incorporated into the general herbarium. A digest of the life and work of Tessendorff, a high school teacher and amateur botanist in Berlin, is presented. The status of the 11 type specimens present in the collection is discussed, their taxonomy is assessed, new synonymies are proposed and four names are lectotypified.

Keywords: Asteraceae, Botanical Museum Berlin, *Cichorieae*, *Compositae*, Ferdinand Tessendorff, herbarium, *Hieracium*, typification

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Introduction

In the backlog of the Botanical Museum Berlin, the first author recently located several bundles containing 565 *Hieracium* specimens collected by Ferdinand Tessendorff between 1902 and 1922, all revised by the monographer of the genus, Karl Hermann Zahn. Like the important *Hieracium* herbaria of Karl Touton (Vogt 1998), Hans Schack (Vogt 1999; Vogt & Schuhwerk 2000 & 2001), Joseph Bornmüller and August Schlickum (Vogt 2001), this collection of Tessendorff was not incorporated into the general herbarium before 1 March 1943, and for that reason it escaped the disastrous fire of the Botanical Museum Berlin. All these collections were relocated to a safe place in the Harz mountains, where they survived the Second World War unscathed. In contrast, Karl Hermann Zahn's *Hieracium* herbarium, which was also removed from the Botanical Museum Berlin in 1943, was tragically lost at its storage location in Eberswalde near Berlin in 1945 (Vogt 1999; Gottschlich 2015).

In this contribution to the knowledge of the *Hieracium* collections of the Botanical Museum Berlin, some details concerning size and content of the collections of Tessendorff are presented alongside a digest of the life and work of this amateur botanist working as a high school teacher in Berlin in the first quarter of the last century.

Material and methods

In addition to the general description and evaluation of the *Hieracium* collection of Ferdinand Tessendorff extant in the Botanical Museum Berlin, a special focus of this study was the disclosure and interpretation of the type material extant in this collection. However, an in-depth revisionary study was not intended. The taxonomic and nomenclatural reference is Euro+Med PlantBase (Euro+Med 2006+), and therefore the main nomenclatural changes are related to the exclusion of *Pilosella* from *Hieracium* s.l. Furthermore, under Current name, we propose that a large proportion of Zahn's subspecies in the genus *Pilosella* should be synonymized with the species name. In the same manner, in *Hieracium* we sink some of Zahn's varieties in their associated subspecies. The problem of the different taxonomic concepts in the genus *Hieracium* (microspecies versus subspecies) cannot be dealt with in this contribution.

Life and work of Ferdinand Tessendorff

[Konrad] Ferdinand Tessendorff was born on 1 December 1879 at the Heimberger Hof in Schloßböckelheim near Kreuznach in the Prussian province “Rheinland”

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(now Rheinland-Pfalz). He attended the high school in Kreuznach between 1889 and 1898 and was inspired by natural sciences thanks to the influence of his teacher Ludwig Geisenheyner (1841–1926), the well-known floristic botanist, cecidologist and author of the *Flora von Kreuznach* (Geisenheyner 1881, 1903), who also promoted the hieraciologist Karl Touton (Vogt 1998).

In 1898 Tessendorff enrolled at the Friedrich-Wilhelms-Universität in Berlin to study mathematics and natural sciences. In 1905 he examined in mathematics, botany and zoology and completed his teacher training in Brandenburg/Havel. Subsequently in 1907 he became a teacher at the Helmholtz-Realgymnasium in Schöneberg [now Berlin], a position Tessendorff kept until he was appointed the headmaster of this school in 1920. As a committed and popular teacher, Tessendorff was involved in educational and school reform issues. Due to a serious heart condition, Tessendorff died in Berlin on 18 June 1924 at the age of 44 years (Schulze 1936; unpublished source 1).

During his university studies in Berlin, Tessendorff became more and more interested in botany, joined the Botanical Society of Brandenburg and took part in the excursions of Paul Ascherson and Paul Graebner. Already in 1904 Friedrich Fedde – editor of *Just's Botanischer Jahresbericht* – won Tessendorff as a collaborator for this well-known annual repertory of botanical literature from all countries. For the reports from 1904 to 1910 Tessendorff acted as rapporteur of the section “Pflanzengeographie von Europa” (Tessendorff 1906b, 1908, 1909b, 1911, 1914).

By order of the West Prussian Botanical and Zoological Society [Westpreußischer Botanisch-Zoologischer Verein] Tessendorff travelled in 1905, 1906 and 1907 in the lowlands of the Vistula [Weichsel, Wisła] and Nogat rivers and studied the old river beds and silting-up lakes (Tessendorff 1906a, 1907, 1909a). Above all, the lake Druzno [Drausensee] fascinated him for many years, and he compiled his results in the contribution “Der Drausen bei Elbing [Druzno near Elblag], eine Stätte ursprünglicher Natur” (Tessendorff 1916a). Tessendorff’s studies were not restricted on botany alone but he also reported ornithological observations (Tessendorff 1907, 1916a & 1917) and he was engaged in nature conservation. In 1915 he was commissioned by the “Staatliche Stelle für Naturdenkmalpflege” [State agency for the preservation of natural monuments] in Prussia to visit the swamp areas of the provinces [the old Prussian administrative units] Saxony, Hanover and Westphalia to ascertain their conservation and threat status (Tessendorff 1916b).

In 1917 Tessendorff was called up for military service and was deployed in the area of the river Ščara [Schtschara, Шчара, Щара] at the northern edge of the Polesia in Belarus, where he was able to engage himself intensively in the botanical exploration of this floristically completely unknown area. He later compiled the results of this investigation in a dissertation with the title “Vegetationsskizze vom Oberlaufe der Schtschara

(Gouv. Minsk und Grodno)” (Tessendorff 1921, 1922a; unpublished source 1) under the supervision of Adolf Engler and graduated (Ph.D.) on 15 March 1921 at the Friedrich-Wilhelms-Universität in Berlin. One year later he published additional facts to his observations in the Ščara area with the title “Floristisches aus Weißrußland” in the *Verhandlungen des Botanischen Vereins der Provinz Brandenburg* (Tessendorff 1922b).

Since 1902 Tessendorff was a member of the Botanical Society of the Province Brandenburg [Botanischer Verein der Provinz Brandenburg] and in 1910 was elected to its managing board. For more than ten years he was co-editor of the journal *Verhandlungen des Botanischen Vereins der Provinz Brandenburg* and additionally acted as librarian of the society’s library, which was set up in the Botanical Museum Berlin. Due to these obligations, Tessendorff was closely bound up with the Botanical Museum Berlin, where he deposited the plant material used for his scientific work as well as the plants collected on his numerous excursions in Germany and Central Europe (Anon. 1918, 1919; Schulze 1936). From 1905–1911 he was involved in the processing of Paul Ascherson’s huge herbarium (Urban 1916: 76), which was acquired by the Museum in 1895.

Tessendorff was highly esteemed as an excellent floristic botanist. Johannes Abromeit, professor of botany at the University of Königsberg [now Kaliningrad], dedicated “*Silene inflata* var. *tessendorffii*”, published as *S. vulgaris* [unranked] *tessendorffii* Asch. & Graebn. (Ascherson & Graebner 1920: 74), in appreciation of Tessendorff’s achievements in the botanical exploration of West and East Prussia and Belarus.

Tessendorff was closely bound up with the Botanical Museum Berlin and handed over plant material to this institution several times. The first time, his name is found in Urban’s account of the collections of the Botanical Museum (Urban 1916: 402): “10 seltene Arten vom Rhein (a. 1904)”. Subsequently the acquisition of Tessendorff’s plant collections is documented in the annual reports of the Botanic Garden and Botanical Museum under the heading “Erwerbungen (durch Schenkung)”. In the reports for 1916/1917 (Anon. 1917: 123): “Herr Oberlehrer Tessendorff: 23 Pack ägyptische Baumwolle in verschiedenen Handelssorten”, 1917/1918 (Anon. 1918: 257): “Herr Oberlehrer F. Tessendorff, z. Z. im Felde: etwa 580 Herbarpflanzen aus Westrußland, Gouv. Minsk” [accessioned 24 October 1917] and 1918/1919 (Anon. 1919): “Herr Oberlehrer F. Tessendorff, in Berlin-Steglitz: 70 Nummern Kryptogamen aus West-Rußland, Gouv. Minsk”.

Tessendorff was particularly interested in critical genera with polymorphic species like *Calamagrostis*, *Epilobium*, *Euphrasia*, *Polygala* and above all *Hieracium*, of which he gathered extensive materials. With the exception of the *Hieracium* collection dealt with here, all specimens gathered by Tessendorff were included in the general herbarium and to the largest part were destroyed in the Second World War.

The *Hieracium* collection

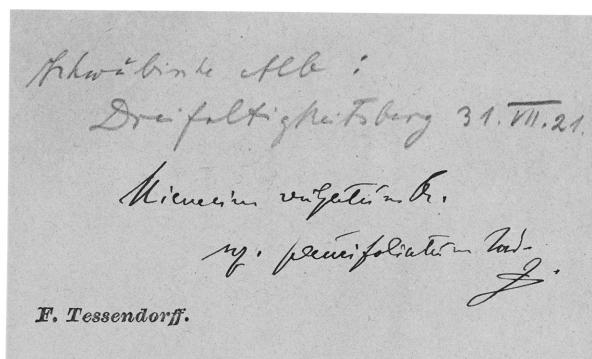
The status of Tessendorff's *Hieracium* collection now located in the backlog of the Botanical Museum Berlin is unclear because it does not appear in the herbarium records and the specimens do not bear any information concerning their acquisition. Possibly the material was already on the premises of the Botanical Museum at the time of Tessendorff's death and was not subsequently recorded. Furthermore, it would be conceivable that the material was relocated to a safe place after the fire disaster of 1943 and survived the Second World War outside Berlin as did the other, as yet unprocessed *Hieracium* collections of Karl Touton (Vogt 1998), Hans Schack (Vogt 1999) and Josef Bornmüller.

The collection comprises 565 specimens, including 11 type specimens of nine names described by Karl Hermann Zahn, who studied Tessendorff's collections for his monumental treatments of the genus in Engler's *Das Pflanzenreich* (Zahn 1921–1923) and in Ascherson & Graebner's *Synopsis der mitteleuropäischen Flora* (Zahn 1922–1938).

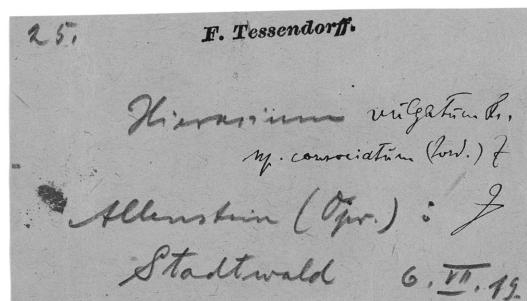
The carefully prepared specimens were kept unmounted in covers. The information on the labels is meagre and normally without further details on locality or altitude in addition to the geographic information.

Fig. 1 presents a selection of labels used by Tessendorff. There are two types of labels: simple field labels with brief information on place and date of collection in Tessendorff's handwriting and the stamped addition "F. Tessendorff." (Fig. 1A, B) and blank labels with the printed headline "Museum botanicum Berolinense." and the stamped footnote "leg. F. Tessendorff" into which Tessendorff himself (Fig. 1C) or later Berlin herbarium staff (Fig. 1D) entered the information by hand. Karl Hermann Zahn's determination remarks and his signature "Z" can be found on nearly all specimens (e.g. Fig. 1A–D, Fig. 2) and it can be assumed that Tessendorff regularly submitted his collections to the monographer of the genus for identification. Zahn listed Tessendorff's collection in his treatment for Engler's *Das Pflanzenreich* among the *Hieracium* collections he had seen (Zahn 1921–1923: 1573). In view of the loss of Zahn's herbarium at the end of the Second World War, the specimens in Tessendorff's collection are of particular importance today.

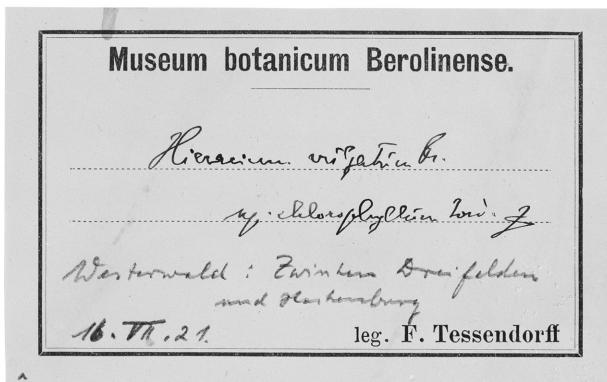
The herbarium material was almost exclusively collected by Tessendorff himself in the time between 1902 and 1922 in Germany including the former eastern territories, as well as Italy, Austria and Switzerland. Specimens from the following areas are extant (year of collection in brackets).



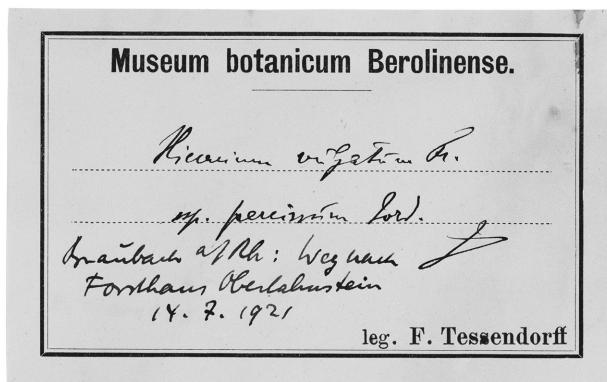
A



B



C



D

Fig. 1. A–D: Labels used in the *Hieracium* collection of Ferdinand Tessendorff. Locality information and date written in A–C by F. Tessendorff, in D by Berlin herbarium staff. The determination particulars come from K. H. Zahn, who additionally signed the labels of the specimens he saw with a "Z".

GERMANY: BADEN-WÜRTTEMBERG: Freudenstadt (1921), Hohenzollern (1921), Kaiserstuhl (1916, 1918), Murgtal (1921), Neubreisach (1918), Schönmünzach (1921), Schwäbische Alb (1919), Schwarzwald (1910, 1919), Weingarten (1921); BAYERN: Banz (1919), Bayerischer Wald (1920), Berchtesgaden (1911), Fichtelgebirge (1922), Fränkische Schweiz (1916), Lichtenfels (1916, 1919), Vilshofen (1920), Würzburg (1910); BERLIN UND BRANDENBURG: Angermünde (1922), Grunewald/Berlin (1920), Botanischer Garten (1920), Buckow (1921), Chorinchen (1921), Diehloer Berge (1909), Erkner (1920), Freienwalde (1919), Fürstenberg (1909), Glindow (1920), Hoppegarten (1921), Jahnberge (1909), Joachimsthal (1921), Liepnitzsee (1921), Luckow, Mittenwalde (1909), Münsberg, Niederfinow (1910), Niemegk (1922), Oranienburg (1919), Potsdam (1908), Rüdersdorf (1920, 1921), Spandau (1921), Sperenberg (1919, 1921), Tegeleer Forst (1920), Uckermark (1916), Werbellinsee (1921), Zossen; MECKLENBURG-VORPOMMERN: Usedom (1921); HARZ (NIEDERSACHSEN UND SACHSEN-ANHALT): Altenau (1922), Benneckenstein (1922); HESSEN: Braufels (1922), Limburg/Lahn (1921, 1922); RHEINLAND-PFALZ: Altenbamberg (1916), Bad Dürkheim (1914, 1916), Bad Ems (1921), Bad Kreuznach (1909, 1911, 1912, 1921, 1922), Balduinstein (1922), Braubach am Rhein (1921), Heidesheim-Ingelheim (1904), Höchstenbach (1922), Katzenelnbogen (1922), Oberlahnstein (1921); SACHSEN: Hoyerswerda (1916); SACHSEN-ANHALT: Altmark (1915), Havelberg (1911), Stendal (1908, 1919); THÜRINGEN: Altenberg (1922), Berka (1916), Blankenburg (1919), Kyffhäuser (1921); WESTERWALD: (1921); NOT LOCATED: Rosenthal (1902), Weidental (1908). — **AUSTRIA:** Kärnten (1911), Salzburg (1911), Tirol (1911). — **BELARUS:** leg. Bothe (1918). — **FRANCE:** Mülhausen [Mulhouse] (1918), Vogesen (1910, 1911). — **ITALY:** Friaul (1911), Görz [Gorizia] (1912), Triest [Trieste] (1912). — **LITHUANIA:** Kurische Nehrung [Kuršių nerija]. — **POLAND:** “WESTPREUSSEN”: Bellinchen [Bielinek] (1916), Briesen [Wąbrzeźno] (1910), Drausensee bei Elbing [Druzno near Elblag] (1908, 1910, 1920), Eylau [Hawa] (1919), Kulmsee [Chełmża] (1908), Löbau [Lubawa] (1919), Marienburg [Malbork] (1920); “OSTPREUSSEN”: Allenstein [Olsztyn] (1919), Miswalde [Myślice] (1919), Nikołajken [Mikołajki] (1920), Sensburg [Mragowo] (1920); “POMMERN”: Bublitz [Boblice] (1920), Rummelsburg [Miastko] (1920), Swinemünde [Świnoujście] (1921), Stettin [Szczecin] (1922); “SCHLESIEN”: Glatz [Kłodzko] (1922), Neurode [Nowa Ruda] (1922), Riesengebirge [Karkonosze] (1910), Strehlen [Strzelin] (1922). — **RUSSIA:** “OSTPREUSSEN”: Insterburg [Tschernjachowsk, Черняховск] (1919), Kurische Nehrung [Kurschskaja kossa, Куршская коса] (1919). — **SWITZERLAND:** Simiplon (1912), Wallis (1911, 1912), Graubünden (1912), St. Gotthard (1913).

Only few specimens from other collectors are included: H. Bothe, K. Hahn, H. Preuß, E. Rebholz and F. Roemer. Exsiccata are not present.

Index herbariorum (Vegter 1988) indicated Berlin (B) and Geneva (G) as the herbaria housing plant material collected by Tessendorff. The duplicate specimens of Tessendorff’s Russian plant collections presented to Johannes Abromeit in Königsberg [Kalingrad] were destroyed in the Second World War.

Type specimens in the *Hieracium* collection of Ferdinand Tessendorff

Hieracium echioides [subsp. *freynii*] subvar. *calvescens* Zahn in Engler, Pflanzenr. 82(IV, 280): 1368. 1923. — Ind. loc.: “Prov. Brandenburg: Templin in der Mark, Niederfinow bis Oderberg!”. — **Lectotype (designated here by Gottschlich):** [Germany]: Niederfinow – Oderberg, 20 Aug 1910, F. Tessendorff (B [B 10 1154393]). — Current name: ***Pilosella echioides*** (Lumn.) F. W. Schultz & Sch. Bip.

Remarks — The specimen has been determined by K. H. Zahn.

Hieracium euchaeum subsp. *tscherningii* Zahn in Engler, Pflanzenr. 82(IV, 280): 1527. 1923. — Ind. loc.: “Brandenburg: Bellinchen a. O.! Niederösterreich: Oberlaa (Bänitz n. 9896 pro *Bauhini* × *echioides* × *Pilosella* Tscherning!, Hainburg!, Stein!, Pfaffenberge bei Deutsch-Altenburg (J. Vetter!)”. — Syntype: [Germany]: Bellinchen (Oder), 4 Jun 1916, F. Tessendorff (B [B 10 1154361]). — Current name: ***Pilosella euchaeum*** (Nägeli & Peter) Soják.

Remarks — The specimen has been determined by K. H. Zahn.

Hieracium laevigatum subsp. *istrogenes* Zahn in Engler, Pflanzenr. 79(IV, 280): 889. 1922. — Ind. loc.: “Schwaben: Jurakalkfelsen im oberen Donautal bei Beuron! und Sigmaringen! und in den Tälern der Rauhen Alb!”. — **Lectotype (designated here by Gottschlich):** [Germany]: Beuron: am Weg zum Maurusfels, 8 Aug 1919, F. Tessendorff (B [B 10 0448385 + B 10 0448386 on two sheets]; isolectotype: (B [B 10 0448389 + B 10 0448388 on two sheets])). — Current name: ***Hieracium laevigatum*** subsp. *istrogenes* Zahn.

Remarks — The original labels of all four sheets bear the handwritten determination particulars of K. H. Zahn dated 1919.

Hieracium leptophyton [subsp. *cinitum*] var. *subcinitum* Zahn in Engler, Pflanzenr. 82(IV, 280): 1462. 1923. — Ind. loc.: “Brandenburg: Bellinchen a. d. Oder!”. — Holotype: [Germany]: Bellinchen (Oder), 4 Jun 1916, F. Tessendorff (B [B 10 1154437]). — Current name: ***Pilosella leptophyton*** (Nägeli & Peter) S. Bräut. & Greuter.



Fig. 2. Holotype of *Hieracium murorum* subsp. *koserovense* Zahn (B [B 10 0673426]) with handwritten determination particulars of K. H. Zahn.



Fig. 3. Lectotype of *Hieracium murorum* subsp. *suevicola* Zahn (B [B 1154496]) with handwritten determination particulars of K. H. Zahn.

Remarks — The blank label (“Museum botanicum Berolinense. leg. F. Tessendorff”) bears the handwritten determination particulars of K. H. Zahn.

Hieracium murorum subsp. *koserovense* Zahn in Ascherson & Graebner, Syn. Mitteleur. Fl. 12(2): 398. 1931. — Ind. loc.: “Koserow – Kölpinsee (Tessendorff)”. — Holotype: [Germany]: Usedom: Koserow – Kölpinsee (II.), 3 Jul 1921, F. Tessendorff (B [B 10 0673426]) [Fig. 2]. — Current name: **Hieracium murorum** subsp. *koserovense* Zahn.

Remarks — The original label bears the handwritten determination particulars of K. H. Zahn stating “*H. murorum* subsp. *oblongum* var. *koserovense*” and “Tessend. et Zahn” as authors of the new name.

Hieracium murorum subsp. *suevicola* Zahn in Engler, Pflanzenr. 76(IV, 280): 306. 1921 (“*suevicolum*”). — Ind. loc.: “Württemberg (Hohenacker, Arznei-Pfl. n. 353)! Harz: zwischen Walkenried und Sachsa (Zobel)! Berlin: Tegeler Forst! Insel Rügen!”. — **Lectotype (designated here by Gottschlich)**: [Germany]: Berlin – Tegeler Forst, 29 May 1920, F. Tessendorff (B [B 10 1154496]) [Fig. 3]. — Current name: **Hieracium murorum** subsp. *suevicola* Zahn.

Remarks — The blank label (“Museum botanicum Berolinense. leg. F. Tessendorff”) bears the handwritten determination particulars of K. H. Zahn. Although it is usually appropriate to select a lectotype among specimens from an exsiccata series, here we selected Tessendorff’s specimen, because we never saw material collected by Hohenacker. Perhaps the indication of “Hohenacker, Arznei-Pfl., n. 353” made by Zahn refers to a specimen formerly at B and now destroyed.

Hieracium umbellatum [subsp. *umbellatum* var. *coronopifolium*] f. *farinellum* Zahn in Engler, Pflanzenr. 79(IV, 280): 914. 1922. — Ind. loc.: “An der Küste von Ostende bis Ostpreußen! [...].” — Syntype: [Lithuania and Russia]: Kurische Nehrung, 13 Jul 1919, F. Tessendorff (B [B 10 1154511]). — Current name: **Hieracium umbellatum** L. subsp. *umbellatum*.

Remarks — The original label of F. Tessendorff bears the handwritten determination particulars of K. H. Zahn dated 1919.

Hieracium vulgatum [subsp. *chlorophyllum*] var. *calvescens* Zahn in Engler, Pflanzenr. 76(IV, 280): 363. 1921. — Ind. loc.: “Pommern: Zwischen Bublitz und Drawehn (Tessendorff)!”. — Holotype: [Poland]: Bublitz – Drawehn [Bobolice – Drzewiany], Pommern, 11 Jul 1920, F. Tessendorff (B [B 10 0673427]). — Current name: **Hieracium lachenalii** subsp. *chlorophyllum* (Jord. ex Boreau) Zahn.

Remarks — The blank label (“Museum botanicum Berolinense. leg. F. Tessendorff”) bears the handwritten determination particulars of K. H. Zahn.

Hieracium vulgatum subsp. *tridentatoides* Zahn in Engler, Pflanzenr. 82(IV, 280): 1543. 1923. — Ind. loc.: “Westerwald: Nistertal bei Niedermörsbach (Tessendorff)”. — **Lectotype (designated here by Gottschlich)**: [Germany]: Westerwald: Tal der Nister bei Niedermörsbach, 16 Jul 1921, F. Tessendorff (B [B 10 0673429]; isolecotype: B [B 10 0673428]). — Current name: **Hieracium lachenalii** subsp. *tridentatoides* (Zahn) Zahn.

Remarks — The specimens bear K. H. Zahn’s handwritten determination particulars on the label stating “*Hieracium vulgatum* subsp. *acuminatum* var. *tridentatoides* Zahn”.

Author contributions

RV wrote the manuscript. GG revised the herbarium specimens and evaluated the types.

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Cited unpublished source

(1) Humboldt Universität zu Berlin, Universitätsbibliothek, Doktorarbeit mit Lebenslauf von Ferdinand Tessendorff.

References

- Anon. 1917: Bericht über den Botanischen Garten und das Botanische Museum zu Berlin-Dahlem vom 1. April 1916 bis zum 31. März 1917. — Notizbl. Bot. Gart. Berlin-Dahlem **7**: 113–132.
- Anon. 1918: Bericht über den Botanischen Garten und das Botanische Museum zu Berlin-Dahlem vom 1. April 1917 bis zum 31. März 1918. — Notizbl. Bot. Gart. Berlin-Dahlem **7**: 249–264.
- Anon. 1919: Bericht über den Botanischen Garten und das Botanische Museum zu Berlin-Dahlem vom 1. April 1918 bis zum 31. März 1919. — Notizbl. Bot. Gart. Berlin-Dahlem **7**: 331–344.
- Anon. 1934: Bericht über den Botanischen Garten und das Botanische Museum zu Berlin-Dahlem vom 1.

- April 1933 bis zum 31. März 1934. – Notizbl. Bot. Gart. Berlin-Dahlem **12**: 1–28.
- Ascherson P. F. A. & Graebner K. O. P. P. (ed.) 1920: Synopsis der mitteleuropäischen Flora **5(2)**: 1–80. – Leipzig: Gebrüder Borntraeger.
- Euro+Med 2006+ [continuously updated]: Euro+Med PlantBase – the information resource for Euro-Mediterranean plant diversity. – Published at <http://www.bgbm.org/EuroPlusMed/> [accessed 19 Feb 2022].
- Geisenheyner L. 1881: Flora von Kreuznach. – Kreuznach: Reinhard Schmithals.
- Geisenheyner L. 1903: Flora von Kreuznach und dem gesamten Nahegebiet, ed. 2. – Kreuznach: Ferd. Harrach.
- Gottschlich G. 2015: Karl Hermann Zahn (1865–1940): Leben, Werk und wissenschaftliches Umfeld des Monographen der Gattung *Hieracium* (Habichtskraut, Asteraceae). – *Stapfia* **102**: 1–126.
- Schulze G. M. 1936: Ferdinand Tessendorff. Nachruf. – Verh. Bot. Vereins Prov. Brandenburg **76**: 64–69.
- Tessendorff F. 1906a: Vorläufiger Bericht über die im Auftrage des Westpreußischen Botanisch-Zoologischen Vereins in der Zeit vom 3. Juli bis 16. August 1905 ausgeführte botanische Reise. – Ber. Westpreuss. Bot.-Zool. Vereins Danzig **28**: 33–42.
- Tessendorff F. 1906b: Pflanzengeographie von Europa. – Just's Bot. Jahresber. **32(2)**: 1106–1256.
- Tessendorff F. 1907: Kurzer Bericht über eine im Auftrage des Westpreußischen Botanisch-Zoologischen Vereins in der Zeit vom 8. Juli bis 21. August ausgeführte botanische Reise. – Ber. Westpreuss. Bot.-Zool. Vereins Danzig **29**: 107–117.
- Tessendorff F. 1908: Pflanzengeographie von Europa. – Just's Bot. Jahresber. **33(3)**: 391–534.
- Tessendorff F. 1909a: Kurzer Bericht über zwei im Auftrage des Westpreußischen Botanisch-Zoologischen Vereins in der Zeit vom 15. bis 22. Mai und 6. Juli bis 5. August ausgeführte botanische Reisen. – Ber. Westpreuss. Bot.-Zool. Vereins Danzig **31**: 65–72.
- Tessendorff F. 1909b: Pflanzengeographie von Europa. – Just's Bot. Jahresber. **34(3)**: 449–684.
- Tessendorff F. 1911: Pflanzengeographie von Europa. 1907. – Just's Bot. Jahresber. **35(3)**: 267–514.
- Tessendorff F. 1914: Pflanzengeographie von Europa. 1908–1910. – Just's Bot. Jahresber. **38(2)**: 865–1573.
- Tessendorff F. 1916a: Der Drausen bei Elbing, eine Stätte ursprünglicher Natur. – Naturdenkmäler **2(12)**: 1–50.
- Tessendorff F. 1916b: Bericht über seine Reise durch Moorgebiete Nordwestdeutschlands. – Beitr. Naturdenkmalpflege **5(2)**: 172–187.
- Tessendorff F. 1916c: Moorschutz. – Heimatschutz: Mitteilungen des Deutschen Bundes Heimatschutz **11(4)**: 25–33.
- Tessendorff F. 1917: Die Vogelwelt des Drausensees. – Ber. Westpreuss. Bot.-Zool. Vereins Danzig **39**: 114–124.
- Tessendorff F. 1920: Bemerkungen zur Pflanzenwelt der Oranienburger und Liebenwalder Forst. – Verh. Bot. Vereins Prov. Brandenburg **61**: 99–103.
- Tessendorff F. 1921: Vegetationsskizze vom Oberlauf der Schtschara (Gouv. Minsk und Grodno.). – Berlin: Max Laue Verlag.
- Tessendorff F. 1922a: Vegetationsskizze vom Oberlauf der Schtschara (Gouv. Minsk und Grodno.). – Ber. Freien Vereinigung Pflanzengeogr. **1920–1921**: 25–102.
- Tessendorff F. 1922b: Floristisches aus Weiss-Russland. – Verh. Bot. Vereins Prov. Brandenburg **64**: 109–128.
- Vegter I. H. 1988: Index herbariorum. Part II(7). Collectors. T–Z. – Utrecht, Antwerp, The Hague, Boston: Bohn, Scheltema & Holkema. – Regnum Veg. **117**.
- Vogt R. 1998: Das *Hieracium*-Herbar von Karl Touton. – Willdenowia **28**: 253–261. Crossref.
- Vogt R. 1999: Hans Schack (1878–1946) und sein Berliner *Hieracium*-Herbar. – Willdenowia **29**: 337–348. Crossref.
- Vogt R. 2001: The *Hieracium* collection of August Schlickum. – Willdenowia **31**: 433–441. Crossref.
- Vogt R. & Schuhwerk F. 2000: Typus-Material im *Hieracium*-Herbar von Hans Schack. – Willdenowia **30**: 161–199. Crossref.
- Vogt R. & Schuhwerk F. 2001: Type material in the *Hieracium* collection of Hans Schack – 2. Names published by others than Schack. – Willdenowia **31**: 153–170. Crossref.
- Zahn K. H. 1921–1923: *Hieracium*. – In: Engler A. (ed.), Das Pflanzenreich **IV**, **280** [Heft **75**: 1–288 (4 Feb 1921), **76**: 289–576 (10 May 1921), **77**: 577–864 (18 Oct 1921), **79**: 865–1146 (14 Feb 1922), **82**: 1147–1705 (27 Feb 1923)]. – Leipzig: Wilhelm Engelmann.
- Zahn K. H. 1922–1938: *Hieracium*. – In: Ascherson P. F. A. & Graebner K. O. P. P. (ed.), Synopsis der mitteleuropäischen Flora **12(1)**: 1–80 (1922), 81–160 (1924), 161–400 (1929), 401–492 (1930); **12(2)**: 1–160 (1930), 161–480 (1931), 481–640 (1934), 641–790 (1935); **12(3)**: 1–320 (1936), 321–480 (1937), 481–708 (1938). – Leipzig, Berlin: Gebrüder Borntraeger.

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