

# Nomenclatural notes on conifer names published by George Gordon and Christian von Steven

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A literature survey conducted to establish the date of valid publication of the name *Pinus pithyusa* revealed a series of publications on conifer plants authored by George Gordon, published during 1841 and 1842 in the horticultural periodical *Gardeners' Chronicle*. The series seems to be largely overlooked by botanical scholars. Names appearing in these contributions, their status and current application are reviewed here. The following new names and combinations were validly published in this series: *Pinus californica* Gordon, *P. pithyusa* Gordon, *P. hispanica* Gordon, *P. romana* Gordon, *P. taurica* (Loudon) Gordon, *P. chilghoza* Gordon, *Abies khutrow* (Royle ex Turra) Gordon, *A. morinda* Gordon and *Juniperus squamosa* Gordon. Of these, *P. pithyusa* is the only name requiring nomenclatural adjustments. The history of the discovery of *P. pithyusa* and its introduction to Britain is reviewed in connection with the first valid publication of the name. It is also shown that *Juniperus marschalliana*, published by Christian von Steven in 1856, is the earlier legitimate name for the taxon currently known as *J. deltoides*. The names *Pinus pithyusa* Gordon and *J. marschalliana* Steven are typified and the combination *Pinus brutia* var. *pithyusa* (Gordon) Silba ex Kovalchuk, *comb. nova* is proposed.

## Introduction

Recent efforts towards the large-scale digitisation of historical natural history publications have resulted in thousands of volumes and millions of pages becoming publicly available via several online platforms. These resources are truly invaluable for the researchers and scholars interested in botanical and zoological nomenclature, as they enable direct access to original descriptions of thousands of taxa.

My survey of 19th-century botanical literature, conducted to establish the place and date

of valid publication of the name *Pinus pithyusa*, revealed a series of short contributions on conifer plants that appeared in 1841 and 1842 in the horticultural periodical *Gardeners' Chronicle* under the title “Coniferous Plants” (No. I – No. IV). The series included brief descriptions of recently described and lesser-known species of conifers. No author's name was provided for the first two of these contributions, but the last two appeared under the authorship of the British botanist George Gordon (1806–1879). Therefore, it is assumed here that all four parts were authored by him (Gordon 1841a, 1841b, 1842a, 1842b).

The fourth part was concluded with a phrase “To be continued”, but I was unable to trace any further parts of this series. The results of an analysis of these publications are presented and discussed here, with special emphasis on the names *Pinus pithyusa* and *Juniperus marschalliana*.

## The names appearing in the series “Coniferous plants” (1841–1842), their statuses and historical notes

I analysed the names that appeared in the series of contributions entitled “Coniferous plants” (No. I – No. IV), with the aim of establishing their identity, aligning them with the names in current use, identifying new names and combinations and evaluating the need for nomenclatural adjustments. The results are summarised in Appendix 1. Many of the provided descriptions are very concise, and some do not meet the formal requirements for valid publication of names of new taxa (Turland *et al.* 2018: Art. 38.3); for example, the descriptive statement associated with the name *Pinus oocarpoides*. In some instances, taxa were given binomial names, but the accompanying descriptions showed that the author did not accept those names as distinct species and instead treated them as varieties. I regard such names as invalid; for example, *Pinus ascarena* and *Juniperus taurica*. Accounts of some species included several alternative names—for example, no. 29 (“*Pinus hispanica*, or *pyrenaica*”), and no. 30, where the names *Pinus romana* and *P. caramanica* were mentioned simultaneously. Here, the names *P. hispanica* Gordon and *P. romana* Gordon are treated as new names that were validly published as superfluous, illegitimate synonyms of *P. pyrenaica* Lapeyr. and *P. caramanica* Bosc, respectively.

### First contribution

The first contribution (Gordon 1841a) in this series dealt with species originating from Mexico and western North America.

The name *Pinus oocarpoides* had not been validly published prior to Gordon’s publication. However, the only character indicated to dis-

tinguish it from *P. oocarpa* was its hardness (Gordon 1841a). Therefore, I conclude that the description does not meet the requirements for the valid publication of new names (Turland *et al.* 2018: Art. 38.3). The name *P. oocarpoides* was validated by Loudon (1842: 1118) and is currently placed in the synonymy of *P. oocarpa*.

The name *Pinus californica* used by Gordon may be formally treated as a new name, since Gordon did not refer to any earlier publication. The name was used prior to Gordon’s publication by Hooker and Arnott (1840: 393), who, however, clearly referred to Loiseleur and thus to the name *P. californiana* Loisel. (Loiseleur-Deslongchamps 1812: 243). The latter name has been suppressed following the proposal by Whittemore (2012). According to Whittemore, the pine described by Loiseleur most likely represented either *P. radiata* or *P. muricata*. Although there is no direct reference provided in Gordon’s publication, his description likely refers to the same tree from the Horticultural Society’s Garden that was described in Loudon’s (1838: 2268–2269) account of *P. californiana*. Gordon’s description of *P. californica* is extremely concise. Even if one considers it sufficient for valid publication, the name would fall into the synonymy of either *P. radiata* or *P. muricata*, both of which were published prior to Gordon’s work.

### Second contribution

The second contribution (Gordon 1841b) in the series dealt with species originating from Europe and the Caucasus. Several designations that appeared there might be considered new names.

The case of *Pinus pithyusa* is discussed in detail below. The name *P. hispanica* may be regarded as the validation of the name *P. hispanica* Cook. This taxon is currently known as *P. nigra* subsp. *salzmannii*, and the earliest name available for it at the specific rank is *P. clusiana* Clemente. The name *P. romana* is applicable to the taxon currently known as *P. nigra* subsp. *laricio*, and the earliest legitimate name for it at the specific rank is *P. caramanica* Bosc. The name *P. ascarena* may be treated as an orthographic variant of *P. escarena* Risso; however,

the name was not accepted by Gordon as a distinct species. This taxon is currently known as *P. pinaster* subsp. *escarena*.

### Third contribution

Of the names that appeared in the third contribution (Gordon 1842a) of this series, *Pinus taurica* is a new combination based on *P. laricio* var. *taurica* Loudon. Gordon treated this species as being distinct from *P. pallasiana*. However, currently it is not recognised at any taxonomic rank and is placed in the synonymy of *P. nigra* subsp. *pallasiana*. Gordon did not recognise the name *P. khasiya* as distinct, placing it in the synonymy of *P. sinensis*. The name *Abies khutrow* is a new combination based on *Pinus khutrow*. Gordon's name appeared three months earlier than the same combination published by Loudon (1842: 1032), which is listed in IPNI (<https://ipni.org/n/261555-1>). The name *Abies morinda* is a new name that was published prior to the publication of the name *Picea morinda* by Link (1842: 522). Both *A. khutrow* and *A. morinda* are currently placed in the synonymy of *Picea smithiana*.

### Fourth contribution and nomenclatural summary

The fourth part (Gordon 1842b) of this series was devoted to species of *Juniperus*. Of the names discussed in this part, *J. squamosa* may be formally regarded as a new name. The species is currently known under the name *J. squamata*. Gordon also mentioned the name *J. taurica*, but he did not accept it as a distinct species.

Based on the analysis of all the names published in the series "Coniferous plants", I conclude that seven new names and two new combinations were validly published there. Additionally, three designations appearing in this series are considered not validly published:

*Pinus oocarpoides* Gordon, Gard. Chron. 1841(22): 340. 1841, *nom. inval.* (Turland *et al.* 2018: Art. 38.3)

*Pinus californica* Gordon, Gard. Chron. 1841(22): 340. 1841.

*Pinus pithyusa* Gordon, Gard. Chron. 1841(35): 564. 1841.

*Pinus hispanica* Gordon, Gard. Chron. 1841(35): 564. 1841.

*Pinus romana* Gordon, Gard. Chron. 1841(35): 564. 1841.

*Pinus ascarena* Gordon, Gard. Chron. 1841(35): 564. 1841, *nom. inval.* (Turland *et al.* 2018: Art. 36.1)

*Pinus taurica* (Loudon) Gordon, Gard. Chron. 1842(4): 52. 1842.

*Pinus chilghoza* Gordon, Gard. Chron. 1842(4): 52. 1842.

*Abies khutrow* (Royle *ex* Turra) Gordon, Gard. Chron. 1842(4): 52. 1842.

*Abies morinda* Gordon, Gard. Chron. 1842(4): 52. 1842.

*Juniperus taurica* Gordon, Gard. Chron. 1842(40): 652. 1842, *nom. inval.* (Turland *et al.* 2018: Art. 36.1)

*Juniperus squamosa* Gordon, Gard. Chron. 1842(40): 652. 1842.

Of those names and combinations, only *Pinus pithyusa* needs nomenclatural adjustment.

### Status of the name *Pinus pityusa* Steven

The authorship of the name *Pinus pityusa* has traditionally been ascribed to Christian von Steven (Steven 1838). Therefore, the name *P. pithyusa* Gordon might appear nomenclaturally superfluous. I review the nomenclatural history of this taxon to clarify the significance of the publication of the name *P. pithyusa* by Gordon (1841b).

Calabrian pine (*Pinus brutia*) is a common species of the Eastern Mediterranean region, with its distribution area extending to the coast of the Black Sea, the Caucasus, northwestern Iran and northern Iraq (<https://powo.science.kew.org/taxon/urn:lsid:ipni.org:names:677009-1>). Geographically isolated populations of *P. brutia* growing along the northeastern coast of the Black Sea are often recognised as a distinct variety, *P. brutia* var. *pithyusa* (Steven) Silba (Farjon 2010: 643). Some authors prefer to treat this taxon at the specific rank, i.e., *P. pityusa* Steven (Orlova & Menitzky 2003).

It is nearly universally accepted that the name *Pinus pityusa* was first validly published by Christian von Steven in his account of pines of the Crimea and the Caucasus (Steven 1838). In that work, Steven indeed provided a description of the pine currently known as *P. brutia* var. *pithyusa*. However, he listed it under the name “*Pinus maritima* Lamb. (non Link)”. The designation “*Pinus pityusa*” was mentioned by Steven in his account of *P. maritima* solely in the following phrase: “*In litore Abshasiæ circa Pezundan, antiquam Pityum; unde olim pro distincta specie existimans nomen P. Pityusæ dedi*”. This statement by Steven undoubtedly shows that the designation “*Pinus pityusa*” was not accepted by him at the time of the publication. Therefore, the name *Pinus pityusa* Steven was not validly published in 1838 (Turland *et al.* 2018: Art. 36.1). In the English translation of Steven’s work by John Loudon (Steven 1839), the same phrase reads “On the shores of Abshasia, around Pezundan, the ancient Pityus; from which circumstance, formerly, when I thought it a distinct species, I named it *P. pityusa*”.

This observation was reported by me to IPNI on 8 February 2025, and *Pinus pityusa* Steven was consequently flagged as *nom. inval.* (<https://www.ipni.org/n/263226-1>).

### Use of the names *Pinus pityusa* and *P. pithyusa* in 1830–1850s

The finding that the name *P. pityusa* was not validly published by Steven prompted a literature survey to determine the place and date of publication of the earliest valid name for the taxon.

Several spelling variants of the final epithet coexist in the literature: *pityusa*, *pithyusa* and *pitiusa*. Steven used the spelling *pityusa* and derived it from the name of the ancient Greek settlement Pityus (Greek: Πιτυοῦς), which existed in the area of modern Pitsunda. However, numerous authors subsequently adopted the spelling *pithyusa* and it became prevalent in the modern botanical literature. In some sources (for example, Komarov 1934), this taxon was cited as *Pinus pithyusa* Fox-Strangw. ex Gordon (1840). The name appeared in that work in the following context: “*Pinus pithyusa* Strangways. This

is only one of the varieties of *P. halepensis*, and is, I believe, identically the same as *P. maritima* of Lambert’s *Monograph*, *P. halepensis maritima* Arb. Brit., p. 223. fig. 2112., which is only the largest-coned variety, and more egg-shaped than the cones of the true Aleppo one” (Gordon 1840). It is clear that the name *P. pithyusa* was not accepted by Gordon in this publication and therefore was not validly published there (Turland *et al.* 2018: Art. 36.1).

The name *P. pithyusa* also appears in Carrière’s (1855) *Traité général des conifères* where the name was accepted by the author. However, as can be concluded from the list of synonyms, the description and the indicated distribution range provided by Carrière, he used this name in a different sense from Steven and applied it to the type variety of *P. brutia* as currently understood. Apparently, Carrière followed the view prevailing at the time, which restricted the application of the name *P. brutia* to pines occurring in Italy, whereas pines of the Eastern Mediterranean, currently recognised as *P. brutia*, were known under the illegitimate name *P. maritima* Lamb. (non *P. maritima* Mill. nec Lam.). Thus, Carrière adopted the name *P. pithyusa* as a replacement name for *P. maritima* Lamb. and gave the pines from the northeastern coast of the Black Sea a new name, *P. abasica*.

The publications mentioned above are well known, included in IPNI and widely cited. My literature survey revealed additional publications that were not mentioned in later treatments. It appears that the first author to report the occurrence of a new distinct pine species on the northeastern coast of the Black Sea near Pitsunda was Alexander von Nordmann. He undertook a trip to the eastern coast of the Black Sea in 1835. Extracts from his reports, sent to the Academy of Sciences in Saint Petersburg, were published two years later (Nordmann 1837). In the reports, the new pine is mentioned in a single phrase: “Bei Pizunda fanden wir eine neue Pinus-Art, *Pinus pitiusa* m.” Since Nordmann did not provide any description for this new pine, his designation *Pinus pitiusa* remained a *nomen nudum* and was not validly published (Turland *et al.* 2018: Art. 38.1).

I succeeded in identifying the previously overlooked place of valid publication of the

name *Pinus pithyusa*. It was validly published by Gordon (1841b) and accompanied by a brief description emphasizing the characters that, in his opinion, distinguished this species from *P. halepensis* and *P. brutia*. Thus, the description formally meets the requirements for valid publication of a new taxon name (Turland *et al.* 2018: Art. 38.1). No references to other publications were provided by Gordon (1841b), but in describing the cones of *P. pithyusa* (“the cones longer, larger and more ovate”), he essentially repeated his own earlier description (Gordon 1840; *see above*) just slightly rephrasing it. Thus, it can be assumed that Gordon referred to cones distributed in Britain under the name *P. pithyusa* by William Fox-Strangways. Gordon (1841b) further added: “It is said to be found plentifully in Greece”. However, that statement is unlikely to be applicable to the material distributed by Fox-Strangways, as the available data show. To prove this, the history of the discovery of *P. pithyusa* and its introduction to Europe is reviewed below.

### History of the discovery of *Pinus pithyusa* and its introduction to Britain

Steven (1838) described the origin of the material available to him as follows: “*Ramulos cum strobilis jam ante plures annos habui ab Exc. Greigh classis rossicæ in Ponto Euxino quondam Præfecti; postea communicavit Chirurgus Iljin*”. In the English translation (Steven 1839), the same phrase reads: “I received branches with strobiles, many years ago, from Admiral Greig, then commanding the Russian fleet in the Euxine; and subsequently from Surgeon Iljin”. Admiral Alexey Greig (Greigh) was the Commander of the Black Sea fleet during 1816–1833. Greig retired and permanently moved to Saint Petersburg in 1833. Therefore, the material of *P. pithyusa* must have been collected by Greig no later than 1833. This agrees with what was written by Steven (1838), who indicated that he received material from Greig “*jam ante plures annos*”, i.e., many years ago. In Steven’s personal herbarium, deposited at the Helsinki Botanical Museum (H), there is an undated specimen of *P. pityusa* with a label reading “*Pinus*

*Bitschwindia, in litore Abchasiae, orient ponti Euxini*”, but without a collector’s name (barcode H1002534). This specimen might have been collected by Greig, but there is no strong evidence of this. It also lacks cones, whereas Steven described the material received from Greig as cone-bearing branches. I was unable to trace any further original material of *P. pityusa* collected by Greig. Another specimen of *P. pityusa* in Steven’s herbarium bears a label reading “*Pinus. Pizunda, Iljin 1836*” (barcode H1504665). Iljin’s collection was also mentioned by Steven (1838). This specimen was designated as the lectotype of *P. pityusa* Steven by Orlova and Kristensen (2002). In their interpretation, it was collected by Greig and later sent to Steven by Iljin. However, it appears more likely that Iljin collected it himself. The indicated collection year (1836) supports this, since the specimen was collected after Greig’s return to Saint Petersburg in 1833.

Nordmann visited the stand of *P. pithyusa* near Pitsunda during his 1835 expedition to the Caucasus (Nordmann 1837). He referred to it as *P. pitiusa* and credited himself with this designation. However, it appears more likely that Nordmann adopted the name originally coined by Steven. As shown above, Steven must have received material of *P. pithyusa* collected by Greig no later than 1833, that is, prior to Nordmann’s expedition. Nordmann and Steven communicated frequently and undertook a journey together across the Crimea in 1833 (Nordmann 1865). Therefore, it is plausible that Nordmann received information about this pine from Steven before his trip to the Caucasus. Additional support for this is provided by the fact that *Pinus pitiusa* is one of only two Latin binomials used by Nordmann in the published extracts from his report. All the remaining discoveries made during the expedition were simply referred to as new species without being named specifically. During his journey to the Caucasus, Nordmann gathered extensive botanical and zoological collections. According to his report, these included a total of 13 260 plant specimens representing 930–950 species. Steven had access to Nordmann’s collections and, in fact, described Caucasian fir *Abies nordmanniana* (as *Pinus nordmanniana*) based on materials brought by Nordmann. However, Steven (1838) did not specifically



mention any collections of *P. pithyusa* made by Nordmann during his journey. I was unable to locate any extant specimens of *P. pithyusa* that can be attributed to Nordmann.

First mentions of the name *P. pithyusa* by British horticulturists (Loudon 1839, Gordon 1840) appeared soon after Steven's publication. However, the first cones with seeds evidently arrived in Britain a few years earlier, as Gordon (1840) mentioned that he raised this pine from seeds himself. Those initial reports repeatedly associated the name *P. pithyusa* with cones distributed by William Fox-Strangways, to whom the name in fact was often ascribed (Gordon 1840, Gordon & Glendinning 1858). Also, plants grown and distributed under the same name in James Booth's nursery in Hamburg were occasionally mentioned (Gordon 1840). Loudon (1839) further specified that Fox-Strangways received cones of this pine from Circassia, a country that spanned the coastal region of the North Caucasus along the Black Sea prior to its annexation by the Russian Empire in the second half of the 19th century. It is also known (Booth 1842, Hartwiss 1842, 1855) that both Fox-Strangways and Booth received seeds of Caucasian plants from Nicolai von Hartwiss, then Deputy Director of the Nikita Botanic Garden in the Crimea. Hartwiss actively communicated with numerous European botanists and horticulturists. He organised seed exchange between Nikita Garden and major British, German and French nurseries. Hartwiss also organised several expeditions to the Caucasus with the primary aim of collecting seeds, cuttings, bulbs and other propagation material of Caucasian plants. The first of these expeditions visited areas along the eastern coast of the Black Sea in 1837. Seed-bearing cones of *P. pithyusa* collected on this trip were later sent to Saint Petersburg and to several foreign nurseries (Chernova 1939). Hartwiss (1842) also reported that he sent to Fox-Strangways cones of *P. pithyusa* collected in Pitsunda. Notably, unlike Steven, Hartwiss spelled the epithet as *pithyusa*, which likely contributed to the broader use of this spelling by British botanists and horticulturists. It cannot be concluded with certainty whether Fox-Strangways indeed received material from several distinct localities in the Caucasus or whether

Pitsunda was mistakenly associated with Circassia by Loudon (1839). Such confusion would not be entirely surprising, given the Russo-Circassian War ongoing at the time, which resulted in frequent shifts in borders.

In any case, those early reports strongly indicate that cones with seeds distributed by Fox-Strangways under the name *P. pithyusa* were of Caucasian and not of Greek provenance. The very concise protologue of *P. pithyusa* (Gordon 1841b) allows for different interpretations of why Greece was indicated as the original locality of this taxon. It may have been a mistake, but it is equally possible that Gordon applied the name *P. pithyusa* in a broad sense and extended its use to Eastern Mediterranean populations currently referred to as *P. brutia*. Such application of the name *P. pithyusa* is consistent with the circumscription of *P. halepensis* var. *pityusa* by Gordon and Glendinning (1858).

Gordon (1841b) did not cite specifically any collections or specimens in the protologue of *P. pithyusa*. Gordon's herbarium is currently deposited at Kew (Stafleu & Cowan 1976). No specimens that would qualify as original material of *P. pithyusa* could be traced there (Grace Flanagan, pers. comm.). I conclude that no extant original material exist, and therefore a neotype is proposed below to serve as the nomenclatural type of the name *P. pithyusa* (Turland *et al.* 2018: Art. 9.8). As shown above, Gordon's description, at least in part, was based on cones of Caucasian provenance that were distributed under the name *P. pithyusa* by Fox-Strangways. For this reason, the specimen collected in Pitsunda and deposited at H (barcode H1202243) is below designated as the neotype of the name *P. pithyusa* Gordon. The same specimen has been previously designated as the epitype of *P. pityusa* Steven (Orlova & Kristensen 2002). This neotypification preserves the current usage of the name *P. pithyusa*.

#### **Status of the name *Pinus halepensis* var. *pithyusa***

Traditionally, the varietal name *P. halepensis* var. *pityusa* is attributed to Gordon and Glendinning (1858). Notably, the name was nomenclaturally superfluous when published, as the name *P.*

*halepensis* var. *maritima* Loudon was cited in the synonymy (Gordon & Glendinning 1858: 166). The latter name is a replacement name for the illegitimate *P. maritima* Lamb., but it is in fact an isonym of an earlier name *P. halepensis* var. *maritima* DC., published in Lamarck and Candolle (1815: 335, “*Aleppensis*”). However, Carrière (1855: 506) cited the authorship of the name *P. halepensis* var. *pithyusa* as “Knight, *Syn. Conif.* 27”. Indeed, the name *P. halepensis* var. *pithyusa* appeared (as “*Pithyusa Stra.*”) in Knight’s nursery catalogue (Knight 1850: 27). There is no description of it provided, but the abbreviation “*Stra.*” may be interpreted as an indirect reference to the description published by Gordon (1840: 638). This reference provides a validating description for the name published by Knight (Turland *et al.* 2018: Art. 38.1, 38.13). Furthermore, as both Knight and Gordon evidently applied their names in the same sense, Knight’s name may be treated as a combination based on Gordon’s name *P. pithyusa* (Turland *et al.* 2018: Art. 41.4). Therefore, Knight’s publication establishes the priority of the epithet *pithyusa* at the varietal rank.

### Notes on the name *Juniperus marschalliana*

The origin of the name *Juniperus taurica* mentioned by Gordon (1842b) is apparently linked to Fox-Strangways. Some clues about its origin were provided in Hartwiss’s (1842) letter. The designation *Juniperus taurica* had been applied by British horticulturists to plants of *J. oxycedrus* of Crimean provenance. Populations of *J. oxycedrus* occurring in the Eastern Mediterranean, including the Crimea and the Caucasus, have been recognised as a distinct species, *J. deltoides* (Adams 2004). *Juniperus deltoides* and *J. oxycedrus* share considerable morphological similarity, but genetic and biochemical markers support their recognition as distinct taxa (Adams *et al.* 2005). Consequently, the designation *J. taurica* is applicable to the taxon currently known as *J. deltoides*. However, that taxon was not accepted by Gordon (1842b) as a distinct species, and therefore the name *J. taurica* was not validly published by him. My extensive literature survey

did not reveal any alternative publications where that name would be validated. However, the search identified the name *Juniperus marschalliana*. The name was published by Steven (1856) in his checklist of Crimean plants. The only character mentioned by Steven in the protologue was the red colour of its “berries” (seed-bearing cones). However, this feature alone is sufficient to distinguish this species from all other species of *Juniperus* naturally occurring in the Crimea. Additionally, in the protologue of *J. marschalliana*, Steven referred to earlier descriptions of Crimean plants published under the name *J. oxycedrus* by Peter Pallas and other authors. In the preface to his work, Steven further specified those publications, listing, among others, the second volume of *Bemerkungen auf einer Reise in die südlichen Statthalterschaften des Russischen Reichs in den Jahren 1793 und 1794* by Pallas (1801) and *Flora Taurico-Caucasica* by Bieberstein (1808). Descriptions appearing under the name *J. oxycedrus* in those works (Pallas 1801: 448, Bieberstein 1808: 426) are thus considered here to constitute additional elements of the protologue of *J. marschalliana*.

There is a single sheet annotated as *J. marschalliana* (barcode H1504180) in Steven’s personal collection deposited at H. Its label in Steven’s handwriting reads: “*Juniperus* (?*rufescens*) *Marschalliana*. *Taur. merid.*”. It bears two branchlets and some loose needles and seed cones that were apparently collected by Steven himself in the southern Crimea. Morphologically, the material on the sheet agrees with the current concept of *J. deltoides*. The sheet has been previously identified as type material of *J. marschalliana*, and it is labelled accordingly. However, I could not trace any evidence of effective typification of *J. marschalliana* in the literature, and I assume that the name was not effectively typified before. Therefore, the above-mentioned sheet is designated here as the lectotype of *J. marschalliana*.

There is an additional specimen in Steven’s collection that may represent a syntype of *J. marschalliana*. It is the lowermost specimen on the sheet H1504201 (specimen ID C.11478), labelled simply as “*Juniperus rufescens* Link” without indication of its origin, collection date or collector’s name.

Among earlier names in this group, *J. macrocarpa* Sm. is traditionally applied to a well-defined taxon represented by plants from maritime sands, with broader leaves lacking a mucro and larger seed cones. As discussed by Ferrer-Gallego *et al.* (2023), the original material of *J. macrocarpa* closely resembles *J. deltoides*, and the conservation of the name with a new conserved type was therefore proposed to maintain its traditional usage. The name *J. rufescens* Link that has been occasionally applied to Crimean and Caucasian plants was published as a superfluous illegitimate synonym of *J. oxycedrus* (<https://powo.science.kew.org/taxon/262339-1>). Therefore, following the priority rule, the name *J. marschalliana* Steven should be applied to the taxon currently known as *J. deltoides* when it is recognised at the specific rank.

## Nomenclatural conclusions

My literature survey revealed a series of previously overlooked contributions on conifer plants published in the years 1841 and 1842 by George Gordon. Analysis of the names appearing in this series showed that several new names and new combinations were first published there. However, the name *Pinus pithyusa* Gordon is the only one that requires changes in the currently accepted names. Additionally, an earlier name *J. marschalliana* Steven was identified for the taxon currently known as *J. deltoides*. The names *P. pithyusa* Gordon and *J. marschalliana* are typified in this publication.

### *Pinus brutia* var. *pithyusa* (Gordon) Silba ex Kovalchuk, *comb. nova*

*Pinus pithyusa* Gordon, Gard. Chron. 1841(35): 564. 1841. — *Pinus halepensis* var. *pithyusa* (Gordon) Knight, Syn. Conif. Pl.: 27. 1850. — *Pinus halepensis* var. *pithyusa* (Gordon) Gordon & Glend., Pinetum: 166. 1858, *isonymum*. — NEOTYPE (designated here): [Georgia] Abchasia, Pitzunda, ad litus Ponti Euxini. 12/25 January 1907 *A. Schelkownikow s. n.* (Flora caucasica exsiccata no. 326) (H barcode H1202243; digital image!). An image of the specimen was published by Orlova and Kristensen (2002).

*Pinus pitiusa* Nordmann, Bull. Sci. Acad. Imp. Sci. Saint-Petersbourg 2(6): 93. 1837, *nom. inval.*

*Pinus pithyusa* Steven, Bull. Soc. Imp. Naturalistes

Moscou 11(1): 49. 1838, *nom. inval.*

*Pinus pithyusa* Fox-Strangw. ex Gordon, Gard. Mag. & Reg. Rural Domest. Improv. 16: 638. 1840, *nom. inval.*

*Pinus brutia* subsp. *pityusa* (Steven) Nahal, Ann. Ecole Natl. Eaux 19: 521. 1962, *nom. inval.*

*Pinus brutia* var. *pityusa* (Steven) Silba, Phytologia 58(6): 367. 1985, *nom. inval.*

### *Juniperus marschalliana* Steven

Bull. Soc. Imp. Naturalistes Moscou 29(1): 244. 1856. — LECTOTYPE (designated here): [Ukraine. Crimea], Taur[ia] merid[ionalis], s. d., s. coll., s. n. (ex Herb. Steven) (H barcode H1504180; digital image!). — SYNTYPE: “*Juniperus rufescens* Link”, s. loc., s. d., s. coll., s. n. (ex Herb. Steven) (H ID C.11478, lowermost specimen on sheet no. H1504201; digital image!).

*Juniperus deltoides* R.P. Adams, Phytologia 86(2): 47. 2004, *syn. nov.* — *Juniperus oxycedrus* subsp. *deltoides* (R.P. Adams) N.G. Passal., Inform. Bot. Ital. 41(1): 141. 2009. — TYPE: Greece. 14 km e. of Archova, 420 m a.s.l., 38°26.720'N, 22°41.678'E, 22 May 2001 *R.P. Adams 9436* (holotype BAYLU; isotypes K, NY).

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**Appendix 1.** Inventory of the names that appeared in the series of publications “Coniferous plants” (No. I – No. IV) published during 1841–1842 in the horticultural periodical *Gardeners' Chronicle*.

No.	Names used by Gordon	Corresponding earlier name	Currently accepted name
No. I (29 May 1841)			
1	<i>Pinus teocote</i>	<i>Pinus teocote</i> Schiede ex Schltdl. & Cham., <i>Linnaea</i> 5(1): 76 (1830)	<i>Pinus teocote</i> Schiede ex Schltdl. & Cham., <i>Linnaea</i> 5(1): 76 (1830)
2	<i>Pinus patula</i>	<i>Pinus patula</i> Schiede ex Schltdl. & Cham., <i>Linnaea</i> 6(2): 354 (1831)	<i>Pinus patula</i> Schiede ex Schltdl. & Cham., <i>Linnaea</i> 6(2): 354 (1831)
3	<i>Pinus apulcensis</i>	<i>Pinus apulcensis</i> Lindl., Edwards's Bot. Reg. 25: 63 (1839)	<i>Pinus pseudostrobus</i> var. <i>apulcensis</i> (Lindl.) Shaw, <i>Publ. Arnold Arbor</i> . 1: 19 (1909)
4	<i>Pinus devoniana</i>	<i>Pinus devoniana</i> Lindl., Edwards's Bot. Reg. 25: 62 (1839)	<i>Pinus devoniana</i> Lindl., Edwards's Bot. Reg. 25: 62 (1839)
5	<i>Pinus macrophylla</i>	<i>Pinus macrophylla</i> Lindl., Edwards's Bot. Reg. 25: 63 (1839)	<i>Pinus devoniana</i> Lindl., Edwards's Bot. Reg. 25: 62 (1839)
6	<i>Pinus pseudo strobus</i>	<i>Pinus pseudostrobus</i> Lindl., Edwards's Bot. Reg. 25: 63 (1839)	<i>Pinus pseudostrobus</i> Lindl., Edwards's Bot. Reg. 25: 63 (1839), <i>nom. cons.</i>
7	<i>Pinus leiophylla</i>	<i>Pinus leiophylla</i> Schiede ex Schltdl. & Cham., <i>Linnaea</i> 6(2): 354 (1831)	<i>Pinus leiophylla</i> Schiede ex Schltdl. & Cham., <i>Linnaea</i> 6(2): 354 (1831)
8	<i>Pinus oocarpa</i>	<i>Pinus oocarpa</i> Schiede ex Schltdl., <i>Linnaea</i> 12: 491 (1838)	<i>Pinus oocarpa</i> Schiede ex Schltdl., <i>Linnaea</i> 12: 491 (1838)
9	<i>Pinus oocarpoides</i>	Not published earlier, but the associated description does not meet the requirements for valid publication of a new name	<i>Pinus oocarpa</i> Schiede ex Schltdl., <i>Linnaea</i> 12: 491 (1838)
10	<i>Pinus filifolia</i>	<i>Pinus filifolia</i> Lindl., Edwards's Bot. Reg. 26: 61 (1840)	<i>Pinus devoniana</i> Lindl., Edwards's Bot. Reg. 25: 62 (1839)
11	<i>Pinus montezumae</i>	<i>Pinus montezumae</i> Lamb., <i>Descr. Pinus</i> [Lambert], ed. 3, 1: 39 (1832)	<i>Pinus montezumae</i> Lamb., <i>Descr. Pinus</i> [Lambert], ed. 3, 1: 39 (1832)
12	<i>Pinus hartwegii</i>	<i>Pinus hartwegii</i> Lindl., Edwards's Bot. Reg. 25: 62 (1839)	<i>Pinus hartwegii</i> Lindl., Edwards's Bot. Reg. 25: 62 (1839)
13	<i>Pinus russelliana</i>	<i>Pinus russelliana</i> Lindl., Edwards's Bot. Reg. 25: 68 (1839)	<i>Pinus montezumae</i> Lamb., <i>Descr. Pinus</i> [Lambert], ed. 3, 1: 39 (1832)
14	<i>Pinus llaveana</i>	<i>Pinus llaveana</i> Schiede ex Schltdl., <i>Linnaea</i> 12: 488 (1838)	<i>Pinus cembroides</i> Zucc., <i>Abh. Math.-Phys. Cl. Königl. Bayer. Akad. Wiss.</i> 1: 392 (1832)
15	<i>Pinus ayacahuite</i>	<i>Pinus ayacahuite</i> C. Ehrenb. ex Schltdl., <i>Linnaea</i> 12: 492 (1838)	<i>Pinus ayacahuite</i> C. Ehrenb. ex Schltdl., <i>Linnaea</i> 12: 492 (1838)
16	<i>Abies religiosa</i>	<i>Abies religiosa</i> (Kunth) Schltdl. & Cham., <i>Linnaea</i> 5(1): 77 (1830)	<i>Abies religiosa</i> (Kunth) Schltdl. & Cham., <i>Linnaea</i> 5(1): 77 (1830)
17	<i>Pinus insignis</i>	<i>Pinus insignis</i> Douglas ex Loudon, <i>Arbor. Frutic. Brit.</i> 4: 2265 (1838)	<i>Pinus radiata</i> D. Don, <i>Trans. Linn. Soc. London</i> 17: 442 (1836)
18	<i>Pinus californica</i> , <i>Pinus montereyensis</i>	May be treated as a new name	<i>Pinus radiata</i> D. Don, <i>Trans. Linn. Soc. London</i> 17: 442 (1836) or <i>Pinus muricata</i> D. Don, <i>Trans. Linn. Soc. London</i> 17: 441 (1836)
19	<i>Pinus monticola</i>	<i>Pinus monticola</i> Douglas ex D. Don, <i>Descr. Pinus</i> [Lambert], ed. 3, 2: unnumbered page between 144&145 (1832)	<i>Pinus monticola</i> Douglas ex D. Don, <i>Descr. Pinus</i> [Lambert], ed. 3, 2: unnumbered page between 144&145 (1832)
20	<i>Pinus macrocarpa</i>	<i>Pinus macrocarpa</i> Lindl., Edwards's Bot. Reg. 26: 61 (1840)	<i>Pinus coulteri</i> D. Don, <i>Trans. Linn. Soc. London</i> 17: 440 (1836)
21	<i>Pinus sabiniana</i>	<i>Pinus sabiniana</i> Douglas, <i>Descr. Pinus</i> [Lambert], ed. 3, 2: unnumbered page between 144&145 (1832)	<i>Pinus sabiniana</i> Douglas, <i>Descr. Pinus</i> [Lambert], ed. 3, 2: unnumbered page between 144&145 (1832)
22	<i>Abies amabilis</i>	<i>Abies amabilis</i> Douglas ex J. Forbes, <i>Pinet. Woburn.</i> : 125 (1839)	<i>Abies amabilis</i> Douglas ex J. Forbes, <i>Pinet. Woburn.</i> : 125 (1839)
23	<i>Abies grandis</i>	<i>Abies grandis</i> (Douglas ex D. Don) Lindl., <i>Penny Cyclop.</i> 1: 30 (1833)	<i>Abies grandis</i> (Douglas ex D. Don) Lindl., <i>Penny Cyclop.</i> 1: 30 (1833)

- |                        |  |  |   |
|------------------------|--|--|---|
| 24                     | <i>Abies nobilis</i>   | <i>Abies nobilis</i> (Douglas ex D. Don) Lindl., <i>Penny Cyclop.</i> 1: 30 (1833), <i>nom. illeg.</i> (non <i>A. nobilis</i> A. Dietr. (1824))  | <i>Abies procera</i> Rehder, <i>Rhodora</i> 42: 522 (1940)  |
| 25                     | <i>Abies menziesii</i>   | <i>Abies menziesii</i> (Douglas ex D. Don) Lindl., <i>Penny Cyclop.</i> 1: 32 (1833), <i>nom. illeg.</i> (non <i>A. menziesii</i> Murb. (1825))  | <i>Picea sitchensis</i> (Bong.) Carrière, <i>Traité Conif.</i> : 260 (1855)   |
| No. II (28 Aug. 1841)  |  |  |   |
| 26                     | <i>Pinus brutia</i> ,<br><i>Pinus conglomerata</i>   | <i>Pinus brutia</i> Ten., <i>Fl. Napol.</i> 1(Prodr.): LXXII (1815)  | <i>Pinus brutia</i> Ten., <i>Fl. Napol.</i> 1(Prodr.): LXXII (1815)   |
| 27                     | <i>Pinus pithyusa</i>  | New name; not validly published earlier  | <i>Pinus brutia</i> var. <i>pithyusa</i> (Gordon) Silba ex Kovalchuk (this work)  |
| 28                     | <i>Pinus nigricans</i> ,<br><i>Pinus austriaca</i>   | <i>Pinus nigricans</i> Host, <i>Fl. Austriaca</i> [Host] 2: 628 (1827); <i>Pinus austriaca</i> Höss, <i>Anleit. Bäume Sträucher Oesterr.</i> : 6 (1830)  | <i>Pinus nigra</i> J.F. Arnold, <i>Reise Mariazell Steyer.</i> : 8 (1785)   |
| 29                     | <i>Pinus hispanica</i> ,<br><i>Pinus pyrenaica</i>   | <i>Pinus pyrenaica</i> Lapeyr., <i>Suppl. Mém Hist. Nat. Pyrénées</i> : 146 (1818); <i>Pinus hispanica</i> may be regarded as a new name   | <i>Pinus nigra</i> subsp. <i>salzmannii</i> (Dunal) Franco, <i>Dendrol. Florest.</i> : 56 (1943)  |
| 30                     | <i>Pinus romana</i> ,<br><i>Pinus caramanica</i> ,<br><i>Pinus neglecta</i>  | <i>Pinus caramanica</i> Bosc, <i>Nouv. Cours Compl. Agric.</i> [Rozier] 10: 92 (1809); <i>Pinus romana</i> may be treated as a new name  | <i>Pinus nigra</i> subsp. <i>laricio</i> Palib. ex Maire, <i>Bull. Soc. Hist. Nat. Afrique N.</i> 19: 66 (1928)   |
| 31                     | <i>Pinus ascarena</i>  | May be regarded either as a new name or as an orthographic variant of <i>Pinus escarena</i> Risso, <i>Hist. Nat. Prod. Eur. Mérid.</i> 2: 459 (1826)   | <i>Pinus pinaster</i> subsp. <i>escarena</i> (Risso) K. Richt., <i>Pl. Eur.</i> 1: 1 (1890)   |
| 32                     | <i>Pinus lemoniana</i>   | <i>Pinus lemoniana</i> Benth., <i>Trans. Hort. Soc. London</i> , ser. 2, 1: 512 (1835)   | <i>Pinus pinaster</i> Aiton, <i>Hortus Kew.</i> 3: 367 (1789)   |
| 33                     | <i>Picea cephalonica</i>   | <i>Picea cephalonica</i> (Loudon) Loudon, <i>Gard. Mag. &amp; Reg. Rural Domest. Improv.</i> , n.s., 5: 238 (1839)   | <i>Abies cephalonica</i> Loudon, <i>Gard. Mag. &amp; Reg. Rural Domest. Improv.</i> 14: 81 (1838)   |
| 34                     | <i>Picea pinsapo</i>   | <i>Picea pinsapo</i> (Boiss.) Lawson, <i>Gard. Mag. &amp; Reg. Rural Domest. Improv.</i> 15: 109 (1839)  | <i>Abies pinsapo</i> Boiss., <i>Not. Abies Pinsapo</i> : 8 (1838)   |
| No. III (22 Jan. 1842) |  |  |   |
| 35                     | <i>Pinus taurica</i>   | New combination based on <i>Pinus laricio</i> var. <i>taurica</i> Loudon, <i>Arbor. Frutic. Brit.</i> 4: 2202 (1838)   | <i>Pinus nigra</i> subsp. <i>pallasiana</i> (Lamb.) Holmboe, <i>Stud. Veg. Cyprus</i> : 29 (1914)   |
| 36                     | <i>Pinus sinensis</i> ,<br><i>Pinus massoniana</i> ,<br><i>Pinus nepalensis</i> ,<br><i>Pinus khasiya</i> Royle,<br><i>Pinus cavendishiana</i> | <i>Pinus sinensis</i> D. Don, <i>Descr. Pinus</i> [Lambert], ed. 2, 1: 47 (1828), <i>Pinus massoniana</i> Lamb., <i>Descr. Pinus</i> [Lambert] 1: 17 (1803), <i>Pinus nepalensis</i> J. Forbes, <i>Pinet. Woburn.</i> : 34 (1839), <i>Pinus khasiya</i> Royle ex Gordon, <i>Gard. Mag. &amp; Reg. Rural Domest. Improv.</i> 16: 8 (1840) | <i>Pinus massoniana</i> Lamb., <i>Descr. Pinus</i> [Lambert] 1: 17 (1803) and <i>Pinus kesiya</i> Royle ex Gordon, <i>Gard. Mag. &amp; Reg. Rural Domest. Improv.</i> 16: 8 (1840)          |
| 37                     | <i>Pinus excelsa</i> ,<br><i>Pinus dicksonii</i>   | <i>Pinus excelsa</i> Wall. ex D. Don, <i>Descr. Pinus</i> [Lambert] 2: 5 (1824), <i>nom. illeg.</i> (non <i>P. excelsa</i> Lam. (1779))  | <i>Pinus wallichiana</i> A.B. Jacks., <i>Bull. Misc. Inform. Kew</i> 1938: 85 (1938)  |
| 38                     | <i>Pinus longifolia</i> ,<br><i>Pinus chilgoza</i>   | <i>Pinus longifolia</i> Roxb. ex Lamb., <i>Descr. Pinus</i> [Lambert] 1: 29 (1803), <i>nom. illeg.</i> (non <i>P. longifolia</i> Salisb. (1796)); <i>Pinus chilgoza</i> is a new name  | <i>Pinus roxburghii</i> Sarg., <i>Silva N. Amer.</i> 11: 9 (1897); <i>Pinus gerardiana</i> Wall. ex D. Don, <i>Descr. Pinus</i> [Lambert], ed. 3, 2: unnumbered page between 144&145 (1832) |
| 39                     | <i>Pinus gerardiana</i>  | <i>Pinus gerardiana</i> Wall. ex D. Don,   | <i>Pinus gerardiana</i> Wall. ex D. Don, <i>Descr.</i>  |

		<i>Descr. Pinus</i> [Lambert], ed. 3, 2: unnumbered page between 144&145 (1832)	<i>Pinus</i> [Lambert], ed. 3, 2: unnumbered page between 144&145 (1832)
40	<i>Abies webbiana</i>	<i>Abies webbiana</i> Lindl., <i>Penny Cyclop.</i> 1: 30 (1833), <i>nom. illeg.</i>	<i>Abies spectabilis</i> (D. Don) Mirb., <i>Mém. Mus. Hist. Nat.</i> 13: 70 (1825)
41	<i>Abies pindrow</i>	<i>Abies pindrow</i> (Royle ex D. Don) Royle, <i>Ill. Bot. Himal. Mts.</i> : t. 86 (1836)	<i>Abies pindrow</i> (Royle ex D. Don) Royle, <i>Ill. Bot. Himal. Mts.</i> : t. 86 (1836)
42	<i>Abies pichta</i> , <i>Abies sibirica</i>	<i>Abies pichta</i> Fisch. ex Jacques, <i>Ann. Fl. Pomone</i> 4: 324 (1836), <i>Abies sibirica</i> Ledeb., <i>Fl. Altaic.</i> 4: 202 (1833)	<i>Abies sibirica</i> Ledeb., <i>Fl. Altaic.</i> 4: 202 (1833)
43	<i>Abies brunoniana</i> , <i>Abies dumosa</i> , <i>Abies decidua</i>	<i>Abies brunoniana</i> Lindl., <i>Penny Cyclop.</i> 1: 30 (1833), <i>Abies dumosa</i> (D. Don) Mirb., <i>Mém. Mus. Hist. Nat.</i> 13: 70 (1825)	<i>Tsuga dumosa</i> (D. Don) Eichler, <i>Nat. Pflanzenfam.</i> [Engler] 2(1): 80 (1887)
44	<i>Abies khutrow</i>	New combination based on <i>Pinus khutrow</i> Royle ex Turra, <i>Ill. Bot. Himal. Mts.</i> : 350, t. 84, f. 1 (1839)	<i>Picea smithiana</i> (Wall.) Boiss., <i>Fl. Orient.</i> 5: 700 (1884)
45	<i>Abies morinda</i>	New name	<i>Picea smithiana</i> (Wall.) Boiss., <i>Fl. Orient.</i> 5: 700 (1884)
46	<i>Abies orientalis</i>	<i>Abies orientalis</i> (L.) Poir., <i>Encycl. [Lamarck]</i> 6: 518 (1804)	<i>Picea orientalis</i> (L.) Peterm., <i>Pflanzenreich [Petermann]</i> : 235 (1844)
No. IV (1 Oct. 1842)			
1	<i>Juniperus oblonga</i>	<i>Juniperus oblonga</i> M. Bieb., <i>Fl. Taur.-Caucas.</i> 2: 426 (1808)	<i>Juniperus communis</i> var. <i>saxatilis</i> Pall., <i>Fl. Ross.</i> 1(2): 12 (1789)
2	<i>Juniperus oxycedrus</i> , <i>Juniperus taurica</i>	<i>Juniperus oxycedrus</i> L., <i>Sp. Pl.</i> 2: 1038 (1753); <i>Juniperus taurica</i> not published earlier, but not accepted by the author	<i>Juniperus oxycedrus</i> L., <i>Sp. Pl.</i> 2: 1038 (1753); <i>Juniperus marschalliana</i> Steven, <i>Bull. Soc. Imp. Naturalistes Moscou</i> 29(1): 244 (1856)
3	<i>Juniperus macrocarpa</i>	<i>Juniperus macrocarpa</i> Sm., <i>Fl. Graec. Prodr. [Sibthorp]</i> 2: 263 (1816)	<i>Juniperus macrocarpa</i> Sm., <i>Fl. Graec. Prodr. [Sibthorp]</i> 2: 263 (1816)
4	<i>Juniperus squamosa</i>	May be treated as a new name or as an orthographic variant of <i>Juniperus squamata</i> D. Don, <i>Descr. Pinus [Lambert]</i> 2: 17 (1824)	<i>Juniperus squamata</i> D. Don, <i>Descr. Pinus [Lambert]</i> 2: 17 (1824)
5	<i>Juniperus recurva</i>	<i>Juniperus recurva</i> Buch.-Ham. ex D. Don, <i>Prodr. Fl. Nepal.</i> : 55 (1825)	<i>Juniperus recurva</i> Buch.-Ham. ex D. Don, <i>Prodr. Fl. Nepal.</i> : 55 (1825)
6	<i>Juniperus nana</i>	<i>Juniperus nana</i> Willd., <i>Berlin. Baumz.</i> : 159 (1796)	<i>Juniperus communis</i> var. <i>saxatilis</i> Pall., <i>Fl. Ross.</i> 1(2): 12 (1789)