

NOMENCLATURE COMMUNICATIONS

Synopsis of Proposals on Nomenclature – Madrid 2024: A review of the proposals to amend the *International Code of Nomenclature for algae, fungi, and plants* submitted to the XX International Botanical Congress

Nicholas J. Turland (Rapporteur-général)¹ & John H. Wiersema (Vice-rapporteur)²

1 Botanischer Garten und Botanisches Museum Berlin, Freie Universität Berlin, Königin-Luise-Str. 6–8, 14195 Berlin, Germany

2 Department of Botany, NMNH - MRC 166, Smithsonian Institution, P.O. Box 37012, Washington, D.C., 20013-7012, U.S.A.

Address for correspondence: Nicholas J. Turland, n.turland@bo.berlin

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NOTICE

Individual members of the International Association for Plant Taxonomy (IAPT) are entitled to participate in the preliminary guiding vote (so-called “mail vote”) on proposals to amend the *International Code of Nomenclature for algae, fungi, and plants* (hereafter “Code”; Turland & al. in *Regnum Veg.* 159. 2018) submitted to the XX International Botanical Congress, Madrid, 2024, as stated in Div. III Prov. 2.5 of the Code. Authors of these proposals and members of the nine Permanent Nomenclature Committees (see Div. III Prov. 7.1) are also entitled to vote, but no institutional votes (Div. III Prov. 3) are allowed. The IAPT office is sending a ballot (voting form) by email to those IAPT members who have email addresses on file, the authors for correspondence of the proposals, and the secretaries of the Permanent Nomenclature Committees. A printed copy of the ballot is being sent to IAPT members who have no email address on file. If you are entitled to vote but do not receive a ballot, you may request an electronic or printed copy from the IAPT office at the following address. An electronic copy of the ballot should be filled out, saved, and sent by email to the IAPT office at office@iapt-taxon.org. Alternatively, a printed copy may be filled out and sent by airmail to: IAPT office, Plant Science and Biodiversity Centre, Slovak Academy of Sciences, Dubravská cesta 9, SK-845 23 Bratislava, Slovakia. All ballots must be received no later than 31 May 2024, so that they may be included in the tabulation to be made available to members of the Nomenclature Section of the Congress.

The sessions of the Nomenclature Section, which will take definitive action on the proposals, will be held in the Villanueva Pavilion, Real Jardín Botánico, Plaza de Murillo 2, Madrid 28014, Spain, from Monday, 15 July 2024 (beginning at 08:30 hours) to Friday, 19 July 2024 (see <https://ibcmadrid2024.com/?seccion=nomenclature&subSeccion=nomenclature>).

Each person registered for at least one full day of the Congress is entitled to register as a member of the Nomenclature Section. Registration for the Congress should be done in advance (see <https://ibcmadrid2024.com/index.php?seccion=registrationArea&subSeccion=registrationInfo>); the confirmation received will be the evidence of eligibility for Nomenclature Section registration, which will start during a welcome reception on Sunday, 14 July, at 17:00–20:00 hours in the Villanueva Pavilion. Nomenclature Section registration will continue on Monday, 15 July beginning at 08:00 hours in the Villanueva Pavilion.

Each registered member of the Nomenclature Section is entitled to one personal vote in the sessions (Div. III Prov. 5.9). Personal votes can neither be transferred nor accumulated; one person never receives more than one personal vote. A member of the Nomenclature Section may be the official delegate of one or more institutions, thereby carrying institutional votes, which range from one to seven per institution, but no one person is allowed to carry more than 15 votes including the one personal vote.

The Committee on Institutional Votes has published its report together with the list of institutional votes at the Madrid Congress (Ulloa Ulloa & al. in *Taxon*: <https://doi.org/10.1002/tax.13110>). Instructions are provided under: “How to exercise institutional votes at the Nomenclature Section of the XX IBC, Madrid, 2024”. Institutions entitled to vote will receive formal notification by letter from the Rapporteur-général and Vice-rapporteur in the first half of 2024. This letter will be sent by email from the IAPT office to the correspondents listed for the institutions in *Index Herbariorum*. Institutions should therefore check that their information given in *Index Herbariorum* is current and submit corrections (see <https://sweetgum.nybg.org/science/ih/how-to-update-index-herbariorum/>).

At the Madrid Congress, the Nomenclature Section will be broadcast live on the internet for the first time (see Knapp & al. in *Taxon*: <https://doi.org/10.1002/tax.13127>). Observation of each day’s sessions will be possible, but interactive commenting and voting will not be possible (see Division III Prop. H under the proposals below). Observers must register in advance to access the live broadcast, and this registration is independent of registration for the Congress. Full details will be provided on the Nomenclature Section page of the Congress website (<https://ibcmadrid2024.com/?seccion=nomenclature&subSeccion=nomenclature>).

INTRODUCTION

This Synopsis repeats the exact wording of the proposals, along with reference to the published justification. The numbered sequence of proposals extends from 001 to 433. The comments by the Rapporteurs were drafted during a working meeting in Washington, D.C. from 25 September to 1 October 2023 followed by 14 online meetings, generally lasting four to five hours each, between 3 October and 20 November 2023. The Rapporteurs have endeavoured to outline the foreseeable consequences of each of the proposals,

irrespective of their personal opinions on desirability. The comments are the result of a consensus between the Rapporteur and the Vice-rapporteur, and both have equal responsibility for them.

As noted on the voting form, there are four voting options: “yes”, “no”, “ed.c.” and “s.p.c.” All proposals accepted by the Congress will be reviewed by the Editorial Committee prior to the production of the *Madrid Code*, and any necessary editorial changes will be made; consequently, a “yes” vote only implies approval in principle of the proposal, not necessarily of its exact wording. Unless otherwise noted, an “ed.c.” vote instructs the Editorial Committee to consider inclusion in the *Code* of material in the proposal but does not necessarily require it to do so. An “s.p.c.” vote refers the proposal to a Special-purpose Committee to review the matter, either during the Nomenclature Section in Madrid or, more likely, before the next Congress in 2029; it implies the desire to establish such a Committee. In order to make the result of the ballot as meaningful as possible, instructions have been added in several cases as to how special expressions of opinion, by means of “ed.c.” votes, will be interpreted.

All proposals that relate to particular groups of organisms were referred to the relevant Permanent Nomenclature Committees in order that the Committees can give their opinions prior to the Nomenclature Section. These opinions are recorded under the respective proposals, with votes cited in the format “#yes : #no : #abstain”. The numbers of voting members were: Nomenclature Committee for Algae 16; Nomenclature Committee for Bryophytes 15; Nomenclature Committee for Fossils 12; Nomenclature Committee for Fungi 15. A Committee is considered to support a proposal when more than 50% of the votes cast are “yes” votes.

Five Special-purpose Committees (SPCs) were established at the Shenzhen Congress in 2017 (Wilson in *Taxon* 68: 160–162. 2019). Two have published reports: the SPC on Virtual Participation in the Nomenclature Section (Landrum & al. in *Taxon* 70: 1397–1398 [proposals]; 1399–1401 [report]. 2021) and the SPC on DNA Sequences as Types (Thiele & al. in *Taxon* 72: 965–973. 2023 [discussion paper]; Lehtonen & Thiele in *Taxon* 72: 1137–1142. 2023 [report]; Thiele & al. in *Taxon* 72: 1143–1145; 1146–1148. 2023 [proposals]). The SPC on Typification and the SPC on Lists of Available Names did not become active. The SPC on Pleomorphic Fungi was renamed as the SPC on Names of Fungi with the Same Epithet established at the XI International Mycological Congress in San Juan in 2018 (May & al. in *IMA Fungus* 9: xxii–xxvii. 2018; Wilson, l.c. 2019).

The General Committee has published seven reports since the Shenzhen Congress containing recommendations – subject to a decision at the Madrid Congress – on proposals to conserve, protect or reject names, proposals to suppress works, and requests for decisions (Wilson in *Taxon* 70: 1360–1362. 2021; 71: 216–218; 1315–1318. 2022; 72: 422–424; 905–907; 1112–1114; 1353–1354. 2023). Reports relevant to the Madrid Nomenclature Section have also been published by the Committee on Institutional Votes (Ulloa Ulloa & al., l.c.; see Notice above) and the Registration Committee (Loizeau & al. in *Taxon* 72: 1134–1136. 2023; see Art. 42 under the proposals below).

The proposals in this Synopsis are arranged in the sequence of the provisions of the *Code* that they affect. Within each of the provisions, the proposals have been lettered sequentially (e.g. Art. 9 Prop. A–Z, AA–ZZ, AAA–GGG) in the order in which the Rapporteurs believe they might usefully be discussed by the Section. Needless to say, the Section, or its President, is completely free to adopt another sequence for its deliberations.

The numbering of new paragraphs in the *Code* follows that given in the published proposals in *Taxon* and is preliminary (e.g. Art. 9.9bis, Art. 10.1ter, Art. 45.n5, etc.). This system is not of course intended to bind the future Editorial Committee in any way.

ACKNOWLEDGEMENTS

We thank the International Association for Plant Taxonomy for financial support for the Rapporteurs’ meeting held in Washington, D.C. in September–October 2023. We also thank the Department of Botany, Smithsonian Institution, in particular Warren Wagner, for hospitality and facilities provided during the Rapporteurs’ meeting. Linda in Arcadia, David Mabberley, John McNeill and Paul van Rijckevorsel provided helpful comments. Robert Andersen (Secretary of the Nomenclature Committee for Algae), Patrick Herendeen (Secretary of the Nomenclature Committee on Fossils), Niels Klazenga (Secretary of the Nomenclature Committee on Bryophytes) and Tom May (Secretary of the Nomenclature Committee for Fungi) are thanked for eliciting opinions on relevant proposals from their respective Committees. Paul van Rijckevorsel’s “Overview of editions of the *Code*” (<https://www.iapt-taxon.org/historic/index.htm>) facilitated tracing the history of provisions of the *Code*.

PROPOSALS TO AMEND THE CODE

Preamble

Prop. A (051 – Rijckevorsel in Taxon 70: 448) Amend Pre. 7 as follows (new text in bold):

“7. The provisions regulating the governance of this *Code* form its last Division (Div. III). **These provisions are not retroactive.**”

Prop. B (195 – Mosyakin in Taxon 72: 442) Amend the Preamble by adding the following text after Pre. 14:

“Potentially sensitive content disclaimer and limitation of liability

Scientific names of algae, fungi, and plants were created and modified over the centuries by many authors of various national, ethnic, cultural, religious, political, historical, and other backgrounds, identities, origins, and traditions. Such names reflect the rich but also complicated and sometimes controversial history of scientific explorations and biological nomenclature.

Anyone using the scientific names of taxa governed by this *Code* should be aware that this *Code* is not intended for judging, evaluating, changing, rejecting, or censoring such names because of ethical, cultural, religious, political, social, ideological, and/or other principles, criteria, and procedures, except for those explicitly prescribed in this *Code* (see Preamble 1, 12, Art. 51.1).

The authors and editors of this *Code* and anyone using scientific names of organisms in accordance with this *Code* in good faith and for lawful purposes shall not be held responsible for any discomfort, inconvenience, offense, mental and/or emotional distress, or other possible negative consequences potentially caused by some scientific names of taxa to any person or group of people who may consider such names objectionable, offensive, or inappropriate.

The use of scientific names of taxa in accordance with this *Code* in good faith and for lawful purposes should not be viewed as manifestation, support, or endorsement of any cultural, religious, political, social, racial, or other views, concepts, prejudices, and/or ideologies that may be deemed objectionable, offensive, or inappropriate to some people or groups of people.”

Prop. C (349 – Mosyakin in Taxon 72: 1149) Amend the Preamble by adding after Pre. 14 the following text:

“Non-Discrimination Statement

Authors and editors of this *Code* recognize the importance of principles of human rights, equal rights and opportunities, diversity, inclusivity, and representation, especially with regard to authors and users of scientific names governed by this *Code*.

Authors and users of scientific names governed by this *Code* shall not be discriminated against on the basis of their race, colour, ethnicity, national origin, disability, age, sex and sexual orientation, gender identity, religion, social status, cultural identity, and/or political beliefs, and shall have equal rights under this *Code*, including the rights to propose amendments to this *Code*.

Preferential or discriminatory treatment, rejection or censoring of names governed by this *Code* because of the aforementioned characteristics of their authors, or because of actual or assumed association of such names with any cultural, religious, political, social, ethnic, national, or racial concepts, beliefs, or ideologies, is not allowed, except for the cases explicitly regulated by this *Code* (e.g. the preferential status of the Latin alphabet and the Latin and English languages in nomenclature).”

Rapporteurs’ comments – *Prop. A* seems to be a useful addition, the acceptance of which does not seem to pose any issues.

Prop. B and *C*, although not changing the rules themselves, would add a dimension to the *Code* that is not currently present, which users may or may not feel is needed.

Principles

Prop. A (339 – Thiele & al. in Taxon 72: 1147) Amend Principle II as follows (new text in bold):

“The application of names of taxonomic groups is determined by means of nomenclatural types **where typification is technically feasible, and by means of a description based on a reference DNA sequence where it is not.**”

Rapporteurs’ comments – *Prop. A* is part of a set of proposals that would provide for the future valid publication of names of certain taxa other than vascular plants or bryophytes without nomenclatural types (so-called “type-less names”; see Chap. II new Art. Prop. A). The Nomenclature Committee for Algae does not support *Prop. A* (votes 0 : 15 : 1).

Article 4

Prop. A (350 – Pročkův & Drábková in Taxon 72: 1150) Add a new Article after Art. 4.3:

“4.3bis. A rank of a taxon between subtribe (subtribus) and genus is supergenus.”

Rapporteurs’ comments – *Prop. A*, together with Art. 19 Prop. B, would establish a formal category in the *Code* for what seems to be best dealt with informally. Applying the same name unchanged at different ranks may create difficulties in determining the intended rank of what are currently considered generic names if this was not explicitly indicated, and could retroactively affect valid publication (Art. 37.1). There could also be problems adhering to a hierarchical classification (Art. 2.1) if segregate genera under a supergenus were, e.g., to be treated in different subtribes.

Recommendation 5A

Prop. A (426 – Turland & Wiersema in Taxon 72: 1186) In Rec. 5A.1 change “f. (forma)” to “f. (form)”.

5A.1. For purposes of standardization, the following abbreviations are recommended: cl. (class), ord. (order), fam. (family), tr. (tribe), gen. (genus), sect. (section), ser. (series), sp. (species), var. (variety), f. (forma). The abbreviations for additional ranks created by the addition of the prefix sub-, or for nothotaxa with the prefix notho-, should be formed by adding the prefixes, e.g. subsp. (subspecies), nothosp. (nothospecies), but subg. (subgenus) not “subgen.”

Editorially, in Art. 24 Ex. 1 change “subforma” to “subform” and in Art. 36 Ex. 13 change “second forma” to “second form”.

Rapporteurs’ comments – *Prop. A* addresses a minor inconsistency.

Chapter II

Prop. A (340 – Thiele & al. in Taxon 72: 1147) Amend the title of Chapter II as follows (new text in bold, deleted text in strikethrough):

“STATUS, ~~TYPIFICATION~~, APPLICATION, AND PRIORITY OF NAMES”

Rapporteurs’ comments – *Prop. A* is essentially editorial and part of a set of proposals that would provide for the future valid publication of names of certain taxa other than vascular plants or bryophytes without nomenclatural types (so-called “type-less names”; see Chap. II new Art. Prop. A). The Nomenclature Committee for Algae does not support *Prop. A* (votes 1 : 14 : 1).

Article 6

Prop. A (136 – McNeill & al. in Taxon 71: 703) Amend the footnote to Art. 6.1 as follows (new text in bold, deleted text in strikethrough):

[footnote to Art. 6.1] “¹ Here and elsewhere in this *Code*, the term “illustration” designates a work of art or a photograph depicting a feature or features of ~~an organism~~ **a species or infraspecific taxon (see also Art. 10.4 and 43.2)**, e.g. a drawing, a picture of a herbarium specimen, or a scanning electron micrograph, **but not a habitat photograph.**”

Prop. B (196 – Wisnev in Taxon 72: 443) Amend Art. 6.1 as follows (new text in bold, deleted text in strikethrough):

“6.1. Effective publication is publication in accordance with Art. 29–31. Except in specified cases (Art. **6.1**, 8.1 **and any reference to a type in this Code**, 9.4(a), **9.9**, **9.19**, 9.22, Rec. **9A.1**, 9A.3, **9B.1**, ~~and Art. 10.4~~, 40.7, **and 46.9**) **or where the use of unpublished text or illustrations is explicitly or implicitly permitted**, text and illustrations¹ must be effectively published to be taken into account for the purposes of this *Code*.”

Prop. C (341 – Thiele & al. in Taxon 72: 1147) Amend Art. 6 Note 1 as follows (new text in bold):

“Note 1. For nomenclatural purposes, valid publication creates a name, and sometimes also an autonym (Art. 22.1 and 26.1), but does not itself imply any taxonomic circumscription beyond inclusion of the type **or reference DNA sequence** (see Art. X.1) of the name (Art. 7.1).”

This is the first of several instances where the phrase “or DNA reference sequence” should be added after “type”. If this proposal is accepted, the Editorial Committee is asked to deal with subsequent instances, including but not limited to Art. 9, 10, 22, 26, 40, 48 and 52.

Prop. D (242 – Wisnev & Prado in Taxon 72: 677) Amend Art. 6.3 as follows, incorporating the definition of “designation” from the Glossary (new text in bold, deleted text in strikethrough):

“6.3. In this *Code*, unless otherwise explicitly indicated or implicitly used otherwise, the word “name” means a name that has been validly published, whether it is legitimate or illegitimate (see Art. 12; but see Art. 14.9 and 14.14). **The word “designation” is used for what appears to be a name but that (1) has not been validly published and hence is not a name in the sense of this *Code* or (2) is not to be regarded as a name (Art. 20.4 and 23.6). The term “potential name” may be used for what appears to be a name before its status as a name or designation has been determined.**”

In addition, we recommend that the Editorial Committee use “designation” as infrequently as possible when referring to a name that is not validly published, as opposed to a type designation. We prefer “name that has not been validly published” instead of “designation that has not been validly published”.

Prop. E (053 – Malik & al. in Taxon 70: 449) Amend Art. 6 Note 2 as follows (new text in bold, deleted text in strikethrough):

“*Note 2.* When the same name, based on the same type, has been published independently at different times, ~~perhaps~~ **by the same or different authors**, then only the earliest of these “isonyms” has nomenclatural status. The name is always to be cited from its original place of valid publication, and later isonyms may be disregarded (but see Art. 14.14).”

The definition of isonym might be amended accordingly in the Glossary.

Prop. F (054 – Malik & al. in Taxon 70: 449) Add a new Example after Art. 6 Note 2:

“*Ex. n.* The name *Bignonia tomentosa* Thunb. was independently published by Thunberg in three different places (Murray, Syst. Veg., ed. 14: 563. May–Jun 1784; Fl. Jap.: 252. Aug 1784; in Nova Acta Regiae Soc. Sci. Upsal. 4: 39. late 1784–1785). The two later names have the same diagnostic phrase name as *B. tomentosa* in its original place of valid publication and therefore include its type (Art. 52.2(e), 52.3). Consequently, the two later names were nomenclaturally superfluous when published (Art. 52.1) and are to be automatically typified (Art. 7.5) by the type of *B. tomentosa* Thunb. (in Murray, l.c.). Because the three names are the same and based on the same type, they are isonyms, the later two of which may be disregarded.”

Prop. G (408 – Wisnev in Taxon 72: 1181) Amend Art. 6.4 by adding the word “nomenclaturally” before “superfluous” (new text in bold):

“6.4. An illegitimate name is one that is designated as such in Art. 18.3, 19.6, 52–54, F.3.3, or F.6.1 (see also Art. 21 Note 1 and Art. 24 Note 2). A name that according to this *Code* was illegitimate when published cannot become legitimate later unless Art. 18.3 or 19.6 so provide; unless it is conserved (Art. 14), protected (Art. F.2), or sanctioned (Art. F.3); or unless the name is **nomenclaturally** superfluous under Art. 52 and its intended basionym is conserved or protected.”

Prop. H (063 – Wisnev in Taxon 70: 451) Amend Art. 6.9 as follows (deleted text in strikethrough):

“6.9. The name of a new taxon (e.g. genus novum, gen. nov., species nova, sp. nov.) is a name validly published in its own right, ~~i.e. one not based on a previously validly published name~~; it is not a new combination, a name at new rank, or a replacement name.”

Prop. I (055 – Wisnev in Taxon 70: 449) Amend Art. 6.10 as follows (new text in bold, deleted text in strikethrough):

“6.10. A new combination (combinatio nova, comb. nov.) ~~or name at new rank (status novus, stat. nov.)~~ is a new name **for a taxon below the rank of genus** based on a legitimate, previously published

name, which is its basionym. **A name at new rank (status novus, stat. nov.) is a new name based on a legitimate, previously published name at a different rank, which is its basionym.** The basionym does not itself have a basionym; it provides the final epithet¹, name, or stem of the new combination or name at new rank. (See also Art. 41.2).”

Prop. J (056 – Wisnev in Taxon 70: 449) Amend the first sentence of Art. 6.10 as follows (new text in bold):

“6.10. A new combination (combinatio nova, comb. nov.) or name at new rank (status novus, stat. nov.) is a new name **validly published in accordance with Art. 41** and based on a legitimate, previously published name, which is its basionym.”

Prop. K (057 – Wisnev in Taxon 70: 450) Amend Art. 6.10 as follows (new text in bold, deleted text in strikethrough):

“6.10. A new combination (combinatio nova, comb. nov.) or name at new rank (status novus, stat. nov.) is a new name based on a legitimate, previously published name, which is its basionym. **The new name is based on the earlier name if (1) the earlier name provides the final epithet¹, name, or stem of the new name, (2) the new name is validly published in accordance with Art. 41, and (3) the type of the earlier name is not explicitly excluded (see Art. 48.1).** The basionym does not itself have a basionym; ~~it provides the final epithet¹, name, or stem of the new combination or name at new rank.~~ (See see also Art. 41.2).”

Prop. L (296 – Wisnev & Prado in Taxon 72: 947) Amend Art. 6.10 as follows (new text in bold, deleted text in strikethrough):

“6.10. A new combination (combinatio nova, comb. nov.) or name at new rank (status novus, stat. nov.) is a new name based on a legitimate, previously published name, which is its basionym. The basionym ~~does not itself have a basionym; it provides the final epithet¹, name, or stem of the new combination or name at new rank.~~ **A new combination or name at new rank cannot be the basionym of a later new combination or name at new rank; in this case, the basionym of all the later names is the earliest name that provides the final epithet, name, or stem of the later names** (See see also Art. 41.2).”

Prop. M (245 – Wisnev & Prado in Taxon 72: 678) Amend Art. 6 Note 5 as follows and delete Art. 6 Ex. 13 (deleted text in strikethrough):

“*Note 5.* A new combination can at the same time be a name at new rank (comb. & stat. nov.); ~~a nomenclatural novelty with a basionym need not be either of these.~~”

“*Ex. 13. Centaurea jacea* subsp. *weldeniana* (Rehb.) Greuter, “comb. in stat. nov.” (in Willdenowia 33: 55. 2003), based on *C. weldeniana* Rehb. (Fl. Germ. Excurs.: 213. 1831), was not a new combination because *C. jacea* var. *weldeniana* (Rehb.) Briq. (Monogr. Centaurées Alpes Marit.: 69. 1902) had been published previously; nor was it a name at new rank, due to the existence of *C. amara* subsp. *weldeniana* (Rehb.) Kušan (in Priir. Istraž. Kral. Jugoslavije 20: 29. 1936); it was nevertheless a nomenclatural novelty.”

Prop. N (001 – Choi & al. in Taxon 69: 623) Add a new Note and a new Example under Art. 6.11:

“*Note 6.* A replacement name for a legitimate name, for which a legitimate name at new rank (Art. 6.10) could be published, can be legitimate provided that its rank differs from that of the replaced synonym. Such a replacement name would, however, be contrary to Rec. 21B.4 or 24B.2.”

“*Ex. n. Bidaria indica* M. A. Rahman & Wilcock (in Blumea 34: 99. 1989) was published as an explicit substitute (“nom. et stat. nov.”) for the legitimate name *Gymnema montanum* var. *beddomei* Hook. f.

(Fl. Brit. India 4: 32. 1883), even though the epithet *beddomei* was available at specific rank in *Bidaria*. Because the ranks of the replacement name and replaced synonym differ, and names have no priority outside the rank at which they are published (Art. 11.2), *B. indica* is not illegitimate under Art. 52.1.”

Prop. O (058 – Wisnev in Taxon 70: 450) Amend the first sentence of Art. 6.11 as follows (new text in bold):

“6.11. A replacement name (nomen novum, nom. nov.) is a new name **validly published in accordance with Art. 41** as an explicit substitute (avowed substitute) for a legitimate or illegitimate, previously published name, which is its replaced synonym.”

Prop. P (060 – Wisnev in Taxon 70: 450) Amend Art. 6.11 as follows (new text in bold):

“6.11. A replacement name (nomen novum, nom. nov.) is a new name published as an explicit substitute (avowed substitute; **but see Art. 6.12 and 6.13**) for a legitimate or illegitimate, previously published name, which is its replaced synonym. The replaced synonym, when legitimate, does not provide the final epithet, name, or stem of the replacement name (see also Art. 41.2 and 58.1).”

Prop. Q (059 – Wisnev in Taxon 70: 450) Amend Art. 6.12 as follows (new text in bold, deleted text in strikethrough):

“6.12. A name not explicitly proposed as a substitute for an earlier name is nevertheless a replacement name either ~~(a)~~ if it is **(a) validly published in accordance with Art. 41 and** validated solely by reference to that earlier name or **(b) treated as a replacement name** under the provisions of Art. 7.5.”

Prop. R (061 – Wisnev in Taxon 70: 450) Amend Art. 6.13 as follows (new text in bold, deleted text in strikethrough):

“6.13. A name not explicitly proposed as a substitute for an earlier name and not covered by Art. 6.12 may be treated either as a replacement name or as the name of a new taxon if in the protologue¹ both ~~(a) a potential replaced synonym is cited~~ **all requirements of Art. 41 for valid publication of a replacement name are met** and **(b) all requirements for valid publication of the name of a new taxon are independently met**. Decision on the status of such a name is ~~to be based on predominant usage and is to be~~ effected by means of appropriate type designation (Art. 9 and 10).”

Prop. S (137 – McNeill & al. in Taxon 71: 703) Amend the footnote to Art. 6.13 as follows (new text in bold):

[footnote to Art. 6.13] “¹ Protologue (from Greek πρότος, protos, first; λόγος, logos, discourse): everything associated with a name at its valid publication, e.g. description, diagnosis, illustrations, **habitat photographs (see Art. 6.1 footnote)**, references, synonymy, geographical data, citation of specimens, discussion, and comments.”

Prop. T (197 – Wisnev in Taxon 72: 443) Amend the definition of protologue in the footnote to Art. 6.13 (new text in bold, deleted text in strikethrough):

[footnote to Art. 6.13] “¹ Protologue (from Greek πρότος, protos, first; λόγος, logos, discourse): everything associated with a name ~~at~~ **as part of its valid publication, e.g. description, diagnosis, illustrations, references, synonymy, geographical data, citation or reference of specimens, discussion, and comments. It also includes all illustrations published, cited, or referenced in the publication (including unpublished illustrations).**”

Prop. U (297 – Wisnev & Prado in Taxon 72: 947) Add a new Article to Art. 6:

“6.n1. A new combination or name at new rank cannot be the replaced synonym of a later new combination or name at new rank, because the basionym of the earlier name would be the actual replaced

synonym, unless the earlier new combination or name at new rank is the illegitimate name being replaced by a replacement name.”

If this proposal is rejected, we recommend that the Editorial Committee delete Art. 41 Ex. 25. If the proposal is accepted, we recommend the following changes [Prop. V] to Art. 6.12 and Art. 41 Ex. 25.

Prop. V (298 – Wisnev & Prado in Taxon 72: 947) Amend Art. 6.12 and Art. 41 Ex. 25 as follows (new text in bold):

“6.12. A name not explicitly proposed as a substitute for an earlier name is nevertheless a replacement name either *(a)* if it is validated solely by reference to that earlier name, **which is its replaced synonym**, or *(b)* under the provisions of Art. 7.5.”

[Art. 41] “Ex. 25. (a) The intended new combination “*Machaerina iridifolia*” was proposed by Koyama (in Bot. Mag. (Tokyo) 69: 64. 1956) with a full and direct reference to “*Cladium iridifolium* Baker, Flor. Maurit. 424 (1877)”. However, *C. iridifolium* had been proposed by Baker as a new combination based on *Scirpus iridifolius* Bory (Voy. Îles Afrique 2: 94. 1804). **Under Art. 6.10 and 6.n1, *C. iridifolium* cannot serve as the basionym or replaced synonym of *M. iridifolia*.** Because Baker provided an explicit reference to Bory, Art. 41.8(a) does not apply and the combination under *Machaerina* was not validly published by Koyama.”

Prop. W (299 – Wisnev & Prado in Taxon 72: 948) Add a new Article to Art. 6 and delete the last sentence of Art. 6.11 as follows (deleted text in strikethrough):

“6.n2. The replaced synonym, when legitimate, may not provide the final epithet, name, or stem of the replacement name (see also Art. 41.2 and 58.1).”

“6.11. A replacement name (nomen novum, nom. nov.) is a new name published as an explicit substitute (avowed substitute) for a legitimate or illegitimate, previously published name, which is its replaced synonym. ~~The replaced synonym, when legitimate, does not provide the final epithet, name, or stem of the replacement name (see also Art. 41.2 and 58.1).~~”

Prop. X (398 – Wisnev in Taxon 72: 1179) Convert the second sentence of Art. 48.1 into a new Article in Art. 6 as follows and delete Art. 48 Note 1 (new text in bold, deleted text in strikethrough):

“6.n. **(a) Unless an author explicitly excluded the type of the apparent basionym or replaced synonym of a name, that name will not fail to be a new combination, name at new rank, or replacement name merely because (1) its author applied it erroneously to a taxon now considered not to include that type and/or (2) its author attempted to designate a type that is contrary to the rules.**

(b) Similarly, when If an author who adopts a name refers to an apparent basionym or replaced synonym but explicitly excludes its type, the name of a new taxon is considered to have been published that must be attributed solely to that author; however, if the relevant requirements for valid publication of the name of a new taxon are not satisfied, then no name is published even if the requirements of Art. 41 are satisfied.”

(c) For this purpose, exclusion of the type is defined in Art. 48.1 and 48.2.”

~~“Note 1. Misapplication of a new combination, name at new rank, or replacement name to a different taxon, but without explicit exclusion of the type of the basionym or replaced synonym, is dealt with under Art. 7.3–7.4.”~~

If this proposal is accepted, some of the language in Art. 7.3 and 7.4 is redundant and can be deleted.

Prop. Y (301 – Wisnev & Prado in Taxon 72: 948) Add a new Note to Art. 6:

“*Note n.* A replacement name may be published for a legitimate replaced synonym if it is not possible to publish a legitimate new combination or name at new rank because the new name would be an illegitimate later homonym or could not be validly published (such as a tautonym).”

Prop. Z (400 – *Wisnev in Taxon* 72: 1179) Add a new Note in Art. 6 as follows:

“*Note n.* If an author who publishes a potential name on or after 1 January 1953 (*a*) refers to an apparent basionym or replaced synonym, (*b*) does not exclude its type, and (*c*) does not satisfy Art. 41, the name of a new taxon is considered to have been published (if it meets the conditions for valid publication as such).”

Rapporteurs’ comments – *Prop. A* (see also *Prop. S*), would exclude habitat photographs, which generally lack sufficient morphological detail, from being considered as illustrations under the *Code*. Otherwise, these could be original material and potentially obligate lectotypes, which would be undesirable.

Prop. B would exhaustively expand the cross-referencing already evident in Art. 6.1. It may be referred to the Editorial Committee.

Prop. C is part of a set of proposals that would provide for the future valid publication of names of certain taxa other than vascular plants or bryophytes without nomenclatural types (so-called “typeless names”; see Chap. II new Art. *Prop. A*). The Nomenclature Committee for Algae does not support *Prop. C* (votes 1 : 14 : 1).

Prop. D would provide formal definitions for entities that are not considered names in the sense of the *Code*. The last sentence seems more like a Recommendation than part of a rule. The term “potential name” seems to be a harmless addition to the *Code*, but is it needed?

Prop. E does not change the meaning of Art. 6 Note 2, but would make the wording more explicit.

Prop. F proposes a new Example, which would be automatically referred to the Editorial Committee.

Prop. G would add more consistent wording without any change in meaning. It could be a useful clarification.

Prop. H would delete a clause from Art. 6.9, intending to avoid confusion surrounding the usage of “based on” in this clause. The proposal would implicitly define a name of a new taxon as not one of the alternatives mentioned in the last phrase, but it overlooks the category of nomenclatural novelties mentioned in Art. 6 Note 5, which are similarly not names of new taxa.

Prop. I would include the more detailed Glossary definitions of the terms “new combination” and “name at new rank” directly in Art. 6.10. Although the meaning is unchanged, some might prefer this more explicit wording.

Prop. J would add a reference to a requirement for valid publication in the definition of new combination and name at new rank in Art. 6.10 (see also *Prop. O*). No such reference has been proposed for Art. 6.9 (names of new taxa), nor should it be, because such requirements are accounted for elsewhere (Chap. V). Perhaps removal of the “new” before “name” would prevent the potential misreading the proposer seeks to avoid; those in favour of this should vote “ed.c.”

Prop. K is an extension of *Prop. J*, and would restructure the wording of Art. 6.10 to incorporate exceptions treated elsewhere in the *Code*, unnecessarily complicating the definitions provided.

Prop. L would provide a fuller explanation of part of Art. 6.10 that may be preferred by some. However, the introduction of the word “later” overlooks the complication that would arise when a new combination or name at new rank was published simultaneously with its basionym. Replacing “a later” with “**another**” in the first added

clause and deleting the second added clause might achieve the authors’ desired clarity; those in agreement should vote “ed.c.”

Prop. M, Art. 21 *Prop. A*, Art. 24 *Prop. B* and Art. 32 *Prop. B* form a set of proposals that would eliminate the interpretation conveyed in three different Notes that a rank-denoting term is not part of a combination. This interpretation is based on Art. 21.1 and 24.1, where in each case the rank-denoting term is excluded from the definitions of what constitutes the name. Deletion of the wording from the three Notes would allow an alternative interpretation, that the rank-denoting term *is* part of the name, which would eliminate the category of nomenclatural novelty with a basionym that is neither a new combination nor name at new rank mentioned in Art. 6 Note 5 and Ex. 13. Some may consider this an improvement and/or a simplification.

Prop. N, which would add considerations of priority and legitimacy to Art. 6.11, seems out of place in the context of this Article, which is a definition of replacement name. Its Example could be considered for inclusion under Art. 11.2 or 52.2.

Prop. O would add a reference to a requirement for valid publication in the definition of replacement name in Art. 6.11 (see also *Prop. J*). No such reference has been proposed for Art. 6.9 (names of new taxa), nor should it be, because such requirements are accounted for elsewhere (Chap. V). The same considerations apply as in *Prop. J*.

Prop. P seems to be a useful addition.

Prop. Q proposes two additions to Art. 6.12. Considerations involving the first addition are similar to those already discussed under *Prop. J* and *O*; the second addition would provide a more precise wording than is currently present in the Article, avoiding any conflict with Art. 7.5(b). Those who support only the second addition should vote “ed.c.”

Prop. R would adjust clause (a) of Art. 6.13 to make it more parallel to clause (b), which appears useful, although the non-parallel reference to Art. 41 here brings up the same considerations already mentioned under *Prop. J* and *O*. Whether moving part of the final sentence of Art. 6.13 into a new Recommendation (Rec. 6A *Prop. A*) is accepted or rejected does not seem critical to its application.

Prop. S relates to *Prop. A*, the acceptance of which would make it necessary to specify habitat photographs apart from illustrations in the definition of protologue, and should be voted accordingly.

Prop. T would expand the listing of protologue elements with regard to illustrations. Whereas the current listing (using “e.g.”) is not intended to be exhaustive, this expansion, which would include previously published or unpublished illustrations, may not be considered necessary or desirable.

Prop. U and *V* could have unwanted consequences if replacement names in current use are found to have been based on new combinations, e.g. where the reference to a basionym was cryptic and therefore overlooked.

Prop. W seems to be an unnecessary splitting of Art. 6.11.

Prop. X is part of a set of proposals involving also Art. 7 and 48 (Art. 6 *Prop. X*, Art. 7 *Prop. H*, Art. 48 *Prop. A*, *B* and *C*) that would more explicitly deal with the effects of inclusion vs. exclusion of a type on homonymy, misapplication, new combinations or replacement names. While parts of *Prop. X* are dealt with by existing provisions (Art. 7.3, 7.4 and 48.1), other content is new, such as the new text in clauses (a)(2) and (b). See Art. 40 *Prop. Q* for an alternative to the new text in clause (a)(2). An alternative to the new text in clause (b) would be a modification to the middle sentence of current Art. 48.1 to read: “[...], the name of a new taxon is

considered to have been published, **provided all requirements for valid publication of such a name are fulfilled**, that must be attributed solely to that author.” While some may support the new arrangement advocated by Prop. X, those who do not support the restructuring of content from other provisions but wish to have the new content of Prop. X considered in this alternative fashion should vote “ed.c.” See Art. 48 Prop. H for a more inclusive alternative to the new text in clause (b).

Prop. Y, like *Prop. N*, seems out of context in Art. 6, where the definition of replacement name is provided in Art. 6.11, and would be better placed under Art. 11, where Art. 11.4 deals with the situation discussed.

Prop. Z would provide a new Note in Art. 6 to account for the fact that names published as apparent new combinations or replacement names can potentially be validly published as names of new taxa if the requirements of Art. 41 are not otherwise fulfilled. The Note has some merit, but would appear to be more useful in Art. 41, but this could be determined by the Editorial Committee. However, it interacts with Art. 41 *Prop. L*, which changes the requirements for valid publication of new combinations or replacement names and could allow names to be validly published as such and not as names of new taxa.

Recommendation 6A (new)

Prop. A (062 – *Wisnev in Taxon* 70: 450) Add a new Recommendation 6A.1 as follows:

“6A.1. The decision on typification under Art. 6.13 should be based on predominant usage of the name.”

Rapporteurs’ comments – *Prop. A* is discussed under Art. 6 *Prop. R*.

Article 7

Prop. A (342 – *Thiele & al. in Taxon* 72: 1147) Amend Art. 7.1 as follows (new text in bold):

“7.1. The application of names of taxa at the rank of family or below is determined by means of nomenclatural types (types of names of taxa), **except as provided by Art. X.1**. The application of names of taxa at the higher ranks is also determined by means of types when the names are formed from a **typified** generic name (see Art. 10.10) **or by reference sequences when the names are formed from type-less generic names (see Art. X.7)**.”

Prop. B (002 – *Lidén in Taxon* 69: 624) Amend Art. 7.2 as follows (new text in bold, deleted text in strikethrough):

“7.2. A nomenclatural type (typus) is that element to which ~~the~~ **a** name of a taxon is permanently attached, whether as the correct name or as a synonym. ~~The nomenclatural type is not necessarily the most typical or representative element of a taxon.~~”

Prop. C (003 – *Lidén in Taxon* 69: 624) As an alternative to *Prop. 002*, amend Art. 7.2 as follows (new text in bold, deleted text in strikethrough):

“7.2. A nomenclatural type (typus) is that element to which ~~the~~ **a** name of a taxon is permanently attached, whether as the correct name or as a synonym. ~~The nomenclatural type is not necessarily the most typical or representative element of a taxon.~~ **This does not imply that any element of the taxon is more typical of the taxon than any other.**”

Prop. D (065 – *Tindall in Taxon* 70: 451) Amend Art. 7.2 as follows (new text in bold, deleted text in strikethrough):

“7.2. A nomenclatural type (typus) is that element to which the name of a taxon is permanently attached, whether as the correct name

or as a synonym. ~~The nomenclatural type is not necessarily the most typical or representative element of a taxon.~~ **The terms nomenclatural type, type, typify (including typified and typifying), and typification are technical terms used in this Code and are not to be interpreted as meaning typical in normal linguistic use.**”

Add the following definition to the Glossary:

“*typify*. [Not defined] – to attach a nomenclatural type to a name of a taxon; the process of which is *typification* (Art. 7–10, F.5.4, and F.5.5) (see also *automatic typification*, *nomenclatural type*, and *type designation*).”

Prop. E (138 – *Wisnev in Taxon* 71: 704) Amend the first sentence of Art. 7.2 as follows (new text in bold):

“7.2. A nomenclatural type (typus) is that element to which the name of a taxon is permanently attached (**unless it is superseded, destroyed, lost, or missing**), whether as the correct name or as a synonym.”

Prop. F (025 – *Bhattacharjee & al. in Taxon* 69: 1379) Add a new Note after Art. 7.2 and a new entry to the Glossary:

“*Note 0*. A name of a taxon may have a type (see Art. 7.1) but has no circumscription. The taxon itself has a circumscription but no type.”

“*circumscription*. [Not defined] – an indication of the elements (e.g. subordinate taxa, synonyms, specimens, illustrations) that are included in a taxon.”

Prop. G (139 – *Wisnev in Taxon* 71: 704) Amend Art. 7.3, 7.4, and 10.9 as follows (new text in bold):

“7.3. A new combination or a name at new rank (Art. 6.10) is typified **automatically** by the type of the basionym even though it may have been applied erroneously to a taxon now considered not to include that type (but see Art. 48.1).”

“7.4. A replacement name (Art. 6.11) is typified **automatically** by the type of the replaced synonym even though it may have been applied erroneously to a taxon now considered not to include that type (but see Art. 41 Note 3 and 48.1).”

“10.9. The type of a name of a family or of any subdivision of a family is **automatically** the same as that of the generic name from which it is formed (see Art. 18.1). For purposes of designation or citation of a type, the generic name alone suffices, **i.e. it is considered as the full equivalent of its type**. The type of a name of a family or subfamily not formed from a generic name is the same as that of the corresponding alternative name (Art. 18.5 and 19.8).”

Make a conforming amendment to the definition of “automatic typification” in the Glossary.

Prop. H (399 – *Wisnev in Taxon* 72: 1179) If *Prop. 398* [Art. 6 *Prop. X*] is accepted, amend Art. 7.3 and 7.4 as follows (new text in bold, deleted text in strikethrough):

“7.3. A new combination or a name at new rank (Art. 6.10) is typified by the type of the basionym ~~even though it may have been applied erroneously to a taxon now considered not to include that type~~ (but see Art. ~~48.1~~ **6.n**).”

“7.4. A replacement name (Art. 6.11) is typified by the type of the replaced synonym ~~even though it may have been applied erroneously to a taxon now considered not to include that type~~ (but see Art. 41 Note 3 and ~~48.1~~ **6.n**).”

Prop. I (106 – *Wisnev in Taxon* 70: 1383) Amend Art. 7.8 and Art. 9 Note 3 as follows (new text in bold, deleted text in strikethrough):

“7.8. A name of a new taxon validly published solely by reference to a previously and effectively published description or diagnosis (Art. 38.1(a)) (and not by a reproduction of such a description or

diagnosis) is to be typified by an element ~~selected~~ from the entire context of the validating description or diagnosis, unless **there are no such elements or** the validating author has ~~definitely~~ designated a different type **in the protologue (indication or usage by the validating author is insufficient to establish a type)**, but not by an element explicitly excluded by the validating author (see also Art. 7.9)."

[Art. 9] "Note 3. For names falling under Art. 7.8, only elements from the **entire** context of the validating description are considered as original material, unless the validating author has ~~definitely~~ designated a different type."

Prop. J (257 – Wiersema & al. in *Taxon* 72: 683) Add the following new sentence at the end of Art. 7.8 (new text in bold):

"7.8. A name of a new taxon validly published solely by reference to a previously and effectively published description or diagnosis (Art. 38.1(a)) (and not by a reproduction of such a description or diagnosis) is to be typified by an element selected from the entire context of the validating description or diagnosis, unless the validating author has definitely designated a different type, but not by an element explicitly excluded by the validating author (see also Art. 7.9).

However, if the name is first typified on or after 1 January 2026, the original material is to be determined in accordance with Art. 9.4 without regard to the preceding sentence."

Prop. K (249 – Wisnev & Prado in *Taxon* 72: 679) Amend Art. 7.9 as follows (new text in bold, deleted text in strikethrough):

"7.9. A name of a taxon assigned to a group with a nomenclatural starting-point later than 1 May 1753 (see Art. 13.1) is to be typified by an element selected from the context of its **protologue valid publication** (Art. 32–45)."

Prop. L (066 – Wisnev in *Taxon* 70: 452) Amend Art. 7.10 as follows (new text in bold, deleted text in strikethrough):

"7.10. ~~For purposes of priority (Art. 9.19, 9.20, and 10.5), designation~~ **Designation** of a type is **not achieved unless made in an only by effective publication.**"

Prop. M (067 – Wisnev in *Taxon* 70: 452) Amend Art. 7.11 as follows (new text in bold, deleted text in strikethrough):

"7.11. ~~For purposes of priority (Art. 9.19, 9.20, and 10.5), designation~~ **Designation** of a type is **not achieved only if unless** the type is definitely accepted as such by the typifying author, ~~if the type element is clearly indicated by direct citation by including the term "type" (typus) or an equivalent and on or after 1 January 2001, if the typification statement includes the phrase "designated here" (hic designatus) or an equivalent.~~

Make a conforming change in Art. F.5.4.

Prop. N (088 – Nachychko in *Taxon* 70: 1378) Amend Art. 7.11 as follows (new text in bold, deleted text in strikethrough):

"7.11. For purposes of priority (Art. 9.19, 9.20, and 10.5), designation of a type is achieved only if **(a)** the type is definitely accepted as such by the typifying author, ~~if~~ **(b)** the type element is clearly indicated by direct citation including ~~the a term that is or contains the word element "type" (typus); or an equivalents in other modern languages and abbreviations permitted; see also Art. 7 *Ex. 16), and, (c)~~ on or after 1 January 2001, ~~if~~ the typification statement includes the phrase "designated here" (hic designatus) or an equivalent."

Prop. O (198 – Majumdar & al. in *Taxon* 72: 444) Add the following sentence to Art. 7.11 (new text in bold):

"7.11. For purposes of priority (Art. 9.19, 9.20, and 10.5), designation of a type is achieved only if the type is definitely accepted as such by the typifying author, if the type element is clearly indicated by direct citation including the term "type" (typus) or an equivalent,

and, on or after 1 January 2001, if the typification statement includes the phrase "designated here" (hic designatus) or an equivalent. **On or after 1 January 2026, only the phrase "designated here" or "here designated" (hic designatus) or its exact translation into another modern language is permitted."**

Prop. P (253 – Wiersema & al. in *Taxon* 72: 681) Amend Art. 7.11 as follows (new text in bold, deleted text in strikethrough):

"7.11. For purposes of priority (Art. 9.19, 9.20, and 10.5), designation of a type is achieved only if the type is definitely accepted as such by the typifying author, if the type element is clearly indicated by direct citation including the term "type" (typus) or an equivalent, and, on or after 1 January 2001, if the typification statement includes the phrase "designated here" (hic designatus) or ~~an equivalent~~ **a similar expression demonstrating the author's intent to designate a type there."**

Prop. Q (358 – Wiersema & McNeill in *Taxon* 72: 1153) Add a new Note after Art. 7.11:

"*Note 2bis.* The effective typification of a name necessarily establishes the same typification for all names sharing the same basionym (Art. 7.3) or replaced synonym (Art. 7.4) and that basionym or replaced synonym."

Rapporteurs' comments – *Prop. A* is part of a set of proposals that would provide for the future valid publication of names of certain taxa other than vascular plants or bryophytes without nomenclatural types (so-called "type-less names"; see Chap. II new Art. Prop. A). The Nomenclature Committee for Algae does not support Prop. A (votes 1 : 14 : 1).

Prop. B and *C* are alternative proposals that attempt to avoid the implication in Art. 7.2 that a most representative element of any taxon exists. Prop. B would simply delete the second sentence, whereas Prop. C would replace it with an alternative wording. Prop. C seems to have the advantage of preserving the existing information.

Prop. D represents another alternative wording to the final sentence of Art. 7.2 and would emphasize the distinction between the usage of "type" and derivative terms in the *Code* and similar expressions in common speech, e.g. "typical". If such a change is considered desirable and to what extent, either Prop. C or Prop. D or both could be supported. If the proposal is accepted, the decision on adding "typify" to the Glossary would be automatically referred to the Editorial Committee.

Prop. E would make a point that could be similarly achieved through a cross-reference to the relevant Articles in Art. 9 and 10. However, the proposed addition actually diminishes the concept of a type being a permanent foundation for a name. Is this addition really necessary?

Prop. F seems to be a useful addition, which would reinforce an important distinction between taxonomy and nomenclature. Adding "circumscription" to the Glossary also makes sense, because the word is employed several times throughout the *Code*.

Prop. G suggests some useful additions, which would emphasize that typification is indeed automatic in Art. 7.3, 7.4 and 10.9 and would make the latter more consistent with its counterpart for indicating generic types in Art. 10.1.

Prop. H is contingent on acceptance of Art. 6 Prop. X and is discussed there.

Prop. I would restrict the exception to selecting a type under Art. 7.8, i.e. when the validating author has "definitely designated a different type", requiring that it be designated in the protologue and that mere indication of a type (e.g. under Art. 40.3) or use of a single element (Art. 9.1(b)) is not enough. The author argues that this is the

intention of Art. 7.8, based on a review of earlier versions of the rule. It is not entirely clear whether such a change would be free of unwanted consequences.

Prop. J would eliminate the restrictions on the typification of names falling under Art. 7.8 after 2025, allowing the original material to be determined more broadly under Art. 9.4. Likely this would apply to only a few cases and might not merit adding another date-limited provision to the *Code*.

Prop. K seeks to make Art. 7.9 consistent with Art. 9 Note 2, but given that the latter is a Note and the former an Article, the change would be better made in the reverse to make them consistent. Those wishing to instruct the Editorial Committee to resolve this incongruity should vote “ed.c.”

Prop. L and *M*, in the elimination of the opening clause, would both extend the application of Art. 7.10 and 7.11 from lectotypes, neotypes and epitypes and their equivalents under Art. 10 to also include holotypes. While this might be unproblematic in the case of Art. 7.10 (*Prop. L*), *Prop. M* would presumably add the requirement to indicate “designated here” or an equivalent for holotype designations after 2000, which would have destabilizing consequences for names published after that date.

Prop. N attempts to more precisely delineate what could be considered as acceptable equivalents to usage of the terms “type (typus)” in Art. 7.11. While the proposed change might add some clarity, by retaining the word “equivalents” before the added phrase “in other modern languages”, it still permits unspecified equivalents to the word “type” in those languages to be considered acceptable.

Prop. O would make stricter the requirement to use the phrase “designated here” by permitting, instead of an unspecified equivalent of “designated here”, only direct translations in other modern languages after 2025. One can again question whether it is worth adding another date-limited provision to the *Code*.

Prop. P deals with the same issue as *Prop. O*, but rather than eliminating expressions equivalent to “designated here” from consideration it would place the focus on the need to demonstrate an author’s intent to designate a type.

Prop. Q would clarify how acts of typification apply from basionyms to their new combinations and replaced synonyms to their replacement names and similarly in the reverse order. This is not otherwise noted in the *Code*, and seems to be a useful addition.

Recommendation 7A

Prop. A (254 – Knapp & al. in *Taxon* 72: 682) Add a new Recommendation to Rec. 7A:

“7A.2. Insofar as possible the herbarium, collection, or institution in which the holotype is deposited should be within the native geographical distribution of the taxon.”

Prop. B (091 – Mosyakin in *Taxon* 70: 1379) Amend Rec. 7A.1 as follows (new text in bold):

“7A.1. It is strongly recommended that the material on which the name of a taxon is based, especially the holotype, be deposited in a public herbarium or other public collection with a policy of giving bona fide researchers access to deposited material, and that it be scrupulously conserved. **Authors publishing names of new species or infraspecific taxa are encouraged to deposit some type material (holotype, isotypes, and/or paratypes) in one or more herbaria, collections, or other specialized institutions in the country or countries of origin of the newly described taxon.**”

Prop. C (360 – Gavade & Lekhak in *Taxon* 72: 1154) Add a new paragraph under Rec. 7A:

“7A.2. It is strongly recommended, insofar as possible, that duplicate material on which the name of a taxon is to be based, especially of the holotype but also of a neotype or epitype, be conserved in different herbaria, collections, or institutions, preferably in different areas of the world.”

Prop. D (199 – Majumdar & al. in *Taxon* 72: 444) Add a new paragraph to Rec. 7A:

“7A.2. The phrase “designated here” or the equivalents permitted by Art. 7.11 should be written in the Latin alphabet.”

Rapporteurs’ comments – *Prop. A* would recommend the deposition of holotype material in herbaria located where a taxon is native. This seems to be prudent advice.

Prop. B similarly would recommend where type material of newly described taxa should be deposited, without limiting this to just the holotype. This may be a more pragmatic approach. Additionally, the focus here is on “countries of origin” rather than “native geographical distribution”. Either way, a distinction in meaning may not really exist between the two phrasings.

Prop. C would offer helpful advice to facilitate the long-term preservation of type material. A similar Recommendation, avoiding keeping all one’s eggs in a single basket, is part of Rec. 40A *Prop. E* and, in principle, parallels the archiving of electronic material in digital repositories in Rec. 29A.2(b).

Prop. D seems consistent with a similar recommendation in Rec. 40A.4 concerning “details of the type specimen”. However, Art. 7.11 implicitly allows an equivalent of “designated here” to be in any language (or any modern language under Art. 7 *Prop. O*), whereas *Prop. D* could conflict by recommending use of the Latin alphabet. See also comments under Rec. 40A *Prop. C*.

Recommendation 7B (new)

Prop. A (026 – Prado & al. in *Taxon* 69: 1380) Add a new Recommendation after Article 7 and a new entry to the Glossary:

“7X.n. When citing designations of lectotype and neotype (and their equivalents under Art. 10) that were achieved before 1 January 2001 in a non-explicit manner (i.e. without the use of the words “lectotypus” or “neotypus” (Art. 9.23) and “designated here” (Art. 7.11) or their equivalents), authors should use the phrase “non-explicitly designated by” (or an equivalent) after the kind of type, e.g. “lectotype, non-explicitly designated by [author(s)]” followed by the bibliographic reference or date.”

“non-explicit typification. [Not defined] – a designation of lectotype or neotype (or its equivalent under Art. 10) that was achieved before 1 January 2001 in a non-explicit manner; that is, without the use of the words “lectotypus” or “neotypus” and “designated here” or their equivalents (Rec. 7X.n).”

Prop. B (069 – Renner in *Taxon* 70: 453) Add a new Recommendation 7B to read as follows:

“7B.1. It is strongly recommended that the protologue of the name of a new taxon at the rank of species or below include at least one photograph of the mounted holotype with its label.”

Rapporteurs’ comments – *Prop. A* would recommend using specified terms to label acts of non-explicit lecto- or neotypification. Those who feel that this distinction is useful will presumably vote accordingly.

Prop. B would recommend what is good taxonomic practice, either including a photograph of the holotype in the protologue or providing a link to an image in an open-access online digital herbarium (which could show more detail). Those who feel that publishing holotype photographs “would improve the utility of type material for

current and future researchers” and should be recommended in the *Code* should support this proposal. See also comments under Rec. 40A Prop. E.

Article 8

Prop. A (004 – Schwartsburd & al. in Taxon 69: 624) Insert a Note after Art. 8.1:

“*Note 0.* The term “type-species”, often found in taxonomic, systematic, and phylogenetic works, is not used in this *Code*. A type is never a collective entity. The same applies to “type-genus”, “type-subspecies”, and “type-variety”.”

Prop. B (093 – Renner in Taxon 70: 1380) Amend Art. 8.1 as follows (new text in bold, deleted text in strikethrough):

“8.1. The type (holotype, lectotype, or neotype) of a name of a species or infraspecific taxon is either a single specimen conserved in one herbarium or other collection or institution, ~~or a published or unpublished illustration, or an assembled nuclear genome or informative parts thereof accessioned in a public repository~~ (but see Art. 8.5; see also Art. 40.4, 40.5, and Art. 40 Ex. 6).”

Prop. C (140 – Wisnev in Taxon 71: 704) Amend Art. 8.1 as follows (new text in bold, deleted text in strikethrough):

“8.1. The type (~~holotype, lectotype, or neotype~~ see Art. 7.2) of a name of a species or infraspecific taxon is **a holotype (Art. 9.1), lectotype (Art. 9.3), neotype (Art. 9.8), or conserved type (Art. 14.9), any of which may be supported by an epitype (Art. 9.9).** **Such a type is** either a single specimen conserved in one herbarium or other collection or institution, or a published or unpublished illustration (but see Art. 8.5; see also Art. 40.4, 40.5, and Art. 40 Ex. 6).”

Make a conforming amendment to the definition of “nomenclatural type” in the Glossary.

Prop. D (329 – Thiele & al. in Taxon 72: 1144) Amend Art. 8.1 as follows (new text in bold):

“8.1. The type (holotype, lectotype, or neotype) of a name of a species or infraspecific taxon is either a single specimen conserved in one herbarium or other collection or institution, or a published or unpublished illustration (but see Art. 8.5; see also Art. 40.4, 40.5, and Art. 40 Ex. 6); **a holotype may also be an effectively published DNA sequence (see Art. X.1).**”

Prop. E (097 – Wisnev & Prado in Taxon 70: 1381) Amend Art. 8.2 as follows (new text in bold, deleted text in strikethrough):

“8.2. For the purpose of typification, a specimen (a) is a gathering², or part of a gathering, of a single species or infraspecific taxon, disregarding admixtures (see Art. 9.14). ~~It may, that consists of a single organism, parts of one or several organisms, or of multiple small organisms and (b) A specimen is usually a single preparation mounted on (i.e. a single herbarium sheet or in an equivalent preparation, such as a box, packet, jar, or microscope slide) or, to the extent permitted by Art. 8.3, multiple preparations.~~”

Prop. F (305 – Wisnev & Prado in Taxon 72: 949) Amend the first sentence of Art. 8.2 as follows (new text in bold, deleted text in strikethrough):

“8.2. For the purpose of typification a specimen is a gathering², or part of a gathering, of a single species or infraspecific taxon **(but see Art. 9.14)**, disregarding admixtures (see Art. ~~8.n9-14~~).”

Prop. G (142 – Gravendyck & al. in Taxon 71: 705) Amend Art. 8.2 as follows (new text in bold, deleted text in strikethrough):

“8.2. For the purpose of typification a specimen is a gathering¹, or part of a gathering, of a single species or infraspecific taxon, disregarding admixtures (see Art. 9.14). It may consist of a single ~~organism, parts of one or several organisms, or of multiple small organisms~~

part, multiple parts, or the whole of one or more individual organisms. A specimen is usually mounted on a single herbarium sheet or in an equivalent preparation, such as a box, packet, jar, or microscope slide **(for fossil-taxa see Art. 8.n).**”

Prop. H (143 – Gravendyck & al. in Taxon 71: 706) Add a sentence to the footnote to Art. 8.2 (new text in bold):

[footnote to Art. 8.2] ^{“2} Here and elsewhere in this *Code*, the term “gathering” is used for a collection presumed to be of a single taxon made by the same collector(s) at the same time from a single locality. The possibility of a mixed gathering is always to be considered, especially when designating a type. **For most fossils, a collection of a sample of sediment or rock is not presumed to be of a single fossil-taxon, but is a set of gatherings, each gathering consisting of an individual of a fossil-taxon.**”

Prop. I (098 – Wisnev & Prado in Taxon 70: 1381) Amend the footnote of Art. 8.2 as follows (new text in bold, deleted text in strikethrough):

[footnote to Art. 8.2] ^{“2} Here and elsewhere in this *Code*, the term “gathering” is used for a collection presumed to be of a single taxon made by the same collector(s) at the same time from a single locality. ~~The~~ **If specimens lack information on collector, date, or locality, this does not necessarily preclude their being part of the same gathering, but the** possibility of a mixed gathering is always to be considered, especially when designating a type.”

Prop. J (163 – Mosyak & McNeill in Taxon 71: 1326) Amend Art. 8 Ex. 3 as follows (new text in bold, deleted text in strikethrough):

“Ex. 3. **The protologue of “*Echinocereus sanpedroensis*” (Raudonat & W. Rischer (in *Echinocereenfreund* 8(4): 88–97. 1995) ~~was based on a “holotype” consisting of~~ meets the requirements of Art. 38.1 for valid publication of the name, including indication of the type (Art. 40.1) as “Holotypus: Mexico, Edo Sonora, Rancho San Pedro, Ri. 263, cult. W. Rischer Mai 1995 (ZSS), AX 16502”. That the designated type specimen comprises a complete plant with roots, a detached branch, an entire flower, a flower cut in halves, and two fruits that, according to the label, were taken from the same cultivated individual at different times and preserved, in alcohol, in a single jar. ~~Because this material was collected at more than one time, it belongs to more than one gathering and cannot be accepted as a type. Raudonat & Rischer’s name is not validly published under Art. 40.2,~~ and must, therefore, represent more than one gathering, does not affect the status of the name, as there was no indication of more than one gathering in the protologue in which all the requirements for valid publication were fully met.”**

Prop. K (375 – Wisnev & Prado in Taxon 72: 1168) Amend Art. 8 Ex. 3 as follows (new text in bold, deleted text in strikethrough):

“Ex. 3. **The protologue of “*Echinocereus sanpedroensis*” (Raudonat & W. Rischer (in *Echinocereenfreund* 8(4): 88–97. 1995) states “Holotypus: Mexico, Edo Sonora, Rancho San Pedro, Ri. 263, cult. W. Rischer Mai 1995 (ZSS), AX 16502”. While the protologue contains no additional information as to the contents of this ~~was based on a “holotype”, it consisting~~ consists of a complete plant with roots, a detached branch, an entire flower, a flower cut in halves, and two fruits that, according to the label, were taken from the same cultivated individual at different times and preserved, in alcohol, in a single jar. Because this material was collected at more than one time, it belongs to more than one gathering and cannot be accepted as a type. Raudonat & Rischer’s name is not validly published under Art. 40.2, **even though there is nothing in the protologue indicating the holotype is more than one gathering.**”**

We also recommend that the Editorial Committee move this Example to Art. 40.

Prop. L (149 – Bhattacharjee & Bandyopadhyay in Taxon 71: 707) Add a new Example under Art. 8 Note 1 (which could be amended editorially to state “the same or different gatherings”):

“*Ex. n.* The specimens of “*Pantling 215*” in BM, BR, K, L, P, and W, collected from Sanchal, India in July 1892 by Robert Pantling, are types of *Goodyera hemsleyana* King & Pantl. (in J. Asiat. Soc. Bengal, Pt. 2, Nat. Hist. 64: 342. 1896) and belong to the same gathering. However, the specimens of “*Pantling 215*” in AMES and L, also collected from Sanchal by Pantling, belong to a different gathering of the same species made in July 1898 after publication of the name. The number 215 represents the species number rather than the collecting number of Pantling.”

Prop. M (099 – Wisnev & Prado in Taxon 70: 1382) Amend Art. 8.3 and its footnote as follows (new text in bold, deleted text in strikethrough):

“8.3. ~~A specimen may be mounted as more than one preparation, as long as the parts~~ **Multiple preparations that otherwise meet the requirements in Art. 8.2 do not qualify as a single specimen unless the preparations are (a) clearly labelled as being part of that same specimen, or (b) housed together (e.g. in a single folder) and either the housing or one of the preparations bears a single, original label in common applicable to all such preparations.** Multiple preparations from a single gathering that ~~are not clearly labelled as being part of a single specimen~~ **do not meet one of these conditions** are duplicates¹, irrespective of whether the source was one individual or more than one.”

[footnote to Art. 8.3] “¹ Here and elsewhere in this *Code*, the word “duplicate” is given its usual meaning in curatorial practice. **A Each duplicate is a separate specimen that** is part of a single gathering of a single species or infraspecific taxon.”

Prop. N (144 – Gravendyck & al. in Taxon 71: 706) Add a sentence to the footnote to Art. 8.3 (new text in bold):

[footnote to Art. 8.3] “¹ Here and elsewhere in this *Code*, the word “duplicate” is given its usual meaning in curatorial practice. A duplicate is part of a single gathering of a single species or infraspecific taxon. **For most fossils, a single gathering consists of an individual of a fossil-taxon, and hence there are no duplicates.**”

Prop. O (200 – Mosyakin & Tsybalyuk in Taxon 72: 445) Amend the footnote to Art. 8.3 as follows (new text in bold):

[footnote to Art. 8.3] “¹ Here and elsewhere in this *Code*, the word “duplicate” is given its usual meaning in curatorial practice. A duplicate is part of a single gathering of a single species or infraspecific taxon. **However, separately preserved samples or preparations of pollen, spores, and/or other microscopic or small parts taken from herbarium or other specimens of non-microscopic organisms for specific purposes (e.g. for DNA extraction, anatomical, micromorphological, or biochemical studies) are not considered duplicates.**”

Prop. P (100 – Wisnev & Prado in Taxon 70: 1382) Add a new Note after Art. 8.3:

“*Note n.* Multiple preparations do not constitute a single specimen merely by being labelled with the same collection information. Preparations of a single gathering housed at different herbaria or other collections or institutions are always considered separate specimens (duplicates) even if they are clearly labelled as being part of a single specimen (e.g. “part 1 of 2”, “part 2 of 2”).”

Prop. Q (145 – Gravendyck & al. in Taxon 71: 706) Add a new paragraph to Art. 8 with a Note and two Examples:

“8.n. For the purpose of typification of names of fossil-taxa, a specimen is an individual of a fossil-species or infraspecific fossil-taxon selected from a sample of sediment or rock or subsample or preparation thereof. A specimen is usually contained on or in a slab of rock, box, vial, or micropalaeontology slide, or mounted on a scanning electron microscope stub or microscope slide. Each specimen is treated as a separate gathering. A sample (or subsample or preparation thereof) may contain multiple individuals (i.e. specimens) of the same fossil-taxon as well as other fossil-taxa (see also Art. 40.n).”

“*Note n.* Macrofossils are often discovered by splitting rocks to reveal a fossil organ on both parts of the rock (or the entire fossil itself and a mould). These are usually referred to as “part” and “counterpart”; they are parts of the same specimen, not separate specimens, and often complementary to each other in their structural details. For the purpose of typification, both part and counterpart, where available, comprise the type specimen.”

“*Ex. n1.* The specimen designated as the holotype of the fossil spore *Striatella jurassica* Mädlér (in Fortschr. Geol. Rheinl. Westfalen 12: 192. 1964) was mounted on a microscope slide as a strewn mount together with other individuals of the same and other taxa. The material on the slide represents a subsample of the residue, which in turn is a subsample of a single rock sample from the Thuruau 1 core from the Lower Jurassic of Germany. The holotype is indicated by microscope coordinates (21:117.7) and a collection inventory number (TK 3154) on the slide as well as in the protologue. Additionally, four surrounding dots were added later to indicate the location of this specimen. This indication was translated into a more widely used England Finder reference (N19/4). Besides this holotype, the slide also contains the holotype of *Ephedripites tortuosus* Mädlér (l.c.: 194. 1964), TK3159. Other palynomorphs on the same slide conforming to the circumscription of *S. jurassica*, but not explicitly cited in the protologue, comprise other parts of the original material, i.e. they are independent uncited specimens (see photograph of this example in Gravendyck & al. in Palynology 45: 727, fig. 5Ab. 2021).”

“*Ex. n2.* The fossil-species *Diploptropis claibornensis* Herendeen & Dilcher (in Syst. Bot. 15: 527, fig. 1 and 2. 1990) was described based on a fossil that consists of part and counterpart. Both part and counterpart comprise the specimen that was designated as the holotype.”

Prop. R (304 – Wisnev & Prado in Taxon 72: 949) Add a new Article in Art. 8 as follows, incorporating and amending the definition of “admixture” from the Glossary:

“8.n. An admixture is automatically disregarded irrespective of Art. 9.14, and does not prevent the gathering, or part thereof, from being a specimen or type specimen (Art. 8.2). An admixture is a minor ingredient mixed into a specimen, used for components of a presumed gathering that represent a taxon or taxa other than that presumed by the collector.”

Rapporteurs’ comments – Prop. A suggests a new Note that would most likely fit better elsewhere in the *Code*, perhaps under Art. 10.1. However, is it desirable to introduce terms into the *Code* (including the Glossary, see Gloss. Prop. G) that are not used there?

Prop. B is part of a set of proposals (with Rec. 8A Prop. C and D and Art. 40 Prop. J) relating to the acceptance of DNA sequences as nomenclatural types that were published prior to and independently from those of the Special-purpose Committee on DNA Sequences as Types (see Chap. V Sect. 2 Prop. A), which should be consulted as alternatives. The latter set of proposals is much more comprehensive in terms of necessary amendments to provisions throughout the *Code*, some of which are not accounted for by the set including Prop. B. While there

are no restrictions on the organisms covered by this set of proposals, those of the Committee would effectively apply only to microalgae and microfungi, and while the types involved could only be based on nuclear DNA, no such restriction appears in the Committee's proposals.

Prop. C would expand the treatment of what constitutes a nomenclatural type for the name of a species or infraspecific taxon, which is currently mentioned only parenthetically and partially in Art. 8.1.

Prop. D is part of a set of proposals alternative to *Prop. B* providing for the future valid publication of names of microscopic algae or microfungi with DNA sequences as types (see Chap. V Sect. 2 *Prop. A*). *Prop. D* should be amended to delete “effectively published” from the added text. A DNA sequence serving as type does not need to be effectively published; neither do specimens and illustrations. Those who support the overall set of proposals but favour this amendment should vote “ed.c.” The Nomenclature Committee for Algae does not support *Prop. D* (votes 0 : 15 : 1).

Prop. E suggests an alternative wording to Art. 8.2, with no detectable change in its meaning. Those who find the proposed wording preferable should vote accordingly.

Prop. F is discussed further under *Prop. R*. However, the addition of “but see Art. 9.14” appears to suggest that a type specimen may consist of more than one species or infraspecific taxon, disregarding admixtures, but as Art. 9.14 indicates, such a preparation cannot serve as a type specimen.

Prop. G seeks to improve the wording of the second sentence of Art. 8.2 to better reflect reality, because some combinations (e.g. one part of one organism, multiple larger organisms) found on specimens are not covered by the current wording. The new Article it references, pertaining solely to specimens of fossil-taxa, is discussed in *Prop. Q*. The Nomenclature Committee for Fossils supports *Prop. G* (votes 12 : 0 : 0).

Prop. H would clarify the concept of a gathering, to better describe the situation as it pertains to fossils, which differs from that of non-fossils. The Nomenclature Committee for Fossils supports *Prop. H* (votes 12 : 0 : 0).

Prop. I would add to the definition of gathering in the footnote to Art. 8.2, emphasizing that not all parts of a gathering may be similarly labelled. No problems from this addition are foreseen.

Prop. J suggests corrections to Art. 8 Ex. 3, considering it to represent valid publication, and would be automatically referred to the Editorial Committee. The corrections are supported by a proposed new Note in Art. 38 (see Art. 38 *Prop. A*).

Prop. K makes the opposite interpretation to *Prop. J* on the status of Art. 8 Ex. 3, considering it not to represent valid publication, and would also be automatically referred to the Editorial Committee. It is supported by amendments to Art. 9 and 40 (see Art. 9 *Prop. K*).

Prop. L would add a new Example to show that an apparent collecting number does not necessarily denote the same gathering. It would be automatically referred to the Editorial Committee.

Prop. M would extensively reword Art. 8.3 and its footnote for various reasons explained in the text accompanying the proposal. Those who find the new wording to be an improvement should vote accordingly.

Prop. N is a necessary corollary to *Prop. H*, and would account for the concept of a duplicate not applying to fossils. The Nomenclature Committee for Fossils supports *Prop. N* (votes 12 : 0 : 0).

Prop. O would eliminate from consideration as duplicates certain parts extracted from herbarium specimens for specific purposes, but it would leave the status of some other potentially removed parts, such as plant fragments (e.g. “kleptotypes”) or seeds and other propagules (in seed herbaria), open to question. Those who support the

proposal with some amending to better account for these issues should vote “ed.c.”

Prop. P would add a new Note to account for a hypothetical case that appears to be counter-intuitive and of which no examples have been provided.

Prop. Q would add a new Article defining a specimen as it applies to fossil-taxa, together with a Note and two Examples. Specimens of fossil-taxa have important distinctions from those of non-fossils that are not adequately covered by Art. 8.2. These additions seek to better accommodate the needs of palaeobotanists. The Nomenclature Committee for Fossils supports *Prop. Q* (votes 12 : 0 : 0).

Prop. R would incorporate the definition of the term “admixture”, now in the Glossary, in a new Article. Whereas in the Glossary this is considered to be “especially a minor ingredient”, the new Article would definitively state that an admixture “is a minor ingredient”. While this difference in meaning from the Glossary version may have unforeseen implications for some groups, those who think this would make a useful addition should vote accordingly.

Recommendation 8A

Prop. A (104 – *Wisnev in Taxon 70: 1383*) Amend Rec. 8A.2 as follows (deleted text in strikethrough):

“8A.2. When an illustration is ~~designated as~~ the type of a name under Art. 40.5, the collection data of the illustrated material should be given (see also Rec. 38D.2).”

Prop. B (027 – *Gnanasekaran & Arisdason in Taxon 69: 1380*) Amend Rec. 8A.4 as follows (new text in bold, deleted text in strikethrough):

“8A.4. When a single specimen designated as **type holotype, lectotype, neotype, or epitype** is mounted as multiple preparations, this should be stated in the ~~protologue~~ **publication containing the type designation**, and the preparations appropriately labelled.”

Prop. C (095 – *Renner in Taxon 70: 1380*) Add a new Rec. 8A.5:

“8A.5. When the type (holotype, lectotype, or neotype) of a name of a species or infraspecific taxon is an assembled nuclear genome or informative parts thereof, the original or typifying author(s) should provide detailed information on the source of the material that gave rise to the genome and, in the case of a holotype, explain why at least one specimen cannot be preserved and why formal naming of the taxon is nevertheless needed.”

Prop. D (096 – *Renner in Taxon 70: 1381*) Add a new Rec. 8A.6:

“8A.6. When publishing the name of a new species or infraspecific taxon with an assembled nuclear genome or informative parts thereof as the type, authors should document potentially diagnostic characters of the taxon as completely as possible.”

Prop. E (006 – *Singh Deo & Majumdar in Taxon 69: 625*) Add a new paragraph to Rec. 8A:

“8A.n. For bryophytes (*Marchantiophyta*, *Bryophyta*, and *Anthocerotophyta*), dissected parts of the holotype specimen such as leaves, anatomical sections, and fertile parts including sex organs should be preserved permanently on labelled glass microscope slides and kept together with the holotype.”

Prop. F (028 – *Katagiri & Majumdar in Taxon 69: 1381*) Add a new paragraph to Rec. 8A:

“8A.n. The unauthorized division of a type specimen should be prevented to avoid a loss of the type specimen. Such action most likely complicates the work of future generations and the resulting reduced collections may give a misleading concept of the species. When found, such “kleptotype” specimens should not be destroyed

but preserved as duplicates. Formal notification of the existence and location of these specimens should also be published.”

Prop. G (146 – Gravendyck & al. in Taxon 71: 706) Add a new paragraph to Rec. 8A:

“8A.n1. If a specimen is prepared on a microscope slide, it is strongly recommended that its location be indicated by means of England Finder reference (Graticules Ltd. in J. Sci. Instrum. 39: 250. 1962; Riding in Palynology 45(S1): 92–93. 2021) or equivalent unambiguous reference (e.g. single-grain mounts or permanent ink circling; see Art. 8 Ex. n1).”

Prop. H (147 – Gravendyck & al. in Taxon 71: 706) Add a new paragraph to Rec. 8A:

“8A.n2. In the case of palaeopalynology, it is recommended that at least a subsample of rock or sediment or residue from which the type was selected be deposited in the public collection along with the type, thereby permitting future preparations that could interpret or replace degraded type material.”

Prop. I (150 – Bokil in Taxon 71: 707) Add a new paragraph to Rec. 8A:

“8A.n. Authors describing new taxa for which distinguishing characters are not clearly visible to the naked eye should provide accurate drawings or microphotographs of those characters or paste dissected parts onto the type specimens.”

Rapporteurs’ comments – *Prop. A* would make a useful correction to Rec. 8A.2.

Prop. B would extend the application of Rec. 8A.4 from holotypes to later-designated types, which seems logical.

Prop. C and *D* are part of a set of proposals (with Art. 8 Prop. B and Art. 40 Prop. J) relating to the acceptance of DNA sequences as nomenclatural types. Their acceptance is dependent on the outcome of this set of proposals or the alternatives of the Special-purpose Committee on DNA Sequences as Types (see Chap. V Sect. 2 Prop. A). See comments under Art. 8 Prop. B.

Prop. E would create a recommendation on the curation of bryophyte specimens. The Nomenclature Committee for Bryophytes comments that (1) keeping microscope slides physically together with a specimen is bad practice: it is bad for the microscope slide as well as for the specimen; (2) microscope slides only last a few years, and the tissues start to deteriorate immediately, so making “permanent” slides does nothing for preserving the specimen; and (3) even if the proposal was more practical, it might be better suited to herbarium procedures or loan agreements than to a nomenclatural *Code*. The Committee for Bryophytes does not support Prop. E (votes 2 : 9 : 4).

Prop. F would add a new Recommendation. Those who feel this to represent sound advice that should be included in the *Code* should vote accordingly.

Prop. G and *H* provide new Recommendations on the curation of specimens of fossil-taxa. These additions support the needs of palaeobotanists. The Nomenclature Committee for Fossils supports Prop. G (votes 12 : 0 : 0) and Prop. H (votes 12 : 0 : 0).

Prop. I attempts to promote better preparation and depiction of type specimens so as to reduce the need for future destructive handling of such specimens. While the aims of this proposal may be worthwhile, the wording needs some editorial adjustment to make it clear that the phrase “drawings or microphotographs of those characters” pertains to the type specimens.

Article 9

Prop. A (007 – Turland & al. in Taxon 69: 627) Amend Art. 9.1 as follows (new text in bold, deleted text in strikethrough):

“9.1. A holotype of a name of a species or infraspecific taxon is the one specimen or illustration (but see Art. 40.4) either (a) ~~indicated~~ **designated by the author(s) in the protologue** as the nomenclatural type or (b) used by the author(s) **in preparing the protologue** when no type was ~~indicated~~ **designated**. As long as the holotype is extant, it fixes the application of the name concerned (but see Art. 9.15).”

Prop. B (029 – Bhattacharjee & al. in Taxon 69: 1382) Add a new Example after Art. 9.1:

“Ex. n. In the protologue of *Calycanthus praecox* L. (Sp. Pl., ed. 2: 718. 1762), Linnaeus did not designate a type and cited only one element, an illustration by Kaempfer (Amoen. Exot. Fasc.: 879. 1712); he also stated that the plant was unknown to him (“Ignota mihi”). This is evidence establishing that Linnaeus, when preparing the protologue, used only Kaempfer’s illustration, which must therefore be accepted as the holotype.”

Prop. C (330 – Thiele & al. in Taxon 72: 1144) Amend Art. 9.1 as follows (new text in bold, deleted text in strikethrough):

“9.1. A holotype of a name of a species or infraspecific taxon is the one specimen, ~~or~~ illustration (but see Art. 40.4), **or DNA sequence (see Art. X.1)** either (a) indicated by the author(s) as the nomenclatural type or (b) used by the author(s) when no type was indicated. As long as the holotype is extant, it fixes the application of the name concerned (but see Art. 9.15).”

Prop. D (366 – Wisnev in Taxon 72: 1157) Amend Art. 9.1 as follows (new text in bold):

“9.1. A holotype of a name of a species or infraspecific taxon is the one specimen or illustration (but see Art. 40.4) either (a) indicated by the author(s) as the nomenclatural type or (b) used by the author(s) when no type was indicated. **A single specimen or illustration cited in the protologue of a name of a new taxon published on or after 1 January 1958 and before 1 January 1990 is the holotype.** As long as the holotype is extant, it fixes the application of the name concerned (but see Art. 9.15).”

Prop. E (367 – Wisnev in Taxon 72: 1157) If Prop. 366 [Art. 9 Prop. D] is rejected, amend Art. 9.1 as follows (new text in bold):

“9.1. A holotype of a name of a species or infraspecific taxon is the one specimen or illustration (but see Art. 40.4) either (a) indicated by the author(s) as the nomenclatural type or (b) used by the author(s) when no type was indicated. **Except as provided in Art. 9.1(b), a single specimen or illustration cited in the protologue, without the use of the word “type” or “holotype” or one of their equivalents, is not the holotype.** As long as the holotype is extant, it fixes the application of the name concerned (but see Art. 9.15).”

Prop. F (008 – Turland & al. in Taxon 69: 627) Convert Art. 9 Note 1 to an Article and amend it as follows (new text in bold, deleted text in strikethrough):

“9.1bis. Any designation of the type made by the original author(s), if definitely expressed ~~at the time of the original publication of the name of the taxon~~ **in the protologue**, is final (but see Art. 9.11, 9.15, and 9.16). **Mention of a single specimen or gathering or illustration does not by itself constitute designation of the holotype (but see Art. 40.3 for names published on or after 1 January 1958). However, if there is evidence in the protologue or elsewhere to establish that only one (either cited or uncited) specimen or illustration was used (Art. 9.1(b)) and no additional, uncited specimens or illustrations (which may have been lost or destroyed) could have been used, that specimen or illustration must be accepted as the holotype.** ~~If the author used only one specimen or illustration, either cited or uncited, when preparing the account of the new taxon, it must be accepted as the holotype, but the possibility that the~~

author used additional, uncited specimens or illustrations (which may have been lost or destroyed) must always be considered. If a name of a new taxon is validly published solely by reference to a previously published description or diagnosis, the same considerations apply to specimens or illustrations used by the author(s) of that description or diagnosis (see Art. 7.8; but see Art. 7.9)."

Editorially amend Art. 9 Ex. 1 and 2 as follows (changes not shown) and add a new Example:

"Ex. 1. When Tuckerman published *Opegrapha oulocheila* Tuck. (Lich. Calif.: 32. 1866) he referred to "the single specimen, from Schweinitz's herbarium (Herb. Acad. Sci. Philad.) before me". Even though the term "type" or its equivalent was not used in the protologue, Tuckerman's statement is evidence to establish that he used only that specimen (in PH barcode 00007529), which is therefore the holotype."

"Ex. 2. In the protologue of *Coronilla argentea* L. (Sp. Pl.: 743. 1753), Linnaeus cited an illustration by Alpini (Pl. Exot.: 16. 1627) and did not designate a type. Although no uncited specimens or illustrations are known to exist, making Alpini's illustration the only extant element of original material, it is not the holotype because it cannot be established that Linnaeus used only this one element when preparing the protologue; he rarely cited specimens and could have used a specimen that was subsequently lost or destroyed (he is known to have discarded specimens). Moreover, the mention of the illustration does not by itself constitute designation of the holotype. Alpini's illustration was designated as the lectotype of *C. argentea* by Greuter (in Ann. Mus. Goulandris 1: 44. 1973)."

"Ex. 2bis. In the protologue of *Stellaria radians* L. (Sp. Pl.: 422. 1753), Linnaeus cited no specimens, but he did cite a single illustration ("Amm. ruth. 83. t. 10.") referring to species number 83 on page 64 and "Tab. X" in Amman (Stirp. Rar. Ruth. 1739). The Amman illustration is not the holotype because, as was commonly the case, Linnaeus also used at least one uncited specimen in preparing the protologue: *Gmelin s.n.*, Herb. Linn. No. 584.3 (LINN), which was designated by Lazkov (in Taxon 53: 1053. 2004) as the lectotype."

Prop. G (363 – Wisnev in Taxon 72: 1156) Amend the second sentence of Art. 9 Note 1 as follows (deleted text in strikethrough):

"Note 1. [...] If the author used only one specimen or illustration, either cited or uncited, when preparing the account of the new taxon, it must be accepted as the holotype, but the possibility that the author used additional, uncited specimens or illustrations (which may have been lost or destroyed) must always be considered. [...]"

In addition, if Prop. 008 [Prop. F] is accepted, delete "(which may have been lost or destroyed)" in the new Art. 9.1bis.

Prop. H (102 – Wisnev in Taxon 70: 1383) Amend Art. 9.2 as follows (new text in bold, deleted text in strikethrough):

"9.2. If a designation an indication of holotype under Art. 9.1 or type under Art. 40 made in the protologue of the name of a taxon is later found to contain errors (e.g. in locality, date, collector, collecting number, herbarium code, specimen identifier, or citation of an illustration), these errors are to be corrected provided that the intent of the original author(s) is not changed (and these errors do not prevent valid publication of the name under Art. 40). However, omissions of required information under Art. 40.6–40.8 are not correctable."

If Prop. 007 [Prop. A] is adopted, "indication" should not replace "designation" and "indication of" should be inserted before "type under Art. 40".

Prop. I (103 – Wisnev in Taxon 70: 1383) Move Art. 9.2 to the end of Art. 9 and amend it as follows (new text in bold, deleted text in strikethrough):

"9.n. If a designation an indication of holotype, designation of lectotype, neotype, or epitype, or other citation of an isotype, synonym, or paratype made in the protologue of the name of a taxon is later found to contain errors (e.g. in locality, date, collector, collecting number, herbarium code, specimen identifier, or citation of an illustration), these errors are to be corrected provided that the intent of the original author(s) (or designating or citing author(s), if applicable) is not changed. However, omissions of required information under Art. 40.6–40.8 (in the case of a holotype) or Art. 7.11 and 9.21–9.23 (in the case of a lectotype, neotype, or epitype) are not correctable."

Prop. J (165 – Lin & Sun in Taxon 71: 1326) Move Art. 9.2 to after Art. 9.23 and amend it as follows (new text in bold, deleted text in strikethrough) and add new Examples:

"9.n. If a designation of holotype, lectotype, neotype, or epitype made in the protologue publication containing the type designation of the name of a taxon is later found to contain errors (e.g. in locality, date, collector, collecting number, herbarium code herbarium or collection or institution or its abbreviation, specimen identifier, or citation of an illustration), these errors are to be corrected provided that the intent of the original author(s) is not changed (see also Art. F.5.8). However, omissions of required information under Art. 7.11, 9.21–9.23, 40.6–40.8, and F.5.4 are not correctable."

"Ex. n1. The name *Cremanthodium campanulatum* var. *flavidum* S. W. Liu & T. N. Ho (in Acta Phytotax. Sin. 39: 558. 2001) was validly published with the holotype designated as "Rock 17919 (holotype, here designated, GH)", but no specimen with this collecting number exists in GH. However, a specimen of *J. F. Rock 17919* with the author's written label exists in A and matches all other details in the protologue. Therefore, the erroneous herbarium in the designation of holotype is to be corrected."

"Ex. n2. The name *Capparis trichocarpa* B. S. Sun (in Acta Phytotax. Sin. 9: 113. 1964) was validly published with a gathering "C. W. Wang 73796" in PE designated as the type, but in the herbarium PE there are two duplicates of this gathering. Li & al. (in Bull. Bot. Res., Harbin 28: 265. 2008) designated one of these specimens as the lectotype: "China. Yunnan: Fo-hai (= Menghai), alt. 1520 m, March 1936, C. W. Wang 73796 (lectotype, PE Herb. Bar Code No. 00029137, designated here, PE!; islectotype, PE!)". However, the collection date on the label of the lectotype specimen is May 1936. Therefore, the erroneous date in the designation of lectotype is to be corrected."

"Ex. n3. The name *Camellia drupifera* Lour. (Fl. Cochinch.: 411. 1790) lacks original material. Ming & Bartholomew (in Wu & al., Fl. China 12: 411. 2007) designated a single specimen as the neotype: "China. Guangxi: Liucheng Xian, Satang Forest Station in cultivation, Jul 1956, Huang Tso-Chieh [Huang Zuo-Jie] 2042 (neotype designated here, PE) based on the holotype of *C. vietnamensis* T. C. Huang ex Hu (Acta Phytotax. Sin. 10: 138. 1965)". However, no specimen with this collecting number exists in PE. A specimen collected by Huang Zuo-Jie with the collecting number 2043, annotated with "*Camellia vietnamensis* Hu et Huang" and "type" by Hu on 26 April 1963, was found in PE and matches all other details in the type designation. Therefore, the erroneous collecting number in the designation of neotype is to be corrected."

Prop. K (376 – Wisnev & Prado in Taxon 72: 1169) Amend Art. 9.2 as follows (new text in bold, deleted text in strikethrough) and add a new Article in Art. 40:

"9.2. If a designation of holotype (or indication of type under Art. 40) made in the protologue of the name of a taxon is later found

to contain errors (e.g. in locality, date, collector, collecting number, herbarium code, specimen identifier, or **incorrect** citation of an illustration), these errors are to be corrected provided that the intent of the original author(s) is not changed. ~~However, omissions of required information under Art. 40.6–40.8 are not correctable.~~

“40.n. Except as expressly provided in this *Code* (e.g. Art. 9.14), a name of a new taxon is not validly published if external evidence reveals that the internal evidence in the protologue failed to meet the requirements for valid publication (i.e. Art. 32–45, F.4, F.5, and H.9). For example, even if not apparent from the protologue, a name of a new taxon is not validly published if the indicated type consists of more than one gathering, or for names published on or after 1 January 2007, is an illustration (except as permitted by Art. 41.5), or if the purported validating description or diagnosis in a referenced earlier publication is inadequate under Art. 38. In contrast, errors in the indication of the type described in Art. 9.2 do not prevent the valid publication of the name of a new taxon. However, omissions of the required information to validly publish a name (e.g. Art. 40.6–40.8) are not correctable.”

Prop. L (030 – Wisnev in Taxon 69: 1383) Amend Art. 9.3 as follows (new text in bold, deleted text in strikethrough):

“9.3. (a) A lectotype is one specimen or illustration designated from the original material (Art. 9.4) as the nomenclatural type, in conformity with Art. ~~9.11 and 9.12~~ **9.3(b)**, if **one or more of the following conditions is met: (1) the name was published without a holotype; or (2) the holotype or previously designated lectotype is lost or destroyed; or (3) a type is found to belong to more than one taxon (see also Art. 9.14); or (4) the requirements of Art. 9.17 or Art. 9.19 permitting designation of a lectotype are met.** For sanctioned names (Art. F.3), a lectotype may be ~~selected designated~~ from among elements associated with either or both the protologue and the sanctioning treatment (Art. F.3.9).

(b) If the requirements in Art. 9.3(a) are met, a lectotype (or, if permissible under Art. 9.8, a neotype as a substitute for it) may be designated. Designation is effective only if it is made in an effective publication (Art. 29–31) and conforms with the requirements of Art. 7.11, 9.12, and, if applicable, 9.22, 9.23, and F.5.4.”

In addition, delete Art. 9.11; at the end of Art. 9.14 and 9.19 and after “lectotypification” in Art. 9.17 add “(see Art. 9.3(b))”.

Prop. M (009 – Gravendyck & al. in Taxon 69: 628) Amend Art. 9.4(a) and (b) (new text in bold):

“9.4. For the purposes of this *Code*, original material comprises the following elements: (a) those specimens and illustrations (both unpublished and published prior to publication of the protologue; **illustrations of fossils excepted: see Art. 8.5**) that the author associated with the taxon, and that were available to the author prior to, or at the time of, preparation of the description, diagnosis, or illustration with analysis (Art. 38.7 and 38.8) validating the name; (b) any illustrations published as part of the protologue (**fossils excepted: see Art. 8.5**); ...”

Prop. N (201 – Wisnev in Taxon 72: 445) Amend Art. 9.4 as follows (new text in bold):

“9.4. For the purposes of this *Code*, original material comprises the following elements: (a) those **uncited** specimens and **uncited** illustrations (both unpublished and published prior to publication of the protologue) that the author associated with the taxon, and that were available to the author prior to, or at the time of, preparation of the description, diagnosis, or illustration with analysis (Art. 38.7 and 38.8) validating the name; (b) any illustrations published as part of, **or cited in**, the protologue; (c) the holotype and those specimens

which, even if not seen by the author of the description or diagnosis validating the name, were indicated as types (syntypes or paratypes) of the name at its valid publication; and (d) the isotypes or isosyntypes¹ of the name irrespective of whether such specimens were seen by either the author of the validating description or diagnosis or the author of the name (but see Art. 7.8, 7.9, and F.3.9).”

Prop. O (202 – Wisnev in Taxon 72: 446) Reorder and reword Art. 9.4 as follows and add a new Note:

“9.4. Original material comprises the following elements: (a) the holotype and its isotypes; (b) other specimens cited in the protologue of the name (i.e. syntypes and paratypes) and isosyntypes¹; (c) any illustrations published as part of the protologue; and (d) those specimens and illustrations (both unpublished and published prior to publication of the protologue) that the author associated with the taxon, and that were available to the author prior to, or at the time of, preparation of the description, diagnosis, or illustration with analysis (Art. 38.7 and 38.8) validating the name (but see Art. 7.8, 7.9, and F.3.9).”

“*Note n.* Original material under Art. 9.4(a) or (b) need not be seen by either the author of the validating description or diagnosis or the author of the name.”

Prop. P (255 – Wiersema & al. in Taxon 72: 683) Amend Art. 9.4 as follows (new text in bold, deleted text in strikethrough):

“9.4. For the purposes of this *Code*, original material comprises the following elements: (a) those specimens and illustrations (both unpublished and published ~~prior to publication of the protologue~~) that ~~the author were~~ associated with the taxon **by**, and that were available to, **(1) the publishing author(s) prior to, or at the time of, publication of the protologue or (2) other author(s) to whom the description or diagnosis may have been ascribed (or unequivocally associated) prior to, or at the time of, preparation of the description, diagnosis, or illustration with analysis (Art. 38.7 and 38.8) validating the name; (b) any illustrations published as part of the protologue; (c) the holotype and those specimens which even if not seen by the author of the description or diagnosis validating the name, were indicated as types (syntypes or paratypes) of the name at its valid publication; and (d) the isotypes or isosyntypes of the name irrespective of whether such specimens were seen by either the author of the validating description or diagnosis or the author of the name (but see Art. 7.8, 7.9, and F.3.9).”**

Prop. Q (256 – Wiersema & al. in Taxon 72: 683) Add the following new Note after Art. 9.4:

“*Note n.* Under Art. 46, the author(s) of a name are either the publishing author(s) (or at least one of them) or the person(s) to whom the name is ascribed (or unequivocally associated). A specimen or illustration need not be seen by either the publishing author(s) or the person(s) to whom the description or diagnosis is ascribed (or unequivocally associated) in order to be original material under Art. 9.4(c) or 9.4(d).”

Prop. R (361 – Wisnev in Taxon 72: 1155) Add the following sentence at the end of Art. 9.4:

“9.4. [...]. If an author cites an element with an expression of doubt (e.g. the citation of a specimen or illustration with a question mark), the element may be treated as a syntype (if it is a specimen), an element under Art 9.4(a) (if it is an illustration) or not as original material. Decision on the status of such an element is to be effected by means of the appropriate type designation.”

Prop. S (352 – Wisnev & Prado in Taxon 72: 1151) Delete Art. 7.8 and convert Art. 9 Note 3 into an Article as follows (new text in bold, deleted text in strikethrough):

~~“7.8. A name of a new taxon validly published solely by reference to a previously and effectively published description or diagnosis (Art. 38.1(a)) (and not by a reproduction of such a description or diagnosis) is to be typified by an element selected from the entire context of the validating description or diagnosis, unless the validating author has definitely designated a different type, but not by an element explicitly excluded by the validating author (see also Art. 7.9).”~~

“Note 3. 9.n. For names falling under Art. 7.8 a name of a new taxon validly published solely by reference to a previously and effectively published description or diagnosis (Art. 38.1(a)) (and not by a reproduction of such a description or diagnosis), only elements from the entire context of the validating description or diagnosis are considered as original material (but not including elements explicitly excluded by the validating author), unless the validating author has definitely designated a different type.”

Prop. T (353 – Wisnev & Prado in Taxon 72: 1151) Amend Art. 9 Note 3 as follows (new text in bold, deleted text in strikethrough):

~~“Note 3. For names falling under Art. 7.8, only elements from the original material is determined under Art. 9.4 as if the author context of the validating description or diagnosis are considered as original material had validly published the name by publishing the description or diagnosis, unless the validating author has definitely designated a different type.”~~

Prop. U (355 – Wisnev & Prado in Taxon 72: 1152) Amend Art. 9 Note 3 as follows (new text in bold, deleted text in strikethrough):

“Note 3. For names falling under Art. 7.8, only elements from the context of the validating description are considered as original material. However, if unless the validating author has definitely designated a different element as the type in the protologue (indication or usage by the validating author is insufficient to establish a type), the original material is determined in accordance with Art. 9.4 without regard to the previous sentence.”

Prop. V (356 – Wisnev & Prado in Taxon 72: 1152) Replace “validating” with “publishing” in Art. 9 Note 3 as follows (new text in bold, deleted text in strikethrough):

“Note 3. For names falling under Art. 7.8, only elements from the context of the validating description are considered as original material, unless the validating publishing author has definitely designated a different type.”

If all of the foregoing proposals [Prop. 352, 353, 355 and 356 (Prop. S–V) and Prop. 354 (Rec. 9A Prop. D)] are accepted, Art. 7.8 and Art. 9 Note 3 will be deleted, and a new Article in Art. 9 would read as follows:

“9.n. For a name of a new taxon validly published solely by reference to a previously and effectively published description or diagnosis (Art. 38.1(a)) (and not by a reproduction of such a description or diagnosis), original material is determined under Art. 9.4 as if the author of the validating description or diagnosis had validly published the name by publishing the description or diagnosis (but not including elements explicitly excluded by the publishing author). However, if the publishing author has designated a different element as the type in the protologue (indication or usage by the validating author is insufficient to establish a type), the original material is determined in accordance with Art. 9.4 without regard to the previous sentence.”

Prop. W (010 – Prado & al. in Taxon 69: 629) Add a new Note and a new Example after Art. 9.6:

“Note 4bis. Specimens not cited in the protologue that are original material according to Art. 9.4(a) are not syntypes.”

“Ex. n. Lavalley (in Darwiniana 41: 68. 2003) cited “SINTIPOS” (syntypes) of the name Marattia cicutifolia Kaulf. (Enum. Filic.: 32. 1824). However, they cannot be syntypes because they were not cited in the protologue of that name, where Kaulfuss cited only the locality “Habitat in Brasilia”. Instead, they are original material because they satisfy the definition of that term as given in Art. 9.4(a).”

Prop. X (034 – Bhattacharjee & al. in Taxon 69: 1384) Amend Art. 9.6 as follows (new text in bold):

“9.6. A syntype is any specimen cited in the protologue when there is no holotype, or any one of two or more specimens simultaneously designated in the protologue as types (see also Art. 40 Note 1). Reference to an entire gathering, or a part thereof (see also Art. 40 Note 2), is considered citation of the included specimens.”

Prop. Y (035 – Bhattacharjee & al. in Taxon 69: 1384) Add a new first sentence to Art. 9 Ex. 6 (new text in bold, deleted text in strikethrough):

“Ex. 6. In the protologue of Campanula pulla L. (Sp. Pl.: 163. 1753), Linnaeus cited “Burs. IV. 21”, referring to a specimen in the Burser Herbarium (UPS), in addition to an illustration in Bauhin (Prodr.: 35. 1620). This single specimen is a syntype because it was cited in the protologue and there is no holotype. In Similarly, in the protologue of Anemone alpina L. (Sp. Pl.: 539. 1753), two specimens are cited under the (unnamed) varieties β and γ, as “Burs. IX: 80” and “Burs. IX: 81”. These specimens, held in the Burser Herbarium (UPS), are syntypes of A. alpina.”

Prop. Z (105 – Wisnev in Taxon 70: 1383) Amend Art. 9.6 as follows (new text in bold, deleted text in strikethrough):

“9.6. A syntype is any specimen cited in the protologue when there is no holotype, or any one of two or more specimens simultaneously designated indicated in the protologue as types (see also Art. 40 Note 1). Reference to an entire gathering, or a part thereof, is considered citation of the included specimens.”

Conforming changes are needed in Art. 9.7, the Examples and Note under Art. 9.6 and 9.7, and Rec. 9A.1.

Prop. AA (011 – Hassemer & al. in Taxon 69: 630) Add the following text to Art. 9.8 (new text in bold):

“9.8. A neotype is a specimen or illustration selected to serve as nomenclatural type if no original material exists, or as long as it is missing (see also Art. 9.16 and 9.19(c)). A neotype designated on or after 1 January 2025 must be a specimen, except for names of non-fossil microscopic algae and non-fossil microfungi, for which the type may be an effectively published illustration if there are technical difficulties of specimen preservation or if it is impossible to preserve a specimen that would show the features attributed to the taxon by the author of the name.”

Prop. BB (031 – Wisnev in Taxon 69: 1383) Amend Art. 9.8 as follows:

“9.8. (a) A neotype is one specimen or illustration designated to serve as the nomenclatural type, in conformity with Art. 9.8(b), if one or more of the following conditions is met: (1) no original material exists, or as long as it is missing; (2) the holotype or previously designated lectotype has been lost or destroyed and it can be shown that all the other original material differs taxonomically from the lost or destroyed type; in this case, a neotype may be designated only to preserve the usage established by the previous typification (see also Art. 9.18); or (3) the requirements of Art. 9.17 (see also Art. 9.14) or Art. 9.19 permitting designation of a neotype are met.

(b) If the requirements in Art. 9.8(a) are met, a neotype may be designated. Designation is effective only if it is made in an effective publication (Art. 29–31) and conforms with the requirements of Art.

7.11 and, if applicable, 9.22, 9.23, and F.5.4. A lectotype always takes precedence over a neotype, except as provided by Art. 9.8(a) (2) and 9.19(c)."

In addition, delete Art. 9.13 and 9.16; at the end of Art. 9.14 and 9.19 and after "neotypification" in Art. 9.17 add "(see Art. 9.8(b))"; and in Art. 9.18 make conforming changes, i.e. change "selected" to "designated".

Prop. CC (036 – Wisnev in Taxon 69: 1385) Amend Art. 9.8 as follows (new text in bold, deleted text in strikethrough):

"9.8. A neotype is a specimen or illustration ~~selected~~ **designated** to serve as nomenclatural type if **(a) the name was published without any original material existing, or as long as if the original material is missing lost or destroyed, (b) the previously designated neotype is lost or destroyed, (c) the previously designated neotype is found to belong to more than one taxon (see also Art. 9.14), or (d) the conditions in (see also Art. 9.16 or and 9.19(c) are met).**"

Conforming amendments to other Articles: amend Art. 9.13 to use the wording of clause (a) as proposed here; in Art. 9.13, 9.16, and 9.18, replace "selected" with "designated".

Prop. DD (032 – Wisnev in Taxon 69: 1383) Amend Art. 9.9 as follows:

"9.9. (a) An epitype is one specimen or illustration designated to serve as an interpretative type, in conformity with Art. 9.9(b), if either (1) the holotype, lectotype, or previously designated neotype, or all original material associated with a validly published name, is demonstrably ambiguous and cannot be critically identified for purposes of the precise application of the name to a taxon or (2) the requirements of Art. 9.17 (see also Art. 9.14) or Art. 9.9(c) permitting designation of an epitype are met.

(b) If the requirements in Art. 9.9(a) are met, an epitype may be designated. Designation is effective only if it is made in an effective publication (Art. 29–31) and meets all of the following conditions: (1) the holotype, lectotype, or neotype that the epitype supports is explicitly cited; (2) the designation conforms with the requirements of Art. 7.11 and, if applicable, 9.23 and F.5.4; and (3) the herbarium, collection, or institution in which the epitype is conserved is specified or, if the epitype is a published illustration, a full and direct bibliographic reference (Art. 41.5) to it is provided.

(c) The author who first designates an epitype must be followed; a different epitype may be designated only if the original epitype is lost or destroyed (see also Art. 9.17). A lectotype or neotype supported by an epitype may be superseded in accordance with Art. 9.19 or, in the case of a neotype, in accordance with Art. 9.18. If it can be shown that an epitype and the type it supports differ taxonomically and that neither Art. 9.18 nor 9.19 applies, the name may be proposed for conservation with a conserved type (Art. 14.9; see also Art. 57)."

In addition, delete Art. 9.20 and 9.21; at the end of Art. 9.14 and after "epitypification" in Art. 9.17 add "(see Art. 9.9(b))".

Prop. EE (037 – Wisnev in Taxon 69: 1385) Amend Art. 9.9 as follows (new text in bold, deleted text in strikethrough):

"9.9. An epitype is a specimen or illustration ~~selected~~ **designated** to serve as an interpretative type ~~when if~~ **(a) the holotype, lectotype, or previously designated neotype, or all original material associated with a validly published name, is demonstrably ambiguous and cannot be critically identified for purposes of the precise application of the name to a taxon, (b) the previously designated epitype is lost or destroyed, or (c) the previously designated epitype is found to belong to more than one taxon (see also Art. 9.14).** Designation of an epitype is not effected unless the holotype,

lectotype, or neotype that the epitype supports is explicitly cited (see Art. 9.20)."

Prop. FF (107 – Lirio & al. in Taxon 70: 1384) Insert a new Example following Art. 9.9

"*Ex. 9bis.* Martínez-Laborde & al. (in Phytotaxa 220: 96. 2015) designated a specimen with pistillate flowers (*Balansa* 2342, P00080325) as the lectotype of *Hennecartia omphalandra* J. Poiss. (in Bull. Soc. Bot. France 32: 41. 1885). Although fruits and staminate flowers are important diagnostic characters for this species, the vegetative organs and pistillate flowers in the lectotype are also clearly diagnostic. Therefore, according to Art. 9.9, an epitype is not necessary because the type can be critically identified in order to precisely apply the name to a taxon."

Prop. GG (108 – Steudel in Taxon 70: 1385) Add a sentence to Art. 9.9 (new text in bold):

"9.9. An epitype is a specimen or illustration selected to serve as an interpretative type when the holotype, lectotype, or previously designated neotype, or all original material associated with a validly published name, is demonstrably ambiguous and cannot be critically identified for purposes of the precise application of the name to a taxon. **More than one epitype may be designated if the identification of a taxon needs two or more characters that cannot be shown in a single specimen.** Designation of an epitype is not effected unless the holotype, lectotype, or neotype that the epitype supports is explicitly cited (see Art. 9.20)."

Prop. HH (331 – Thiele & al. in Taxon 72: 1144) Amend Art. 9.9 as follows (new text in bold, deleted text in strikethrough):

"9.9. An epitype is a specimen, ~~or~~ **illustration, or (solely for names with a DNA sequence as a holotype) a DNA sequence.** An epitype is selected to serve as an interpretative type when the holotype, lectotype, or previously designated neotype, or all original material associated with a validly published name, is demonstrably ambiguous and cannot be critically identified for purposes of the precise application of the name to a taxon. Designation of an epitype is not effected unless the holotype, lectotype, or neotype that the epitype supports is explicitly cited (see Art. 9.20)."

Prop. II (151 – Prado & al. in Taxon 71: 708) Add a new Article with a new Example after Art. 9.9 and a new entry to the Glossary:

"9.9bis. A **typotype** is a specimen from which a type illustration was prepared. It need not be part of the original material as defined by Art. 9.4, and it may be selected as an epitype (Art. 9.9) to support the type illustration."

"*Ex. n.* In the protologue of *Aristolochia arborescens* L. (Sp. Pl.: 960. 1753), Linnaeus cited a single illustration, "*Aristolochia polyrrhizos, auriculatis foliis, Virginiana*" (in Plukenet, Phytographia: t. 78, fig. 1. 1691), which is original material and was selected as the lectotype by Reveal & Jarvis (in Taxon 58: 978. 2009). The illustration was drawn from a specimen housed in the Sloane Herbarium in BM (Herb. Sloane 95: 105). The specimen is a **typotype** because it was used to prepare the illustration, but it is not part of the original material because it was not available to Linnaeus."

In the Glossary:

"**typotype.** A specimen from which a type illustration was prepared. It need not be part of the original material as defined by Art. 9.4, and it may be selected to serve as an epitype (Art. 9.9) to support the type illustration."

Prop. JJ (365 – Wisnev in Taxon 72: 1157) Amend Art. 9.10 and Art. 9 Note 6 as follows (new text in bold, deleted text in strikethrough):

"9.10. The use of a term defined in the *Code* (Art. 9.1, 9.3 and 9.5–9.9) as denoting a type, in a sense other than that in which it is

so defined, is treated as an error to be corrected (for example, the use of the term lectotype to denote what is in fact a neotype). **The use of the term holotype on or after 1 January 2001 to denote a lectotype for a single specimen cited in a protologue of a name of a new taxon published prior to 1 January 1958 is to be corrected, notwithstanding the requirement of Art. 7.11 to include the phrase “designated here”.**

“Note 6. **Except as noted in Art. 9.10, a** ~~A~~ **misused term may be corrected only if the requirements of Art. 7.11 (for correction to lectotype, neotype, and epitype) are met and Art. 40.6 (for correction to holotype) does not apply.**”

In addition, add “(but see Art. 9.10)” at the end of Art. 7.11.

Prop. KK (070 – Jocu in *Taxon* 70: 453) Add a new Example after Art. 9 Note 6:

“*Ex. n.* Bohley & al. (in *Syst. Bot.* 42: 138. 2017) cited the specimen *Balansa* 2263 (G) as the “type” and “holotype” of *Cypselea meiziana* K. Müll. (in *Bot. Jahrb. Syst.* 42(Beibl. 97): 72. 1908). However, this use of the term holotype cannot be corrected to lectotype because the requirement of Art. 7.11 to include, on or after 1 January 2001, the phrase “designated here” or an equivalent was not met. As a consequence, designation of a lectotype was not achieved until Jocu & Minué (in *Phytotaxa* 461: 69. 2020) wrote “Lectotype (designated here)” selecting a specimen from the same *Balansa* gathering in P.”

Prop. LL (012 – Bhattacharjee & al. in *Taxon* 69: 630) Modify Art. 9.12 as follows (new text in bold, deleted text in strikethrough):

“9.12. In lectotype designation, an isotype must be chosen if such exists, or otherwise a syntype or isosyntype if such exists. If no isotype, syntype or isosyntype is extant, the lectotype must be chosen from among the paratypes if such exist. If none of the above specimens exists, the lectotype must be chosen from among the **illustrations and uncited specimens and cited and uncited illustrations** that comprise the remaining original material, if such exist.”

Prop. MM (166 – Meneguzzo & al. in *Taxon* 71: 1327) Insert a new Note and two new Examples after Art. 9.12 as follows:

“Note *n.* Upon designation of a lectotype, the remaining type specimens among the original material retain their former category of type (except duplicates of the lectotype, i.e. isolectotypes). They should be cited as “remaining syntype(s)”, “remaining isosyntype(s)”, or “remaining paratype(s).”

“*Ex. n.* *Cleistes castaneoides* Hoehne (in *Arq. Bot. Estado São Paulo* 1: 42. 1939) was published with two syntypes, *Hoehne s.n.* in SP accession No. 28697 and *Luederwaldt s.n.* in SP accession No. 28995. Meneguzzo & Van den Berg (in *Willdenowia* 50: 140. 2020) designated *Hoehne s.n.* as the lectotype of the name, and the other type specimen, *Luederwaldt s.n.*, is categorized as a remaining syntype.”

“*Ex. n.* *Vanilla organensis* Rolfe (in *J. Linn. Soc., Bot.* 32: 452. 1896) was described based on the syntype gatherings *Gardner* 632, *Miers s.n.*, *Glaziou* 11620, and *Glaziou* 14320. Soto Arenas & Cribb (in *Lankesteriana* 9: 385. 2010) designated *Gardner* 632 in K-L as the lectotype. Duplicates of this gathering deposited in GH, NY, and US are isolectotypes. All the specimens of the remaining gatherings in several other herbaria are categorized as remaining syntypes.”

Prop. NN (362 – Proćków & Proćków in *Taxon* 72: 1155) Amend Article 9.12 as follows (new text in bold, deleted text in strikethrough):

“9.12. In lectotype designation, **a part of the holotype (if it is taxonomically mixed) that is not in conflict with the validating description or diagnosis must be chosen if such exists, or**

otherwise an isotype must be chosen if such exists, or otherwise a syntype or isosyntype if such exists. ~~If no isotype, syntype, or isosyntype is extant, the lectotype must be chosen from among the, or otherwise a paratype if such exists.~~ If none of the above specimens exists, the lectotype must be chosen from among the uncited specimens and cited and uncited illustrations that comprise the remaining original material, if such exist.”

Prop. OO (306 – Wisnev & Prado in *Taxon* 72: 950) Amend Art. 9.14 as follows (new text in bold, deleted text in strikethrough):

“9.14. ~~When a~~ **A** type (herbarium sheet or equivalent preparation) **that is later found to contain** ~~contains~~ parts belonging to more than one taxon (see Art. 9.11) **must nevertheless be accepted (subject to Art. 9.19 and 9.20), but may be further narrowed (by way of a subsequent typification)** ~~the name must remain attached~~ to the part (specimen as defined in Art. 8.2) that corresponds most nearly with the original description or diagnosis.”

Prop. PP (307 – Wisnev & Prado in *Taxon* 72: 950) Add a new sentence to Art. 9.14 (new text in bold):

“9.14. When a type (herbarium sheet or equivalent preparation) contains parts belonging to more than one taxon (see Art. 9.11), the name must remain attached to the part (specimen as defined in Art. 8.2) that corresponds most nearly with the original description or diagnosis. **However, on or after 1 January 2026, a type that remains mixed must be narrowed to a part that preserves the traditional and current usage of the name insofar as possible.**”

Prop. QQ (309 – Wisnev & Prado in *Taxon* 72: 950) Add a new sentence at the end of Art. 9.14 and delete Art. 9.19 clause (b) (new text in bold, deleted text in strikethrough):

“9.14. When a type (herbarium sheet or equivalent preparation) contains parts belonging to more than one taxon (see Art. 9.11), the name must remain attached to the part (specimen as defined in Art. 8.2) that corresponds most nearly with the original description or diagnosis. **Any later designation from this type contrary to this rule has no standing.**”

“9.19. The author who first designates (Art. 7.10, 7.11, and F.5.4) a lectotype or a neotype in conformity with Art. 9.11–9.13 must be followed, but that choice is superseded if (a) the holotype or, in the case of a neotype, any of the original material is found to exist; the choice may also be superseded if it can be shown that (b) ~~it is contrary to Art. 9.14 or (c) it is in serious conflict with the protologue [...].~~

Prop. RR (310 – Wisnev & Prado in *Taxon* 72: 950) Add a new Note after Art. 9.14:

“Note *n.* Article 9.14 does not apply to illustrations. An illustration that contains parts belonging to more than one taxon cannot be a type, and any prior indication or designation of such an illustration as a type is not effective unless the prior indication or designation limited the type to one taxon.”

Prop. SS (038 – Chakrabarty & al. in *Taxon* 69: 1386) Add a new Example under Art. 9.17:

“*Ex. n.* Brooker & al. (in Boland & al., *Forest Trees Australia*, ed. 4: 314. 1984) designated a first-step lectotype for the name *Eucalyptus oreades* R. T. Baker (in *Proc. Linn. Soc. New South Wales* 24: 596. 1900), fulfilling the requirements of Art. 7.11 by citing “Type: Near Lawson, New South Wales, Apr. 1899, R. T. Baker and H. G. Smith.” No herbarium was specified, but this was not a requirement in 1984 (see Art. 9.22). Bean (in *Telopea* 12: 316. 2009), noting that *R. T. Baker & H. G. Smith* was a single gathering represented by five specimens, one in K and four in NSW, designated the specimen NSW325376 as the second-step lectotype.”

Prop. TT (311 – Wisnev & Prado in Taxon 72: 950) Amend Art. 9.17 as follows (new text in bold):

“9.17. A designation of a lectotype, neotype, or epitype (**in each case, excluding illustrations**) that later is found to refer to a single gathering but to more than one specimen must nevertheless be accepted (subject to Art. 9.19 and 9.20), but may be further narrowed to a single one of these specimens by way of a subsequent lectotypification, neotypification, or epitypification (see also Art. 9.14).”

Prop. UU (141 – Wisnev in Taxon 71: 704) Add a new Note after Art. 9.19:

“*Note n.* Supersession is automatic if the holotype is found to exist. In all other cases, it is effected by designating a new lectotype, if appropriate original material is available, or a neotype. Upon supersession, the earlier designated element ceases to be the type.”

Prop. VV (312 – Wisnev & Prado in Taxon 72: 951) Amend Art. 9.19 as follows (new text in bold, deleted text in strikethrough):

“9.19. The author who first designates (Art. 7.10, 7.11, and F.5.4) a lectotype or a neotype in conformity with **the relevant rules of Art. 9** ~~9.11–9.13~~ must be followed, ~~but that choice unless a new replacement type is designated in conformity with the relevant rules of Art. 9. Any lectotype or neotype (other than a neotype under Art. 9.16)~~ is superseded if (a) the holotype or, in the case of a neotype, any of the original material is found to exist; the ~~choice~~ **designation** may also be superseded if it can be shown that [...].”

Prop. WW (313 – Wisnev & Prado in Taxon 72: 951) Amend Art. 9.19 clause (c) as follows (new text in bold, deleted text in strikethrough):

“9.19. [...] (c) it is in serious conflict with the protologue, in which case an element that is not in **serious** conflict with the protologue is to be ~~chosen~~ **designated**; a lectotype may only be superseded by ~~an element not in conflict with the protologue~~ **an element that does not seriously conflict with the protologue**, if such exists; if none exists it may be superseded by a neotype **that does not seriously conflict with the protologue**.”

Prop. XX (314 – Wisnev & Prado in Taxon 72: 951) Delete Art. 9 Ex. 15 (deleted text in strikethrough):

~~“Ex. 15. (b) Navarro & Rosúa (in Candollea 45: 584. 1990) designated a sheet in GDC as lectotype of *Teucrium gnaphalodes* L’Hér. (Stirp. Nov.: 84. 1788), but this preparation contains more than one gathering and a heterogeneous mixture of more than one species, not all of which matched L’Héritier’s diagnosis. Ferrer-Gallego & al. (in Candollea 67: 38. 2012) superseded the previous lectotype in choosing one of the specimens on the same preparation that corresponds most nearly with the original diagnosis.”~~

Prop. YY (013 – Mazumdar & al. in Taxon 69: 631) Amend Art. 9.20 as follows (new text in bold, deleted text in strikethrough):

“9.20. The author who first designates (Art. 7.10, 7.11, and F.5.4) an epitype must be followed; **but that choice is superseded if it is in serious conflict with the protologue, in which case an element that is not in conflict with the protologue is to be chosen.** A different epitype may **also** be designated ~~only~~ if the original epitype is lost or destroyed (see also Art. 9.17). A lectotype or neotype supported by an epitype may be superseded in accordance with Art. 9.19 or, in the case of a neotype, in accordance with Art. 9.18. If it can be shown that an epitype and the type it supports differ taxonomically and that neither Art. 9.18 nor 9.19 applies, the name may be proposed for conservation with a conserved type (Art. 14.9; see also Art. 57).”

Prop. ZZ (109 – Steudel in Taxon 70: 1385) Amend Art. 9.20 as follows (new text in bold):

“9.20. The author who first designates (Art. 7.10, 7.11, and F.5.4) an epitype must be followed; a different epitype may be designated only if the original epitype is lost or destroyed **or a previously designated epitype is ambiguous and an additional epitype needs to be designated for nomenclatural stability** (see also Art. 9.17). A lectotype or neotype supported by an epitype may be superseded in accordance with Art. 9.19 or, in the case of a neotype, in accordance with Art. 9.18. If it can be shown that an epitype and the type it supports differ taxonomically and that neither Art. 9.18 nor 9.19 applies, the name may be proposed for conservation with a conserved type (Art. 14.9; see also Art. 57).”

Prop. AAA (315 – Mosyakin & McNeill in Taxon 72: 952) Amend Art. 9.20 as follows (new text in bold):

“9.20. The author who first designates (Art. 7.10, 7.11, and F.5.4) an epitype must be followed; a different epitype may be designated only if the original epitype is lost or destroyed (see also Art. 9.17). A lectotype or neotype supported by an epitype may be superseded in accordance with Art. 9.19 or, in the case of a neotype, in accordance with Art. 9.18. If it can be shown that an epitype and the type it supports differ taxonomically and that neither Art. 9.18 nor 9.19 applies, the name may be proposed for conservation with a conserved type **if this will best serve nomenclatural stability** (Art. 14.9; see also Art. 57).”

Prop. BBB (068 – Wisnev in Taxon 70: 452) Amend Art. 9.21 as follows (new text in bold, deleted text in strikethrough):

“9.21. Designation of an epitype is not ~~effected~~ **achieved** unless the herbarium, collection, or institution in which the epitype is conserved is specified or, if the epitype is a published illustration, a full and direct bibliographic reference (Art. 41.5) to it is provided.”

Make conforming changes in Art. 9.9, 9.22 and 9.23.

Prop. CCC (332 – Thiele & al. in Taxon 72: 1144) Amend Art. 9.21 as follows (new text in bold):

“9.21. Designation of an epitype is not effected unless the herbarium, collection, or institution in which the epitype is conserved is specified or, if the epitype is a published illustration, a full and direct bibliographic reference (Art. 41.5) to it is provided **or, if the epitype is a DNA sequence, both (a) the identifier issued for the epitype sequence by a recognized online repository (see App. X and Art. X.1) is cited, and (b) selected informative portions of the epitype sequence are specified.**”

Prop. DDD (089 – Nachychko in Taxon 70: 1378) Amend Art. 9.23 as follows (new text in bold, deleted text in strikethrough):

“9.23. On or after 1 January 2001, lectotypification, neotypification, or epitypification of a name of a species or infraspecific taxon is not effected unless indicated by use of the term “lectotypus”, “neotypus”, or “epitypus”, ~~its abbreviation, or~~ its equivalent in a modern language, **or abbreviations of these** (see also Art. 7.11 and 9.10).”

Prop. EEE (014 – Lendemer in Taxon 69: 631) Add a new paragraph to Article 9 as follows:

“9.24. On or after 1 January 2025, epitypification of a name of a species or infraspecific taxon is not effected unless the author designating the epitype states that the type being supported is “demonstrably ambiguous” (or an equivalent).”

Prop. FFF (110 – Bhattacharjee & al. in Taxon 70: 1386) Add a new Note to Art. 9:

“*Note n.* An isotype is any duplicate of the holotype irrespective of whether or not it is cited in the protologue or seen by the author(s) of the name. An isosyntype does not have to be seen by the author(s) of the name; if it is cited in the protologue, it is instead a syntype (Art. 9.6). Duplicates of lectotypes, neotypes, and epitypes

are isolectotypes, isoneotypes, and isoeptypes, respectively, irrespective of whether or not they were cited or seen by the typifying author(s)."

Prop. GGG (303 – Wisnev & Prado in Taxon 72: 948) Add a new Note to Art. 9:

"*Note n.* Because a new combination, name at new rank or replacement name is typified by the type of its basionym (Art. 7.3) or replaced synonym (Art. 7.4; but see Art. 7.5), the original material is that of the basionym or replaced synonym. A lectotype may not be designated from among elements cited or used by the author of the later name that are not original material, although such an element may be designated as a neotype if no original material exists."

Rapporteurs' comments – Prop. A is part of a set of proposals seeking to make clearer the circumstances under which a holotype can exist. The use of "designated" vs. "indicated" would restore the usage of the 2012 *Melbourne Code*, to avoid mention of a single element prior to 1958 (as per Art. 40.3) being taken as creating a holotype.

Prop. B would provide an Example of the use of a single element having created a holotype. It would be automatically referred to the Editorial Committee.

Prop. C is part of a set of proposals that would provide for the future valid publication of names of microscopic algae or microfungi with DNA sequences as types (see Chap. V Sect. 2 Prop. A). The Nomenclature Committee for Algae does not support Prop. C (votes 0 : 15 : 1).

Prop. D would offer a more explicit alternative to the parenthetical cross-reference that Prop. F would employ to deal with the same issue. It would provide a clearer solution to the interpretation of whether or not mention of a single element under Art. 40.3 (second sentence) creates a holotype between 1958 and 1989 inclusive. Should both proposals be accepted, the more explicit and arguably preferable wording of Prop. D would replace the cross-reference in Prop. F.

Prop. E is contingent on the rejection of Prop. D and would rule that mention of a single element under Art. 40.3 (second sentence) never creates a holotype, which seems a less favourable interpretation.

Prop. F is part of a set of proposals seeking to make clearer the circumstances under which a holotype can exist. It would make the conditions for concluding that an author "used only one specimen or illustration" more stringent and clearer, i.e. that there must now be "evidence [for this] in the protologue or elsewhere". Should Prop. D be accepted, its new wording would need to be incorporated here. The Examples would be referred to the Editorial Committee.

Prop. G would remove the possibility that there might have been "lost or destroyed" specimens or illustrations from consideration as to whether a holotype existed because an author "used only one specimen or illustration". The proposer concludes that these can only be "unknown possibilities", but this is an erroneous conclusion, because evidence can exist that such materials did exist and such evidence should be taken into account in determining this issue.

Prop. H would make the point that errors that would otherwise prevent valid publication should not be corrected under Art. 9.2. However, it is difficult to imagine circumstances where this might be desirable, and the wording used makes such an interpretation ambiguous anyway.

Prop. I would extend the application of the corrections specified in Art. 9.2 for holotype designations to those involving lectotypes, neotypes or epitypes, but it would also include corrections of

citations involving isotypes, syntypes or paratypes. These latter do not involve corrections to nomenclatural acts and would therefore have no impact on the application of names.

Prop. J is similar to Prop. I, but would not include correction of citations involving isotypes, syntypes or paratypes. Those who favour extending Art. 9.2 as it relates to lectotypes, neotypes or epitypes should vote for one or the other of these proposals, depending on whether or not they favour the additional, and arguably unnecessary, expansion of Prop. I to cover isotype, syntype and paratype citations. The three Examples of Prop. J would be referred to the Editorial Committee.

Prop. K would support the interpretation of Art. 8 Prop. K by both modifying Art. 9.2 and adding a new Article under Art. 40. The latter Article, in permitting external evidence to override the internal evidence present in the protologue, has the potential to be nomenclaturally destabilizing, e.g. if a name, otherwise considered validly published with its holotype specified to be in a certain herbarium (Art. 40.7), was revealed not to be validly published by external evidence showing that its holotype was never deposited there. Such transgressions have historically been disregarded, so impugning them now would be disruptive. See Art. 38 Prop. A for a contrasting approach.

Prop. L, along with Prop. BB and DD, is part of a set of proposals that would rewrite and restructure the Articles defining lectotypes, neotypes and epitypes in order to indicate those conditions, currently elaborated in other Articles, where one of these types can be designated. Given the complexity of these changes, it cannot be stated with confidence that these newly formulated Articles would be free of unwanted consequences.

Prop. M, by excluding illustrations from the original material of names of fossil-taxa, would solve a paradox in the neotypification of such a name. Otherwise, a neotype cannot be designated because original material exists, and Art. 8.5 precludes designation of an illustration as the lectotype. The Nomenclature Committee for Fossils supports Prop. M (votes 12 : 0 : 0).

Prop. N would slightly alter Art. 9.4 to make it more explicit how cited or uncited specimens or illustrations relate to original material. The new wording seems to be an improvement.

Prop. O would basically reorganize Art. 9.4 and add a Note, placing its various component elements into a more ranked and perhaps more understandable order in a manner similar to that of Art. 9.12. Because it concerns chiefly the organization rather than the content of the Article, it would be independent of the other proposals on Art. 9.4.

Prop. P would address an issue arising from a recent change in Shenzhen to Art. 9.4(a) that has created uncertainty over the meaning of "the author", thereby eliminating from the original material any specimens or illustrations used to prepare the description or diagnosis if these were not available to the publishing author. This has forced neotypes to be designated on such material that would otherwise be lectotypes. The adjustment would bring this part of the Article back in line with prior *Codes*.

Prop. Q would add a Note that parallels the Note proposed in Prop. O, both accommodating text removed from Art. 9.4 and thought to be unnecessary there, with its terminology amended to align with that used in Prop. P. However, the new first sentence of this Note seems unnecessary and irrelevant to the Article itself, so the Note in Prop. O seems preferable.

Prop. R would exclude any elements cited with doubt from consideration under clauses (a)–(d) of Art. 9.4, where they would

otherwise unequivocally be included, but would leave the status of such elements as either original material or not original material subject to “the appropriate type designation” presumably on this or another element. This seems to create additional unnecessary uncertainty rather than eliminating it.

Prop. S would merge the content of current Art. 7.8, focusing on typification of names “validly published solely by reference to a previously and effectively published description or diagnosis”, and Art. 9 Note 3 into a new Article, additional to Art. 9.4 that otherwise defines original material, focused on the original material of such names. No practical differences exist in the effect of this realignment, and the reasons provided for it do not seem compelling, but those who find this reorganization desirable should vote accordingly.

Prop. T would provide an alternative to the transfer of Art. 7.8 to Art. 9 advocated in *Prop. S*, by expanding Note 3 seeking to better indicate what the original material would be from “the entire context of the validating description or diagnosis” (Art. 7.8).

Prop. U proposes changes to Art. 9 Note 3 that would define original material for names falling under Art. 7.8 when a different element, from those employed by the describing author(s), was designated as type by the validating author. This original material would come into play only if the designated type was somehow lost or destroyed. The current *Code* does not explicitly cover this issue.

Prop. V would make a reasonable adjustment to the wording of Art. 9 Note 3. The same change ought to be made in Art. 7.8 if *Prop. S* was rejected.

Prop. W proposes a Note that would state what should be obvious from Art. 9.6, i.e. that specimens not cited in the protologue are not syntypes. The Example, which might address the concern of the authors, would be referred to the Editorial Committee.

Prop. X would provide a useful cross-reference in Art. 9.6 to Art. 40 Note 2, which provides some criteria for determining whether or not a specimen or gathering has been mentioned. The cross-reference seems better placed at the end of the Article, however.

Prop. Y would add a sentence to an existing Example and would be automatically referred to the Editorial Committee.

Prop. Z would change “designated” to “indicated” in Art. 9.6 and elsewhere. The existing cross-reference in the Article would appear to already cover any issue surrounding the use of this term without the proposed change.

Prop. AA would restrict neotypes in the same way that holotypes are currently restricted in Art. 40.5, preventing neotypification on an illustration (except in microscopic algae or microfungi) on or after 1 Jan 2025 (the date should now be changed to 1 Jan 2026).

Prop. BB is discussed under *Prop. L*.

Prop. CC and *Prop. EE* would reformulate the rules concerning neotypes and epitypes, respectively, elaborating the various conditions, some newly explained, in which a neotype or epitype can be selected. Those who consider these formulations to be more useful than the current provisions should vote accordingly.

Prop. DD would amalgamate all of the rules concerning epitypes into a single Article. Those who consider this restructuring to be more user-friendly than the previous arrangement of these provisions should vote accordingly.

Prop. EE is discussed under *Prop. CC*.

Prop. FF would provide an Example of when an epitype should not be selected. It would be automatically referred to the Editorial Committee.

Prop. GG and *Prop. ZZ* would modify the rules regarding epitypes to allow for designation of multiple epitypes under certain

conditions. While this would add another layer of complexity to these two provisions, some might believe this to be a worthwhile addition.

Prop. HH is part of a set of proposals that would provide for the future valid publication of names of microscopic algae or microfungi with DNA sequences as types (see Chap. V Sect. 2 *Prop. A*). The Nomenclature Committee for Algae does not support *Prop. HH* (votes 1 : 14 : 1).

Prop. II would introduce a new term (“typotype”) to the various type definitions in Art. 9. What the proposers define as a typotype is currently referenced, although unnamed, in Rec. 8A.1, where it is recommended that such a specimen “should be used to help determine the application of the name”. The proposers state that addition of an Article defining this term would “promote good practice for epitype selection”, but Rec. 8A.1 already encourages the use of typotypes in much the same way as an epitype would be used. Rather than add a new Article that might promote inappropriate epitypification when the primary type is not demonstrably ambiguous, the term typotype could be added to Rec. 8A.1 and the Glossary; those who prefer this option should vote “ed.c.”

Prop. JJ would allow correction of usage of the term “holotype” to “lectotype” for names published before 1958 without the need for authors to indicate their intent to typify by stating “designated here” or an equivalent phrase. It would permit names to be lectotypified after 2000 by authors incorrectly citing a single specimen as the holotype of the name. Difficulty may arise in determining whether “a single specimen” is “cited in a protologue”, because if such a citation actually represented a gathering or a part thereof, e.g. multiple duplicate specimens in the same herbarium, there would be no basis for correction of the term “holotype”.

Prop. KK proposes a new Example, which would be automatically referred to the Editorial Committee.

Prop. LL offers improved wording to Art. 9.12 to better account for illustrations that are part of the protologue as original material.

Prop. MM would add a Note seeking to explain how the status of type specimens among the original material is affected by designation of a lectotype, although it is implied that isolectotypes do not retain their former status. It could be argued that *all* type specimens retain their former status upon designation of a lectotype, e.g. if a syntype is designated as the lectotype, it is indeed the lectotype but does not lose its syntype status, and if the type is later changed by conservation, the former lectotype is still a syntype. The Note would also introduce and recommend use of some additional terminology, e.g. “remaining syntype(s)”, which some might consider useful, although a Recommendation would be misplaced in a Note.

Prop. NN would fill a void in the priority of lectotype selection, i.e. what to do in the case of a taxonomically mixed holotype (Art. 9.14), which has previously not been considered here or in Art. 9.14, so it seems a useful addition.

Prop. OO would provide a useful clarification of what procedure should be undertaken when a type is taxonomically mixed. Whereas it only specifies “a subsequent typification”, this should more precisely be “a subsequent lectotypification, neotypification, or epitypification”, according with current Art. 9 Ex. 13 and avoiding what could be seen as a subsequent “holotypification”.

Prop. PP would address a perceived potential conflict between Art. 9.14 and Rec. 9A.4. Whereas the former requires correspondence with the descriptive material, the latter recommends preserving current usage. However, because one deals with a pre-existing type and the other with a type that does not yet exist, the two situations are not comparable. It would also add yet another date-limited Article to the *Code*.

Prop. QQ, which would move an indirectly indicated condition for supersession of a type from Art. 9.19 to Art. 9.14, where it is more directly resolved as simply being an ineffective typification, would provide a clearer presentation of the issue.

Prop. RR would add a new Note, but it would assign properties to illustrations that are not covered elsewhere in the *Code*, namely that a mixed illustration cannot be a type. As such, this would need to be introduced as an Article, but without further knowledge of the impact of such a change, it would likely be destabilizing to nomenclature, e.g. rendering past typifications on mixed illustrations ineffective or, if the only original material for a name was a mixed illustration, creating a conundrum, because it could not be a lectotype nor could a neotype be designated.

Prop. SS offers a useful Example of a second-step typification that would be automatically referred to the Editorial Committee.

Prop. TT would add wording seeking to qualify that Art. 9.17 does not apply to illustrations, but this should be already apparent from the current wording of the text (using “gathering”, “specimen”), so there seems to be no need for this addition.

Prop. UU would outline procedures for effecting supersession under Art. 9.19. The first sentence of the proposed Note suggests that supersession is automatic only when the holotype is found to exist, but this would also apply when a missing previously designated lectotype or neotype was found. This sentence could be amended as: **“Supersession is automatic if the missing type (holotype, or previously designated lectotype or neotype) is found to exist.”** The final sentence could also be worded more concisely as: **“When a type is superseded, it ceases to be the type.”** to avoid confusion when more than one element had been designated as type for a name over time. Those who favour amending the Note as suggested should vote “ed.c.”

Prop. VV would modify Art. 9.19, adding precision, but it could be improved editorially to eliminate some redundant wording. Those who support the acceptance of this proposal after such editorial adjustment should vote “ed.c.”

Prop. WW would alter the wording of Art. 9.19 without any apparent change in meaning, except for the qualification that a newly selected neotype “does not seriously conflict with the protologue”, which would seem to be intuitively understood without the need for an explicit statement.

Prop. XX would delete Art. 9 Ex. 15, which does appear to be problematic. It would be automatically referred to the Editorial Committee.

Prop. YY would create a mechanism for superseding an epitypification if the original epitype was “in serious conflict with the protologue”. However, there is no requirement in Art. 9.9, which provides the basis for epitype generation, that an epitype agree with the protologue of the supported name, so accepting this proposal could mandate supersession of properly designated epitypes, possibly with destabilizing consequences.

Prop. ZZ is discussed under Prop. GG.

Prop. AAA would add wording to Art. 9.20 underscoring that a name supported by a epitype with which it is not in taxonomic agreement should only be proposed for conservation if “this will best serve nomenclatural stability”. However, any proposal for conservation that does not serve nomenclatural stability would be dead on arrival at the Nomenclature Committees, so at best this new addition may serve to discourage the submission of such proposals, which might be a laudable achievement.

Prop. BBB would standardize the usage of either “effected” or “achieved”, as they pertain to type designations in six different

provisions of the *Code*, to “achieved”. Because the terms are synonymous, no real difference would result other than consistency of usage.

Prop. CCC is part of a set of proposals that would provide for the future valid publication of names of microscopic algae or microfungi with DNA sequences as types (see Chap. V Sect. 2 Prop. A). The Nomenclature Committee for Algae does not support Prop. CCC (votes 1 : 14 : 1).

Prop. DDD would provide a more precise wording for Art. 9.23. A similar change is proposed for Art. 40.6 (see Art. 40 Prop. N).

Prop. EEE would force an author epitypifying a name to state that the supported type was “demonstrably ambiguous” or use an equivalent phrase. In Rec. 9B.2, it is already recommended that an author should actually state in what way such a supported type is ambiguous in order to justify selection of an epitype. Forcing the author to attach a particular phrase rather than an explanation misses the point of the Recommendation. Besides, determining what would be an equivalent expression to “demonstrably ambiguous” could be problematic.

Prop. FFF describes several categories of type, and would be inserted as a Note somewhere in Art. 9. Because it covers various types scattered throughout the Article, a proper place for it seems elusive. Alternatively, any included items not already explicitly stated in Art. 9 could be added to the appropriate entries in the Glossary. Those favouring this approach should vote “ed.c.”

Prop. GGG, although it would provide useful guidance delineating the original material for new combinations, names at new rank or replacement names, seems unnecessarily verbose. The issue could be dealt with in a more concise, parallel and sufficient way by following the format already established in Notes 2 and 3 under Art. 9.4 (e.g. **“Note n. For names falling under Art. 7.3 or 7.4, only elements from the context of the protologue of the basionym or replaced synonym are original material.”**). Those who prefer this option should vote “ed.c.”

Recommendation 9A

Prop. A (101 – Wisnev in Taxon 70: 1383) Amend Rec. 9A.1 as follows (new text in bold, deleted text in strikethrough):

“9A.1. Typification of names for which no published without a holotype was designated should only be carried out with an understanding of the author’s method of working; in particular it should be realized that some of the material used by the author in describing the taxon may not be in the author’s herbarium or may not even have survived, and conversely, that not all the material surviving in the author’s herbarium was necessarily used in describing the taxon.”

Prop. B (308 – Wisnev & Prado in Taxon 72: 950) Amend Rec. 9A.4 as follows (new text in bold, deleted text in strikethrough):

“9A.4. When the original material consists of two or more heterogeneous elements were included in or cited with the original description or diagnosis, the lectotype should be so selected designated so as to preserve current and traditional usage insofar as possible (but see Art. 9.12). In particular, if If another author has already segregated one or more elements as other taxa, one of the remaining elements should be designated as the lectotype provided that this element is not in serious conflict with the original description or diagnosis protologue (see Art. 9.19(c)).”

Prop. C (039 – Krishna & al. in Taxon 69: 1386) Add a new paragraph to Rec. 9A:

“9A.5. Preference should be given to carrying out those lectotypifications where the application of the name is in doubt.”

Prop. D (354 – Wisnev & Prado in Taxon 72: 1152) Add a new Recommendation to Rec. 9A as follows:

“9A.n. For names falling under Art. 7.8, if there are no extant elements in the context of the validating description or diagnosis and the validating author did not definitely designate a different type, later authors should consider any specimens and illustrations cited in the protologue when designating a type.”

Rapporteurs’ comments – *Prop. A* would provide a useful rewording of Rec. 9A.1.

Prop. B would appear to provide a more precise wording for Rec. 9A.4, and the only real difference seems to be adding “traditional” usage to the “current usage” recommended to be preserved. The two usages can sometimes be in conflict, but because the proposal qualifies this adding “insofar as possible”, this may not be an issue.

Prop. C seems like good advice but, in the absence of some specialized knowledge of the groups involved, could have undesirable consequences.

Prop. D would add a Recommendation suggesting that for names validly published solely by reference to a previously and effectively published description or diagnosis (Art. 7.8) if original material does not exist a later author should consider elements in the protologue in type designation. Such a designation would constitute a neotype, although this is not so stated in the proposal.

Recommendation 9B

Prop. A (015 – Chakrabarty & Bandyopadhyay in Taxon 69: 632) Add a new paragraph to Rec. 9B:

“9B.3. Authors should examine the specimen or illustration or at least its digital image before designating it as a lectotype, neotype, or epitype.”

Prop. B (016 – Nandikar in Taxon 69: 632) Add a new paragraph to Rec. 9B:

“9B.3. In selecting a neotype it is recommended that the specimen be chosen from as close as possible to the type locality that is cited in the protologue, or which can be inferred from the protologue. If no type locality is cited in the protologue, the neotype should be a specimen that best matches the protologue.”

Prop. C (316 – Mosyakin & McNeill in Taxon 72: 952) Add a new Recommendation in Rec. 9B:

“9B.3. Neotypes and/or epitypes should not be designated for long-forgotten and/or taxonomically obscure names that are not in current use, especially if such names may compete in terms of priority with currently accepted names.”

Prop. D (167 – Kar & Bandyopadhyay in Taxon 71: 1328) Add a new paragraph to Rec. 9B:

“9B.n. Authors designating a neotype should indicate why they have selected a neotype from elsewhere, if the neotype is not from the locality of a replaced type.”

Rapporteurs’ comments – *Prop. A* states what should be obvious, although one might wish that Rec. 9A.2 was also being followed at the same time.

Prop. B reflects what is generally considered good practice. However, the second sentence seems to imply that a neotype that “best matches the protologue” is of secondary importance to a neotype from near the type locality, but this runs seemingly counter to Rec. 9B.1, which considers that a neotype should be an element that “best fits the protologue”. Moreover, the first sentence assumes that a neotype is a specimen, which although good practice is not a requirement for names of non-fossil taxa.

Prop. C would caution against what most would view as unwelcome and nomenclaturally destabilizing neotypifications or epitypifications.

Prop. D takes an alternative and more negative approach in comparison to *Prop. B* to encourage neotype selection from the type locality.

Recommendation 9C

Prop. A (071 – Bramhadande & Nandikar in Taxon 70: 454) Add a new paragraph to Rec. 9C:

“9C.2. In the case that a choice of holotype, lectotype, neotype, or epitype is based on web-sourced, digital images of specimens, the author(s) designating the type should notify the curator of the herbarium, collection, or institution to update the labelling of the specimen and thereby reduce the chances of further nomenclatural amendments or inadvertent retypification.”

Rapporteurs’ comments – *Prop. A* would recommend that when a type is designated based solely on the viewing of online images, the institution where the type is curated should be notified by authors to allow updated labelling of the specimens involved. However, there is currently no parallel Recommendation covering the same situation in relation to specimens examined directly.

Article 10

Prop. A (083 – Wisnev in Taxon 70: 908) Amend Art. 10.1 as follows (new text in bold, deleted text in strikethrough):

“10.1. The type of a name of a genus or of any subdivision of a genus is the type of a name of a species (except as provided by Art. 10.4). For purposes of designation or **citation indication** of a type, the species name alone suffices, i.e. it is considered as the full equivalent of its type (see also Rec. 40A.3).”

Prop. B (087 – Wisnev in Taxon 70: 909) Add a new Note after Art. 10.1 as follows:

“*Note n.* Because the type of a name of a genus or subdivision of a genus is the type of a name of a species, any change in the type of that species name (e.g. by lectotypification or conservation) also affects the application of the generic name or subdivisional name.”

Prop. C (168 – Rijkkevorsel in Taxon 71: 1329) Add a new paragraph to follow Art. 10.1 or 10.7, supported by an Example:

“10.1bis. For purposes of choosing, designating, selecting, or conserving a type of a name of a genus or subdivision of a genus (Art. 10.2, 10.5–10.7 and 14.9) or inclusion, or exclusion, of the type of a name of a genus or subdivision of a genus (Art. 22, 48 and 52), a species name that does not have a type is to be treated (until a type is designated for it) as if it does have a type.”

“*Ex. n.* The protologue of *Decarinium* Raf. (Neogenyton: 1. 1825) indicated *Croton glandulosus* L. as the type. Because only in 1920 was a specimen selected as the lectotype of *C. glandulosus*, until 1920 there was no specimen or illustration that was the type of *Decarinium* (because Art. 8.1 allows only a specimen or illustration as the type of a name of a species and Art. 10.1 requires that the type of a name of a genus must be the type of a name of a species, except as provided for in Art. 10.4, this means that *Decarinium* had no type until 1920). Nevertheless, when the protologue of *Geiseleria* Klotzsch (in Arch. Naturgesch. 7: 254. 1841) included *C. glandulosus* in the circumscription of the new genus, this is to be treated for the purposes of Art. 52.1 as inclusion of the type of *Decarinium*, and *Geiseleria* is illegitimate (see Art. 58 Ex. 4).”

Prop. D (169 – Rijkkevorsel in Taxon 71: 1329) Add a new paragraph after Art. 10.1 or 10.7, supported by a Note:

“10.1ter. If a change is made to the typification of the name of a species that for purposes of designation or citation of the type of a name of a genus or subdivision of a genus is considered as the full equivalent of its type (Art. 10.1), as provided in this *Code* (Art. 9 and 14.9), the typification of that name of a genus or subdivision of a genus automatically changes accordingly.”

“*Note n.* Art. 10.1ter governs not only a new (first-time) or different type (replacement type, superseding type, conserved type) of the species name, but the whole of how a name is typified. Typification also includes selecting part of a specimen (Art. 9.14), narrowing a gathering to a specimen (Art. 9.17), designating a supporting epitype (Art. 9.9) or a change in the supporting epitype (Art. 9.20).”

Prop. E (084 – Wisnev in Taxon 70: 908) Amend Art. 10.2 as follows (new text in bold, deleted text in strikethrough):

“10.2. If in the protologue of a name of a genus or of any subdivision of a genus (**excluding sanctioned names: Art. F.3**) the ~~holotype or lectotype type of one or more previously or simultaneously published a single~~ species name(s) is definitely included (see Art. 10.3), **or indicated (Art. 10.8, 40.1, and 40.3) or designated as the type, that is the original type that fixes the application of the name and is final. If a name of a genus or of any subdivision of a genus has no original type (but see Art. 40.1), a type may be designated, but that the type must be chosen designated** from among ~~these~~ the types of any species name(s) definitely included in the protologue, unless ~~(a) the type was indicated (Art. 10.8, 40.1, and 40.3) or designated by the author of the name; or (b) the name was sanctioned (Art. F.3), in which case the type may also be chosen designated~~ from among the types of species names **definitely included in the sanctioning treatment (but see Art. 10.5).** If no type of a ~~previously or simultaneously published~~ species name was definitely included, a type ~~must~~ **may** be otherwise ~~chosen designated~~, but the designation is to be superseded if it can be demonstrated that the selected type is not conspecific with any of the material associated with either the protologue or the sanctioning treatment.”

The proposed amended Art. 10.2 would read as follows:

“10.2. If in the protologue of a name of a genus or of any subdivision of a genus (excluding sanctioned names: Art. F.3) the type of a single species name is definitely included (see Art. 10.3), or indicated (Art. 10.8, 40.1, and 40.3) or designated as the type, that is the original type that fixes the application of the name and is final. If a name of a genus or of any subdivision of a genus has no original type (but see Art. 40.1), a type may be designated, but that type must be designated from among the types of any species name(s) definitely included in the protologue, unless the name was sanctioned (Art. F.3), in which case the type may also be designated from among the types of species names definitely included in the sanctioning treatment (but see Art. 10.5). If no type of a species name was definitely included, a type may be otherwise designated, but the designation is to be superseded if it can be demonstrated that the selected type is not conspecific with any of the material associated with either the protologue or the sanctioning treatment.”

Prop. F (170 – Rijckevorsel in Taxon 71: 1330) Rearrange and rephrase Art. 10.2 so that it reads:

“10.2. The type of a name of a genus or of a subdivision of a genus, published as the name of a new taxon (Art. 6.9), is to be established as follows:

(a) The type is established if it is designated in the protologue, otherwise indicated (Art. 40.3) in the protologue, or determined by Art. 10.8.

(b) If the type was not established under (a), it is to be chosen (but see Art. 10.5–10.7) from among the types of previously or

simultaneously published species names definitely included (see Art. 10.3) in the protologue. For a sanctioned name (Art. F.3), the choice of type may also be made from among the types of species names definitely included in the sanctioning treatment.

(c) If the type was not established under (a) and cannot be established under (b), it is to be chosen otherwise, but the choice is to be superseded if it can be demonstrated that the selected type is not conspecific with any of the material associated with either the protologue or the sanctioning treatment.”

A further option would be to integrate Art. 10.8 here (as a separate clause following clause (a)).

Prop. G (152 – Rijckevorsel in Taxon 71: 709) In Art. 10.2, 10.3, and 40.3 replace “the holotype or lectotype” by “the type” or “the type(s)” as appropriate.

Prop. H (085 – Wisnev in Taxon 70: 909) Amend Art. 10.3 as follows (new text in bold, deleted text in strikethrough):

“10.3. For the purposes of Art. 10.2, definite inclusion of the type of a **species name of a species** is effected by citation of, or reference (direct or indirect) to, a validly published species name, whether accepted or synonymized by the author, or by citation of the holotype or **previously designated** lectotype of a previously ~~or simultaneously~~ published species name.”

Prop. I (033 – Wisnev in Taxon 69: 1383) Amend the first sentence of Art. 10.5 as follows (new text in bold, deleted text in strikethrough):

“10.5. The author who first designates (Art. 7.10, 7.11, and F.5.4) a type of a name of a genus or subdivision of a genus **in an effective publication (Art. 29–31)** must be followed, but the **designation choice** may be superseded if the author used a largely mechanical method of selection (Art. 10.6). [...]”

In addition, delete Art. 7.10.

Prop. J (086 – Wisnev in Taxon 70: 909) Amend the first sentence of Art. 10.5 as follows (new text in bold, deleted text in strikethrough):

“10.5. **If there is no original type,** ~~the~~ author who first designates (Art. 7.10, 7.11, and F.5.4) a type of a name of a genus or subdivision of a genus **in conformity with Art. 10.2** must be followed, but the ~~choice designation~~ may be superseded if the author used a largely mechanical method of selection (Art. 10.6).”

Prop. K (359 – Wiersema & McNeill in Taxon 72: 1153) Add a new Article to follow Art. 10.8:

“10.8bis. When the name of a new species was validly published solely by reference to a description or diagnosis of a genus under Art. 38.12, making that genus monotypic (see Art. 38.6), the type of the generic name is the same as that of the species name, unless a different type has definitely been designated for the species name.”

If this proposal is accepted, a cross-reference to the resulting Article should be added to Art. 10.2 and likely also Art. 38.12 and its Ex. 21, with some modification to the Example also possibly desirable.

Rapporteurs’ comments – Prop. A would replace “citation” with “indication” in Art. 10.1, but in that case should a similar change, which has not been proposed, be made also in Art. 10.9 and elsewhere in Art. 10? The proposer notes that “indicated”, “designated”, “selected” and “chosen” (without mentioning “cited”) are used with respect to types in Art. 10 and considers the first two to be the correct terms.

Prop. B would clarify the effect of a change in the type of a species name on the application of a generic or subdivisional name for which it is the type. This is not otherwise explained in the *Code*, so would be a useful addition.

Prop. C would state what is otherwise generally believed or understood but is nowhere indicated in the *Code*. The proposal could be regarded as slightly pedantic, but those who feel it is useful to include this information should vote accordingly. If the proposal is accepted, the Example would be referred to the Editorial Committee.

Prop. D covers the same issue as *Prop. B*, although in a less concise way.

Prop. E, together with *Prop. H* and *J*, would provide an improved rewording of Art. 10.2, 10.3 and 10.5, where in Art. 10.2 the concept of the “original type” of a genus, a term currently used in seven places in the *Code* (such as in Art. 22.2, Art. 48.2 and Art. 52.2), is first defined (see Art. 22 *Prop. A* and Art. 48 *Prop. D*, which seek to eliminate the use of this term altogether). In a manner analogous to species name typification, the revised wording follows a more understandable “holotype”, “lectotype” and “neotype” progression. There is a problem, however, with the addition of “(excluding sanctioned names: Art. F.3)” in the first sentence of the proposal. A sanctioned name could already have an original type at the time of sanctioning, or the sanctioning treatment may actually be the protologue where such a type is created. There is nothing about the sanctioning process itself that would impact whether or not a generic or subdivisional name has an original type. So it would be wrong to exclude sanctioned names from this part of the Article. Those in favour of this proposal with this parenthetical phrase deleted should vote “ed.c.”

Prop. F would provide an alternative to *Prop. E*, following a similar progression in its wording, although without the term “original type”. Whether the wording of the amended Article is preferable to that it *Prop. E* is a matter of opinion.

Prop. G would have the effect of including species names with previously designated neotypes (and previously conserved types), along with those having holotypes and lectotypes, among those to be considered in typifying a generic or subdivisional name when such types were included in its protologue. Species names with neotypes were not previously mentioned either in Art. 10.2, 10.3 or 40.3.

Prop. H is discussed under *Prop. E*.

Prop. I is contingent upon acceptance of Art. 9 *Prop. L*, BB and DD. See comments under Art. 9 *Prop. L*.

Prop. J is discussed under *Prop. E*.

Prop. K would establish a means for generic names published without inclusion of a validly published species name to be automatically typified if the first species name published, per Art. 38.12, in that genus was not otherwise typified. This avoids the need for a formal generic typification, which would have to adopt the same element anyway, and the waste of time and effort that this would require.

Article 11

Prop. A (250 – Wisnev & Prado in *Taxon* 72: 679) Amend Art. 11.3 and 11.4 as follows (new text in bold, deleted text in strikethrough):

“11.3. For any taxon ~~from~~ **with a particular circumscription at the rank of** family to genus, inclusive, the correct name is the earliest legitimate one with the same rank, except in cases of limitation of priority by conservation or protection (see Art. 14 and F.2) or where Art. 11.7, 11.8, 19.4, **19.5**, 56, 57, F.3, or F.7 apply.”

“11.4. For any taxon **with a particular circumscription** below the rank of genus, the correct name is the combination of the final epithet of the earliest legitimate name of the taxon at the same rank, with the correct name of the genus or species to which it is assigned, except [...]”

Prop. B (017 – Kumar & al. in *Taxon* 69: 633) Add a new Example after Art. 11.4:

“*Ex. n.* When *Aeginetia acaulis* (Roxb.) Walp. (in Repert. Bot. Syst. 3: 481. 1844) and *A. pedunculata* Wall. (in Pl. Asiat. Rar. 3: 13. 1831) are considered to apply to the same species, *A. acaulis* is the correct name because it is the combination of the final epithet of *Orobancha acaulis* Roxb. (Pl. Coromandel 3: 89. 1820), the earliest legitimate name of the taxon at specific rank, with *Aeginetia* L., the correct name of the genus to which the species is assigned.”

Prop. C (258 – Elbrächter & al. in *Taxon* 72: 684) Delete Art. 11.7:

~~“11.7. For purposes of priority, names of fossil taxa (diatom taxa excepted) compete only with names based on a fossil type.”~~

Prop. D (259 – Elbrächter & al. in *Taxon* 72: 685) Delete Ex. 30 from Art. 11:

~~“*Ex. 30.* Reid (in Nova Hedwigia 29: 429–462. 1977) indicated that his new fossil species *Votadinium calvum* was the resting cyst of the non-fossil dinoflagellate *Peridinium oblongum* (Auriv.) Cleve (in Kongl. Svenska Vetensk. Acad. Handl., n.s., 32(8): 20. 1900). *Votadinium calvum* can be used as the correct name for the cyst fossil species because it has a fossil type and therefore does not compete for priority with *P. oblongum*.”~~

Some of the present authors are of the opinion that the zoologically connoted term “dinoflagellate” (as used in the present Example) should be removed from the *Code*. The equivalent botanical terms are “Dinophyta” or “Dinophyceae”, so “dinophyte” would be the preferred term to use in the *Code*.

Prop. E (260 – Elbrächter & al. in *Taxon* 72: 685) Amend Art. 11.8, its Ex. 35, and the caption of Art. 13.1(f) as follows (new text in bold, deleted text in strikethrough):

“11.8. Names of organisms (diatoms **and dinoflagellates** excepted) based on a non-fossil type are treated as having priority over names at the same rank based on a fossil type where these names are treated as synonyms for a non-fossil taxon.”

“*Ex. 35.* The non-fossil species *Gonyaulax ellegaardiae* K. N. Mertens & al. (in J. Phycol. 51: 563. 2015) was indicated in the protologue to produce a cyst corresponding to the fossil-species *Spiniferites pachydermus* (M. Rossignol) P. C. Reid (in Nova Hedwigia 25: 607. 1974). Both names were correct because Mertens & al. (**l.c.**) did not treat them as synonyms. However, if these names are treated as synonyms ~~for the non-fossil species, *S. pachydermus*, based on a fossil type, *G. ellegaardiae* is treated as having has priority because~~ **Art. 11.8 excepts dinoflagellates even though it is antedated by *S. pachydermus*.**”

“13.1. [...] Fossil organisms (diatoms **and dinoflagellates** excepted):”

Rapporteurs’ comments – *Prop. A* would require a taxon to have a “particular circumscription” when its correct name is determined under Art. 11.3 and 11.4. A taxon is a taxonomic group (Art. 1.1) and must therefore have a particular circumscription. It seems unnecessary to state this in Art. 11.3 and 11.4 because the correct name would be determined in the same way irrespective of the circumscription.

Prop. B suggests a new Example for Art. 11.4. It would be automatically referred to the Editorial Committee.

Prop. C–E seek to eliminate a contradiction between Art. 11.7 and 11.8 and would exclude dinoflagellates (“dinophytes”), like diatoms, solely for the purposes of priority from being treated as fossil organisms, thereby eliminating the dual nomenclature between fossil and non-fossil names currently applied to this taxonomic

group. These proposals intentionally avoid equating other differences in the *Code* regarding valid publication (Art. 43 and 44) in the treatment of fossil and non-fossil dinoflagellate names, although Art. 44 Prop. A would eliminate one such difference. See also the critique of these proposals, with alternative recommendations, by Head & al. (in Taxon: <https://doi.org/10.1002/tax.13128>). The Nomenclature Committee for Algae does not support Prop. C (votes 0 : 13 : 1), Prop. D (votes 6 : 2 : 6) or Prop. E (votes 0 : 13 : 1), in each case with 14 members voting. The Nomenclature Committee for Fossils does not support Prop. C (votes 0 : 12 : 0), Prop. D (votes 0 : 12 : 0) or Prop. E (votes 0 : 12 : 0), but it does support the alternative recommendations by Head & al. (votes 12 : 0 : 0). The alternative recommendations were submitted too late for inclusion as proposals in this Synopsis but may be introduced as new proposals at the Nomenclature Section (Div. III Prov. 5.7).

Article 12

Prop. A (244 – Wisnev & Prado in Taxon 72: 677) Amend Art. 12.1 as follows (new text in bold):

“12.1. A **potential** name of a taxon has no status under this *Code* unless it is validly published (see Art. 6.3; but see Art. 14.9 and 14.14).”

Rapporteurs’ comments – *Prop. A* would add a new term “potential name” to the *Code*. See comments under Art. 6 Prop. D, which would define the term.

Article 13

Prop. A (266 – Doweld in Taxon 72: 688) Delete the second sentence of Art. 13.1(f) as follows (deleted text in strikethrough):

“Fossil organisms (diatoms excepted):

(f) All groups, 31 December 1820 (Sternberg, *Flora der Vorwelt*, Versuch 1: 1–24, t. 1–13). ~~Schlotheim’s *Petrefactenkunde* (1820) is regarded as published before 31 December 1820.~~”

Rapporteurs’ comments – *Prop. A* originates from a new bibliographic finding proving that Schlotheim’s *Petrefactenkunde* was indeed published before 31 December 1820, hence there is no longer a need to rule that it is “regarded” as so published. The Nomenclature Committee for Fossils supports *Prop. A* (votes 10 : 2 : 0).

Article 14

Prop. A (175 – Meneguzzo & Prado in Taxon 71: 1331) Amend Art. 14.1 as follows (new text in bold, deleted text in strikethrough) and add a new Example:

“14.1. In order to avoid disadvantageous nomenclatural changes entailed by the strict application of the rules, and especially of the principle of priority in starting from the dates given in Art. 13 and F.1, this *Code* provides, in App. II–IV, lists of names of families, genera, **subdivisions of genera, and species, and infraspecific taxa** that are conserved (nomina conservanda) (see Rec. 50E.1). Conserved names are legitimate even though initially they may have been illegitimate. ~~The name of a subdivision of a genus or of an infraspecific taxon may be conserved with a conserved type and listed in App. III and IV, respectively, when it is the basionym or replaced synonym of a name of a genus or species that could not continue to be used in its current sense without conservation.~~”

“Ex. n. Reichenbach (in Bot. Zeitung (Berlin) 10: 668. 1852) published *Zygopetalon* sect. *Zygosepalon* Rchb. f. Later, he published a new generic name *Zygosepalum* Rchb. f. (in Ned. Kruidk. Arch. 4: 330. 1859), its termination *-alum* likely agreeing with the contemporary spelling of *Zygopetalum* Hook. (in Bot. Mag. 54: ad t. 2748. 1827, as ‘*Zygopetalon*’). The orthographical variant

Zygopetalum, originally ‘*Zygopetalon*’, has since been conserved. By this conservation, ‘*Zygopetalon*’ sect. *Zygosepalon* became *Zygopetalum* sect. *Zygosepalon*. Conservation of the name with the spelling *Zygopetalum* sect. ‘*Zygosepalum*’ would restore the harmonious terminations of the generic name and sectional epithet.”

Prop. B (154 – Prado & al. in Taxon 71: 709) Amend the last sentence of Art. 14.4 as follows (new text in bold):

“14.4. [...] A conserved name of a species is conserved against all names listed as rejected, and against all **new combinations and replacement names** based on the rejected names.”

Prop. C (176 – Turland & Wiersema in Taxon 71: 1333) Add a cross-reference to the first sentence of Art. 14.12 (new text in bold) and amend Art. 14.14 as follows (deleted text in strikethrough):

“14.12. The lists of conserved names will remain permanently open for additions and changes (**but see Art. 14.14**).”

“14.14. The places of publication cited for conserved names of families in App. IIB are treated as correct in all circumstances and consequently are not to be changed, ~~except under the provisions of Art. 14.12~~, even when otherwise such a name would not be validly published or when it is a later isonym.”

Prop. D (124 – Rijkvorschel in Taxon 70: 1394) Add a sentence at the end of Art. 14.15:

“14.15. [...] Conservation of spelling and gender (Art. 14.11), once it takes effect, applies retroactively, as does legitimacy of conserved names (Art. 14.1) (but see Art. 52.n).”

If this is accepted, it may be a good idea to add a Note to Art. 6.5 along the lines of “No name can become illegitimate by the later typification or later conservation of another name” or in Art. 14 (somewhere): “Conservation of a name cannot cause another name to become illegitimate.”

Prop. E (427 – Turland & Wiersema in Taxon 72: 1186) Amend Art. 14 Note 4 clause (c) as follows (new text in bold, deleted text in strikethrough):

“(c) Conservation of names ~~is for~~ the 1952 Stockholm *Code* include: (1) those of the Special Committee for Phanerogamae and Pteridophyta, which became effective on 1 June 1940 under the authority of the VI IBC held in Amsterdam in 1935 (see Bull. Misc. Inform. Kew 1940: 81–134); (2) those of the Special Committee for Fungi, which became effective on 20 July 1950 at the VII IBC in Stockholm (see Regnum Veg. 1: 549–550. 1953); **(3) those of the Special Committee on Palaeobotanical Nomenclature, which also became effective on 20 July 1950 at the VII IBC in Stockholm (see Regnum Veg. 1: 548. 1953), but were omitted from both the Stockholm Code and the 1961 Paris Code.**”

Prop. F (125 – Rijkvorschel in Taxon 70: 1395) Add a new Art. 14.16 (or add a sentence at the end of Art. 14.15):

“14.16. Once it has taken effect, conservation applies retroactively (but see Art. 48.2(c), 52.2(b), and 52.n).”

Rapporteurs’ comments – *Prop. A* represents a renewed attempt to introduce the possibility of unrestricted conservation of any name at the rank of family and below. A proposal (Barkworth & al. in Taxon 64: 1339. 2015; Art. 14 Prop. A) with the same intended effect failed to gain support at the Shenzhen Congress.

Prop. B would allow “all combinations based on the rejected names” in Art. 14.4 to include both new combinations and replacement names. However, in this context “combinations” can mean only new combinations, because otherwise an illegitimate replacement name conserved against its replaced synonym would be conserved against itself. It was always the intention that “combinations” in Art. 14.4 and “combination” in Art. 14.7 meant “new

combination(s)”, evident from the discussion at the Sydney Congress (Greuter & Voss in Englera 2: 54–55. 1982) of the proposal that originally added this wording to the *Code*. At that time, referring to a combination being based on an earlier name meant that it had a basionym. The proposal should be amended so that only “new” is inserted before “combinations” in Art. 14.4 (and likewise in Art. 14.7) and “and replacement names” is not added. Those who agree should vote “ed.c.”

Prop. C would allow Art. 14.14 to be more effective in protecting the family names in App. IIB against being needlessly replaced by earlier isonyms through conservation proposals.

Prop. D concerns retroactivity of conservation and is linked to Prop. F (which is an alternative) and Art. 52 Prop. L. Prop. D seeks to establish that conservation actions with respect to spelling, gender and illegitimacy would have retroactive effect. The effect on spelling and gender seems uncontroversial, and this would seem to be already apparent in Art. 14.11 (“A name so conserved is to be attributed without change of date to the author who validly published it, not to an author who later introduced the conserved spelling or gender.”). The effect on illegitimacy, if newly made retroactive, would impact other provisions of the *Code* (see the discussion by Wiersema & al. in Taxon 65: 644. 2016). Article 52 Prop. L seeks to undo the impact this would have on superfluity by amending Art. 52. The entire objective here seems to be to make the historical treatment of later-conserved names as if it was correct by current rules, but this has no apparent impact on today’s nomenclature.

Prop. E would correct an omission of a group of names of fossil-taxa from Art. 14 Note 4, clarifying their date of conservation. The Nomenclature Committee for Fossils supports Prop. E (votes 12 : 0 : 0).

Prop. F is a less detailed alternative to Prop. D, with essentially the same impact. It is discussed under Prop. D.

Chapter II new Article

Prop. A (343 – Thiele & al. in Taxon 72: 1147) Add a new Section “Type-less names” to Chapter II with the following new Articles and Note:

“X.1. On or after 1 January 2026, when typification is not technically feasible, a name of a taxon other than a vascular plant or bryophyte may be published without a type, the application of the name instead being fixed using a DNA reference sequence (Art. X.9).”

“Note 1. For the purposes of Art. X.1, typification is regarded as technically not feasible if and only if physical specimens, illustrations, or cultures cannot reasonably be obtained using technologies available at the time of publication. Preservation of a specimen or culture is not considered unfeasible if a type specimen or culture could not be obtained merely for reasons of inconvenience, lack of access, or if a specimen or culture was lost or otherwise not collected or prepared when it could have been.”

“X.2. A reference sequence of a type-less name is that sequence to which the name of the taxon is permanently attached, whether as the correct name or as a synonym. The reference sequence is not necessarily the most typical or representative sequence of a taxon.”

“X.3. The reference sequence of a new combination or name at new rank (Art. 6.10) based on a type-less name is the reference sequence of the basionym even though it may have been applied erroneously to a taxon now considered not to include that reference sequence (but see Art. 48.1).”

“X.4. The reference sequence of a replacement name (Art. 6.11) for a type-less name is the reference sequence of its replaced

synonym even though it may have been applied erroneously to a taxon now considered not to include that reference sequence (but see Art. 41 Note 3 and 48.1).”

“X.5. The reference sequence of an autonym of a type-less name is the same as that of the name from which it is derived.”

“X.6. The reference sequence of a name of a genus or of any subdivision of a genus erected to accommodate only species with type-less names at time of publication is the reference sequence of a name of one of those species. For purposes of designation or citation of a reference sequence, the species name alone suffices, i.e. it is considered as the full equivalent of its reference sequence (see also Rec. 40A.3).”

“X.7. The reference sequence of a name of a family or of any subdivision of a family is the same as that of the generic name from which it is formed (see Art. 18.1), if the generic name has a designated reference sequence (Art. X.8). For purposes of designation or citation of a reference sequence, the generic name alone suffices.”

“X.8. In order to be validly published a type-less name must (a) be published in an approved journal (see App. Y, Art. X.9(b)) and (b) be accompanied in the protologue by (1) citation of the identifier issued for the reference sequence by a recognized online repository (see App. X and Art. X.9(a)), (2) specification of selected informative portions of the reference sequence, (3) a statement as to why it is believed that the taxon is novel and unnamed, and (4) an explanation of why a type specimen could not be isolated, cultured, or otherwise prepared.”

“X.9. The General Committee, after seeking advice from relevant specialist Committees and international societies, has the powers to (a) appoint one or more localized or decentralized, open and accessible electronic repositories to issue the identifiers required by Art. X.8(b)(1) (see App. X), (b) ratify a list of approved journals for valid publication of names with DNA sequences as types (see App. Y), and (c) cancel or alter such appointments or ratifications at its discretion.”

Rapporteurs’ comments – Prop. A is part of a set of proposals (Prin. Prop. A, Chap. II Prop. A, Art. 6 Prop. C, Art. 7 Prop. A, Chap. II new Art. Prop. A, Art. 38 Prop. D, Art. 39 Prop. A, Art. 40 Prop. C, Art. 44 Prop. C and Div. III Prop. Y) that would provide for the future valid publication of names of certain taxa other than vascular plants or bryophytes without nomenclatural types (so-called “type-less names”) by fixing their application using DNA reference sequences. This would only be possible, on or after 1 January 2026, “when typification is not technically feasible”, which would be the case “only if physical specimens, illustrations, or cultures cannot reasonably be obtained using technologies available at the time of publication”, with some further limitation on what could be considered unfeasible. The set of proposals would create an alternative pathway for valid publication of names of these organisms independent of that for other names requiring type indication (Art. 40). This would not impact the typification provisions in the *Code*, but would allow for the DNA reference sequence to substitute for a description or diagnosis. Stringent requirements would have to be satisfied (see Art. X.8) in the valid publication of such names, some of these overseen by the General Committee. Apart from a minor issue (see Art. 39 Prop. A), no fundamental nomenclatural problems are foreseen from acceptance of this set of proposals. An alternative set of proposals (see Chap. V Sect. 2 Prop. A), with effectively the same taxonomic coverage, seeks the same objective through modification of typification rules to permit reference DNA sequences to serve as types. The objective is to overcome the obstacle that taxa detected and characterized using DNA sequences, but unable to be isolated, cultured or

illustrated, are currently unnameable. Those voting may choose to support one or the other of these sets of alternative proposals, or neither. The Nomenclature Committee for Algae does not support Prop. A (votes 1 : 14 : 1). The Nomenclature Committee for Fungi does not support this set of proposals as a whole (votes 3 : 12 : 0). Some members of the latter Committee who voted “no” indicated that they could support such an innovation, depending on modifications to the proposals potentially resulting from deliberations of the Special-purpose Committee on DNA Sequences as Types for Fungi that is to report to the XII International Mycological Congress in Maastricht in August 2024.

Article 19

Prop. A (155 – Rijckevorsel in Taxon 71: 710) Amend Art. 19.1 and 19.3 as follows (new text in bold, deleted text in strikethrough):

“19.1. The name of a **subdivision of a family** is a plural adjective used as a noun; it is formed in the same manner as the name of a family (Art. 18.1) but by adding **the an appropriate termination (see Art. 19.3) –oideae** instead of ~~-aceae~~.”

“19.3. The ~~name of a tribe or subtribe is formed in the same manner as the name of a subfamily (Art. 19.1), except that the~~ termination is **–oideae for a subfamily**, ~~-eae~~ for a tribe, and ~~-inae~~ (but not ~~-virinae~~) for a subtribe.”

A further option would be to join Art. 19.3 to 19.1.

Prop. B (351 – Pročkův & Drábková in Taxon 72: 1150) Add a new Article after Art. 19.3:

“19.3bis. The name of a supergenus is identical to the generic name from which the supergenus name is derived.”

Rapporteurs’ comments – *Prop. A* would require names of subdivisions of families at ranks other than subfamily, tribe or subtribe to be automatically typified names formed from a generic name, not descriptive names, which is theoretically still possible under the current rules. Should, for example, a name of a “supertribe” be published, its termination would, however, not be specified by the *Code*.

Prop. B is discussed under Art. 4 Prop. A.

Article 20

Prop. A (205 – Stephan in Taxon 72: 447) Amend Art. 20.1 as follows (new text in bold, deleted text in strikethrough):

“20.1. The name of a genus is a noun in the nominative singular, or a word treated as such, and is written with an initial capital letter (see Art. 60.2). It may be taken from any source whatever, and may even be composed **arbitrarily (but see Art. 60.1) in an absolutely arbitrary manner**, but it must not end in ~~-virus~~.”

Prop. B (417 – Demoulin in Taxon 72: 1184) Add the following at the end of Art. 20.1 (new text in bold):

“20.1. The name of a genus is a noun in the nominative singular, or a word treated as such, and is written with an initial capital letter (see Art. 60.2). It may be taken from any source whatever, and may even be composed in an absolutely arbitrary manner, but it must not end in ~~-virus~~. **Names containing one or more orthographical errors are not composed in an absolutely arbitrary manner and are correctable under Art. 60.1. They are not to be considered names not validly published under Art. 32.1(c).**”

Prop. C (369 – Wiersema & al. in Taxon 72: 1159) Rearrange and amend Art. 20.2 as follows (new text in bold, deleted text in strikethrough):

“20.2. The name of a genus **published before 1 January 1912** may not coincide with a Latin technical term in use in morphology at the time of publication unless it was ~~published before 1 January 1912~~

~~and was~~ accompanied by a species name published in accordance with the binary system of Linnaeus.”

Prop. D (370 – Wiersema & al. in Taxon 72: 1159) Submit the generic names or designations in Table 1B [see Wiersema & al., l.c.] to the General Committee, which will refer them for examination to the specialist committee for the appropriate taxonomic group (see Div. III Prov. 2.2, 7.9 and 7.10). In order to retain those names that best serve stability of nomenclature, a Committee recommendation as to whether or not any of these “names” or any spelled exactly alike should be treated as validly published may then be put forward to an International Botanical Congress and, if ratified, will become a binding decision with retroactive effect.

Prop. E (371 – Wiersema & al. in Taxon 72: 1166) Add the following Note under Art. 20:

“*Note n.* Editions of the *Code* prior to the *Madrid Code* of 2025 included a provision precluding the valid publication after 1911 of the name of a genus that coincided with a technical term in use in morphology at the time of publication. While publication of such names is not recommended (see Rec. 20A.1(n)), in the interest of nomenclatural stability under the current *Code* binding decisions on the valid publication status for each case or any with identical spelling where this former provision applied are listed in App. VI and take retroactive effect.”

Prop. F (072 – Prado & al. in Taxon 70: 454) Amend Art. 20.3 (new text in bold, deleted text in strikethrough):

“20.3. The name of a genus ~~may not consist of two words, unless these words are~~ **must consist of one word (which may be formed by combining two or more words into one), or of two words** joined by a hyphen (but see Art. 60.12 for names of fossil-genera **and Art. H.6.2 for names of bigeneric hybrids**).”

Replace Ex. 7 and 8 with the following three Examples:

“*Ex. 7.* Names validly published that consisted of one word when originally published: *Quisqualis* L. (Sp. Pl., ed. 2: 556. 1762, ‘*Qvisqualis*’) (formed by combining two words into one); *Asplenium* L. (Sp. Pl.: 1078. 1753); *Mnium* Hedw. (Sp. Musc. Frond.: 188. 1801).”

“*Ex. 8.* Designation not validly published (Art. 32.1(c)) because it was composed of two separate words not connected by a hyphen: “*Uva ursi*” (Miller, Gard. Dict. Abr., ed. 4: *Uva ursi*. 1754); the corresponding name is correctly attributed to Duhamel (Traité Arbr. Arbust. 2: 371. 1755) as *Uva-ursi* (hyphenated when published).”

“*Ex. 8bis.* Names validly published that consisted of two words hyphenated when originally published: *Neves-armondia* K. Schum. (in Engler & Prantl, Nat. Pflanzenfam. Nachtr. 1: 302. 1897), *Sebastiano-schaueria* Nees (in Martius, Fl. Bras. 9: 158. 1847), and *Solms-laubachia* Muschl. ex Diels (in Notes Roy. Bot. Gard. Edinburgh 5: 205. 1912).”

Prop. G (111 – Majumdar in Taxon 70: 1386) Amend Art. 20.3 and Art. 60 Note 6 (new text in bold, deleted text in strikethrough) and delete Art. 60.12:

“20.3. The name of a genus may not consist of two **or more** words, unless these words are joined by a hyphen, **which is in all cases treated as an error to be corrected by deletion of the hyphen** (but see Art. 60.12 for names of fossil-genera).”

[Art. 60] “*Note 6.* Art. 60.11 refers only to epithets (in combinations), not to names of genera (for names of fossil-genera see Art. ~~60.12~~ **20.3**) or taxa at higher ranks; ~~a non-fossil generic name published with a hyphen can be changed only by conservation (Art. 14.11; see also Art. 20.3; but see Art. H.6.2).~~”

“~~60.12. The use of a hyphen in the name of a fossil genus is in all cases treated as an error to be corrected by deletion of the hyphen.~~”

Prop. H (261 – Doweld in Taxon 72: 687) Amend Art. 20.4 as follows (new text in bold) and add two new Examples:

“20.4. The following are not to be regarded as generic names:

(a) Words not intended as names.

(b) Unitary designations of species.

(c) **Designations representing fossil spore, pollen, or other microfossil groupings (substituting at generic level in artificial systems of classification) that are usually followed by an epithet.**

(d) **Designations representing microfossils (substituting at generic level in artificial systems of classification) intended to be distinct in rank from the fossil-genus names used by authors in the same work.”**

“*Ex. n1. “Leiotriletes”* (Naumova in Trudy XVII Sess. Mezhdunar. Geol. Kongr. 1937(1): 357. 1940 [“1939”]) was published as a “name” for a subgroup of fossil spores in an artificial classification of microfossils (“Group *Azonotriletes* Luber of Class *Irrimales* Naumova” in Naumova, l.c. 1940). Naumova explicitly stated that “in the description of the spores and pollen a binary nomenclature is adopted: the «generic» names are given to the author’s subgroups; and the names of «families», to groups”. “*Leiotriletes*” was not therefore a generic name, although it was used in binary combinations such as “*L. minutissimus*” (Naumova in Izv. Akad. Nauk S.S.S.R., Ser. Geol. 1949(4): 52. 1949). As a fossil-generic name, *Leiotriletes* was later validly published based on different fossil spore materials by various researchers nearly simultaneously and independently: *Leiotriletes* Naumova (in Trudy Inst. Geol. Nauk Akad. Nauk S.S.S.R. 143: 20, 17 [rank]. 27 Oct 1953) and *Leiotriletes* Naumova ex R. Potonié & Kremp (in Geol. Jahrb. 69: 120. 31 Mar 1954).”

“*Ex. n2. In the author’s artificial classification of fossil coccoliths, “Lophodolitus”* (Deflandre in Ann. Paléontol. 40: 146. 1954) was published with the rank of “manipula” for some fossil coccoliths (then classified as fossil protists of Coccolithophorida or now algae of *Prymnesiophyceae*); at the same time, the genera *Clathrolithus* Deflandre (l.c.: 168. 1954) and *Pyxolitus* Deflandre (l.c.: 170. 1954), explicitly published with the rank of genus in the same work, are considered as validly published generic names. As a genus, “*Lophodolitus*” was validly published later: *Lophodolitus* Deflandre ex Bramlette & Sullivan (in Micropaleontology 7: 145. 1961).”

Prop. I (373 – Wiersema & al. in Taxon 72: 1167) Delete Art. 20 Ex. 4–6; insert a new clause in Art. 20.4 (new text in bold):

“20.4. The following are not to be regarded as generic names:

[...]

(n) **Some words that have been widely used in pharmacopoeia or as descriptive morphological terms: *Balsamum, Bulbus, Caulis, Cortex, Flos, Herba, Lignum, Oleum, Radix, Spina.***”

Prop. J (262 – Doweld in Taxon 72: 687) Add a new paragraph to Art. 20 with two new Examples:

“20.n. Names with their rank denoted by the terms “pseudo-genus”, proposed for artificial fossil-taxa, or “form(a)-genus”, “organ(o)-genus”, “sporogenus”, or “morphogenus”, or their equivalents in modern languages, once permissible under past editions of this *Code*, are treated as having been published at the rank of genus.”

“*Ex. n3. Cycadeorhachis* Stopes (Cretac. Fl. 2: 53. 1915), originally published with the rank-denoting term “pseudo-genus”, is treated as published at the rank of fossil-genus, reflecting the author’s intention to consider “rachises of Cycadean foliage”, on which the name was based, as an artificial fossil-taxon with no clear relations with other fossil-taxa.”

“*Ex. n4. Maceopolipollenites* Leffingwell (in Spec. Pap. Geol. Soc. Amer. 127: 29. 1970) was published as an organ-genus for fossil

dispersed pollen; *Insulapollenites* Leffingwell (l.c.: 48. 1970) was created in the same work as a form-genus for fossil dispersed pollen; both generic names are treated as validly published at the rank of genus.”

Rapporteurs’ comments – Prop. A would slightly reword Art. 20.1 to use the same language as Art. 23.2 with regard to the arbitrary formation of names or epithets.

Prop. B (which is related to Art. 60 Prop. A–D) would provide support for correcting the spellings of generic names that might otherwise have been considered arbitrarily formed but contain what could be interpreted as orthographical errors. Seemingly it would have the same effect as the more concise Art. 20 Prop. A, although Prop. B would provide a more elaborate justification but with no parallel proposal giving the same justification for correcting the spelling of specific epithets in Art. 23.2.

Prop. C–E and *Prop. I* (with Rec. 20A Prop. B) comprise a set of proposals that would eliminate the application of Art. 20.2 (prohibiting valid publication of generic names that “coincide with a Latin technical term in use in morphology at the time”) to generic names published after 1911. Previous attempts to sunset or eliminate this provision, which has been plagued with difficulties of interpretation (see Linda in Arcadia & Lücking in Taxon 65: 903–905. 2016), at the 2017 Shenzhen Congress failed largely due to an absence of evidence on the impact this might have on nomenclatural stability. An exhaustive search for all cases where this provision has been or could have been applied was conducted, such that the impact of limiting the coverage of Art. 20.2 only to names published before 1912, as proposed in Prop. C, can now be predicted and mitigated. The mechanism for resolving any post-1911 applications of this provision would be to authorize (in Prop. D and E) a one-time batch of binding decisions (~30 essential + ~55 optional), at the discretion of Nomenclature Committees, on a defined set of relevant generic names (see Table 1B in Wiersema & al. in Taxon 72: 1158–1167. 2023). The need for this provision, originally believed to be necessary to prevent accidental valid publication of generic names used in the early 20th century pharmacopoeia (Greuter in Lindon & al. in PhytoKeys 150: 241. 2020), no longer exists, so these proposals would create a comprehensive and workable procedure for its removal.

Prop. F would modify Art. 20.3 to eliminate any false impression that a generic name formed from two words combined into one is not admissible. It would also serve to eliminate any doubt about the treatment of generic names formed from more than two words. If the proposal is accepted, its three Examples would be referred to the Editorial Committee.

Prop. G would automatically remove hyphens from any generic name validly published with a hyphen. This is already the case for fossil-generic names (Art. 60.12), and five generic names in other groups have had to be conserved solely to achieve this removal, so this proposal would obviate the need for any additional similar conservation proposals and uniformly treat all generic names with regard to hyphenation.

Prop. H, along with Art. 23 Prop. K and Art. 36 Prop. B, is part of a set of proposals relating to fossil-taxa that would clarify the status of artificial binary designations in the (mostly mid-1900s) palaeobotanical literature arising from artificial groupings of fossil spore, pollen and other microfossil taxa. Prop. H would eliminate these “names” for artificial non-generic groups or subgroups, treating them as designations not to be regarded as generic names; Art. 23 Prop. K has the same objective in relation to species designations. The Nomenclature Committee for Fossils does not support Prop. H (votes 0 : 12 : 0).

Prop. I is discussed under *Prop. C*.

Prop. J and *Art. 23 Prop. N* would clarify the status of names of fossil-taxa formerly published using now obsolete generic or specific rank-denoting terms that existed in previous *Codes*. *Prop. J* would treat names published using certain rank-denoting terms, e.g. “pseudogenus” or “morphogenus”, as having been published at the rank of genus; *Art. 23 Prop. N* deals with names that would be treated as having been published at the rank of species. The Nomenclature Committee for Fossils does not support *Prop. J* (votes 0 : 12 : 0).

Recommendation 20A

Prop. A (112 – Pillon & Hopkins in *Taxon* 70: 1388) In *Rec. 20A.1* delete clause (b) and amend clause (c) as follows (deleted text in strikethrough):

“20A.1. Authors forming generic names should comply with the following:

[...]

~~(b) Avoid names not readily adaptable to the Latin language.~~

(c) Not make names that are very long ~~or difficult to pronounce in Latin.~~”

Prop. B (372 – Wiersema & al. in *Taxon* 72: 1166) Add the following new clause to *Rec. 20A.1* (new text in bold):

“20A.1. Authors forming generic names should comply with the following:

[...]

(n) Not publish names for genera that coincide with technical terms currently in use in morphology.”

Rapporteurs’ comments – *Prop. A* and *Rec. 23A Prop. A* would remove some Recommendations for forming generic names and specific epithets in Latin that are said to be a “hindrance to increasing the use of vernacular names, eponyms from diverse origins, and words from indigenous languages”.

Prop. B is discussed under *Art. 20 Prop. C*.

Article 21

Prop. A (246 – Wisnev & Prado in *Taxon* 72: 678) Amend *Art. 21 Note 1* as follows (deleted text in strikethrough):

“*Note 1*. Names of subdivisions of the same genus, even if they differ in rank, are homonyms if they have the same epithet but are based on different types (*Art. 53.3*), ~~because the rank-denoting term is not part of the name.~~”

Rapporteurs’ comments – *Prop. A* is discussed under *Art. 6 Prop. M*.

Article 22

Prop. A (174 – Rijckevorsel in *Taxon* 71: 1330) Rephrase the first sentence of *Art. 22.2* so that it reads (new text in bold, deleted text in strikethrough):

“22.2. A name of a subdivision of a genus **that of which the protologue includes the type, previously or simultaneously established, (i.e. the original type or all elements eligible as type, for the name itself (Art. 10.2), or, if it has one, its basionym (Art. 7.3), or its replaced synonym (Art. 7.4 and 7.5), or the previously designated type)** of the adopted, legitimate name of the genus is not validly published unless its epithet repeats the generic name unaltered.”

Similar considerations should also apply to *Art. 26.2*.

Prop. B (394 – Wisnev in *Taxon* 72: 1177) Amend *Art. 22.2* and *26.2* as follows (new text in bold, deleted text in strikethrough):

“22.2. A name of a subdivision of a genus that includes the type **(as specified in Art. 52.2(a)–(d) i.e. the original type or all elements eligible as type or the previously designated type)** of the adopted, legitimate name of the genus is not validly published unless its epithet repeats the generic name unaltered. [...]”

“26.2. A name of an infraspecific taxon that includes the type **(as specified in Art. 52.2(a)–(d) i.e. the holotype or all syntypes or the previously designated type)** of the adopted, legitimate name of the species to which it is assigned is not validly published unless its final epithet repeats the specific epithet unaltered. [...]”

Rapporteurs’ comments – *Prop. A* would make two adjustments to *Art. 22.2*. The first (together with *Art. 48 Prop. D*) would eliminate usage of “original type” from three Articles (*Art. 22.2*, *48.2* and *52.2*) on the grounds that it is not defined (but see *Art. 10 Prop. E*, which includes a definition) and not uniformly used. The second (together with *Art. 48 Prop. E*) would make explicit what should be apparent already from *Art. 7.3* and *7.4*, i.e. that new combinations and replacement names are typified by the types of their basionyms and replaced synonyms. It is debatable whether or not *Prop. A*, while sacrificing the current conciseness and fluency of *Art. 22.2*, adds anything to improve its understanding.

Prop. B would replace the parenthetical statements identifying the elements involved in inclusion of the type of (1) a genus for subdivisions of genera in *Art. 22.2* or (2) a species for infraspecific taxa in *Art. 26.2* by an identical reference to *Art. 52.2(a)–(d)* in both Articles. In the course of incorporating, through this reference, the missing but necessary inclusion of the previously conserved type (*Art. 52.2(c)*) or illustrations of types (*Art. 52.2(d)*) for additional consideration, *Prop. B* would remove the prior enumeration of elements formerly specific to generic types (“the original type or all elements eligible as type or the previously designated type”) and to species types (“the holotype or all syntypes or the previously designated type”) from the respective Article. One might argue that including an illustration of a type is, in essence, inclusion of the type itself, so this part is unnecessary. Therefore, an alternative approach to solve this problem would be to simply modify in each case the “or the previously designated type” to read “**or the previously designated or conserved type**”. Those who prefer this alternative approach should vote “ed.c.”

Article 23

Prop. A (073 – Garland in *Taxon* 70: 455) Amend *Art. 23.1* and *Art. 23 Ex. 1* as follows (new text in bold):

“23.1. The name of a species is a binary combination consisting of the name of the genus followed by a single specific epithet in the form of an adjective, a noun in the genitive, or a word in apposition, **but not a phrase in the ablative case** (see also *Art. 23.6 and 23.7*). [...]”

“*Ex. 1. Adiantum capillus-veneris, Atropa bella-donna, Cornus sanguinea, Dianthus monspessulanus, Embelia sarasinorum, Fumaria gussonei, Geranium robertianum, Impatiens noli-tangere, Papaver rhoeas, Spondias mombin* (an indeclinable epithet), *Uromyces fabae*, **but not Solanum “fructu-tecto” (Cavanilles, Icon. 4: 5. 1797).**”

Prop. B (156 – George in *Taxon* 71: 711) Amend the first sentence of *Art. 23.1* as follows (new text in bold):

“23.1. The name of a species is a binary combination consisting of the name of the genus followed by a single specific epithet in the form of an adjective, a noun in the genitive, **an adverb**, or a word in apposition (see also *Art. 23.6*). [...]”

Prop. C (207 – Rijkcevorsel in Taxon 72: 449) Add a Note to Art. 23.1 supported by an Example:

“*Note. n.* An epithet in apposition need not match the generic name in gender or number but must be in the same case (the nominative case, Art. 20.1). If an epithet in apposition is composed from more than one word, this may be a compound (with a noun in final position, see Art. 60.10bis, Rec. 60G) that serves semantically as if it were an adjective, or it may be composed of words that can stand independently, in which case the additional word(s) relate(s) grammatically not to the generic name but to the noun in apposition; an additional word may be in the form of an adjective, a noun in the genitive, or a word in apposition.”

“*Ex. n.* Examples of epithets in apposition. In the form of compounds: *Bactrodesmium betulicola*, *Calocedrus macrolepis*, *Borassus pinnatifrons*. Composed of words that usually stand independently: *Strychnos nux-blanda*: “nux” in the nominative, “blandus, -a, -um” an adjective to “nux”; *Planchonella dies-reginae*: “dies” in the nominative, “regina” in the genitive; *Palaquium regina-montium*: “regina” in the nominative, “mons” in the genitive (plural). In *Arenaria mons-cragus*, both “mons” and “cragus” (a geographical name) are nouns in the nominative.”

Prop. D (114 – Maity & Dash in Taxon 70: 1388) Amend Art. 23.2 as follows (new text in bold, deleted text in strikethrough), add a new Example under it, and delete Rec. 23A.3(d):

“23.2. The epithet in the name of a species may be taken from any source whatever ~~and may even~~ **but may not** be composed arbitrarily (but see also Art. 60.1). **In a name published on or after 1 January 2026, the specific epithet may not be formed of two or more hyphenated words.**”

[Art. 23] “*Ex. n.* *Cycas pschannae* R. C. Srivast. & L. J. Singh (in Int. J. Curr. Res. Biosci. Pl. Biol. 2(8): 35. 2015) and *Kobresia resrivastavae* Jana (in Indian J. Fundam. Appl. Life Sci. 2: 256. 2012) have specific epithets unpronounceable in Latin, due to the presence of consecutive consonants at the beginning of the epithets. These epithets were formed from abbreviated names of scientists P. S. Channa and R. C. Srivastava, respectively. Such arbitrary formations of specific epithets are not permitted on or after 1 January 2026.”

“23A.3. In forming specific epithets, authors should comply also with the following:

[...]

~~(d) Avoid those formed of two or more hyphenated words.”~~

Prop. E (203 – Stephan in Taxon 72: 447) Amend Art. 23.2 and Art. 24.2 as follows (new text in bold), and delete Rec. 60F.1:

“23.2. The epithet in the name of a species may be taken from any source whatever, and may even be composed arbitrarily (but see Art. 60.1). **All specific epithets are to be written with an initial lower-case letter (see Art. 60.2).**”

“24.2. Intraspecific epithets are formed like specific epithets and, when adjectival in form and not used as nouns, they agree grammatically with the generic name (see Art. 23.5 and 32.2). **All infra-specific epithets are to be written with an initial lower-case letter (see Art. 60.2).**”

~~“60F.1. All specific and infraspecific epithets should be written with an initial lower-case letter.”~~

Prop. F (204 – Stephan in Taxon 72: 447) Amend Art. 23.4 as follows (new text in bold, deleted text in strikethrough):

“23.4. ~~The~~ specific epithet, with or without the addition of a transcribed symbol, **published prior to 1 January 2026**, may not exactly repeat the generic name (a designation formed by such repetition is a tautonym).”

Prop. G (157 – George in Taxon 71: 711) Amend the first sentence of Art. 23.5 as follows (new text in bold) and add a new Example:

“23.5. The specific epithet, when adjectival in form and not used as a noun, agrees with the gender of the generic name; when the epithet is a noun in apposition or a genitive noun, it retains its own gender and termination irrespective of the gender of the generic name; **when the epithet is an adverb, it retains its spelling irrespective of the gender of the generic name.** [...]”

“*Ex. 7bis.* Names with an adverb for an epithet: *Acrostichum deorsum* H. Karst., *Brachyotum seorsum* Wurdack, *Caladenia postea* Hopper & A. P. Br., *Phaca unde* Rydb., *Rubus satis* L. H. Bailey.”

Prop. H (115 – Garland & Prado in Taxon 70: 1389) Amend Art. 23.5 as follows (new text in bold) and add an Example:

“23.5. The specific epithet, when adjectival in form and not used as a noun, agrees with the gender of the generic name; when the epithet is a noun in apposition or a genitive noun **or a noun and its accompanying adjective in the genitive case**, it retains its own gender and termination irrespective of the gender of the generic name. Epithets not conforming to this rule are to be corrected (see Art. 32.2) to the proper form of the termination (Latin or transcribed Greek) of the original author(s). In particular, the usage of the word element *-cola* as an adjective is a correctable error.”

“*Ex. n.* Correctable errors in Latin epithets that consist of a noun and its accompanying adjective in the genitive case: *Agrostophyllum montis-jayani* Ormerod (in Orchadian 17: 379. 2013, ‘*montis-jayanum*’); *Loranthus cycnei-sinus* Blakely (in Proc. Linn. Soc. New South Wales 47: 392. 1922, ‘*Cycneus-Sinus*’); *Salicornia sinus-persici* Akhani (in Pakistan J. Bot. 40: 1638. 2008, ‘*sinus-persica*’).”

Prop. I (216 – Rijkcevorsel in Taxon 72: 451) Add a new rule to Art. 23 (or possibly to Art. 60) supported by three Examples:

“23.5bis. In a specific epithet composed of what originally were words that in (botanical) Latin usually stand independently (for a compound see Art. 60.10, 60.10bis/ter), whether separated by a hyphen or not, these words must relate correctly to each other with regard to Latin grammar. In particular, in an epithet derived from a geographical or personal name that consists of a noun in the genitive in non-final position and an adjective in final position, the adjective must be changed to the corresponding noun in the genitive. If the adjective itself is not derived from a name but from general Latin and a corresponding noun is not available in Latin, the adjective must be maintained but must agree (in gender, case and number) with the noun in the genitive.”

“*Ex. n1.* Correctable errors in epithets derived from a personal or geographical name that at valid publication consisted of a noun in the genitive and an adjective: *Centaurea carolipau* Fern. Casas & Susanna (in Fontqueria 1: 2. 1982, ‘*carolipauana*’), honouring Carlos Pau; *Calamintha caroli-henrici* Kit Tan & Sorger (in Pl. Syst. Evol. 155: 100. 1987, ‘*caroli-henricana*’), honouring Karl Heinz Rechinger; *Agrostophyllum montis-jayae* Ormerod (in Orchadian 17: 379. 2013, ‘*montis-jayanum*’), after Mt Jaya; *Dracontia montis-mortis* Karremans & Bogarin (in Syst. Bot. 38: 307. 2013, ‘*montis-mortense*’), after the Cerro de la Muerte.”

“*Ex. n2.* In *Syzygium montis-veneti* Craven (in Blumea 66: 74. 2021, ‘*montis-venetus*’), after the Blue Mountain, ‘*venetus*’ is the nominative case of an adjective that (correctly) agrees in gender with the noun in the genitive (“mons” is masculine), not with the generic name (which is neuter). The Latin adjective “venetus, -a, -um” (in the sense used here: “blue”) has no corresponding Latin noun

(the plural noun *Veneti* refers to a people): here, the adjective is to be maintained but adjusted to its genitive: ‘*veneti*’.”

“*Ex. n3.* Not to be altered is the epithet in *Loranthus cycneus-sinus* Blakely (in Proc. Linn. Soc. New South Wales 47: 392. 1922, ‘*Cycneus-Sinus*’) because this can be a correctly formed epithet in apposition (the fourth declension noun “*sinus*” has the same nominative form as the genitive). This form is not recommended, but there is no evidence that the epithet is incorrectly formed.”

Prop. J (074 – Garland in Taxon 70: 455) As an alternative to Prop. 073 [Art. 23 Prop. A], add a new clause to Art. 23.6 and a new Example as follows:

[23.6. The following designations are not to be regarded as species names:]

“(x) Designations consisting of a generic name followed by an epithet in the form of a phrase in the ablative case (but see Art. 23.7).”

“*Ex. 11bis.* *Solanum* “*fructu-tecto*” (Cavanilles, Icon. 4: 5. 1797) is a generic name followed by an epithet in the form of a phrase in the ablative case. It is not to be regarded as a species name.”

Prop. K (264 – Doweld in Taxon 72: 687) Amend Art. 23.6 as follows (new text in bold) and add a new Example:

“23.6. The following designations are not to be regarded as species names:

(a) Designations consisting of a generic name followed by a phrase name (Linnaean “*nomen specificum legitimum*”) commonly of one or more nouns and associated adjectives in the ablative case, but also including any single-word phrase names in works in which phrase names of two or more words predominate.

(b) Other designations of species consisting of a generic name followed by one or more words not intended as a specific epithet.

(c) Designations of species consisting of a generic name followed by two or more adjectival words in the nominative case.

(d) Formulae designating hybrids (see Art. H.10.2).

(e) Designations formed as a combination of the name of the fossil pollen (sub)group followed by an epithet.”

“*Ex. n5.* “*Leiotriletes minutissimus*” (Naumova in Izv. Akad. Nauk S.S.S.R., Ser. Geol. 1949(4): 52. 1949), originally proposed for fossil sporomorphs (erroneously treated as spores), is not a fossil-species name (although labelled “*sp. nov.*”), because it is formed as a combination of the fossil pollen subgroup “*Leiotriletes*” (Naumova in Trudy XVII Sess. Mezhdunar. Geol. Kongr. 1937(1): 357. 1940 [“1939”]) and the sporomorph epithet “*minutissimus*”. The name of this microfossil, now treated in the algal group *Acrutar-cha*, was first validly published as *Leiosphaeridia minutissima* Jankauskas (Mikrofoss. Dokembr. S.S.S.R.: 79. 1989). Although Jankauskas wrongly transferred “*Leiotriletes minutissimus*” to the fossil-genus *Leiosphaeridia* Eisenack (in Palaeontographica, Abt. A, Paläozool. 110: 2. 1958), he otherwise met the conditions for valid publication of the name of a new fossil-taxon.”

Prop. L (075 – Garland in Taxon 70: 455) If either Prop. 073 or Prop. 074 [Art. 23 Prop. A or J] is accepted, amend Art. 23.7 and Art. 60 Ex. 41 as follows (new text in bold, deleted text in strikethrough):

“23.7. **Names in which Linnaeus used phrases in the ablative case** ~~Phrase names used by Linnaeus~~ as specific epithets (“*nomina trivialia*”) are to be corrected in accordance with later usage by Linnaeus himself (but see Art. 23.6(e)).”

[Art. 60] “*Ex. 41.* Hyphen to be maintained: *Athyrium austro-occidentale* Ching (in Acta Bot. Boreal.-Occid. Sin. 6: 152. 1986); *Enteromorpha roberti-lamii* H. Parriaud (in Botaniste 44: 247. 1961), in which the given name and surname stand independently because they are separately latinized; *Piper pseudo-oblongum*

McKown (in Bot. Gaz. 85: 57. 1928); *Ribes non-scriptum* (Berger) Standl. (in Publ. Field Mus. Nat. Hist., Bot. Ser. 8: 140. 1930); ~~*Solanum fructu-tecto* Cav. (Icon. 4: 5. 1797)~~; *Vitis novae-angliae* Fernald (in Rhodora 19: 146. 1917).”

Prop. M (206 – Zamora in Taxon 72: 448) Add a new Article under Art. 23 (preferably after Art. 23.5) and one or more of the following Examples:

“23.n. When the final epithet of a name can be interpreted as belonging to two different grammatical categories (e.g. an adjective and a noun), both being correct under the rules, a subsequent author may choose (directly or indirectly) one of those categories, and the first such choice to be effectively published (Art. 29–31) is to be followed.”

“*Ex. n1.* The final epithet in *Ruellia hybrida* Pursh (Fl. Amer. Sept. 2: 420. 1813) may be considered either as a noun in apposition or a feminine adjective, neither option being indicated in the protologue. When the final epithet was combined as *Dipteracanthus ciliosus* var. *hybridus* (Pursh) Nees (in Candolle, Prodr. 11: 123. 1847), Nees chose to treat it as an adjective, and his choice is to be followed.”

“*Ex. n2.* The final epithet in *Erigeron florifer*, as so spelled by Hooker (Fl. Bor.-Amer. 2: 20. 1834), could be interpreted as a masculine adjective or a noun in apposition, because this information was not provided in the protologue. The final epithet was subsequently combined in *Haplopappus* (as ‘*Aplopappus*’) by Hooker & Arnott (Bot. Beechey Voy.: 351. 1839) and in *Stenotus* by Torrey & Gray (Fl. N. Amer. 2: 238. 1842), but no choice of either form was performed there. The first choice was made by Gray (in Proc. Amer. Acad. Arts 16: 84. 1880), who published the combination *Townsendia florifer*, thus treating the final epithet as a noun in apposition. This choice was subsequently followed in, e.g., *T. florifer* var. *communis* M. E. Jones (in Proc. Calif. Acad. Sci., ser. 2, 5: 697. 1895) and *T. florifer* var. *watsonii* (A. Gray) Cronquist (in Leaflet. W. Bot. 6: 49. 1950, ‘*Watsoni*’). The epithet “*florifer*” is therefore treated as a noun in apposition and is not to be altered to the adjectival “*florifera*” or “*floriferum*” in combinations under feminine or neuter generic names.”

“*Ex. n3.* When *Peziza lachnoderma* Berk. (in Hooker, Bot. Ant. arct. Voy., III, Fl. Tasman. 2: 274. 1859) was published, Berkeley did not indicate whether the final epithet was a noun in apposition or a feminine adjective, and both interpretations are possible. A combination made by Rehm (in Ber. Naturhist. Augsburg 26: 76. 1881), currently accepted in *Dasyscyphus*, did not effect a choice because, at that time, Rehm combined the final epithet under a feminine orthographical variant of the generic name, “*Dasyscypha*”. The first choice was made by Kuntze (Revis. Gen. Pl. 3: 446. 1898), who effectively published the combination *Atractobolus lachnoderma* (Berk.) Kuntze under a masculine generic name, unambiguously using the final epithet as a noun in apposition, a choice that is to be followed.”

Prop. N (263 – Doweld in Taxon 72: 687) Add a new paragraph to Art. 23:

“23.n. Names with their rank denoted by the terms “*form(a)-species*”, “*organ(o)-species*”, “*sporospecies*”, “*species praedicta*”, “*sporomorpha*” (if the epithet is associated with a generic name, not an artificial spore group designation), “*morphospecies*”, or their equivalents in modern languages, once permissible under past editions of this *Code*, are treated as having been published at the rank of species.”

Rapporteurs’ comments – Prop. A and Prop. J are alternatives and would prevent a phrase in the ablative case from being used as a specific or infraspecific epithet, except those published by Linnaeus and allowed under Art. 23.7. Under the current rules, a few

names (see Garland in Taxon 70: 648–652. 2021) such as *Solanum fructu-tecto* Cav. are validly published, apparently contrary to botanical tradition and editions of the *Code* from Berlin to Melbourne, but they would become not validly published if Prop. A or J was accepted.

Prop. B, *Prop. G* and Art. 24 *Prop. A* would make explicit what could be considered as implicit in Art. 23.1, 23.2, 23.5 and 24.2, i.e. that specific and infraspecific epithets may be adverbs, in which case their termination is independent of the gender of the generic name and an improper Latin or transcribed Greek termination is correctable under Art. 32.2. See comments under *Prop. G*.

Prop. C would add a Note and an Example explaining epithets in apposition, in particular those that consist of more than one word, and how they should be treated grammatically. Although some might find this content helpful, it might not be important enough to include in the *Code*.

Prop. D would eliminate both arbitrarily composed specific (and infraspecific) epithets and, if they were published after 2025, epithets containing hyphens. It is not entirely clear what is arbitrary and what is not, so this part of the proposal, which has no date limitation, could create doubts as to the validly published status of some existing names. If this part of the proposal were instead date-limited, the same uncertainties would apply to future names.

Prop. E would make it a rule, rather than a Recommendation, to write specific and infraspecific epithets with a lower-case initial letter. It could be argued that disobeying the rule when publishing a new name would fail to meet the requirement of Art. 32.1(c) and such a name would not be validly published (the form of the name would not comply with Art. 23.2 or 24.2), although the author apparently believes that matters of typography (Art. 60.2) fall outside of this requirement. This is not the first attempt to make the initial lower-case letter mandatory: at the Shenzhen Congress, a proposal (Rijckevorsel in Taxon 65: 404. 2016; Art. 23 *Prop. B*) was rejected (Lindon & al. in PhytoKeys 150: 109. 2020) apparently from fear of making existing names not validly published. The only difference in the present *Prop. E* is that it includes a cross-reference to Art. 60.2.

Prop. F would alter the wording of Art. 23.4 to permit the valid publication of tautonyms, in which the specific epithet exactly repeats the generic name, after 2025. The proposer argues that this and other proposed revisions would “simplify the *Code*”, but would adding yet another date-limited provision affecting valid publication be a simplification? Such a tautonym, although acquiring priority only after 2025, may have been already published, though not validly, over a century ago, perhaps by the same author(s) to whom the new name is ascribed, thereby creating confusion on its valid publication date.

Prop. G is connected with *Prop. B* (see comments there) and Art. 24 *Prop. A*. The current wording in *Prop. G*: “it [an adverb] retains its spelling irrespective of the gender of the generic name”, could be interpreted to mean that an originally improper termination of an adverb would have to be retained. To avoid this interpretation, an improved wording would be “**its termination is independent of the gender of the generic name**”. Those who consider that adverbs should be explicitly regulated in Art. 23 and favour this amendment should vote “ed.c.” for *Prop. G*.

Prop. H, like *Prop. G*, would account for another category of specific epithets in Art. 23.5, in this case a genitive noun with an accompanying adjective. Although epithets with an improper Latin or transcribed Greek termination are correctable under Art. 32.2, and ‘*Loranthus Cycneus-Sinus*’ [see accompanying Ex. n.] appears to

be correct (named after Cygnet Bay, with *sinus* a nominative noun in apposition and *cycneus* an adjective agreeing with its gender), some might find the proposed addition useful. If *Prop. H* is accepted, the associated Example would be referred to the Editorial Committee.

Prop. I attempts to address the same issue as *Prop. H*, i.e. epithets consisting of a genitive noun with an accompanying adjective, but would add a new Article and three Examples, which the author suggests could otherwise be placed in Art. 60, although some might consider this unnecessarily complex even for that part of the *Code*.

Prop. J is discussed under *Prop. A*.

Prop. K would not be necessary if Art. 20 *Prop. H* were to be accepted, because Art. 35.1 already establishes that the name of a species could not exist (i.e. would not be validly published) unless the corresponding generic name was validly published, and *Prop. H* would prevent the fossil pollen (sub)group names in question from being regarded as generic names. The Nomenclature Committee for Fossils does not support *Prop. K* (votes 0 : 12 : 0).

Prop. L could be considered independently from *Prop. A* or *Prop. J*. By restricting Art. 23.7 to epithets that are phrases in the ablative case, the “but see” cross-reference to Art. 23.6(c) would cease to be necessary. This seems to simplify the Article without changing its effect. The two names included in Art. 23 Ex. 22 are the only ones to which Art. 23.7 applies, and there are no names with epithets in other cases except the nominative, to which Art. 23.6(c) applies.

Prop. M would provide a mechanism, similar to that employed in Art. 11.5 and Art. 62.3 (using the first subsequent effectively published choice), for establishing how a final epithet, which on first usage could be interpreted as either an adjective or a noun, is to be treated in later combinations. The proposer provides evidence of the uncertainty and alternative spellings that persist in such cases, and proposes a workable solution. Although no mention of the application of this new rule to infraspecific epithets was made, a cross-reference from Art. 24.2 to this provision would seem to be all that would be required to establish this. If *Prop. M* is accepted, its three Examples would be referred to the Editorial Committee.

Prop. N is discussed under Art. 20 *Prop. J*, and would treat names published using certain rank-denoting terms, e.g. “form(a)-species”, “sporospecies” or “sporumorpha”, as having been published at the rank of species. The Nomenclature Committee for Fossils does not support *Prop. N* (votes 0 : 12 : 0).

Recommendation 23A

Prop. A (113 – Pillon & Hopkins in Taxon 70: 1388) Amend Rec. 23A.3 clause (b) as follows (deleted text in strikethrough):

“23A.3. In forming specific epithets, authors should comply also with the following:

[...]

(b) Avoid epithets that are very long ~~or difficult to pronounce in Latin.~~”

Prop. B (177 – Mosyakin in Taxon 71: 1333) Add a new clause to Rec. 23A.3 as follows (new text in bold):

“23A.3. In forming specific epithets, authors should comply also with the following:

(a) Use Latin terminations insofar as possible.

[...]

(k) **Not dedicate species to persons quite unconnected with botany, mycology, phycology, or natural science in general, or the practitioners thereof.**”

Rapporteurs’ comments – *Prop. A* is discussed under Rec. 20A *Prop. A*.

Prop. B would extend to specific epithets the Recommendation that already applies to generic names (Rec. 20A.1(h)), with additional wording to avoid any implication that species should not be dedicated to persons connected with the practitioners of botany, mycology, etc.

Recommendation 23B (new)

Prop. A (208 – *Rijckevorsel in Taxon 72: 450*) Add a new Recommendation to Art. 23 supported by an Example:

“23A.2bis/23B.1. In forming specific epithets, authors should avoid the use of a word in apposition when an accepted Latin adjective or noun in the genitive is available. An epithet in apposition should preferably be reserved for descriptive epithets that, by tradition, semantically serve as if adjectives (e.g. *aesculicola*, *brevicalyx*, *chrysolepis*, *crassipes*, *leucothrix*, *longifrons*, *microglochin*, *rhodoxylon*, *salicicola*) and to commemorate words that do not lend themselves well to latinization (especially vernacular names).”

“*Ex. n1.* Examples of nouns for which accepted Latin forms are available and that need not be used: *elephanti* (or *elephantis*), *elephantorum* (or *elephantum*), *elephantinus*, -a, -um, rather than *elephas*; *draconis*, *draconteus*, -a, -um rather than *draco*; *jovis* rather than *jupiter*; *macrostachyus*, -a, -um rather than *macrostachys*; *margaritaceus*, -a, -um, rather than *margarita*.”

Prop. B (209 – *Rijckevorsel in Taxon 72: 450*) Add a new Recommendation to Art. 23 or Art. 60 supported by an Example:

“23B.2/60D.2. When forming names for species of significant importance to indigenous people in its area of occurrence, authors should consider adopting a widely used vernacular name as an epithet (as a noun in apposition, Art. 23.1).”

“*Ex. n2.* Examples of vernacular names commemorated as epithets in apposition: *Tabernanthe iboga*, *Diospyros kaki*, *Agave karatto*, *Pistacia khinjuk*, *Dimocarpus longan*, *Zea mays*, *Amomum mioga*, *Mimosa saman*, *Enterolobium timboïva*.”

Prop. C (210 – *Rijckevorsel in Taxon 72: 450*) Add a new Recommendation to Art. 23 or Art. 60 supported by an Example:

“23B.3/60D.3. When adopting vernacular names as specific epithets, authors should consider using the vernacular name in its pure form (as a noun in apposition), with minimum transliteration, rather than in a latinized form (Rec. 23A.3(a) notwithstanding).”

“*Ex. n3.* The latinization of the epithet in *Cedrela mahagoni*, from “mahogany” (itself presumed to be derived from “m’oganwo”), has occasionally caused confusion.”

Rapporteurs’ comments – *Prop. A* would recommend on what in the author’s opinion would be the appropriate use of a word in apposition as a specific epithet. Some might question whether such a Recommendation really improves the utility of the *Code*.

Prop. B would urge authors to adopt vernacular names as specific epithets in particular cases. This is similarly encouraged in Rec. 38F *Prop. A*.

Prop. C would advise against attempting to latinize vernacular names. This could perhaps be combined editorially with *Prop. B* if both proposals were accepted.

Article 24

Prop. A (158 – *George in Taxon 71: 711*) Amend Art. 24.2 as follows (new text in bold):

“24.2. Intraspecific epithets are formed like specific epithets and, when adjectival in form and not used as nouns **or adverbs**, they agree grammatically with the generic name (see Art. 23.5 and 32.2).”

Prop. B (247 – *Wisnev & Prado in Taxon 72: 679*) Amend Art. 24 Note 2 as follows (deleted text in strikethrough):

“*Note 2.* Names of infraspecific taxa within the same species, even if they differ in rank, are homonyms if they have the same final epithet but are based on different types (Art. 53.3), ~~because the rank-denoting term is not part of the name.~~”

Rapporteurs’ comments – *Prop. A* is discussed under Art. 23 *Prop. B* and *G*.

Prop. B is discussed under Art. 6 *Prop. M*.

Article 29

Prop. A (333 – *Thiele & al. in Taxon 72: 1144*) Amend Art. 29.1 as follows (new text in bold):

“29.1. Publication **(with the exception of DNA sequences used for typification; see Art. X.1)** is effected, under this *Code*, by distribution of printed matter (through sale, exchange, or gift) to the general public or at least to scientific institutions with generally accessible libraries. Publication is also effected by distribution on or after 1 January 2012 of electronic material in Portable Document Format (PDF; see also Art. 29.3 and Rec. 29A.1) in an online publication with an International Standard Serial Number (ISSN) or an International Standard Book Number (ISBN).”

Prop. B (317 – *Govaerts & Kirk in Taxon 72: 953*) Add a new Article to Art. 29 to allow for effective publication by registration only:

“29.1bis. On or after 1 January 2026, publication is also effected for new combinations, names at new rank (Art. 6.10), and replacement names (Art. 6.11) by registration of the new combination, name at new rank, or replacement name at a recognized nomenclatural repository (Art. 42). The date of effective publication of such registered names will be the date they first appear on the repository website.”

Rapporteurs’ comments – *Prop. A* is part of a set of proposals that would provide for the future valid publication of names of microscopic algae or microfungi with DNA sequences as types (see Chap. V Sect. 2 *Prop. A*). *Prop. A* is unnecessary for reasons given under Art. 8 *Prop. D*. The Nomenclature Committee for Algae does not support *Prop. A* (votes 1 : 14 : 1).

Prop. B and Art. 41 *Prop. I* would permit nomenclatural novelties other than names of new taxa to be effectively and validly published by registration at a recognized nomenclatural repository. This would permit a new format of electronic publication, aside from PDF. The implications of this are discussed further under Art. 41 *Prop. I*. The aim is to streamline what is “largely a technical matter of no intrinsic scientific merit”, i.e. publishing new combinations, names at new rank and replacement names when the taxonomic aspects of such naming are dealt with in other publications. The authors recognize the possibility of opening the floodgates to countless nomenclatural novelties devoid of peer-review and unsupported by taxonomic evidence in associated publications, but they point out that such unscientific bulk output is already possible under the current rules. The idea seems to be that the benefits would outweigh the drawbacks. Unless nomenclatural repositories for algal or plant names were recognized under Art. 42, the proposal would apply only to fungal names (see Art. F.5), for which Fungal Names (<https://nmdc.cn/fungalnames/>), Index Fungorum (<http://www.indexfungorum.org/>) and MycoBank (<https://www.mycobank.org/>) are currently recognized nomenclatural repositories.

Article 30

Prop. A (178 – *Doweld in Taxon 71: 1335*) Delete Art. 30 Note 1, amend Art. 30.3, and revise Ex. 5–7 accordingly (new text in bold, deleted text in strikethrough):

~~“Note 1. An electronic publication may be a final version even if details, e.g. volume, issue, article, or page numbers, are to be added or changed, provided that those details are not part of the content (see Art. 30.3).”~~

“30.3. Content of an electronic publication includes that which is visible on the page, e.g. text, tables, illustrations, etc., ~~but it excludes volume, issue, article, and page numbers, etc.~~, but it also excludes external sources accessed via a hyperlink or URL (Uniform Resource Locator).”

“Ex. 5. A paper describing the new genus *Partitatheca* and its four constituent species, accepted for the *Botanical Journal of the Linnean Society* (ISSN 0024-4074, print; ISSN 1095-8339, online), was placed online on 1 February 2012 as an “Early View” PDF document with preliminary pagination (1–29). This was **not** evidently the version considered final by the journal’s publisher ~~although because~~, in the document itself, it was declared the “Version of Record” (an expression defined by the standard NISO-RP-8-2008). Later, in the otherwise identical electronic version published together with the printed version on 27 February 2012, the volume pagination (229–257) was added. A correct citation of the generic name is: *Partitatheca* D. Edwards & al. in Bot. J. Linn. Soc. 168 ~~(online): 12 of 29~~, 230. ~~1 Feb 2012, or just “... 168 (online): 230. 1 Feb 2012.”~~

“Ex. 6. The new combination *Rhododendron aureodorsale* was made in a paper in *Nordic Journal of Botany* (ISSN 1756-1051, online; ISSN 0107-055X, print), first ~~effectively~~ published online on 13 March 2012 in “Early View”, the “Online Version of Record published before inclusion in an issue”, with a permanent Digital Object Identifier (DOI) but with preliminary pagination (1-EV to 3-EV). When the printed version was published on 20 April 2012, the pagination of the electronic version was changed to 184–186 and the date of the printed version was added, **so the earlier electronic version with preliminary pagination was not effectively published**. The combination can be cited as *Rhododendron aureodorsale* (W. P. Fang ex J. Q. Fu) Y. P. Ma & J. Nielsen in *Nordic J. Bot.* 30 ~~(online): 184. 13 Mar~~ **20 Apr** 2012 (DOI: <https://doi.org/10.1111/j.1756-1051.2011.01438.x>).”

“Ex. 7. Two new *Echinops* species, including *E. antalyensis*, were described in *Annales Botanici Fennici* (ISSN 1797-2442, online; ISSN 0003-3847, print) in a paper ~~effectively~~ published in its definitive form on 13 March 2012 as an online PDF document, still with preliminary pagination ([1]–4) and the watermark “preprint”. When the printed version was published on 26 April 2012, the online document was repaginated ([95]–98) and the watermark removed, **so the earlier electronic version with preliminary pagination was not effectively published**. A correct citation of the name is: *E. antalyensis* C. Vural in *Ann. Bot. Fenn.* 49 ~~(online): 95. 13 Mar~~ **26 Apr** 2012.”

Prop. B (428 – Turland & Wiersema in *Taxon* 72: 1186) Amend Art. 30.4 as follows (new text in bold, deleted text in strikethrough):

“30.4. The content of a particular electronic publication ~~must~~ **may not be altered or retracted** after it is effectively published. Any such alterations are not themselves effectively published **and have no effect on the original publication**. Corrections or revisions must be issued separately to be effectively published.”

Prop. C (159 – Prado & al. in *Taxon* 71: 711) Add a new Note and Example in Art. 30:

“Note *n*. Electronic material that has been effectively published remains effectively published even if retracted by its publisher.”

“Ex. *n*. *Bauhinia saksuwaniae* Mattapha & al. was effectively published in a paper first placed online on 11 December 2013 as a PDF document accessible through the website of the *Nordic Journal*

of Botany (ISSN 1756-1051, online, <https://doi.org/10.1111/j.1756-1051.2013.00102.x>). That paper was later declared as “retracted” by the publisher and has not appeared in the printed version of the journal (ISSN 0107-055X, print). Despite the retraction, the paper remains effectively published under Art. 29 and 30 and the species name remains validly published.”

Rapporteurs’ comments – *Prop. A* aims to make life easier for nomenclatural indexers, who currently may have to update records of nomenclatural novelties if preliminary pagination in “online first” journal articles is replaced with final pagination. *Prop. A* would shift forward the date of effective publication to the date on which the final pagination was added, even though journals generally do not record that date, instead recording the date on which the article was effectively published, i.e. when the version with final content (page numbers are excluded from content) became available online. We would likely never know the precise dates of publication of an unknown number of articles published since 2012, and it is uncertain how rapidly, if at all, journals would adapt to the new rule, so the problem could grow even larger in the future.

Prop. B seeks to make it clearer that electronic material, once effectively published, may not be altered or retracted, and any such attempts have no effect on the publication.

Prop. C would add a new Note and Example to make it explicit that effectively published electronic material remains effectively published even if retracted by its publisher. It could be inferred from current Art. 30.4 that retraction is a form of alteration and is therefore not permitted, but acceptance of *Prop. B* would make this explicit, in which case the Note of *Prop. C* could be unnecessary although the Example would be a helpful addition. This could be decided by the Editorial Committee, and those who agree should vote “ed.c.”

Article 31

Prop. A (251 – Wisnev & Prado in *Taxon* 72: 680) Amend Art. 31.1 as follows (new text in bold, deleted text in strikethrough):

“31.1. The date of effective publication is the date on which the printed matter or electronic material ~~became available~~ **is first distributed as an effective publication in accordance with as defined in** Art. 29 and 30. In the absence of proof establishing some other date, the one appearing in the printed matter or electronic material must be accepted as correct.”

Prop. B (040 – Paul & Paszko in *Taxon* 69: 1387) Add a new paragraph after Art. 31.3:

“31.4. When the date of effective publication of a work cannot be determined precisely to the day, it should be regarded for nomenclatural purposes as the last day of the time period that can be demonstrated with certainty (except dates stated in Art. 13).”

If the above is accepted, as an illustration, the following Example may serve:

“Ex. *n*. *Pulsatilla ×janczewskii* Zapał. was published in parallel in: (a) *Rozpr. Wydz. Mat.-Przyr. Akad. Umiejętn., Dział B, Nauki Biol.* 8B(48B): 200. 1909, (b) *Consp. Fl. Galic. Crit.* 2: 244. 1908, and (c) *Bull. Int. Acad. Sci. Cracovie, Cl. Sci. Math.* 1908(5): 448. 1908 (issue dated 3 Jun 1908). None of these sources indicated that the name had already been published elsewhere. From external evidence, Paszko & al. (in *PhytoKeys* 155: 53–85 & suppl. material. 2020) dated source (a) as having become available no later than Jul–Aug 1908 and source (b) as available no later than Aug–Oct 1908. Therefore, for nomenclatural purposes, the dates should be regarded as: (a) 31 Aug 1908, (b) 31 Oct 1908, and (c) 3 Jun 1908, respectively.”

Rapporteurs' comments – *Prop. A* seeks to better define the date of effective publication by replacing “became available”, which is not defined but is perhaps self-explanatory, with a more precise phrase containing “distributed”, a word used in Art. 29.1 for both printed matter and electronic material. It seems reasonable that “first distributed” can include the stage at which “the publisher or publisher’s agent delivers printed matter to one of the usual carriers for distribution to the public” and therefore not conflict with Rec. 31A.1.

Prop. B would offer an arbitrary method of assigning a precise date of effective publication to a work that cannot be dated to the day. However, the new rule could be difficult to apply in practice because for many works, especially books, a time period during which publication took place can hardly be “demonstrated with certainty”. There is also the potential for disruption of priority if established custom (see Pre. 13) has led to a different conclusion.

Recommendation 31B

Prop. A (116 – Dutta & Bandyopadhyay in *Taxon* 70: 1390) Amend Rec. 31B.1 as follows (new text in bold, deleted text in strike-through) and delete Rec. 31B.2:

“31B.1. The date of effective publication should be clearly indicated as precisely as possible (**day, month, year**) within a publication ~~the printed matter or electronic material. In printed matter not already published as electronic material, the date should conform to Rec. 31A.1.~~ When a publication is issued in parts, this date should be indicated in each part.”

~~“31B.2. In electronic material, the precise dates (year, month, and day) of effective publication should be included.”~~

Rapporteurs' comments – *Prop. A* would combine Rec. 31B.1 and 31B.2 to recommend indicating the day, month and year of effective publication within both printed matter and electronic material. The additional suggestion for printed matter not already published electronically is aimed at reducing any gap between the date included within the printed matter and the date of its actual distribution.

Article 32

Prop. A (419 – Demoulin in *Taxon* 72: 1184) Restructure Art. 32 by adding amended content from Art. 61 as detailed below:

Article 32.1 and Note 1 remain unchanged.

Article 61.1 becomes Art. 32.2; “32.2” (at the end) is replaced by “16–19, 21, 23, and 24”; “orthographical” in qualification of “variant” is deleted here and elsewhere except in Art. 60 or elsewhere when it is not used with the same restricted meaning. Note that I find the reference to Art. 6.10 in Art. 61.1 uselessly confusing and Art. 14.8 is an Article to which I am radically opposed, but, if it stays, those references can be editorially added.

Article 32 Ex. 1 and 2 would be better placed under Art. 21.2.

Article 32 Note 2 may be deleted. This Note is anyway erroneous because the reference to Art. 32.2 stands for Art. 21.2.

Article 61.2 becomes Art. 32.3 and is followed by a new Art. 32 Note 2 clarifying the case of compounds with inverted elements.

Article 61 Ex. 1 becomes Art. 32 Ex. 1 and Art. 61 Ex. 2 becomes Art. 32 Ex. 2.

Article 61.3 becomes Art. 32.4.

Article 61.4 becomes Art. 32.5 with the addition at the end of the first sentence of “without change of authorship or date” that comes from present Art. 31.2 and the replacement of “corrected” by “changed” (also in Art. 61 Note 1, which becomes Art. 32 Note 3).

Article 61.5 becomes Art. 32.6, with the formulation adapted by referring to the new Art. 32.2.

Article 61 Ex. 3 becomes Art. 32 Ex. 3.

Article 32.3, 32.4, Ex. 3–5 and Notes 3 and 4 remain unchanged but become Art. 32.7, Art. 32.8, Ex. 4–6 and Notes 4 and 5, respectively.

Here is the result:

[Article 32.1 and Note 1 unchanged.]

“32.2. Only one variant of any one name is treated as validly published: the form that appears in the original publication, except as provided in Art. 60, 61, and F.9 (typographical or orthographical errors and standardizations), Art. 14.11 (conserved spellings), Art. F.3.2 (spelling of sanctioned names), and Art. 16–19, 21, 23, and 24 (rank-determining terminations). Application of the aforementioned Articles does not lead to a change of author citation or date.

32.3. Variants of a name, only one nomenclatural type being involved, are the various spellings of a name or its final epithet. Variants also result from the use of different but related stems for adding a termination or forming a compound, or from the use of different terminations as long as the category, either adjective or substantive, remains the same.

Note 2. For compounds, variants do not include words in which the order of the compounding words is inverted, which are to be treated as synonyms, not homonyms.

Ex. 1. *Nelumbo* Adans. (Fam. Pl. 2: 76. 1763) and ‘*Nelumbium*’ (Jussieu, Gen. Pl.: 68. 1789) are variants of a generic name based on *Nymphaea nelumbo* L., formed by using either a termination of the second or third declension of substantives. Similarly *Musineon* Raf. (in J. Phys. Chim. Hist. Nat. Arts 91: 71. 1820) and ‘*Musenium*’ (Nuttall in Torrey & Gray, Fl. N. Amer. 1: 642. 1840) are variants in termination, both with *Seseli divaricatum* Pursh as type.

Ex. 2. The epithet of *Selaginella apus* Spring (in Martius, Fl. Bras. 1(2): 119. 1840) is a noun in apposition, so that *apus* cannot be treated as a variant of the adjective *apodus*, used in *Lycopodium apodum* L. (Sp. Pl.: 1105. 1753). Spring cited *L. apodum* as a synonym of *S. apus*, but instead he should have adopted the former epithet and published “*S. apoda*”; consequently *S. apus* was nomenclaturally superfluous when published and is illegitimate under Art. 52.1.

32.4. If variants of a name of a new taxon or replacement name appear in the original publication, the one that conforms to the rules and best suits the recommendations of Art. 60 is to be retained. If the variants conform and suit equally well, the first author who, in an effectively published text (Art. 29–31), explicitly adopts one of the variants and rejects the other(s) must be followed (see also Rec. F.5A.2).

32.5. Any variant of a name not conforming to the validly published form of that name is to be changed to that form without change of authorship or date. Whenever such a variant appears in a publication, it is to be treated as if it appeared in its changed form.

Note 3. In full citations it is desirable that the original form of a changed variant of a name be added (Rec. 50F).

32.6. Confusingly similar names that are not variants as defined in Art. 32.3, but are based on the same type, are nevertheless treated as variants (for confusingly similar names based on different types, see Art. 53.2–53.4).

Ex. 3. ‘*Geaster*’ (Fries, Syst. Mycol. 3: 8, 1829) and *Geastrum* Pers. (in Neues Mag. Bot. 1: 85, 1794): Pers. (Syn. Meth. Fung.: 131, 1801) are similar names with the same type (see *Taxon* 33: 498. 1984); they are treated as variants despite the fact that they are derived from two different nouns, *aster* (*asteris*) and *astrum* (*astri*)."

[Followed by Art. 32.7, Art. 32.8, Ex. 4, Ex. 5, Ex. 6, Note 4 and Note 5, i.e. the current Art. 32.3 onward unchanged.]

Prop. B (248 – Wisnev & Prado in Taxon 72: 679) Move Art. 32 Note 1 to the end of Art. 32.1 and amend it as follows (new text in bold, deleted text in strikethrough):

“32.1. In order to be validly published, a name of a taxon (autonyms excepted) must: (a) be effectively published (Art. 29–31) on or after the starting-point date of the respective group (Art. 13.1 and F.1.1); (b) be composed only of letters of the Latin alphabet, except as provided in Art. 23.3, 60.4, 60.7, and 60.11–14; and (c) have a form that complies with the provisions of Art. 16–27 (but see Art. 21.4 and 24.4) and Art. H.6 and H.7 (see also Art. 61). ~~The However, the use of~~ **However, the use of** typographical signs, numerals, or letters of a non-Latin alphabet in the arrangement of taxa (such as Greek letters α , β , γ , etc. in the arrangement of varieties under a species) does not prevent valid publication ~~because rank-denoting terms and devices are not part of the name.~~”

Rapporteurs’ comments – *Prop. A*, in combination with Art. 61 *Prop. A*, would transfer, with some modification, the present content of Art. 61 to Art. 32. The aim of the proposer seems to be to restrict the usage of “orthographical variants” in Art. 61 to exclude what in the *Code* represent “orthographical errors”, which are to be consolidated in Art. 32. This new arrangement does not appear to create any differences in interpretation or application of the relevant provisions, so users must decide whether or not the new structure is preferred.

Prop. B is discussed under Art. 6 *Prop. M*.

Article 33

Prop. A (429 – Turland & Wiersema in Taxon 72: 1187) Amend Art. 33.1 as follows (new text in bold, deleted text in strikethrough):

“33.1. The date of a name is that of its valid publication. When the various conditions for valid publication are not simultaneously fulfilled, the date is that on which the last is fulfilled. However, the name must always be explicitly accepted in the place of its valid publication. ~~A name published on or after 1 January 1973 for which~~ **When the various conditions for valid publication are not simultaneously fulfilled, a name is not validly published unless full and direct** reference ~~(Art. 41.5)~~ is given to the place(s) where these requirements were previously fulfilled; **this reference must be full and direct (Art. 41.5) on or after 1 January 1973 (but see also** Art. 41.7).”

Rapporteurs’ comments – *Prop. A* would adjust Art. 33.1 to permit names published between 1953 and 1972, inclusive, to be validly published by reference, not necessarily full and direct, to previous publications where other requirements for valid publication, such as provision of a description or diagnosis, may have been fulfilled. This would remove an apparent conflict with Art. 38.13, which requires that a “reference to a previously and effectively published description or diagnosis” be “full and direct” after 1952. However, Art. 38.13 applies only to names that are validly published by reference to a description or diagnosis, not to those where this requirement was previously fulfilled. Nevertheless, for names published between 1953 and 1972, the relationship between the requirements in Art. 38.13 and Art. 33.1 could be made clearer by amending the second sentence of Art. 38.13 as follows: “For names published on or after 1 January 1953, **for which the requirement for a description or diagnosis was not previously fulfilled (see Art. 33.1)**, it must, however, be full and direct as specified in Art. 41.5.” Those who favour *Prop. A* together with this amendment should vote “ed.c.”

Article 35

Prop. A (041 – Welker & Prado in Taxon 69: 1387) Add a new sentence to Art. 35.2 (new text in bold) and a new Example:

“35.2. A combination (autonyms excepted) is not validly published unless the author definitely associates the final epithet with the name of the genus or species, or with its abbreviation (see Art. 60.14). **This association can be achieved typographically by the position of the final epithet in the text, by use of a symbol, or by the epithet agreeing with the gender of the generic name.**”

“*Ex. n. Andropogon brevifolius* Sw. was assigned to *Schizachyrium* Nees (in Martius, Fl. Bras. Enum. Pl. 2(1): 332. 1829) when Nees described that genus as new: “Hujusce generis species, praeter enumeratas, sunt et *Andropogon brevifolius*, Sw. (Pollinia Spr.) ... [Species of this genus, besides those enumerated, are also *Andropogon brevifolius*, Sw. (Pollinia Spr.) ...]”. However, Nees did not associate the final epithet of the species name with *Schizachyrium* and did not therefore validly publish a new combination. *Schizachyrium brevifolium* (Sw.) Nees ex Buse (in Miquel, Pl. Jungh.: 359. 1854) was validly published when Buse wrote “... a *Schiz. brevifolium* Nees (i. e. *Andr. brevifolium* Sw.) ...”, thereby referring to the basionym and definitely associating the final epithet with *Schizachyrium*.”

Rapporteurs’ comments – *Prop. A* would clarify the meaning of “definitely associated” in Art. 35.2 by suggesting three ways in which this can be achieved. As currently worded, without a qualifying “for example”, *Prop. A* could be misunderstood that these are the only three ways. It might also seem strange that more obvious ways, e.g. writing out a binomial in full, are not mentioned at all. The authors note that the four current Examples under Art. 35.2 do not explain the full meaning of “definitely associated”. Perhaps adding suitable Examples would be preferable to amending the Article.

Article 36

Prop. A (042 – Krishna & al. in Taxon 69: 1388) Add a new Example under Art. 36.1:

“*Ex. n. (b)* The intended new combination “*Henckelia membranacea* (Bedd.) Janeesha & Nampy *comb. nov.*” was included by Janeesha & Nampy (in Rheede 30: 77. 2020) in the synonymy of *H. missionis* (Wall. ex R. Br.) A. Weber & B. L. Burt (in Beitr. Biol. Pflanzen 70: 350. 1998). “*Henckelia membranacea*” was not therefore validly published.”

Prop. B (265 – Doweld in Taxon 72: 688) Add a new Note and a new Example after Art. 36.3:

“*Note n1.* Names published and accepted simultaneously for the same fossil pollen, spore, or other microfossil remains (so-called sporomorphs) are not alternative names as defined by Art. 36.3 if one is a designation formed by combining a sporomorph group with a sporomorph epithet.”

“*Ex. n6.* Bolchovitina (in Trudy Inst. Geol. Nauk Akad. Nauk S.S.S.R. 145: 1–183. 1953) employed two parallel systems of classification of fossil spores and pollen, one natural (assigning microfossils to extant genera) and another artificial (combining pollen or spore group designations with an epithet). *Ginkgo tripartita* Bolchovitina (l.c.: 62. 1953) and “*Dolichotrilitrium tripartitum*” (Bolchovitina, l.c.: 62. 1953), based on the same type, are not alternative names as defined by Art. 36.3, because “*D. tripartitum*” (although labelled “sp. nov.”), resulting from combining the fossil pollen subgroup “*Dolichotrilitrium*” (Naumova in Trudy XVII Sess. Mezhdunar. Geol. Kongr. 1937(1): 358. 1940 [“1939”]) and the sporomorph epithet “*tripartitum*”, is not the name of a fossil-species (see Art. 23.6(e)). *Ginkgo tripartita* was therefore validly published by Bolchovitina.”

Prop. C (430 – Turland & Wiersema in Taxon 72: 1187) Amend Art. 36.3 as follows (new text in bold, deleted text in strikethrough):

“36.3. When, on or after 1 January 1953, two or more different names based on the same type are accepted simultaneously for the same taxon by **any one and the same author** ~~and accepted as alternatives by that author~~ in the same publication (so-called alternative names), none of them, if new, is validly published. This rule does not apply in those cases where the same combination is simultaneously used at different ranks, either for infraspecific taxa or for subdivisions of a genus (see Rec. 22A.1, 22A.2, and 26A.1–3), **nor where suprageneric names formed from the same generic name are simultaneously used at different ranks (see Rec. 19A.1 and 19A.2), nor to names provided for in Art. F.8.1.**”

Rapporteurs’ comments – *Prop. A* proposes a new Example under Art. 36.1. The proposal would be automatically referred to the Editorial Committee.

Prop. B, together with Art. 20 *Prop. H* and Art. 23 *Prop. K*, is part of a set of proposals relating to fossil-taxa that would seek to clarify the status of artificial binary designations in the (mostly mid-1900s) palaeobotanical literature arising from artificial groupings of fossil spore, pollen and other microfossil taxa. It would establish that the binary designations defined in Art. 20 *Prop. H* and Art. 23 *Prop. K* cannot be considered as alternative names of fossil-species, but by virtue of the former not being “names” in the sense of Art. 6.3, they could not, by the definition of alternative names in Art. 36.3, be treated as such anyway. It seems unnecessary to have a separate Note to explain what should already be apparent from these definitions. The Nomenclature Committee for Fossils does not support *Prop. B* (votes 0 : 12 : 0).

Prop. C would delete some unnecessary language from Art. 36.3 and extend the coverage of the first sentence to alternative names involving different sets of authors, where at least one author is common to both sets, such that any “names” that were new would not be validly published. The proposal would also extend the exception in the second sentence to suprageneric names used at different ranks and formed from the same generic name, allowing them to be simultaneously validly published with the same type.

Article 37

Prop. A (319 – Govaerts in *Taxon* 72: 954) Add a new Article after Art. 37.4 to clarify infraspecific ranks:

“37.4**is**. If in one whole publication (Art. 37.5) no general statement is made by the author on the different infraspecific ranks used in that publication, statements on ranks associated with individual infraspecific names can be used instead to assign rank throughout the publication as long as they do not result in misplaced terms contrary to Art. 5 (see Art. 37.6). If no statement is made or the words “variety” or “form” or their linguistic equivalents are merely used informally rather than as formal rank-denoting terms, upper-case Latin letters must be interpreted as denoting subspecies, lower-case Greek letters as varieties, and lower-case Latin letters as forms as long as they do not result in misplaced terms or contradict any general statement made in the whole publication.”

Rapporteurs’ comments – *Prop. A* would provide a mechanism for determining the ranks of infraspecific taxa in works where they would otherwise be unranked. In the absence of any clear internal indication of rank, the use of certain categories of letters would be considered to denote particular ranks, which is claimed, by the proposers, to retain current practice.

Article 38

Prop. A (164 – Mosyakin & McNeill in *Taxon* 71: 1326) Add a new Note after Art. 38.1:

“*Note Ibis*. Provided the protologue meets all the requirements for valid publication (i.e. Art. 32–45, F.4, F.5, and H.9), the name of a new taxon is validly published even if the provision of inaccurate or inadequate information in the protologue is later discovered, e.g. failure to deposit the type in the herbarium, collection, or institution specified, or that the type represents more than one gathering.”

Prop. B (324 – Wisnev & Prado in *Taxon* 72: 956) Add a new sentence to Art. 38.1 (new text in bold):

“38.1. In order to be validly published, a name of a new taxon (see Art. 6.9) must (a) be accompanied by a description or diagnosis of the taxon (see also Art. 38.7 and 38.8) or, if none is provided in the protologue, by a reference (see Art. 38.13) to a previously and effectively published description or diagnosis (except as provided in Art. 13.4 and H.9; see also Art. 14.9 and 14.14); and (b) comply with the relevant provisions of Art. 32–45 and F.4–F.5. **The description or diagnosis in the protologue (or referenced in the protologue) is the validating description or diagnosis.**”

Prop. C (334 – Thiele & al. in *Taxon* 72: 1144) Amend Art. 38.1 and 39.2 as follows (new text in bold) and add a new Note after Art. 38.1:

“38.1. In order to be validly published, a name of a new taxon (see Art. 6.9) must (a) be accompanied by a description or diagnosis of the taxon (see also Art. 38.7 and 38.8) or, if none is provided in the protologue, by a reference (see Art. 38.13) to a previously and effectively published description or diagnosis (except as provided in Art. 13.4, **39.2(b)**, and H.9; see also Art. 14.9 and 14.14); and (b) comply with the relevant provisions of Art. 32–45 and F.4–F.5.”

“*Note Ibis*. For the purposes of Art. 38.1, if the type of a name of a new taxon is a DNA sequence, the sequence itself is treated as a description or diagnosis.”

“39.2. In order to be validly published, a name of a new taxon published on or after 1 January 2012 must be accompanied (a) by a Latin or English description or diagnosis, or by a reference (see Art. 38.13) to a previously and effectively published Latin or English description or diagnosis (for fossils see also Art. 43.1), **or (b), on or after 1 January 2026, by both (1) citation of an identifier issued for the holotype sequence by a recognized online repository (see Art. X.1(b)(1) and App. X) and (2) specification of selected informative portions of the holotype sequence (Art. X.1(b)(2)).**”

Prop. D (344 – Thiele & al. in *Taxon* 72: 1148) Add a new Note after Art. 38.1:

“*Note Ibis*. For the purposes of Art. 38.1, if a name is type-less, the reference sequence itself is treated as a description.”

Prop. E (268 – Krieger & Govaerts in *Taxon* 72: 689) Add a new Article to Art. 38 to define description:

“38.1**is**. A description of a taxon is a statement describing a feature or features of an individual taxon. A validating description (Art. 38.1) need not be diagnostic. A description is considered insufficient for the requirements of Art. 38.1 if (a) an identical statement is used in the same work (publication as a whole, see Art. 37.5) for a species description within the same genus or for an infraspecific taxon description within the same species, (b) the description applies only to a single individual plant or specimen rather than the taxon, or (c) the description is limited to habit, height, stem width, stem circumference, or a combination of these. Statement (c) could however be sufficient as a diagnosis under Art. 38.2.”

Prop. F (043 – Bhattacharjee & al. in *Taxon* 69: 1388) Amend Art. 38.2 as follows (new text in bold, deleted text in strikethrough):

“38.2. A diagnosis of a taxon is a statement of that which in the opinion of its author(s) distinguishes the taxon from ~~other~~ **its nearest allied taxon or taxa.**”

The entry for “diagnosis” in the Glossary is to be modified accordingly.

Prop. G (267 – Krieger & Govaerts in Taxon 72: 689) Amend Art. 38.2 as follows (new text in bold):

“38.2. A diagnosis of a taxon is a statement of that which in the opinion of its author distinguishes the taxon from **all other taxa being compared to it.**”

Prop. H (323 – Wisnev & Prado in Taxon 72: 955) Amend Art. 38 voted Ex. 3 as follows (new text in bold, deleted text in strikethrough):

“*Ex. 3. ~~In Don, Sweet’s *Hortus britannicus*, ed. 3 (1839), is a catalogue of plants in tabular form. for each listed Each species appears on a single line with one of various abbreviations for its habit, the flower colour, and the duration of the flowers plant, and a translation into the English name of the specific epithet are given in tabular form. In many cases, the same abbreviations are listed for more than one species in a genus genera the flower colour and duration may be identical for all species and clearly their mention is not intended as a validating description or diagnosis. Names of new taxa appearing in that work are not therefore validly published, except in some those cases where reference is made to an earlier validating descriptions or diagnoses description or diagnosis. This voted Example is limited to Don’s publication and other similar catalogues.~~”

Prop. I (269 – Krieger & Govaerts in Taxon 72: 690) Amend Art. 38 Note 2 (new text in bold, deleted text in strikethrough):

“Note 2. ~~Whereas a~~ A diagnosis must comprise one or more descriptive statements **on how the new taxon differs from one or more other taxa** (Art. 38.2 and 38.3), ~~a validating description (Art. 38.1) need not be diagnostic. A statement on how one or more existing taxa differ from the new taxon is not sufficient to satisfy Art. 38.2.~~”

Prop. J (374 – Earp & Mosyakin in Taxon 72: 1167) Amend Art. 38.3 as follows (new text in bold):

“38.3. The requirements of Art. 38.1(a) are not met by statements describing properties such as purely aesthetic features, economic, medicinal or culinary use, cultural significance, cultivation techniques, geographical origin, or geological age; **or by statements indicating local or indigenous vernacular names (even descriptive ones); or by statements citing non-descriptive traditional knowledge.**”

Prop. K (076 – Pastore & al. in Taxon 70: 456) Amend Art. 38.4 as follows (new text in bold):

“38.4. When it is doubtful whether a descriptive statement satisfies the requirement of Art. 38.1(a) for a “description or diagnosis” **or whether an illustration with analysis is acceptable in its place (Art. 38.7 and 38.8)**, a request for a decision may be submitted to the General Committee, which will refer it for examination to the specialist committee for the appropriate taxonomic group (see Div. III Prov. 2.2, 7.9, and 7.10). A Committee recommendation as to whether or not the name concerned is validly published may then be put forward to an International Botanical Congress and, if ratified, will become a binding decision with retroactive effect. These binding decisions are listed in App. VI.”

Prop. L (077 – Pastore & al. in Taxon 70: 456) Add a new Article with a new Example after Art. 38.4:

“38.4bis. When the established practice has been to treat a descriptive statement as satisfying the requirement of Art. 38.1(a) for a “description or diagnosis” or whether an illustration with analysis is acceptable in its place (Art. 38.7 and 38.8), this practice is to be continued if it is in the interest of nomenclatural stability.”

“*Ex. n. Mimosa monjollo* Vell. (Fl. Flumin. Icon. 11: ad t. 26. 1831) was validly published based on an illustration. When Martius published the new combination *Enterolobium monjollo* (Vell.) Mart. (in Flora 20(2 Beibl.): 117. 1837, ‘mongollo’), he implicitly considered the illustration as diagnostic, i.e. an illustration with analysis, and accepted it to validate the name. Martius’s position has become established practice, which must therefore be followed.”

Prop. M (217 – Mosyakin & al. in Taxon 72: 452) Amend Art. 38.4 as follows (new text in bold):

“38.4. When it is doubtful whether a descriptive statement satisfies the requirement of Art. 38.1(a) for a “description or diagnosis” **or whether a name was accepted by its author in the original publication (Art. 36.1)**, a request for a decision may be submitted to the General Committee, which will refer it for examination to the specialist committee for the appropriate taxonomic group (see Div. III Prov. 2.2, 7.9, and 7.10). A Committee recommendation as to whether or not the name concerned is validly published may then be put forward to an International Botanical Congress and, if ratified, will become a binding decision with retroactive effect. These binding decisions are listed in App. VI.”

Prop. N (218 – Prado & al. in Taxon 72: 454) Amend Art. 38.4 (new text in bold, deleted text in strikethrough):

“38.4. When it is doubtful whether a descriptive statement satisfies the requirement of Art. 38.1(a) for a “description or diagnosis”, a request for a decision may be submitted to the General Committee, which will refer it for examination to the specialist committee for the appropriate taxonomic group (see Div. III Prov. 2.2, 7.9, and 7.10). A **General** Committee recommendation as to whether or not the name concerned is validly published **is to be treated as a binding decision subject to ratification by a later** ~~may then be put forward to an~~ International Botanical Congress **(see also Art. 14.15, 34.2, 53.4, and 56.3)** and, ~~if ratified, will become a binding decision with~~ **takes** retroactive effect. These binding decisions are listed in App. VI.”

Prop. O (243 – Wisnev & Prado in Taxon 72: 677) Amend the second sentence of Art. 38.4 as follows (new text in bold):

“38.4. [...] A Committee recommendation as to whether or not the **potential** name concerned is validly published may then be put forward to an International Botanical Congress and, if ratified, will become a binding decision with retroactive effect. [...]”

Prop. P (325 – Kovalchuk in Taxon 72: 957) Amend Art. 38.4 as follows (new text in bold):

“38.4. When it is doubtful whether a descriptive statement satisfies the requirement of Art. 38.1(a) for a “description or diagnosis”, **or whether a reference to a previously and effectively published description or diagnosis satisfies the requirements of Art. 38.13 and 38.14**, a request for a decision may be submitted to the General Committee, which will refer it for examination to the specialist committee for the appropriate taxonomic group (see Div. III Prov. 2.2, 7.9, and 7.10). A Committee recommendation as to whether or not the name concerned is validly published may then be put forward to an International Botanical Congress and, if ratified, will become a binding decision with retroactive effect. These binding decisions are listed in App. VI.”

Prop. Q (179 – Pastore & al. in Taxon 71: 1336) Add a new Example after Art. 38.7:

“*Ex. n.* The generic name *Torrentia* Vell. (Fl. Flumin. Icon. 8: t. 149. 1831) and that of its only included species, *T. quinquenervis* Vell., were validly published in 1831 without description or diagnosis by a plate with analysis providing details of the bracts, the ray floret pappus, and the stigma. Written descriptions of these names were

not published until 50 years later (Vellozo in Arch. Mus. Nac. Rio de Janeiro 5: 348. 1881)."

Prop. R (078 – Iamonico & al. in Taxon 70: 457) Add a new Example after Art. 38.14:

"*Ex. 23.* The name *Statice tenoreana* was originally proposed by Gussone (Enum. Pl. Inarim.: 268. 1855) without any description or diagnosis but citing "*S. minuta*. Ten. Syll. p. 593 (non Lin.)". However, Tenore (Syll. Pl. Fl. Neapol.: 593. 1833) did not include any description of *S. minuta*, which was provided only later (Tenore, Fl. Napol. 5: 338. 1835–1838), along with a reference to page 593 of the *Sylloge*. *Statice tenoreana* Guss., although lacking a description or diagnosis both in the protologue and in the directly cited *Sylloge* of Tenore, is validly published by the indirect reference to the description in Tenore's *Flora napolitana* (1835–1838)."

Prop. S (320 – Wisnev & Prado in Taxon 72: 955) Add a new Article in Art. 38, incorporating and amending the definition of "description" from the Glossary, and amend Art. 38 Ex. 7 as follows (new text in bold, deleted text in strikethrough):

"38.n. A description is a statement explicitly describing one or more features of an individual taxon. A description need not be diagnostic."

"*Ex. 7.* "*Musa basjoo*" (Siebold in Verh. Bat. Genootsch. Kunsten 12: 18. 1830) appeared with "Ex insulis Luikiu introducta, vix asperitati hiemis resistens. Ex foliis linteum, praesertim in insulis Luikiu ac quibusdam insulis provinciae Satzuma conficitur. Est haud dubie linteum, quod Philippinis incolis audit Nippis." This statement gives information about the economic use (linen is made from the leaves), hardness in cultivation (scarcely survives the winter), and geographical origin (introduced from the Ryukyu Islands), ~~but~~ **Because there is no explicit descriptive information (e.g. shape or texture) on the "leaves", (the only character feature mentioned), it does not satisfy the requirement of Art. 38.1(a) for a "description or diagnosis".** *Musa basjoo* Siebold & Zucc. ex Inuma was later validly published by Inuma (Sintei Somoku Dzusetsu [Illustrated Flora of Japan], ed. 2, 3: ad t. 1. 1874) with floral details and **other descriptive material—a description in Japanese.**"

If the above proposal is rejected, we recommend that the Editorial Committee either delete Art. 38 Ex. 7 or modify the definition of description in the Glossary to better support the Example.

Rapporteurs' comments – Prop. A would create a Note in Art. 38 that would support the interpretation of Art. 8 Prop. J, which would establish that only evidence present in the protologue itself should be determinative in decisions about valid publication, and external information that comes to light later is irrelevant (see Art. 9 Prop. K for a contrasting approach). Although some may find this green-lighting of misinformation or disinformation in a protologue distasteful, it does seem to be a sensible way to deal with these types of situations. However, the proposed Note only clarifies situations "if the provision of inaccurate or inadequate information in the protologue is later discovered". What if such inaccuracies are apparent from available external information already at the time of valid publication? Perhaps the herbarium, collection or institution of deposit specified for the type does not exist, or the gathering indicated was obviously fictitious. Perhaps rephrasing the part quoted above to "**if external evidence shows that information in the protologue is inaccurate or inadequate**" would resolve this issue. Those who support such an amendment should vote "ed.c."

Prop. B would add a sentence to Art. 38.1 defining "validating description", a term used numerous times throughout the *Code*, including in several Articles and Notes, but nowhere defined explicitly.

Those who feel that the intended meaning of the term is implicit enough already, and could be sufficiently covered by an added Glossary entry (note that "description" itself is not currently defined in any Article) can vote "ed.c."

Prop. C is part of a set of proposals that would provide for the future valid publication of names of microscopic algae or microfungi with DNA sequences as types (see Chap. V Sect. 2 Prop. A). It would add a new Note in Art. 38 accompanying a change in Art. 39.2, which would stipulate the acceptable language of a description or diagnosis after 2011, both changes aiming to allow the specification of certain documentation for a holotype DNA sequence to substitute for a description or diagnosis. However, because the provisions permitting DNA sequences to serve as types are intended to be restricted only to microscopic algae or microfungi, Art. 39.2, which applies to all taxonomic groups, is not the proper home for this provision, because in not explicitly mentioning this restriction it might mislead some to conclude that it has broader coverage. The proper place for what has been proposed for Art. 39.2 would appear to be a new Article, perhaps following Art. 38.10, to read: "**The name of a new species or infraspecific taxon of microscopic algae or microfungi published on or after 1 January 2026 may be validly published even if only accompanied by both (1) citation of an identifier issued for the holotype sequence by a recognized online repository (see Art. X.1(b)(1) and App. X) and (2) specification of selected informative portions of the holotype sequence (Art. X.1(b)(2)).**" The proposed new Note could follow. Those who support the overall set of proposals but favour this amendment should vote "ed.c." for Prop. C. The Nomenclature Committee for Algae does not support Prop. C (votes 1 : 14 : 1).

Prop. D is part of a set of proposals that would provide for the future valid publication of names of certain taxa other than vascular plants or bryophytes without nomenclatural types (so-called "typeless names"; see Chap. II new Art. Prop. A). The Nomenclature Committee for Algae does not support Prop. D (votes 0 : 15 : 1).

Prop. E would provide a definition of a "description", a term not otherwise defined formally in the *Code*, placing further restrictions, in addition to those already in Art. 38.3, on what would be acceptable as a "validating description" (see Prop. B). While further limiting this term may cause some nomenclatural instability, the increasing accessibility of searchable online bibliographic sources has opened a Pandora's Box of "names" published with meagre descriptive matter, particularly in the horticultural literature. The Nomenclature Committees are increasingly being asked to make binding decisions on what constitutes a descriptive statement under Art. 38.4 with limited guidance on which to base their recommendations. Accepting this proposal may eliminate the need for some of these requests as well as improve the consistency of decisions. There may be room for improvement in part (a) of this proposal, however. Substituting "for a species description within the same genus or for an infraspecific taxon description within the same species" with "**for a description of a species or infraspecific taxon within the same next higher-ranked group**" would avoid the need to invalidate identical descriptions for species placed in different, perhaps even distantly related, subgenera or sections that were otherwise distinguished or varieties or forms placed in different subspecies. Those who prefer such an amendment should vote "ed.c."

Prop. F would make a slight change to the definition of "diagnosis" in Art. 38.2, requiring that it distinguish a taxon not simply from other taxa but from its nearest allies. This would, of course, be impossible if the author(s) did not know which taxa were most closely allied. While a taxon's close relatives may be more easily determined

today, Art. 38.2 is retroactive to earlier times when the allied taxa were yet to be discovered, much less described, or found on different continents where their distinction bore little importance to a publishing author.

Prop. G would furnish a different adjustment to the definition of “diagnosis”, requiring that it distinguish a taxon not simply from other taxa but from all other taxa to which it is being compared. This may seem to be a very slight change that will likely affect only a small number of cases, but one must assume that in works such as Linnaeus’s *Systema naturae*, where species of a given genus are being distinguished from each other solely by their diagnoses, they are all being compared to each other. Yet the diagnoses may not be parallel enough to distinguish each species from all others in the genus, some diagnosed using certain characters, others using other characters. Applying this new definition to, e.g., the diagnosis of *Browallia elata* L. (Syst. Nat., ed. 10, 2: 1118. 1759) would negate its valid publication in that work. Apart from this issue, there are general concerns that adjustments to the current definition of diagnosis could have other unforeseen consequences.

Prop. H would change voted *Ex. 3 (which is comparable to a rule, governing nomenclatural practice when a corresponding Article is open to divergent interpretation or does not adequately cover the matter), dating to the 1988 *Berlin Code*, adding greater detail to the description of the work involved (*Sweet’s Hortus britannicus*, ed. 3) with the aim of limiting the application of *Ex. 3 to more similar works. It is difficult to know what practical impact these changes would have on its application, and they could have unwanted consequences. If over time some consensus has emerged on how *Ex. 3 should be applied, is there a good reason to change it?

Prop. I would modify Art. 38 Note 2, deleting text from the end and incorporating it into the proposed new Article of Prop. E, and adding a sentence stipulating that a diagnosis must compare a new taxon to existing taxa, not the other way around, so that the diagnosed features of the new taxon must be characterized. The revised Note, which formerly provided some distinction between a diagnosis and a description, now pertains only to a diagnosis, seeming to conflict with its definition by omitting “in the opinion of its author” from the statement in the first sentence. The added final sentence supports an interpretation, exemplified by a particular case, that contrasts with that of a recent Nomenclature Committee decision. In any case, the advocated changes would be more appropriate in an Article, not a Note.

Prop. J would prevent descriptive vernacular names or other non-descriptive traditional/cultural knowledge that might be provided in a protologue from serving as a description or diagnosis. The proposers suggest that if Rec. 38F Prop. A were accepted, such information could more commonly be included in protologues, but it could be debated whether such a perceived future problem is in need of a current solution.

Prop. K, using an approach similar to Prop. M and P, would extend the motive for binding decision requests under Art. 38.4 from uncertainty about the adequacy of a descriptive statement to uncertainty about whether or not an illustration qualifies as an illustration with analysis (Art. 38.10). The wording used (“whether an illustration with analysis is acceptable in its [of a description or diagnosis] place”) could be improved, because Art. 38.7 and 38.8 already indicate that an illustration with analysis is acceptable in lieu of a written description or diagnosis before 1908. What seems to be intended by this proposal is a request for a determination of whether or not a given illustration qualifies as an illustration with analysis in meeting this

requirement. The additional burden that the acceptance of Prop. K, M, or P will place on editors and Nomenclature Committees cannot be precisely known, but if the history of Art. 38.4, added to the 2006 *Vienna Code*, offers any guide, in the 17 subsequent years there have been 66 requests under this Article, or roughly four per year. Whether adding three more bases for requesting such decisions would quadruple that number is anybody’s guess.

Prop. L would create a new Article, paralleled on the last sentence of Art. 53.2 dealing with paronymyms, that would allow established practice to dictate whether or not a descriptive statement or an illustration with analysis should be considered sufficient to satisfy Art. 38.1(a). Provided a clear practice had emerged, it could offer a way to avoid some requests for binding decisions on valid publication. If Prop. L is accepted, the associated Example would be referred to the Editorial Committee.

Prop. M, with an approach similar to Prop. K and P, would extend the motive for binding decision requests under Art. 38.4 to uncertainty about whether or not a name was accepted by its author, satisfying Art. 36.1. Here the proposed new wording appears to be sufficient to achieve the desired aim, but see comments under Prop. K.

Prop. N and Art. 53 Prop. B would amend Art. 38.4 and 53.4 in parallel, so that a binding decision takes effect as soon as the General Committee recommends the decision, subject to ratification by a later International Botanical Congress. At present, a decision does not become binding until it is ratified by the Congress. The proposals originated during discussions by the General Committee (11 members of which are the authors), and the goal is to streamline the process for binding decisions, reducing the wait time of up to six years between requesting a decision and its becoming binding, and to bring it in line with the process for proposals to conserve, protect or reject names or suppress works.

Prop. O would add a new term “potential name” to the *Code*. See comments under Art. 6 Prop. D, which would define the term.

Prop. P, like Prop. K and M, would add yet another motive for requesting a binding decision under Art. 38.4. Prop. P permits decisions on whether a reference to a previously and effectively published description or diagnosis is sufficiently indirect or full and direct as required by Art. 38.13. The proposed new language is sufficient, but see comments under Prop. K.

Prop. Q and *R* propose new Examples, which would be automatically referred to the Editorial Committee.

Prop. S would provide a definition of description, at least partly based on the current Glossary entry. It is essentially similar to that proposed in the first sentence of Prop. E; both proposals would require that the feature(s) are not simply stated but described. Prop. S would further stipulate that the feature(s) that comprise a description be “explicitly” described, suggesting that certain features, such as fragrance, fibrosity, etc. could be implicitly indicated, e.g. in statements describing economic properties, which themselves are not part of a description under Art. 38.3. If both proposals were accepted, the issue just mentioned would be incorporated into the definition of Prop. E. If Prop. S is accepted, the suggested amendments to Ex. 7 (already needing amendment, because the name involved was first validly published in 1867, not 1874) would be referred to the Editorial Committee.

Recommendation 38F (new)

Prop. A (221 – Hayova & al. in *Taxon* 72: 455) Add a new Rec. 38F, as follows:

“38F.1. When describing new taxa that have existing local or indigenous vernacular names, authors are advised to report these names and associated information on traditional knowledge in the protologue and, if appropriate and feasible, to use the local or indigenous vernacular names in forming the scientific names of new taxa.”

Rapporteurs’ comments – *Prop. A* would urge authors to include vernacular names and associated information on traditional knowledge of taxa in the protologue when such information exists. It would also urge authors to use vernacular names in forming scientific names, which is similarly encouraged in Rec. 23B *Prop. B*.

Article 39

Prop. A (345 – Thiele & al. in *Taxon* 72: 1148) Amend Art. 39.2 as follows (new text in bold):

“39.2. In order to be validly published, a name of a new taxon published on or after 1 January 2012 must be accompanied **(a)** by a Latin or English description or diagnosis, or by a reference (see Art. 38.13) to a previously and effectively published Latin or English description or diagnosis (for fossils see also Art. 43.1), **or, (b) on or after 1 January 2026, by both (1) citation of an identifier issued for the reference sequence by a recognized online repository and (2) specification of selected informative portions of the reference sequence (see Art. X.8).**”

Rapporteurs’ comments – *Prop. A* is part of a set of proposals that would provide for the future valid publication of names of certain taxa other than vascular plants or bryophytes without nomenclatural types (so-called “type-less names”; see Chap. II new Art. *Prop. A*). The same considerations discussed under Art. 38 *Prop. C* apply here, i.e. moving the amended portion to a new Article in Art. 38 rather than placing it in Art. 39.2, to read “**A name of a new species or infraspecific taxon other than a vascular plant or bryophyte published on or after 1 January 2026 may be validly published even if only accompanied by both (1) citation of an identifier issued for the reference sequence by a recognized online repository and (2) specification of selected informative portions of the reference sequence (see Art. X.8).**” Those who support the overall set of proposals but favour this amendment should vote “ed.c.” The Nomenclature Committee for Algae does not support *Prop. A* (votes 1 : 14 : 1).

Article 40

Prop. A (180 – Woelkerling & Moestrup in *Taxon* 71: 1338) Amend Art. 40.1 to exempt names of dinoflagellates as follows (new text in bold):

“40.1. Publication on or after 1 January 1958 of the name of a new taxon at the rank of genus or below **(dinoflagellates excepted)** is valid only when the type of the name is indicated (see Art. 7–10; but see Art. H.9 Note 1 for the names of certain hybrids **and Art. 44.3 for those of dinoflagellates).**”

Prop. B (270 – Wrangmore & Govaerts in *Taxon* 72: 690) Add a new Note after Art. 40.1:

“*Note n.* When elements are cited as part of the type indication that cannot on their own serve as types as defined under Art. 8 and 40 (e.g. living organisms cited contrary to Art. 8.4 or illustrations cited contrary to Art. 40.4), they should not be taken into account and do not affect valid publication of the name.”

Prop. C (346 – Thiele & al. in *Taxon* 72: 1148) Amend Art. 40.1 as follows (new text in bold, deleted text in strikethrough):

“40.1. Publication ~~on or after 1 January 1958~~ of the name of a new taxon at the rank of genus or below is valid only when **(a) on**

or after 1 January 1958, the type of the name is indicated (see Art. 7–10; but see Art. H.9 Note 1 for the names of certain hybrids) **or (b) on or after 1 January 2026, a reference sequence is designated for a name that meets the requirements of Art. X.1.**”

Prop. D (018 – Turland & al. in *Taxon* 69: 634) Split Art. 40.3 into two Articles and incorporate Art. 40.2 into the second Article, amended as follows:

Editorially renumber the first Article as Art. 40.2, the second one as Art. 40.3; no changes are proposed in the new Art. 40.2 except editorially replace Art. “40.6” with “40.4” in the final cross-reference.

“40.2. For the name of a new genus or subdivision of a genus, reference (direct or indirect) to a single species name, or citation of the holotype or lectotype of a single previously or simultaneously published species name, even if that element is not explicitly designated as type, is acceptable as indication of the type (see also Art. 10.8; but see Art. 40.4).”

“40.3. For the name of a new species or infraspecific taxon published on or after 1 January 1958, mention of a single specimen, a single gathering or a part thereof, or an illustration is acceptable as indication of the type, even if that element is not explicitly designated as type (but see Art. 40.4) or if it consists of two or more specimens as defined in Art. 8 (see also Art. 40.5).”

Editorially replace “reference to” with “mention of” in Note 1, to accord with the new Art. 40.3, and replace “that consists” with “consisting”; editorially transpose Notes 1 and 2; editorially replace Art. “40.8” with “40.7” in the final cross-reference of Note 3.

Prop. E (153 – Rijkseversel in *Taxon* 71: 709) Amend the first sentence of Art. 40.3 as follows (new text in bold, deleted text in strikethrough):

“40.3. For the name of a new genus or subdivision of a genus, reference (direct or indirect) to a single species name, or citation of ~~the holotype or lectotype of a single~~ **type of a** previously or simultaneously published species name, even if that element is not explicitly designated as type, is acceptable as indication of the type (see also Art. 10.8; but see Art. 40.6).”

Here, the word “single” is not well placed. A name can have only one type, but a type can be shared by any number of names (homotypic names). Alternatively, reinforce the word “element” that occurs further on in the same sentence: “[...] or citation of ~~the holotype or lectotype of a single~~ **element that is the type of a** previously or simultaneously published species name [...].”

Prop. F (357 – Wisnev & Prado in *Taxon* 72: 1152) Add a new sentence at the end of Art. 40.3 (new text in bold):

“40.3. For the name of a new genus or subdivision of a genus, reference (direct or indirect) to a single species name, or citation of the holotype or lectotype of a single previously or simultaneously published species name, even if that element is not explicitly designated as type, is acceptable as indication of the type (see also Art. 10.8; but see Art. 40.6). For the purpose of Art. 40.1, mention of a single specimen or gathering (Art. 40.2) or illustration, even if that element is not explicitly designated as type, is acceptable as indication of the type of the name of a new species or infraspecific taxon (but see Art. 40.6). **For names falling under Art. 7.8, the determination of whether a single element is mentioned is made by considering both the earlier description or diagnosis and the validating protologue.**”

Prop. G (368 – Wisnev in *Taxon* 72: 1158) Delete the word “explicitly” in the second sentence of Art. 40.3 as follows (deleted text in strikethrough):

“40.3. [...]. For the purpose of Art. 40.1, mention of a single specimen or gathering (Art. 40.2) or illustration, even if that element is not explicitly designated as type, is acceptable as indication of the type of the name of a new species or infraspecific taxon (but see Art. 40.6).”

Prop. H (326 – Wisnev & Prado in Taxon 72: 957) Convert Art. 40 Note 2 to an Article and amend it as follows (new text in bold, deleted text in strikethrough) and add cross-references to it in Art. 9.1 and Art. 7.11:

“40.n. Mere citation of a locality does not constitute mention of a single specimen or gathering, **nor does it constitute an indication of the type**. Concrete reference to some detail relating to the actual type is required, such as the collector’s name, collecting number or date, ~~or~~ unique specimen identifier, **or the herbarium, collection, or institution in which the type is conserved. A similar detail is required to indicate a holotype under Art. 9.1 or designate a type (lectotype, neotype, or epitype) under Art. 7.11.**”

Prop. I (020 – Turland & al. in Taxon 69: 635) Combine and reword Art. 40.4 and 40.5 as follows:

Editorially renumber the combined Article as Art. 40.6.

“40.6. For the name of a new species or infraspecific taxon published on or after 1 January 2007, the type indicated in accordance with Art. 40 must always be a specimen (for fossils see also Art. 8.5); an exception is permitted for names of non-fossil microscopic algae and non-fossil microfungi, for which the type may be an effectively published illustration if there are technical difficulties of specimen preservation or if it is impossible to preserve a specimen that would show the features attributed to the taxon by the author of the name.”

Editorially renumber Art. 40.8 as Art. 40.7.

Prop. J (094 – Renner in Taxon 70: 1380) Amend Art. 40.4 as follows (new text in bold):

“40.4. For the purpose of Art. 40.1, the type of a name of a new species or infraspecific taxon (fossils excepted: see Art. 8.5) may be an illustration prior to 1 January 2007; on or after that date, the type must be a specimen **except (a) as provided in Art. 40.5 or (b) on or after 1 January 2026, the type may be an assembled nuclear genome or informative parts thereof.**”

Prop. K (222 – Wisnev & Prado in Taxon 72: 456) Amend Art. 40.4 as follows (new text in bold, deleted text in strikethrough):

“40.4. For the purpose of Art. 40.1, the type of a name of a new species or infraspecific taxon (fossils excepted: see Art. 8.5) may be an illustration prior to 1 January 2007; **for names published** on or after that date, the type ~~must be a specimen~~ **may not be an illustration** (except as provided in Art. 40.5).”

Prop. L (335 – Thiele & al. in Taxon 72: 1144) Amend Art. 40.5 (new text in bold) and add a new Note as follows:

“40.5. For the purpose of Art. 40.1, the type of a name of a new species or infraspecific taxon of microscopic algae or microfungi (fossils excepted: see Art. 8.5) may be an effectively published illustration **or, on or after 1 January 2026, a DNA sequence**, if there are technical difficulties of specimen preservation or if it is impossible to preserve a specimen that would show the features attributed to the taxon by the author of the name.”

“Note x. For the purposes of Art. 40.5, preservation of a specimen is regarded as technically unfeasible if and only if physical specimens or cultures cannot reasonably be obtained using technologies available at the time of publication. Preservation of a specimen is not considered unfeasible if a type specimen could not be obtained merely for reasons of inconvenience, lack of access, or if a specimen was lost or otherwise not collected when it could have been.”

Prop. M (019 – Turland & al. in Taxon 69: 635) Add a new second sentence to Art. 40.6 and amend Art. 9 Note 6 as follows (new text in bold, deleted text in strikethrough):

Editorially renumber Art. 40.6 as Art. 40.4 (and Art. 40.7 as Art. 40.5); editorially add “see also Art. 40.4” to the end of Art. 9.10; editorially amend or delete Art. 40 Ex. 5.

“40.4. For the name of a new taxon at the rank of genus or below published on or after 1 January 1990, indication of the type must include one of the words “typus” or “holotypus”, or its abbreviation, or its equivalent in a modern language (see also Rec. 40A.1 and 40A.4). **This requirement is also satisfied by use of one of the words “lectotypus” or “neotypus” (or its abbreviation, or its equivalent in a modern language), which are to be treated as errors to be corrected under Art. 9.10. But in** In the case of the name of a monotypic (as defined in Art. 38.6) new genus or subdivision of a genus with the simultaneously published name of a new species, indication of the type of the species name is sufficient.”

[Art. 9] “Note 6. A misused term may be corrected to **lectotype, neotype, or epitype** only if the requirements of Art. 7.11 ~~(for correction to lectotype, neotype, and epitype)~~ are met ~~and Art. 40.6 (for correction to holotype) does not apply~~, **in particular inclusion of the phrase “designated here” for typifications on or after 1 January 2001.**”

Prop. N (090 – Nachychko in Taxon 70: 1378) Amend Art. 40.6 and Art. 40 Ex. 7 as follows (new text in bold, deleted text in strikethrough):

“40.6. For the name of a new taxon at the rank of genus or below published on or after 1 January 1990, indication of the type must include one of the words “typus” or “holotypus”, ~~or its abbreviation, or~~ its equivalent in a modern language, **or abbreviations of these** (see also Rec. 40A.1 and 40A.4). But in the case of the name of a monotypic (as defined in Art. 38.6) new genus or subdivision of a genus with the simultaneously published name of a new species, indication of the type of the species name is sufficient.”

“Ex. 7. When Stephenson described “*Sedum mucizonia* (Ortega) Raym.-Hamet subsp. *urceolatum*” (in Cact. Succ. J. (Los Angeles) 64: 234. 1992) the name was not validly published because the protologue lacked the indication “typus” or “holotypus”, ~~or its abbreviation, or~~ its equivalent in a modern language, **or abbreviations of these**, a requirement for names published on or after 1 January 1990.”

Prop. O (160 – Maity & Dash in Taxon 71: 712) Convert Rec. 40A.5 to a new Article after Art. 40.7, reword it as follows, and move Rec. 40A Ex. 1 (wording unchanged) to follow the new Article:

“40.7bis. For the name of a new species or infraspecific taxon published on or after 1 January 2026 of which the type is a specimen, any available number permanently and unambiguously identifying at least one of the holotype, isotype, or paratype specimens in addition to its herbarium, collection, or institution of deposition must be specified (see also Art 40.7).”

“Ex. n. The type of *Sladenia integrifolia* Y. M. Shui & W. H. Chen (in Novon 12: 539. 2002) was designated as “*Mo Ming-Zhong, Mao Rong-Hua & Yu Zhi-Yong 05* (holotype, KUN 0735701; isotypes, MO, PE)”, where KUN No. 0735701 is the unique identifier of the holotype sheet in the herbarium of the Kunming Institute of Botany (KUN).”

Prop. P (148 – Gravenhyck & al. in Taxon 71: 706) Add new paragraph to Art. 40:

“40.n. For the name of a new fossil-species or infraspecific fossil-taxon published on or after 1 January 2026, the protologue

must clearly indicate where the holotype specimen (see Art. 8.n) is located within the rock, sediment, or preparation.”

Prop. Q (401 – Wisnev in Taxon 72: 1179) Add a new Article in Art. 40 follows:

“40.n. A name of a new taxon is not validly published merely because an author attempted to designate a type for an existing name that is contrary to the rules (but see Art. 48.1).”

Editorially revise “48.1” to “6.n and 48.1” if the second sentence of Art. 48.1 is converted to a new Art. 6.n.

Rapporteurs’ comments – Prop. A is part of a set of proposals (Art. 40 Prop. A, Art. 44 Prop. A, D and E) that would harmonize some conflicting requirements for valid publication (availability) of dinoflagellate names of new taxa between the *Code* and the zoological *Code*, because names in this group have been published under both *Codes*. Prop. A, in conjunction with Art. 44 Prop. D, would amend the requirement for type indication, with Prop. A exempting dinoflagellates from Art. 40.1 (requiring type indication after 1957) and Art. 44 Prop. D creating a new Art. 44.3 moving this requirement for dinoflagellates to after 1999. Prop. A and Art. 44 Prop. D and E should be considered together, but the proper home for everything being proposed would seem to be in Art. 40, which deals with type indication, not in Art. 44, which deals with validating descriptive material of non-fossil algae. Avoiding placement in either Art. 43 or Art. 44 would also avoid the need to consider separate treatment for fossil (in Art. 43) and non-fossil (in Art. 44) dinoflagellate names, although current Art. 11 Prop. E, which has its detractors (see comment under Art. 11 Prop. C, D and E), advocates for removal of separate priority rules for fossil or non-fossil dinoflagellate names but intentionally does not address differences in the requirements for valid publication. However, proper placement of any newly accepted provisions is a matter for the Editorial Committee to decide. The Nomenclature Committee for Algae does not support Prop. A (votes 3 : 9 : 4); nor does the Nomenclature Committee for Fossils (votes 0 : 12 : 0).

Prop. B would eliminate debate over the status of some names whose protologues included citation of additional elements ineligible as types, such as living organisms or illustrations cited after 2006, by noting that this would not affect their valid publication. This seems to be in line with existing practice.

Prop. C is part of a set of proposals that would provide for the future valid publication of names of microscopic algae or microfungi with DNA sequences as types (see Chap. V Sect. 2 Prop. A). The Nomenclature Committee for Algae does not support Prop. C (votes 0 : 15 : 1).

Prop. D, together with Prop. I and M, seeks to improve the organization of Art. 40. All three proposals can be considered independently; none is contingent upon another being accepted or rejected. Prop. D would reorganize, without altering, the content of current Art. 40.2 and 40.3, separating the provisions for names of genera and subdivisions of genera from those for species and infraspecific taxa.

Prop. E would modify the wording of Art. 40.3 to prevent possible misinterpretation, because that Article fails to account for species names that have been neotypified or have conserved types. It seems to be a useful adjustment.

Prop. F would address a perceived problem in Art. 40.3 in determining whether or not a type of a new species or infraspecific taxon validly published solely by reference to a previously and effectively published description or diagnosis and therefore typified under Art. 7.8 has been indicated through mention of a single element. This element could presumably be mentioned either in the context of the

earlier description or diagnosis or in the protologue, although the *Code* does not explicitly cover this matter. No situations of this type have been indicated by the proposers, and one might expect them to be quite rare.

Prop. G would strike the word “explicitly” from “explicitly designated” only in the second sentence of Art. 40.3, arguing that this wrongly implies that there is some unknown distinction between explicit designations and other designations. The identical phrase “even if that element is not *explicitly* designated as type” also appears in the first sentence of Art. 40.3, where the same consideration should apply but was not noted in Prop. G. The phrases were editorially added to the 2000 *Saint Louis Code* presumably to contrast explicit designations under Art. 9.1 from what would otherwise be the implicit designations under Art. 40.3. The proposed change seems inappropriate.

Prop. H would modify Art. 40 Note 2 and convert it back into an Article. The contents of Note 2, which dates from the 2000 *Saint Louis Code*, were editorially extracted from Art. 37.3 of the 1994 *Tokyo Code*. The proposed addition to the first sentence seems unnecessary, because this would already be apparent from the parallel language (“mention of a single specimen or gathering”) employed in Art. 40.3. However, Note 2 as currently written does seem to be in need of improvement. It could be taken to imply that at least two details are necessary to specify a specimen or gathering: a locality and some other detail. But some specimens lack locality data, in which case only a single detail might be specified. This seems undesirable. To avoid this issue, “detail” should be plural (“details”) and “locality” should be inserted in the second sentence. There is no problem with also adding “herbarium, [...]”, as advocated in Prop. H, but the proposed insertion of the final sentence, which would make these details minimum requirements to indicate a holotype or designate some other kind of type, seems unwise, because these determinations are best left to other provisions, which could be editorially cross-referenced to this one if considered necessary. Another type not listed in this final sentence, but where it could be relevant, is a syntype, because whether or not a syntype has been mentioned in a protologue is critical to the selection criteria for a lectotype under Art. 9.12. Removal of the word “single”, a cross-reference from Art. 9.6 and the following wording would permit this additional clarification: “**Mere citation of a locality does not constitute mention of a specimen or gathering. Concrete reference to some details relating to the actual type is required, such as the collector’s name, collecting number or date, locality, unique specimen identifier, or the herbarium, collection, or institution in which the type is conserved.**” Those who support this alternative should vote “ed.c.”

Prop. I, together with Prop. D and M, would reorganize Art. 40. All three proposals are independent; none is contingent upon another being accepted or rejected. Prop. I would rearrange and combine the related Art. 40.4 and Art. 40.5 into a single Article, with no change of meaning.

Prop. J is part of a set of proposals (with Art. 8 Prop. B and Rec. 8A Prop. C and D) relating to the acceptance of DNA sequences as nomenclatural types. The acceptance of Prop. J is dependent on the outcome of this set of proposals or the alternatives of the Special-purpose Committee on DNA Sequences as Types (see Chap. V Sect. 2 Prop. A). See comments under Art. 8 Prop. B.

Prop. K would amend Art. 40.4 to avoid a misreading that might suggest that mention of a gathering is not acceptable after 2006. The revised wording seems acceptable.

Prop. L is part of a set of proposals that would provide for the future valid publication of names of microscopic algae or microfungi

with DNA sequences as types (see Chap. V Sect. 2 Prop. A). The Nomenclature Committee for Algae does not support Prop. L (votes 1 : 14 : 1).

Prop. M, together with Prop. D and I, would reorganize Art. 40. All three proposals are independent; none is contingent upon another being accepted or rejected. Prop. M would add a sentence to Art. 40.6 and modify Art. 9 Note 6 to resolve a conflict with Art. 9.10. Note 6 has prevented correction of terms such as “lectotype” or “neotype” to “holotype” under Art. 9.10, thereby penalizing authors who mistakenly believed that they were lecto- or neotypifying already validly published names and leaving the valid publication status of such names in limbo. A non-comprehensive list of 14 of these names was provided by the proposers (in Taxon 69: 635. 2020).

Prop. N would provide a more precise wording for Art. 40.6 and its Ex. 7. A similar change is proposed for Art. 9.23 (see Art. 9 Prop. DDD).

Prop. O would decree that when the type is a specimen “any available number permanently and unambiguously identifying at least one of the holotype, isotype, or paratype specimens [such as a herbarium accession, barcode, or QR code] must be specified” with the aim of ensuring that the type deposition stated in the protologue is actually accomplished. Use of the word “available” implies that this would only be necessary if such a number exists, which does not appear to be the intent of the proposers, so this word should be omitted. Article 40.7 already requires, also for unpublished illustrations, after 1989 that “the single herbarium, collection, or institution in which the type is conserved must be specified”, so Prop. E adds a new layer to this requirement, applying it to at least one specimen from among the holotype, isotypes or paratypes, not necessarily the same specimen as in Art. 40.7. The aim of Prop. E, in including all these types, is to facilitate at least one of them being deposited somewhere before publication. Prop. E presupposes that every herbarium, collection or institution for every group of organisms, including fossils, assigns such numbers to all of its specimens, which may not be true, and that at least one type would be able to be deposited before publication. If the proposal is accepted, the Editorial Committee might prefer to omit the Example (current Rec. 40A Ex. 1), because it concerns a name published in 2002, whereas the new Article would apply only to names published after 2025.

Prop. P proposes a new Article, that would pertain solely to fossil-taxa, requiring that the location of the holotype specimen within a rock, sediment or preparation, which could include multiple specimens of multiple fossil-taxa, be specified in the protologue. This addition seeks to better accommodate the needs of palaeobotanists. The Nomenclature Committee for Fossils supports Prop. P (votes 12 : 0 : 0).

Prop. Q would add a new Article to Art. 40, precluding the possibility of an attempt to improperly designate a type for an existing name resulting in a later homonym. A similar issue is the focus of Art. 6 Prop. X part (a)(2), which prevents an improper designation of a type from interfering with a new combination, name at new rank or replacement name. In both cases the improper type designation must not create the name of a new taxon, because exclusion of the type as defined in Art. 48.2 has not been achieved. This would be, in effect, a misapplication, applying an existing name, basionym or replaced synonym to a different taxon without exclusion of its type, a situation already partly handled by Art. 48 Note 1. It would seem that both issues could be dealt with in combination through a modification to Art. 48 Note 1, to read: “**An improper (Art. 9.11–9.13 and Art. 10.2) or ineffective (Art. 7.10 and 7.11) type designation without explicit exclusion of the type (see Art. 48.2) does not**

create a new name. Misapplication of a new combination, name at new rank, or replacement name to a different taxon, but without explicit exclusion of the type of the basionym or replaced synonym, is dealt with under Art. 7.3–7.4.” Those in favour of this alternative should vote “ed.c.”

Chapter V Section 2 (Article 40 or new Article)

Prop. A (336 – Thiele & al. in Taxon 72: 1145) Add the following new Articles in Chapter V Section 2 after Art. 40.5, as follows:

“X.1. In order to be validly published with a DNA sequence as type (see Art. 40.5), a name must (a) be published in an approved journal (see App. Y, Art. X.2(b)) and (b) be accompanied in the protologue by (1) citation of the identifier issued for the type sequence by a recognized online repository (see App. X and Art. X.2(a)), (2) specification of selected informative portions of the type sequence, (3) a statement as to why it is believed that the taxon is novel and unnamed, and (4) an explanation of why a type specimen could not be isolated, cultured, or otherwise prepared.”

“X.2. The General Committee, after seeking advice from relevant specialist Committees and international societies, has the powers to (a) appoint one or more localized or decentralized, open and accessible electronic repositories to issue the identifiers required by Art. 9.21(a) and X.1(b)(1) (see App. X), (b) ratify a list of approved journals for valid publication of names with DNA sequences as types (see App. Y), and (c) cancel or alter such appointments or ratifications at its discretion.”

Rapporteurs’ comments – *Prop. A* is part of a set of proposals (Art. 8 Prop. D, Art. 9 Prop. C, HH and CCC, Art. 29 Prop. A, Art. 38 Prop. C, Art. 40 Prop. L, Chap. V Sect. 2 Prop. A, Art. 44 Prop. B and Div. III Prop. X) that would provide for the future valid publication of names of microscopic algae or microfungi with DNA sequences as types. This would only be possible, on or after 1 January 2026, when a “type specimen could not be isolated, cultured, or otherwise prepared”. These proposals would allow for the holotype DNA sequence to substitute for a description or diagnosis. Stringent requirements would have to be satisfied (see Art. X.1) in the valid publication of such names, some of these overseen by the General Committee. Apart from a few minor issues (see Art. 8 Prop. D, Art. 29 Prop. A and Art. 38 Prop. C), no fundamental nomenclatural problems are foreseen from acceptance of this set of proposals. An alternative set of proposals (see Chap. II new Art. Prop. A), with effectively the same taxonomic coverage, seeks the same objective by introducing the concept of “type-less” names, the application of which would be determined by means of reference DNA sequences instead of types. The objective is to overcome the obstacle that taxa detected and characterized using DNA sequences, but unable to be isolated, cultured or illustrated, are currently unnameable. Those voting may choose to support one or the other of these sets of alternative proposals, or neither. The Nomenclature Committee for Algae does not support Prop. A (votes 1 : 14 : 1). The Nomenclature Committee for Fungi does not support this set of proposals as a whole (votes 4 : 10 : 1). Some members of the latter Committee who voted “no” indicated that they could support such an innovation, depending on modifications to the proposals potentially resulting from deliberations of the Special-purpose Committee on DNA Sequences as Types for Fungi that is to report to the XII International Mycological Congress, Maastricht, Netherlands, in August 2024.

Recommendation 40A

Prop. A (044 – Bhattacharjee & al. in Taxon 69: 1389) Amend Rec. 40A.1 as follows (deleted text in strikethrough):

“40A.1. The indication of the nomenclatural type should immediately follow the description or diagnosis ~~and should include the Latin word “typus” or “holotypus”.~~”

Prop. B (223 – Kumar & Bandyopadhyay in Taxon 72: 456) Delete Rec. 40A.1:

“40A.1. The indication of the nomenclatural type should immediately follow the description or diagnosis ~~and should include the Latin word “typus” or “holotypus”.~~”

Prop. C (224 – Kumar & Bandyopadhyay in Taxon 72: 456) Amend Rec. 40A.4 (new text in bold):

“40A.4. Details of the type specimen of the name of a new species or infraspecific taxon, **including the words required by Art. 40.6,** should be published in the Latin alphabet.”

Prop. D (327 – Mosyakin & al. in Taxon 72: 958) Amend Rec. 40A.4 as follows (new text in bold):

“40A.4. Details of the type specimen of the name of a new species or infraspecific taxon should be published in the Latin alphabet. **The author(s) should provide in the protologue the full and explicit citation of the data on the label accompanying the type (holotype) specimen, including the exact locality (preferably with geographic coordinates, if available), the name(s) of the collector(s), collecting number and date, and other relevant information.”**

Prop. E (117 – Bandyopadhyay & al. in Taxon 70: 1390) Add a new paragraph to Rec. 40A:

“40A.7. Authors should publish the name of a new species or infraspecific taxon not only with a holotype but also with isotype(s) and/or paratype(s). The isotype(s) and paratype(s) should preferably be deposited in herbaria other than that in which the holotype is deposited. If it is not possible to preserve any specimens other than the holotype, a photograph of the holotype should be included in the protologue, so that if the holotype is lost or destroyed, the photograph will be available for designation as the lectotype.”

Rapporteurs’ comments – *Prop. A* would delete an unnecessary phrase from Rec. 40A.1, because the subject covered is already mandated by Art. 40.6.

Prop. B would delete Rec. 40A.1, which appears to be routinely ignored by most taxonomists, altogether. The Recommendation serves little or no purpose and can be deleted with no negative consequences.

Prop. C would insert a phrase in Rec. 40A.4 to “make it explicit that the ‘details of the type specimen’, which should be published in the Latin alphabet, include the words required by Art. 40.6”. However, Art. 40.6 requires “the words ‘typus’ or ‘holotypus’, or its abbreviation, *or its equivalent in a modern language*” after 1989 and Art. 40 Ex. 8 indicates a name published in 1990 with type details in Chinese. So *Prop. C* would be recommending against something that Art. 40.6 permits.

Prop. D would recommend what some might consider desirable nomenclatural practice that is not currently suggested anywhere in the *Code*. However, in the case of certain taxa, citing exact locality data would not be advisable if it would expose their native populations to over-collecting.

Prop. E, in its first sentence, would offer useful advice encouraging the preparation and citation of duplicate and/or related type material of names of new taxa, although it might have limited application to fossils. The advice of the second sentence overlaps with Rec. 7A *Prop. C*, which more generally applies to all type designations, not just those for names of new taxa. The third sentence would recommend what is already required for fossils under Art. 43.2 and

43.3, although not there restricted to photographs. The latter sentence seemingly offers more good advice, but the resulting photograph would become the obligate choice for later lectotypification, should this be necessary, thereby precluding selection of a more appropriate neotype specimen and encouraging for pre-existing names what Art. 40.4 forbids for names of new taxa.

Article 41

Prop. A (225 – Wisnev in Taxon 72: 457) Amend Art. 41.1 as follows (new text in bold):

“41.1. In order to be validly published, a new combination, name at new rank, or replacement name must be accompanied by a reference to the basionym or replaced synonym. (See Art. 6.10 and 6.11). **See Art. 41.5 for such names published on or after 1 January 1953.**”

Prop. B (271 – Wrangmore & Govaerts in Taxon 72: 691) Add a new Note after Art. 41.3:

“Note n. An indirect reference to a basionym or replaced synonym is a clear (if cryptic) indication of the place of publication of that basionym or replaced synonym or one of its homotypic names. An indication of an author and/or publication different from those of a potential basionym or replaced synonym is in itself not considered sufficient to be an indirect reference to that basionym or replaced synonym.”

Prop. C (302 – Wisnev & Prado in Taxon 72: 948) Amend Art. 41.4 as follows (deleted text in strikethrough):

“41.4. If, for a name of a genus or lower-ranked taxon published before 1 January 1953, no reference to a basionym is given but the conditions for its valid publication as the name of a new taxon or replacement name are fulfilled, that name is nevertheless treated as a new combination or name at new rank when ~~this was the author’s presumed intent and~~ a potential basionym (Art. 6.10) applying to the same taxon exists.”

Prop. D (079 – Gnanasekaran & Arisdason in Taxon 70: 458) Amend Art. 41.5 as follows (new text in bold) and delete Rec. 41A.1:

“41.5. On or after 1 January 1953, a new combination, name at new rank, or replacement name is not validly published unless its basionym or replaced synonym is clearly indicated and a full and direct reference given to its author and place of valid publication, with page or plate reference and date (but see Art. 41.6 and 41.8). On or after 1 January 2007, a new combination, name at new rank, or replacement name is not validly published unless its basionym or replaced synonym is cited. **On or after 1 January 2025, a new combination, name at new rank, or replacement name is not validly published unless it is immediately followed by the full and direct reference to the author and place of publication of its basionym or replaced synonym.**”

~~“41A.1.~~ ~~The full and direct reference to the place of publication of the basionym or replaced synonym should immediately follow a proposed new combination, name at new rank, or replacement name. It should not be provided by mere cross-reference to a bibliography at the end of the publication or to other parts of the same publication, e.g. by use of the abbreviations “loc. cit.” or “op. cit.”~~”

Prop. E (118 – Mosyakin in Taxon 70: 1391) Amend Art. 41.5 as follows (new text in bold, deleted text in strikethrough) and add a new Example:

“41.5. On or after 1 January 1953, a new combination, name at new rank, or replacement name is not validly published unless its basionym or replaced synonym is clearly indicated and a full and direct reference given to its author and place of valid publication, with page

or plate reference and date (but see Art. 41.6 and 41.8). **Valid publication is not achieved by reference to a new combination based on the actual basionym or replaced synonym (but see Art. 41.8), unless that new combination is the illegitimate name being replaced by a replacement name.** On or after 1 January 2007, a new combination, name at new rank, or replacement name is not validly published unless its basionym or replaced synonym is cited.”

“*Ex. 16bis.* The intended replacement name “*Hemionitis atreyu*” was not validly published by Christenhusz (in Christenhusz & al., *Global Fl.* 4: 10. 2018) because that author made no reference to the replaced synonym, *Pteris acrostica* Balb. (Elenco: 98. 1801), instead citing “*Cheilanthes acrostica* Tod., *Giorn. Sci. Nat. Econ. Palermo* 1: 215. 1866”, which is in fact a new combination, *C. acrostica* (Balb.) Tod., based on *P. acrostica*, which Todaro explicitly cited as the basionym.”

Prop. F (184 – Kumar & Bandyopadhyay in Taxon 71: 1338) Amend Art. 41.5 as follows (new text in bold) and add a new Note:

“41.5. On or after 1 January 1953, a new combination, name at new rank, or replacement name is not validly published unless its basionym or replaced synonym is clearly indicated and a full and direct reference given to its author and place of valid publication, with page or plate reference (**if present and even if preliminary**) and date (but see Art. 41.6 and 41.8). On or after 1 January 2007, a new combination, name at new rank, or replacement name is not validly published unless its basionym or replaced synonym is cited.”

“*Note x.* For the purpose of Art. 41.5, preliminary page numbers in electronic publications may be cited provided that the content of the publication is not preliminary (see Art. 30 Note 1).”

Prop. G (226 – Wisnev in Taxon 72: 457) Amend Art. 41.5 as follows (new text in bold, deleted text in strikethrough):

“41.5. ~~On or after 1 January 1953, a~~ **A new combination, name at new rank, or replacement name published on or after 1 January 1953** is not validly published unless its basionym or replaced synonym is clearly indicated and a full and direct reference given to its author and place of valid publication, with page or plate reference and date (but see Art. 41.6 and 41.8). **In addition** ~~On or after 1 January 2007, a new combination, name at new rank, or replacement name published on or after 1 January 2007~~ is not validly published unless its basionym or replaced synonym is cited.”

Conforming changes are needed for Art. 41.3 and 41.8.

Prop. H (272 – Hartley & Govaerts in Taxon 72: 692) Add a new Note after Art. 41 Note 1:

“*Note 1bis.* For publications lacking page numbers, a page reference can be achieved by a clear indication of the page or pages on which the protologue of the basionym or replaced synonym appears by:

(a) citing an assumed page number when there is continuous pagination;

(b) citing the page number automatically generated within the PDF of an electronic publication;

(c) using the words “without page number”, “sine pagina”, “s.p.” or similar; or

(d) including any indication that refers to the exact page on which the protologue appears, for example citing the species number, or the words “addition” or “supplement” if indicated as such on the page.

The citation of a DOI or URL to the web page on which the electronic paper appears is not sufficient for page indication even if the entire publication is coextensive with the protologue.”

Prop. I (318 – Govaerts & Kirk in Taxon 72: 953) Add a new Article to Art. 41 to allow for valid publication of a new combination, name at new rank or replacement name by registration only:

“41.5bis. New combinations, names at new rank, or replacement names that are effectively published under Art. 29.1bis are also considered to be simultaneously validly published. Any errors or omissions are correctable after registration, not affecting the date of valid publication. However, because only new combinations, names at new rank, or replacement names can be validly published by this procedure, correction as the name of a new taxon is not permitted.”

Prop. J (045 – Wisnev in Taxon 69: 1390) Convert Art. 41 Ex. 17 into a voted Example:

“**Ex. 17. Aronia arbutifolia* var. *nigra* (Willd.) F. Seym. (*Fl. New England*: 308. 1969) was published as a new combination “Based on *Mespilus arbutifolia* L. var. *nigra* Willd., in *Sp. Pl.* 2: 1013. 1800.” Willdenow treated these plants in the genus *Pyrus*, not *Mespilus*, and publication was in 1799, not 1800; these errors of citation do not prevent valid publication of the new combination.”

Prop. K (046 – Wisnev in Taxon 69: 1390) Delete Art. 41 Ex. 19:

“*Ex. 19. Nekemias grossedentata* (Hand. Mazz.) J. Wen & Z. L. Nie (in *PhytoKeys* 42: 16. 2014) was published as a new combination, with the basionym cited as “*Ampelopsis cantoniensis* var. *grossedentata* Hand. Mazz., *Sitzungsber. Kaiserl. Akad. Wiss., Math. Naturwiss. Cl., Abt. 1*, 59: 105. 1877”. The actual place of publication of the cited basionym was in *Anz. Akad. Wiss. Wien, Math. Naturwiss. Kl.* 59: 105. 1922. These errors of citation (name of the journal and date) do not prevent valid publication of the new combination.”

Prop. L (328 – Hartley & Govaerts in Taxon 72: 960) Delete clauses (c) and (d) from Art. 41.8 (deleted text in strikethrough) and add a new Art. 41.8bis:

“41.8. On or after 1 January 1953, in any of the following cases, a full and direct reference to a work other than that in which the basionym or replaced synonym was validly published is treated as an error to be corrected, not affecting the valid publication of a new combination, name at new rank, or replacement name:

(a) when the actual basionym or replaced synonym was validly published earlier than the name or later synonym cited as such, but in the cited publication, in which all conditions for valid publication of the name as cited are fulfilled, there is no reference, in association with that name, to the place of valid publication of the actual basionym or replaced synonym;

(b) when the failure to cite the place of valid publication of the basionym or replaced synonym is explained by the later nomenclatural starting-point for the group concerned (Art. 13.1), or by the backward shift of the starting date for some fungi;

~~(c) when the resulting new combination or name at new rank would otherwise be validly published as a (legitimate or illegitimate) replacement name; or~~

~~(d) when the resulting new combination, name at new rank, or replacement name would otherwise be the validly published name of a new taxon.”~~

“41.8bis. On or after 1 January 1953, in any of the following cases, the omission of a basionym or replaced synonym (Art. 41.5), omissions in the full and direct reference citation of a basionym or replaced synonym (Art. 41.6), or citation of a work other than that in which the basionym or replaced synonym was validly published are treated as errors to be corrected, not affecting the valid publication of a new combination, name at new rank, or replacement name:

(a) when the resulting new combination or name at new rank would otherwise be validly published as a (legitimate or illegitimate) replacement name; or

(b) when the resulting new combination, name at new rank, or replacement name would otherwise be the validly published name of a new taxon.”

We ask the Editorial Committee to make the necessary cross-references, especially “(but see Art. 41.8bis)” to Art. 41.5 and 41.6, rather than formally proposing such changes here.

Prop. M (064 – Wisnev in Taxon 70: 451) Add a new Art. 41.9 as follows:

“41.9. None of the foregoing requirements in Art. 41 applies to a replacement name that is illegitimate under Art. 52 if neither Art. 7.5(a) nor (b) applies.”

Prop. N (227 – Mota & al. in Taxon 72: 458) Add a new Article to Art. 41 as follows:

“41.n. When it is doubtful whether an author has satisfied the requirement of Art. 41.3 for an “indirect reference” to a basionym or replaced synonym, a request for a decision may be submitted to the General Committee, which will refer it for examination to the specialist committee for the appropriate taxonomic group (see Div. III Prov. 2.2, 7.9, and 7.10). A Committee recommendation as to whether or not the name concerned is validly published may then be put forward to an International Botanical Congress and, if ratified, will become a binding decision with retroactive effect. These binding decisions are listed in App. VI.”

Prop. O (300 – Wisnev & Prado in Taxon 72: 948) Add a new Note to Art. 41:

“Note n. Before 1 January 1953, a reference to an earlier new combination, name at new rank, or replacement name is deemed to include a reference to the basionym or replaced synonym of that name.”

Rapporteurs’ comments – *Prop. A* is intended to alert *Code* users to Art. 41.5, which the proposer regards as the “most important rule” in Art. 41, whereas “most users have little interest in the pre-1953 rules”. Users who agree with this will presumably support the proposal.

Prop. B, in its first sentence, would provide a useful Note explaining what an indirect reference can be. However, the second sentence would add a restriction suggesting that a pre-1953 new combination, name at new rank or replacement name could not be validly published if the reference to the basionym or replaced synonym involved more than one step, e.g. if it was to a later isonym by the same or a different author, or if it was to a new combination or replacement name based on the basionym or replaced synonym. A less restrictive view of this is taken by *Prop. O*. The proposers cite *Aster pyrenaeus* Desf. ex DC., argued by some to be illegitimate under Art. 52 because “*Aster sibiricus* Lam. Dict. 1. p. 305.” was cited in synonymy and Lamarck described “*Aster sibiricus* L.” However, it can be implied that Candolle meant *A. sibiricus* sensu Lam. non L., which precludes illegitimacy, as explained in Art. 52 Note 3.

Prop. C would remove the need to presume the author’s intent when determining the status of a name under Art. 41.4. This intent could be presumed differently by different workers and therefore lead to instability. The proposers argue that the requirement for the existence of a potential basionym that applies to the same taxon is sufficient.

Prop. D would convert Rec. 41A.1 to an Article, meaning that after 2024 a full and direct reference to a basionym or replaced synonym could no longer be achieved by citing, e.g., “Linnaeus (1753: 123)” and then including a full bibliographic citation of Linnaeus’s *Species plantarum* in the literature cited. Whether journals that currently use this style of citation would promptly comply with the

new rule is uncertain, and some might feel that the *Code* already has too many date-limited rules.

Prop. E seeks to clarify what constitutes reference to the basionym under Art. 41.5, so that referring instead to a new combination would be explicitly prohibited. The current rules already prohibit this, because referring to a new combination instead of its basionym is not a direct reference to that basionym, which the Article requires. The proposal would, however, restrict what constitutes reference to the replaced synonym under the same Article, prohibiting with one exception reference to a new combination, which under the current rules is allowed but, in the proposer’s opinion, “is against what one could presume to be the intent or meaning of Art. 41.5”. Those who agree will presumably support the proposal. If *Prop. E* is accepted, the associated Example would be referred to the Editorial Committee.

Prop. F would make it explicit that a full and direct reference to the basionym or replaced synonym in Art. 41.5 may omit non-existent page or plate numbers and may include preliminary page numbers. This could be helpful especially when referring to final versions of electronic publications in which pagination is still preliminary or lacking. However, as worded, it is not quite clear what the phrase “(if present and even if preliminary)” refers to, although presumably it means page (or plate) numbers.

Prop. G would provide a more precise wording for Art. 41.5 (as well as Art. 41.3 and 41.8) and make it clear that the condition of valid publication in the second sentence applies in addition to that in the first sentence, not instead of it.

Prop. H would add a Note explaining how, in printed matter or electronic material lacking page numbers, reference to pages may be given in order to meet the requirements of Art. 41.5. While a DOI or URL linking to an online article does not constitute a page reference, it may be necessary to include it when it is the only way to identify a particular journal article that has yet to be assigned an article number or final page numbers within a volume or part, because citing, e.g., “Taxon (2023) [page 3 of 10]” could refer to any number of articles. The final sentence of the Note would therefore perhaps be better worded as “is not **by itself** sufficient for page indication”.

Prop. I is linked to Art. 29 *Prop. B*, which would permit nomenclatural novelties other than names of new taxa to be effectively published by registration at a recognized nomenclatural repository. *Prop. I* would go further by ruling that such names are “considered to be simultaneously validly published”, even if there are errors or omissions, which could be corrected later. However, such corrections would conflict with Art. 30.4: “The content of a particular electronic publication *must not be altered after it is effectively published*. Any such alterations are not themselves effectively published. Corrections or revisions must be issued separately to be effectively published” and Art. 41.6: “For names published on or after 1 January 1953, errors in the citation of the basionym or replaced synonym, including incorrect author citation (Art. 46), *but not omissions* (Art. 41.5), do not preclude valid publication of a new combination, name at new rank, or replacement name.” Under *Prop. I*, the protologue is the record in the registration database, and permitting this to be altered after its effective publication would not only violate these other provisions but could create a whole host of future problems. Additionally, separating nomenclature from taxonomy would in some cases facilitate, and thereby encourage, publication of the former unsupported by any evidence from the latter.

Prop. J is based on a strictly literal reading of Art. 41.6 in which “errors in the citation of the basionym or replaced synonym,

including incorrect author citation” would be interpreted as excluding the bibliographic reference of the name (i.e. “place of valid publication, with page or plate reference and date” as per Art. 41.5). On this basis, the proposer argues that Art. 41 Ex. 17 is wrong, because the date is not correctable, and conversion to a voted Example is necessary to permit correction of dates. However, disallowing valid publication when dates have been incorrectly cited for a basionym or replaced synonym could have enormous consequences in terms of nomenclatural stability, because knowledge regarding dates of publication of many works can evolve over time.

Prop. K is based on the argument that Art. 41 Ex. 19 is wrong because the date in a bibliographic reference to a basionym is not correctable, as discussed under *Prop. J*, and the erroneous citation of an actual different journal is contrary to Art. 41.7, which prohibits citation of “any work other than that in which the name was validly published”, so the Example should be deleted. *Prop. K* would be automatically referred to the Editorial Committee.

Prop. L would divide Art. 41.8 into two Articles to end what the proposers call the “new combination/name of new taxon lottery”, i.e. the way in which either status can be determined for an intended new combination published after 1952. According to the authors “If a protologue contains a full and direct reference to any work, then the avowed combination is to be considered a validly published new combination, but if there is no full and direct reference, then it is to be considered a name of a new taxon with the same type as the avowed basionym.” Their new Art. 41.8bis would transfer clauses (c) and (d) from current Art. 41.8 and relax the requirements of Art. 41.5 and 41.6, which demand both: (1) citation of the basionym or replaced synonym and (2) provision of a full and direct reference to its author and place of valid publication, when either condition (c) or (d) is met. The result would be to allow many names intended as new combinations or replacement names, but currently failing to meet requirement (1) or (2) above, to be treated as such rather than being treated as names of new taxa. *Prop. L*, if accepted, would make Art. 6 *Prop. Z* unnecessary, because the names of new taxa that Art. 6 *Prop. Z* mentions would presumably become new combinations or replacement names.

Prop. M, by ruling that none of the current conditions of Art. 41 would apply, would presumably allow illegitimate replacement names to be validly published, even after 1952, merely by including the type of a replaced synonym (Art. 52.1) but without reference to that replaced synonym. However, this seems to be based on a misunderstanding of Art. 6.12 and 7.5, neither of which can determine valid publication. By circumventing the normal rules for valid publication of a replaced synonym, this proposal could have unforeseen consequences.

Prop. N is modelled on Art. 38.4 and would allow binding decisions on valid publication to apply to cases of doubt as to the provision of an indirect reference under Art. 41.3. The proposers cite a single example that they were unable to resolve, but it is unclear how widespread the perceived problem is. Other proposals (Art. 38 *Prop. K*, *M*, *N* and *P*) would amend Art. 38.4 to address other cases of uncertainty. Some might consider that a proliferation in requests for binding decisions could overwhelm Nomenclature Committees that already have a heavy workload.

Prop. O would add a Note, opposite to that offered by *Prop. B*, based on a more expansive interpretation of “indirect reference”, i.e. that an indirect reference may involve two steps, such as when a pre-1953 new combination does not cite the basionym but cites another new combination based on that basionym.

Recommendation 41A

Prop. A (273 – Hartley & Govaerts in *Taxon* 72: 692) Amend Rec. 41A.2 to read (new text in bold, deleted text in strikethrough):

“41A.2. In the absence of established tradition, if publications are not paginated, page numbers **indicated according to Art. 41 Note 1bis(a), (b), or (c)** should be ~~referenced with enclosed in square brackets.~~”

Rapporteurs’ comments – *Prop. A* would be an appropriate editorial adjustment to Rec. 41A.2 should Art. 41 *Prop. H* be accepted.

Article 42

Prop. A (377 – Brinda & Watson in *Taxon* 72: 1170) Add three new Articles and three new Notes to Art. 42:

“42.4. For an identifier to be issued by a recognized repository for a nomenclatural novelty (Art. 6 Note 4) applied to an organism treated as an alga or plant under this *Code*, the minimum elements of information that must be provided to the repository by either the author(s) or other user(s) of these scientific names are proof of effective publication (Art. 29–31) of the name itself along with those elements required for valid publication under Art. 38.1(a) and 39.2 (validating description or diagnosis) and Art. 40.1 and 40.7 (type) or Art. 41.5 (reference to the basionym or replaced synonym) and for algae Art. 44.2.”

“Note 2. In contrast to registration of fungal names, registration of algal and plant names is retrospective and accomplished only after valid publication (Art. 42.3).”

“Note 3. Proof of effective and valid publication for the purposes of issuing an identifier may be provided to the repository in a variety of forms including (but not limited to) PDFs, scanned page images, and/or URL/DOIs that lead to free and publicly accessible websites where these may be obtained.”

“42.5. The General Committee (see Div. III Prov. 7) has the power to (a) appoint one or more localized or decentralized, open and accessible electronic repositories to accession the information required by Art. 42.4 and issue identifiers; (b) cancel such appointment at its discretion; and (c) set aside the requirements of Art. 42.4 and 42.6, should the repository mechanism, or essential parts thereof, cease to function. Decisions made by this Committee under these powers are subject to ratification by a subsequent International Botanical Congress.”

“42.6. For an identifier to be issued by a recognized repository for the purposes of specifying the designation of a type of the name of an organism treated as an alga or plant under this *Code*, the minimum elements of information that must be provided to the repository by either the author(s) or other user(s) of these type designations are proof of effective publication (Art. 29–31) of the name being typified, along with the author(s) designating the type and those elements required by Art. 9.21, 9.22, and 9.23.”

“Note 4. For organisms treated as algae or plants under this *Code*, issuance of an identifier by a recognized repository has no effect on valid publication of a name (Art. 32–45) or effective type designation (Art. 7.8–7.11). Instead, these simply serve as stable digital references to the information present in the actual place of publication.”

Rapporteurs’ comments – *Prop. A* arose from discussions within the Registration Committee, although it was not authored by the Registration Committee itself, which did not submit any proposal (see Loizeau & al. in *Taxon* 72: 1134–1136. 2023). *Prop. A*, which should be considered together with Rec. 42A *Prop. A*, would create three new Articles and three new Notes in Art. 42 that would establish

procedures for the issuance of unique identifiers from recognized repositories, approved by the General Committee, for the voluntary retrospective registration of both nomenclatural novelties of algae and plants and their type designations. These provisions parallel those in Art. F.5 for fungi, but registration in fungi is proactive and mandatory for valid publication of names or effective designation of types.

Recommendation 42A (new)

Prop. A (378 – Brinda & Watson in Taxon 72: 1171) Add two Recommendations to a new Rec. 42A:

“42A.1. Following the effective and valid publication of new names and nomenclatural acts, authors should report them to a recognized nomenclatural repository (Art. 42.1) for indexing and assignment of a unique identifier (Art. 42.4 and 42.6). While it is in the interest of the authors to do this promptly, any other party may present proof of effective and valid publication to these repositories for the purposes of both indexing and identifier assignment. In groups where proactive registration is mandatory (see Art. F.5), additional publication details (e.g. final pagination, precise date of publication, etc.) should be provided to the registrar at this time.”

“42A.2. Specification of names and nomenclatural acts for the purpose of exchange of digital information should include the unique identifier for those entities as established by a recognized nomenclatural repository (Art. 42.1).”

Rapporteurs’ comments – *Prop. A* is paired with and dependent upon acceptance of Art. 42 Prop. A and would encourage authors of new names and nomenclatural acts or other parties to follow the procedures that would be established by Art. 42 Prop. A.

Article 44

Prop. A (181 – Woelkerling & Moestrup in Taxon 71: 1338) Amend Art. 44.1 to exempt names of dinoflagellates as follows (new text in bold):

“44.1. In order to be validly published, a name of a new taxon of non-fossil algae (**dinoflagellates excepted**) published between 1 January 1958 and 31 December 2011, inclusive, must be accompanied by a Latin description or diagnosis or by a reference (see Art. 38.13) to a previously and effectively published Latin description or diagnosis.”

Prop. B (337 – Thiele & al. in Taxon 72: 1145) Amend Art. 44.2 as follows (new text in bold, deleted text in strikethrough):

“44.2. A name of a new species or infraspecific taxon of non-fossil algae ~~published on or after 1 January 1958~~ is not validly published unless **(a) on or after 1 January 1958** it is accompanied by an illustration or figure showing the distinctive morphological features, or by a reference to a previously and effectively published such illustration or figure, **or (b) on or after 1 January 2026 its holotype is a DNA sequence and it meets the requirements of Art. X.1.**”

Prop. C (347 – Thiele & al. in Taxon 72: 1148) Amend Art. 44.2 as follows (new text in bold, deleted text in strikethrough):

“44.2. A name of a new species or infraspecific taxon of non-fossil algae ~~published on or after 1 January 1958~~ is not validly published unless **(a) on or after 1 January 1958** it is accompanied by an illustration or figure showing the distinctive morphological features, or by a reference to a previously and effectively published such illustration or figure, **or (b) on or after 1 January 2026 a reference sequence is designated for a name that meets the requirements of Art. X.1.**”

Prop. D (182 – Woelkerling & Moestrup in Taxon 71: 1338) Add a new Art. 44.3 to align the ICN requirement for nomenclatural type indication of dinoflagellate names with that of the ICZN (Art. 72.3):

“44.3. Publication on or after 1 January 2000 of the name of a new taxon of dinoflagellates at the rank of genus or below is valid only when the type of the name is indicated.”

Prop. E (183 – Woelkerling & Moestrup in Taxon 71: 1338) Add a new Note to follow Art. 44.3:

“Note 2. Although dinoflagellates are excluded from Art. 40.1, the other provisions of Art. 40 still apply, including type indications.”

Rapporteurs’ comments – *Prop. A* is part of a set of proposals (Art. 40 Prop. A, Art. 44 Prop. A, D and E) that would harmonize some conflicting requirements for valid publication (availability) of dinoflagellate names of new taxa between the *Code* and the zoological *Code*, because names in this group have been published under both *Codes*. *Prop. A* would exempt dinoflagellate names from ever requiring a Latin description or diagnosis or a reference to one for valid publication, because this was never a requirement of the zoological *Code*. Acceptance of *Prop. A* would still require non-fossil or fossil dinoflagellate names published under the *Code* to satisfy Art. 39.2 or Art. 43.1, respectively, by providing a Latin or English description or diagnosis or reference to one after 2011 or 1995, respectively. It should be noted that current Art. 11 Prop. E, which has its detractors (see Art. 11 Prop. C, D and E), advocates for removal of separate priority rules for fossil or non-fossil dinoflagellate names, but intentionally did not address differences in these requirements for valid publication. The Nomenclature Committee for Algae does not support *Prop. A* (votes 4 : 7 : 5); nor does the Nomenclature Committee for Fossils (votes 0 : 12 : 0).

Prop. B is part of a set of proposals that would provide for the future valid publication of names of microscopic algae or microfungi with DNA sequences as types (see Chap. V Sect. 2 Prop. A). The Nomenclature Committee for Algae does not support *Prop. B* (votes 0 : 15 : 1).

Prop. C is part of a set of proposals that would provide for the future valid publication of names of certain taxa other than vascular plants or bryophytes without nomenclatural types (so-called “type-less names”; see Chap. II new Art. Prop. A). The Nomenclature Committee for Algae does not support *Prop. C* (votes 0 : 15 : 1).

Prop. D and *E* are part of a set of proposals (Art. 40 Prop. A, Art. 44 Prop. A, D and E) that would harmonize some conflicting requirements for valid publication (availability) of dinoflagellate names of new taxa between the *Code* and the zoological *Code*, because names in this group have been published under both *Codes*. Article 40 Prop. A, in conjunction with Art. 44 Prop. D, would amend the requirement for type indication, with Art. 40 Prop. A exempting dinoflagellates from Art. 40.1 (requiring type indication after 1957) and Art. 44 Prop. D creating a new Art. 44.3 moving this requirement for dinoflagellates to after 1999. Article 44 Prop. E would clarify that the other requirements under Art. 40 would still apply to dinoflagellates. See additional comments under Art. 40 Prop. A that are relevant to both Art. 44 Prop. D and E. The Nomenclature Committee for Algae does not support *Prop. D* (votes 4 : 8 : 4) or *Prop. E* (votes 3 : 8 : 5); nor does the Nomenclature Committee for Fossils (votes 0 : 12 : 0, both proposals).

Article 45

Prop. A (379 – McNeill in Taxon 72: 1172) Add a sentence to Art. 45.1 as follows (new text in bold):

“45.1. If a taxon originally assigned to a group not covered by this *Code* is treated as belonging to the algae or fungi, any of its names need satisfy only the requirements of the relevant other *Code* that the author was using for status equivalent to valid publication

under this *Code* (but see Art. 54 and F.6.1, regarding homonymy). The *Code* used by the author is determined through internal evidence, irrespective of any claim by the author as to the group of organisms to which the taxon is assigned. **If no clear internal evidence exists to determine the *Code* being used by the author, names therein need only satisfy the specific requirements for the equivalent of valid publication in any one of the *Codes* that might have been used regardless of whether or not that *Code* is deemed applicable.** However, a name generated in zoological nomenclature in accordance with the Principle of Coordination is not validly published under this *Code* unless and until it actually appears in a publication as the accepted name of a taxon.”

If Prop. 379 [Prop. A] is accepted, I would commend the following Example to the Editorial Committee:

The generic name *Alexandrium*, with one species, *A. minutum*, was published by Halim (in Vie & Milieu, Sér. A, Biol. Mar. 11: 101–105, 1960) without clear internal evidence of the *Code* that Halim was following. Halim did not include any Latin description or indicate a type for *A. minutum*, both requirements at that time under the *International Code of Botanical Nomenclature*. His names do, however, meet the specific requirements of the *International Code of Zoological Nomenclature* (Art. 10–20) for availability. Consequently, when treated as algal names, they are validly published under the *International Code of Nomenclature for algae, fungi, and plants*, despite the fact that the ICZN has been deemed inapplicable to Halim’s publication (Andersen in Taxon 70: 1125, 2021).

Prop. B (380 – McNeill in Taxon 72: 1172) Amend Art. 45.1 as follows (new text in bold, deleted text in strikethrough):

“45.1. ~~If a taxon originally~~ **Any of the names of a taxon treated as belonging to the algae or fungi but that were, or appear to have been, published under the provisions of another *Code* assigned to a group not covered by this *Code* is treated as belonging to the algae or fungi, any of its names** need satisfy only the requirements of the relevant other *Code* that the author was **considered to be** using for status equivalent to valid publication under this *Code* (but see Art. 54 and F.6.1, regarding homonymy). [...]”

This proposal, if accepted, also permits the following more concise wording that I would refer to the Editorial Committee:

“45.1. Any of the names of a taxon treated as belonging to the algae or fungi but that were, or appear to have been, published under the provisions of another *Code* need satisfy only the requirements of that *Code* for status equivalent to valid publication under this *Code* (but see Art. 54 and F.6.1, regarding homonymy). [...]”

Prop. C (381 – McNeill in Taxon 72: 1172) Add a Note immediately after Art. 45.1 to read:

“*Note 0.* Names published prior to the existence of nomenclatural codes are deemed to have been published under whichever *Code* is suggested by internal evidence.”

Prop. D (382 – McNeill in Taxon 72: 1172) Amend the second sentence of Art. 45.1 to read (new text in bold, deleted text in strikethrough):

“45.1. [...]. The *Code* used ~~by the author~~ is determined through internal evidence, irrespective of any claim by the author as to the ~~group of relationships of the~~ organisms to which the taxon is assigned. [...]”

Prop. E (274 – Doweld in Taxon 72: 693) Add two new Examples after Art. 45.1:

“*Ex. n1. Bacillariaceae* Bory (Dict. Class. Hist. Nat. 2: 127, 1822, ‘*Bacillariées*’), originally published with a French termination in vernacular form for a family then considered to be animals

(animalcules), is available under the *International Code of Zoological Nomenclature* (ICZN Art. 11.7.2) and is validly published as the name of a family of algae and retains its original authorship and date but with the original termination changed in accordance with Art. 18.4 and 32.2, Art. 18.4 last sentence notwithstanding, with the diatoms now treated as algae.”

“*Ex. n2. Prorocentraceae* F. Stein (Organism. Infusionsthieri 3(2): 8, 16–17, 1883, ‘*Prorocentrinen*’), originally published with a German termination in vernacular form for a family of protozoans, is available under the *International Code of Zoological Nomenclature* (Art. 11.7.2) as the name of a family of protists. When the dinoflagellate taxon is treated as a algae, its name is validly published and retains its original authorship and date but with the original termination changed in accordance with Art. 18.4 and 32.2, Art. 18.4 last sentence notwithstanding.”

Prop. F (275 – Doweld in Taxon 72: 694) Add a new paragraph to Art. 45 with a new Example:

“45.n1. If a taxon originally assigned to a group not covered by this *Code* is treated as belonging to the algae or fungi, but when published its name did not meet the requirements of the relevant other *Code* for status equivalent to valid publication, the name has no standing under this *Code* despite satisfying the other requirements of this *Code* for valid publication.”

“*Ex. n3. Hystrichosphaera* Wetzel (in Palaeontographica, Abt. A, Paläozool. 78: 33, 1933), originally published as a fossil protist genus under the *International Code of Zoological Nomenclature* without designation (fixation) of the type and thereby unavailable (ICZN Art. 13.3), was therefore not a validly published name under this *Code* despite satisfying the other requirements of this *Code* for valid publication. Deflandre (in Ann. Paléontol. 26: 61, 1937) validly published the name by providing a description together with fixation of the type, and therefore *Hystrichosphaera* Wetzel ex Deflandre (l.c.) is treated as validly published under both the ICZN and this *Code* from 1937, not from the publication by Wetzel in 1933.”

Prop. G (276 – Doweld in Taxon 72: 694) Add a second new paragraph to Art. 45 with two new Examples:

“45.n2. If a taxon originally assigned to a group not covered by this *Code* is treated as belonging to the algae or fungi and its name was originally published with status equivalent to valid publication under the relevant other *Code*, the name retains its original authorship and date of publication, especially for the purposes of homonymy, even though this *Code* might have later starting-points for some groups of algae or fungi.”

“*Ex. n4. Gyrogonites* Lam. (Syst. Anim. Sans Vertèbr.: 401, 1801) was originally published and available under the *International Code of Zoological Nomenclature* for a genus of fossil molluscs, but later shown to apply to remains of the reproductive organs of charophycean algae. It nonetheless retains its original authorship and date of publication from 1801 for the purposes of homonymy despite not being considered as validly published under this *Code* until after 1820, the starting-point for plant fossils (*Gyrogonites* Lam. ex Bowdich, Man. Conchol.: 16, 1822).”

“*Ex. n5. Pirea* Vavrdová (in Věstn. Ústředn. Ústavu Geol. 47: 82, 1972), originally published as a microfossil of *Acritarcha*, which is treated simultaneously under the rules of the *International Code of Zoological Nomenclature* and this *Code*, is a later homonym of *Pirea* T. Durand (Index Gen. Phan.: 494, 1888), a genus of *Brassicaceae*. *Pirea* Vavrdová is correct in zoological nomenclature, since no senior zoological homonym exists, but not under this *Code*, so it was proposed for conservation against its earlier homonym to avoid the

existence of different correct names for the same organism under two different *Codes* (see Doweld in Taxon 67: 452. 2018 and Taxon 70: 670. 2021)."

Prop. H (277 – Doweld in Taxon 72: 695) Amend Art. 45.1 as follows (deleted text in strikethrough) and add a third new paragraph to Art. 45 with two new Examples:

"45.1. If a taxon originally assigned to a group not covered by this *Code* is treated as belonging to the algae or fungi, any of its names need satisfy only the requirements of the relevant other *Code* that the author was using for status equivalent to valid publication under this *Code* (but see Art. 54 and F.6.1, regarding homonymy). The *Code* used by the author is determined through internal evidence, irrespective of any claim by the author as to the group of organisms to which the taxon is assigned. ~~However, a name generated in zoological nomenclature in accordance with the Principle of Coordination is not validly published under this *Code* unless and until it actually appears in a publication as the accepted name of a taxon.~~"

"45.n3. If a taxon originally assigned to a group not covered by this *Code* is treated as belonging to the algae or fungi and its name was originally generated in zoological nomenclature in accordance with the Principle of Coordination, the name is not validly published under this *Code* unless and until it actually appears in a publication as the accepted name of a taxon. An exception is made for the names of taxa simultaneously and continuously assigned to traditional groups covered by different *Codes*, i.e. Myxomycetes/Mycetozoa (Amoeboae) and Protista, where the authorship and date of publication established by the Principle of Coordination overrides that determined by the rules of this *Code*."

"Ex. n6. *Arcyriini* Rostaf. (Vers. Syst. Mycetoz.: 15. 1873, '*Arcyriaceae*') was originally published for a tribe of Mycetozoa under the *International Code of Zoological Nomenclature*. When Rostafinski later established the mycetozoan family *Arcyriidae* Rostaf. (in Pamiętn. Towarz. Nauk Ścisłych Paryżu 5(4): 70, 87. 1874), in accordance with the Principle of Coordination of the *ICZN* (Art. 36.1) the authorship and date of publication of family-group names at every rank should be Rostafinski (l.c. 1873). Under this *Code*, the family name *Arcyriaceae* and tribal name *Arcyriae* are considered as validly published for Myxomycetes, but retain their original authorship and date in accordance with the Principle of Coordination: *Arcyriae* Rostaf. (l.c. 1873) and *Arcyriaceae* Rostaf. (l.c. 1873, not *Arcyriaceae* Rostaf., l.c. 1874), but with their original terminations changed in accordance with Art. 18.4, 19.7, and 32.2. The subfamily name *Arcyrioidae* J. Schröt. (in Cohn, Krypt.-Fl. Schlesien 3(1): 108. 1885, '*Arcyriei*'), although published for a fungal taxon of Myxomycetes, in accordance with the Principle of Coordination has authorship and date of publication from Rostafinski (l.c. 1873), but with the original termination changed in accordance with Art. 19.7 and 32.2."

"Ex. n7. *Physaroideae* Fr. (Syst. Orb. Veg.: 139. 1825, '*Physarei*') was originally published for a fungal taxon at the rank of subfamily ("Subord[o naturalis].") of the family ("Ord[o naturalis].") '*Trichospermi*' Fr. Although Chevallier later established the family name *Physaraceae* Chevall. (Fl. Gén. Env. Paris 1: 332. 1826, '*Physarieae*') as a fungal taxon, since the organisms are now considered as Mycetozoa, in accordance with the Principle of Coordination of the *International Code of Zoological Nomenclature* (Art. 36.1), the authorship and date of publication of family-group names at every rank should be Fries (l.c. 1825). Later established tribal (*Physareae* Grev., Scott. Crypt. Fl. 6(Synops.): 13. 1828, '*Physarei*') and subtribal (*Physarinae* Tul. in Durieu de Maissoneuve, Explor. Sci. Algérie

1: 406. 1848–1849, '*Physarei*') suprageneric names retain the original authorship and date (Fries, l.c. 1825) in accordance with the Principle of Coordination, but with their original terminations changed in accordance with Art. 19.7 and 32.2."

Prop. I (278 – Doweld in Taxon 72: 695) Add a fourth new paragraph to Art. 45 with a new Example and revise Art. 41.5 to add a special exception (new text in bold, deleted text in strikethrough):

"45.n4. For a taxon originally assigned to a group not covered by this *Code* that is treated as belonging to the algae or fungi, any new combination, name at new rank, or replacement name published with status equivalent to valid publication under the relevant other *Code* is considered as validly published under this *Code* even if its basionym or replaced synonym was not clearly indicated and a full and direct reference was not given to its author and place of valid publication, with page or plate reference and date (see Art. 41.5)."

"Ex. n8. The new combination *Baltisphaeridium longispinosum* (Eisenack) Eisenack (in Neues Jahrb. Geol. Paläontol., Abh. 106: 398. 1958), originally published as a fossil protist of dinoflagellates (not algae) and available under the *International Code of Zoological Nomenclature*, is validly published under this *Code* also, although it was not accompanied by a full and direct reference to its basionym author and place of valid publication with page or plate reference and date (*Ovum hispidum* subsp. *longispinosum* Eisenack in Paläontol. Z. 13: 110. 1931). Its republication by Eisenack (in Palaeontographica, Abt. A, Paläozool. 112: 194. 1959), previously considered necessary for valid publication under earlier editions of this *Code*, should be considered as creating an isonym."

"41.5. On or after 1 January 1953, a new combination, name at new rank, or replacement name is not validly published unless its basionym or replaced synonym is clearly indicated and a full and direct reference given to its author and place of valid publication, with page or plate reference and date (but see Art. 41.6, ~~and 41.8, and 45.n4~~). On or after 1 January 2007, a new combination, name at new rank, or replacement name is not validly published unless its basionym or replaced synonym is cited **(except as provided in Art. 45.n4)**."

Prop. J (279 – Doweld in Taxon 72: 696) Add a fifth new paragraph to Art. 45 with a new Example and revise Art. 20.2 to add a special exception (new text in bold):

"45.n5. For a taxon originally assigned to a group not covered by this *Code* that is treated as belonging to the algae or fungi, a generic name published with status equivalent to valid publication under the relevant other *Code* is considered as validly published under this *Code* even if it coincides with a Latin technical term that is not permissible under Art. 20.2."

"Ex. n9. *Ovulum* Jankauskas (in Paleontol. Zhurn. 1975(1): 96. 1975), originally published as a microfossil of the artificial problematic group Acritarcha, which is treated simultaneously under the rules of the *International Code of Zoological Nomenclature* and this *Code*, is considered validly published under this *Code* although coinciding with a Latin technical term."

"20.2. The name of a genus may not coincide with a Latin technical term in use in morphology at the time of publication unless it was published before 1 January 1912 and was accompanied by a species name published in accordance with the binary system of Linnaeus, **except for names originally assigned to a group not covered by this *Code* (see Art. 45.n5 and Ex. n9)**."

Prop. K (280 – Doweld in Taxon 72: 696) Add a sixth new paragraph to Art. 45 with a new Example and revise the final sentence of Art. 60.8 to add a special exception (new text in bold):

“45.n6. For a taxon originally assigned to a group not covered by this *Code* that is treated as belonging to the algae or fungi, the original spelling of the epithet in its name, which is considered correct under the relevant other *Code* but is correctable under Art. 60.8, is retained under this *Code* as the correct spelling.”

“Ex. n10. *Hystriosphærina schindewolfi* G. Alberti (in *Palaeontographica*, Abt. A, Paläozool. 116: 38. 1961), with the epithet spelled as originally established under the *International Code of Zoological Nomenclature*, is retained as the correct spelling under this *Code* although ‘*schindewolfi*’ is correctable to ‘*schindewolfii*’ under Art. 60.8.”

“60.8. [...] Terminations contrary to the above standards are treated as errors to be corrected to [i]i, [i]ae, [i]ana, [i]anus, [i]anum, [i]arum, or [i]orum, as appropriate (see also Art. 32.2). However, epithets formed in accordance with Rec. 60C.1 and Art. 45.n6 are not correctable (see also Art. 60.9).”

Rapporteurs’ comments – *Prop. A–D* aim to eliminate uncertainty as to the applicability of the rules of any other *Code* to algal and fungal names. The Committee for Algae discussed the proposals and expressed concern about the lack of available evidence on the consequences of their acceptance; votes are cited under each proposal. The Nomenclature Committee for Fungi does not support *Prop. A–D* (votes 6 : 8 : 1), acknowledging the constructive intent of the proposals but expressing concern about unintended consequences due to the changes applying retroactively and comprehensively.

Prop. A would augment Art. 45.1 so that the *Code* used by the author of a name could be determined in the absence of internal evidence. The Nomenclature Committee for Algae does not support *Prop. A* (votes 2 : 11 : 3).

Prop. B intends to make it clear that names of so-called “ambiregna” organisms are subject to Art. 45.1 and would adjust the wording seeking to remove the implication that there was no doubt about which *Code* applied to the taxon being named or which *Code* was being used by the author of the name. The Nomenclature Committee for Algae does not support *Prop. B* (votes 3 : 7 : 5, with 15 members voting).

Prop. C would make explicit in a Note what is implicit in Art. 45.1. The Nomenclature Committee for Algae does not support *Prop. C* (votes 5 : 7 : 4).

Prop. D would remove any implication in the phrase “used by the author” that a particular edition of a *Code* is meant, rather than the current edition (in which the rules are retroactive). Moreover, using the word “relationships” rather than “group” would allow a broader range of taxonomic statements to reveal which *Code* the author was using. The Nomenclature Committee for Algae does not support *Prop. D* (votes 4 : 8 : 4).

Prop. E–K, according to the proposer, aim “to build a workable environment for existing indexing centres of plant fossils, algae and fungi, dealing with registration and nomenclatural evaluation of the names generated under other nomenclature *Codes*” for so-called “ambiregna” organisms. They would add six new Articles and ten new Examples to Art. 45, as well as amend Art. 20.2, 45.1 and 60.8. The Nomenclature Committee for Fungi does not support *Prop. E–K* (votes 3 : 10 : 2). Some members indicated support for individual proposals but not the set as a whole. The members acknowledged the constructive intent of the proposals but expressed concern about unintended consequences due to the changes applying retroactively and comprehensively.

Prop. E would add two new, similar Examples to illustrate cases where Art. 45.1 allows names to be validly published irrespective of

the last sentence of Art. 18.4. The proposal would be automatically referred to the Editorial Committee. The Nomenclature Committee for Algae does not support *Prop. E* (votes 0 : 9 : 7), whereas the Nomenclature Committee for Fossils supports *Prop. E* (votes 11 : 1 : 0).

Prop. F would establish that a name of an “ambiregna” organism that was unavailable when published under another *Code* cannot be considered as validly published under this *Code*, i.e. “has no standing”, unless and until it either is republished and becomes available under the other *Code* or is validly published as the name of an alga or fungus under this *Code*. It is unclear how such names have been interpreted thus far, in the absence of any relevant provision such as *Prop. F* in this *Code*. The Nomenclature Committee for Algae does not support *Prop. F* (votes 0 : 8 : 8); nor does the Nomenclature Committee for Fossils (votes 0 : 12 : 0).

Prop. G would confer special status with regard to authorship and date of publication to names originally published under another *Code* with status equivalent to valid publication under this *Code*, exempting such names from starting-point date limits with regard to homonymy (and seemingly also priority and perhaps typification, although *Prop. G* is not explicit on this). Whereas the aim of *Prop. G* seems to be to unify the date and place of publication between various *Codes*, would this not penalize other names published under this *Code*, which compete with names originally published under the other *Code* for purposes of homonymy or priority, that have their time of valid publication limited by starting-point dates? Of the two Examples provided, Ex. n5 is not relevant to the Article because the name in question was published in 1972, long after the later starting-points for some groups. The Nomenclature Committee for Algae does not support *Prop. G* (votes 0 : 7 : 9); nor does the Nomenclature Committee for Fossils (votes 5 : 7 : 0).

Prop. H aims to resolve a conflict in the authorship and places of valid publication of names in Myxomycetes and protistan amoebas (the former deeply embedded in the latter), which are named under both this *Code* and the zoological *Code*. The conflict arises because only under the zoological *Code* (Art. 36.1, 43.1 and 46.1) is the Principle of Coordination recognized. *Prop. H* would replace the final sentence of Art. 45.1 with a new Article to make an exception for such names, so that their authorship and places of valid publication would be determined under this *Code* by the Principle of Coordination. Although the proposer seems to be concerned primarily with suprageneric (family-group) names, the wording of *Prop. H* provides no such limitation and would apply also to genus-group and species-group names. The Nomenclature Committee for Algae does not support *Prop. H* (votes 0 : 8 : 8); nor does the Nomenclature Committee for Fossils (votes 0 : 12 : 0).

Prop. I claims to allow new combinations, names at new rank and replacement names for “ambiregna” organisms to be validly published under this *Code* even if they lack the reference to, and citation of, the basionym or replaced synonym required by Art. 41.5, because “no comparable provision exists under the *ICZN* [zoological *Code*]”. But *Prop. I* is unnecessary because “any of its names” (i.e. of these “ambiregna” organisms) are already validly published under Art. 45.1 of this *Code*. The Example provided would, however, be a useful addition to the Examples under Art. 45.1, which currently do not include new combinations, and this could be referred to the Editorial Committee. The Nomenclature Committee for Algae does not support *Prop. I* (votes 0 : 9 : 7); nor does the Nomenclature Committee for Fossils (votes 0 : 12 : 0).

Prop. J claims to exempt generic names published with status equivalent to valid publication under the rules of another *Code* from

the constraints of Art. 20.2 of this *Code*, which prohibits publication of names that coincide with Latin technical terms. However, Prop. J is unnecessary for the same reason as discussed under Prop. I, i.e. Art. 45.1 already permits such names to be validly published under this *Code*. The Nomenclature Committee for Algae does not support Prop. J (votes 0 : 8 : 8), whereas the Nomenclature Committee for Fossils supports Prop. J (votes 10 : 2 : 0).

Prop. K would allow the spellings of specific or infraspecific epithets derived from personal names, correct under the zoological *Code* but contrary to Art. 60.8 of this *Code*, to be maintained. While the two different spellings used by these different *Codes* may be confusing in the indexing of such names, it would seem equally confusing to allow two different orthographical standards. Besides, the proposed new rule belongs in Art. 60, which concerns orthography, not in Art. 45, which deals with valid publication. The Nomenclature Committee for Algae does not support Prop. K (votes 0 : 8 : 8); nor does the Nomenclature Committee for Fossils (votes 0 : 12 : 0).

Article 46

Prop. A (281 – Wisnev & Prado in *Taxon* 72: 697) Amend Art. 46.1 as follows (new text in bold, deleted text in strikethrough):

“46.1. The determination of the author(s) of a name and its publication is critical for application of certain rules in this *Code*; see, e.g., Art. 9.4 (original material), 11 (priority), 41.5 (requiring a full and direct reference to the author of a basionym or replaced synonym to publish a new combination, name at new rank, or replacement name), and 53 (homonyms). In publications, particularly those dealing with taxonomy and nomenclature, it may be desirable, even when no bibliographic reference to the protologue is made, to cite the author(s) of the name concerned (see also Art. 22.1 and 26.1). In so doing For these purposes, the following rules in Art. 46–50 apply (see also Art. 22.1 and 26.1).”

Prop. B (383 – Wisnev in *Taxon* 72: 1173) Combine Art. 46 Note 1 and Art. 46.6 into a new Article as follows (new text not appearing in either provision in bold, deleted text in strikethrough):

“46.n1. Note 1. (a) The author of a name of a taxon is attributed to the publishing author(s) of the publication in which it appears (see Art. 46.5) unless this author directly or unequivocally associates the name with another person and one or more of the provisions of Art. 46.2 rules otherwise. If the name of a taxon is “attributed” to a person, that person is the author of the name.

(b) 46.6. For the purposes of Art. 46, the authorship of a publication is the authorship of The publishing author is the author of that part of a publication in which a name is first validly published, appears regardless of the authorship or editorship of the publication as a whole.

(c) The author of a name cannot be a pre-starting-point author.”

Editorially number it as Art. 46.2 and renumber Art. 46.2–46.5. In addition, the Editorial Committee may wish to replace “author of the publication” or similar phrases with “publishing author” as it sees fit throughout Art. 46.

A clean version of how this new Article would appear is as follows:

“46.n1. (a) The author of a name of a taxon is the publishing author unless this author directly or unequivocally associates the name with another person and Art. 46.2 rules otherwise. If the name of a taxon is “attributed” to a person, that person is the author of the name.

(b) The publishing author is the author of that part of a publication in which a name is first validly published, regardless of the authorship or editorship of the publication as a whole.

(c) The author of a name cannot be a pre-starting-point author.”

Prop. C (386 – Wisnev in *Taxon* 72: 1174) Amend Art. 46.2 and 46.3 as follows (new text in bold, deleted text in strikethrough):

“46.2. If the author of the publication ascribes the name to another person and one of the following conditions is met, the other person is the author of the name:

(a) in the case of a name of a new taxon, is attributed to the author(s) to whom the name was ascribed when if the validating description or diagnosis was simultaneously ascribed to or unequivocally associated with the same author(s) person, even when authorship of the publication is different; or

(b) in the case of a new combination, name at new rank, or replacement name is attributed to the author(s) to whom it was ascribed when, in if the publication in which it appears, it is explicitly stated that the same author(s) person contributed in some way to that publication; or

(c) Art. 46.5 notwithstanding, authorship of a in the case of any nomenclatural novelty is always accepted as ascribed, even when it differs from authorship of the publication, when if at least one of those author person(s) is common to both also a publishing author.

In all other cases, the author of the name is the author of the publication.”

“46.3. For the purposes of Art. 46, ascription is the direct or unequivocal association (by the publishing author) of the name of a person or persons with a new name or with the description or diagnosis of a taxon. [...].”

In addition, in Art. 46, replace “author” with “person” when the rules refer to the author to whom the name is ascribed. In addition, make similar changes regarding the deletion of “unequivocal association” in Art. 46 Note 5 and Art. 46.5.

A clean version of the proposed amendment to the current Art. 46.2 is as follows:

“46.2. If the author of the publication ascribes the name to another person and one of the following conditions is met, the other person is the author of the name:

(a) in the case of a name of a new taxon, if the validating description or diagnosis was simultaneously ascribed to or unequivocally associated with the same person; or

(b) in the case of a new combination, name at new rank, or replacement name, if the publication explicitly stated that the same person contributed in some way to that publication; or

(c) in the case of any nomenclatural novelty, if at least one of those person(s) is also a publishing author.

In all other cases, the author of the name is the author of the publication.”

Prop. D (388 – Wisnev in *Taxon* 72: 1175) Convert Art. 46 Note 2 into a new Article as follows (new text in bold, deleted text in strikethrough):

“46.n2. Note 2. When If the author authorship of a name differs from the publishing author, the following citation may (but need not) be used: “[author of the name] in [publishing author]” authorship of the publication in which it was validly published, both are sometimes cited, connected by the word “in”. In such a case, “in” and what follows are part of a bibliographic citation and are better omitted unless the place of publication is being cited.”

If Prop. 387 and 388 [Art. 46 Prop. G and D] are both accepted, the Editorial Committee may wish to consider making this Art. 46.5(b) so that all alternative citation methods appear in a single Article.

Prop. E (384 – Wisnev in Taxon 72: 1174) If Prop. 383 [Prop. B] is accepted, amend Art. 46.5 as follows (new text in bold, deleted text in strikethrough):

“46.5. A name of a new taxon is attributed to the author(s) of the publication in which it appears when the name was ascribed to a different author or different authors but the validating description or diagnosis was neither ascribed to nor unequivocally associated with that author or those authors. A new combination, name at new rank, or replacement name is attributed to the author(s) of the publication in which it appears, although it but the name was ascribed to a different author person or different authors persons (none of whom is a publishing author), when no separate statement was made that one or more of those authors contributed in some way to that publication. However, in both cases the following citation may be used: authorship as ascribed, followed by “ex”, may be inserted before the name(s) of the publishing author(s).”

A clean version of this proposed amendment to current Art. 46.5 is as follows:

“46.5. If the author of a name is the publishing author but the name was ascribed to a different person or different persons (none of whom is a publishing author), the following citation may be used: authorship as ascribed, followed by “ex”, inserted before the name(s) of the publishing author(s).”

Prop. F (385 – Wisnev in Taxon 72: 1174) If Prop. 384 [Prop. E] is rejected, amend Art. 46.5 as follows (new text in bold, deleted text in strikethrough):

“46.5. Except as provided by the last sentence of Art. 46.2, the author of the name is A name of a new taxon is attributed to the author(s) of the publication in which it is first validly published appears if (a) when in the case of the name of new taxon, the name was ascribed to a different author or different authors but the validating description or diagnosis was not simultaneously neither ascribed to nor unequivocally associated with that author or those same authors: or (b) in the case of a A new combination, name at new rank, or replacement name is attributed to the author(s) of the publication in which it appears, although it the name was ascribed to a different author or different authors, when no separate statement was made but it was not explicitly stated that one or more of those same authors contributed in some way to that publication. [...]”

A clean version of this proposed alternative amendment to Art. 46.5 is as follows:

“46.5. Except as provided by the last sentence of Art. 46.2, the author of the name is the author of the publication in which it is first validly published if (a) in the case of the name of new taxon, the name was ascribed to a different author or different authors but the validating description or diagnosis was not simultaneously ascribed to or unequivocally associated with that author or those same authors or (b) in the case of a new combination, name at new rank, or replacement name, the name was ascribed to a different author or different authors but it was not explicitly stated that one or more of those same authors contributed in some way to that publication. [...]”

Prop. G (387 – Wisnev in Taxon 72: 1175) Delete Art. 46.7 and 46.10 and amend the last sentence of Art. 46.5 as follows (new text in bold):

“46.7. When a name has been ascribed by its author to a pre-starting-point author, the latter may be included in the author citation, followed by “ex”. For groups with a starting-point later than 1753, when a taxon of a pre-starting-point author was changed in rank or taxonomic position upon valid publication of its name, that pre-starting-point author may be cited in parentheses, followed by “ex”.”

~~“46.10. Authors publishing nomenclatural novelties and wishing other persons’ names followed by “ex” to precede theirs in author citation may adopt the “ex” citation in the protologue.”~~

“46.5. [...] However, in both cases, the following citation may (but need not) be used by the publishing author and/or later authors: authorship as ascribed, followed by “ex”, may be inserted before the name(s) of the publishing author(s). This same citation may be used if the name is ascribed to a pre-starting-point author. For groups with a starting-point later than 1753, when a taxon of a pre-starting-point author was changed in rank or taxonomic position upon valid publication of its name, that pre-starting-point author may be cited in parentheses, followed by “ex”.”

Prop. H (389 – Wisnev in Taxon 72: 1175) Add a new Article to Art. 46 as follows:

“46.n3. For purposes of Art. 46, any reference to the author (or person) shall be deemed to include a reference to authors (or persons).”

In addition, make appropriate changes throughout Art. 46.

Rapporteurs’ comments – Prop. A would expand Art. 46.1 to emphasize the importance of proper author citations to other provisions of the *Code*. This does, however, create a contrast with the retained, but now second, sentence of the Article, which appears to de-emphasize the same thing.

Prop. B is part of a set of proposals (Prop. B–H) seeking to reformulate and simplify the current provisions of Art. 46, which determine the correct author citation of a name. Prop. B, C and either Prop. E or F, which would modify the current content of Art. 46 Note 1, Art. 46.2, 46.3, 46.5 and 46.6, are best considered together. Prop. B would create and define the term “publishing author” and together with Prop. C would provide all necessary criteria to determine authorship of a name. Prop. B, in its clause (c), would restrict authorship of any name only to post-starting-point authors, under the incorrect assumption that Art. 46.7 implies this should be so, but Art. 46.7 concerns cases where only the name, not also the validating description or diagnosis, was ascribed to a pre-starting-point author. With no other apparent justification provided for this change, clause (c) is perhaps best omitted. While Prop. B and C do seem to simplify the complicated Art. 46 in determining authorship, there are some flaws. Firstly, the sentence introducing the term “attributed” in Prop. B appears unnecessary, because this term would be replaced in other parts of Art. 46 where it was previously used, and its usage in the second sentence of clause (a) seems to undermine what is stated in the first sentence. Secondly, it would allow a person’s name to be “unequivocally associated” with a nomenclatural novelty in place of actual ascription (direct association, Art. 46.3) of the novelty to that person in both Prop. B and C. An unequivocal association could heretofore only be made to a person’s name by citing their previously published description or diagnosis (Art. 46 Note 4), where their name would have appeared. But how is an unambiguous “unequivocal association” to be made to a person’s name when that person is nowhere named? It is also unclear why Prop. C inconsistently uses “author of the publication” twice in lieu of “publishing author”, the term defined for this same usage in Prop. B. Those who support Prop. B and C suitably amended to address these issues should vote “ed.c.”

Prop. C is discussed under Prop. B.

Prop. D, part of a set of proposals dealing with Art. 46 (see Prop. B), can stand alone insofar as converting current Art. 46 Note 2 into an Article. The adjusted language it proposes, replacing “authorship” with “author” and using the term “publishing author”, otherwise partially depends on acceptance of Prop. B and C, but this is an editorial

matter. Prop. D would provide more explicit authorization for “in” citations, similar to that already provided for “ex” citations in Art. 46.5, 46.7 and 46.10.

Prop. E and F would provide alternative wordings to replace current Art. 46.5. Acceptance of Prop. E is contingent upon acceptance of Prop. B and C, which would make most of the content of current Art. 46.5 redundant, whereas Prop. F, which would restructure Art. 46.5 with no apparent change in its effect, could be accepted regardless of the outcome of Prop. B and C.

Prop. G would combine Art. 46.7 and 46.10 into the final sentence of current Art. 46.5, because all three represent different usages of an “ex” author citation. But whereas Art. 46.5 and 46.7 deal with authorship of pre-existing names and provide conditions where such usage is appropriate, Art. 46.10 concerns newly published names and provides no conditions for proper usage. The proposer sought to eliminate this distinction, requiring Art. 46.10 cases to conform to those of Art. 46.5, but the proposed new wording does not achieve this objective. A modification to Prop. G that could achieve this would be the following: “**However, in both cases or in the protologue of a nomenclatural novelty, the ascribed authorship, followed by “ex”, may be inserted before the name(s) of the publishing author(s). [...].**” Those who agree with this modification should vote “ed.c.”

Prop. H would allow for a consistent usage of the singular “author” or “person” in Art. 46 to be considered as also including the plural “authors” or “persons”. It is editorial in nature and hardly merits an Article in the *Code*, but may be supported or not nonetheless.

Recommendation 46C

Prop. A (021 – Krishna & al. in *Taxon* 69: 636) Amend Rec. 46C.2 as follows (new text in bold):

“46C.2. After a name published jointly by more than two authors, the citation should be restricted to the first author followed by “& al.” or “et al.”, except in the original publication, **or the full title or abbreviation of a working group may be cited, provided that the names of the members of that group are given in the original publication.**”

Rapporteurs’ comments – Prop. A would provide an addition to Rec. 46C.2, accounting for authorship of names by working groups, with some names authored by the Legume Phylogeny Working Group given as an example.

Article 48

Prop. A (390 – Wisnev in *Taxon* 72: 1176) Delete the last sentence of Art. 48.1 and move it to Art. 48.2 amended as follows (new text in bold, deleted text in strikethrough):

“48.1. When an author adopts an existing name but definitely excludes its type, a later homonym that must be attributed solely to that author is considered to have been published. Similarly, when an author who adopts a name refers to an apparent basionym or replaced synonym but explicitly excludes its type, the name of a new taxon is considered to have been published that must be attributed solely to that author. ~~Exclusion can be effected by simultaneous explicit inclusion of the type in a different taxon by the same author.~~”

“48.2. For the purpose of Art. 48.1, exclusion of a type means exclusion of (a) the holotype under Art. 9.1 or the original type under Art. 10 or all syntypes under Art. 9.6 or all elements eligible as types under Art. 10.2; or (b) the type previously designated under Art. 9.11–9.13 or 10.2; or (c) the type previously conserved under

Art. 14.9. **Exclusion can be effected by (d) simultaneous explicit inclusion of the type (as type is specified in the preceding sentence) in a different taxon by the same author.**”

Prop. B (395 – Wisnev in *Taxon* 72: 1178) Amend Art. 48.1 as follows (new text in bold, deleted text in strikethrough):

“48.1. **The application of an existing name to a different taxon without exclusion of the type is considered a misapplication that has no nomenclatural status (see also Rec. 50D).** ~~When However, if an author applies~~ ~~adopts~~ an existing name but definitely excludes its type, a later homonym that must be attributed solely to that author is considered to have been published. [...].”

Prop. C (402 – Wisnev in *Taxon* 72: 1180) Amend Art. 48 Note 2 as follows (new text in bold, deleted text in strikethrough):

“Note 2. Retention of a ~~name~~ **later homonym as a legitimate (as opposed to illegitimate) name in a sense that excludes its original type, or its type designated under Art. 7–10,** can be effected only by conservation (see Art. 14.9).”

Prop. D (171 – Rijkvorschel in *Taxon* 71: 1330) Amend Art. 48.2 and 52.2 as follows (new text in bold, deleted text in strikethrough):

“48.2. For the purpose of Art. 48.1, exclusion of a type means exclusion of (a) the holotype under Art. 9.1 or the ~~original~~ **type established** under Art. 10.2(a) or all syntypes under Art. 9.6 or all elements eligible as types under Art. 10.2; [...].”

“52.2. For the purpose of Art. 52.1, definite inclusion of the type of a name is effected by citation of (a) the holotype under Art. 9.1 or the ~~original~~ **type established** under Art. 10.2(a) or all syntypes under Art. 9.6 or all elements eligible as types under Art. 10.2; [...].”

In both provisions, instead of “the ~~original~~ type established under Art. 10.2(a)” this could be “the ~~original~~ **type established at valid publication** under Art. 10”.

Prop. E (173 – Rijkvorschel in *Taxon* 71: 1330) Amend Art. 48.2 and 52.2 as follows (new text in bold):

“48.2. For the purpose of Art. 48.1, exclusion of a type means exclusion, **for the name itself, or, if it has one, its basionym (Art. 7.3), or its replaced synonym (Art. 7.4 and 7.5),** of [...].”

“52.2. For the purpose of Art. 52.1, definite inclusion of the type of a name is effected by citation, **for the name itself, or, if it has one, its basionym (Art. 7.3), or its replaced synonym (Art. 7.4 and 7.5),** of [...].”

Prop. F (185 – Wiersema & al. in *Taxon* 71: 1339) Amend Art. 48.2 as follows (new text in bold, deleted text in strikethrough) and add a new Note:

“48.2. For the purpose of Art. 48.1, ~~definite~~ **exclusion of a the type of a name** means exclusion of (a) the holotype under Art. 9.1 or the original type under Art. 10 or all syntypes under Art. 9.5 or all elements eligible as types under Art. 10.2; or (b) the type previously designated under Art. 9.11–9.13 or 10.2; or (c) the type previously conserved under Art. 14.9. **It is also effected (d) by explicit exclusion of the name itself or any name homotypic at that time, unless the type is at the same time included either explicitly or by implication.**”

“Note n. For the purpose of Art. 48.1, the inclusion of a name with an expression of doubt, or in a sense that excludes one or more of its potential type elements, is not in itself considered exclusion of its type.”

Potential Examples for consideration by the Editorial Committee:

For the amended Art. 48.2:

“Ex. n. The name *Chusquea quila* was published by Kunth (Révis. Gramin.: 138. 1829) with reference to “*Arundo quila* Poir.,

excl. Syn.”, which is an explicit exclusion of the apparent basionym *A. quila* Molina (Sag. Stor. Nat. Chili: 154, 155, 349. 1782), the only name cited as a synonym by Poirét (in Lamarck & al., *Encycl.* 6: 274. 1804). Therefore, *C. quila* Kunth is the name of a new taxon validated by Poirét's description.”

For the new Note:

“*Ex. n.* The name *Meum segetum* was published by Gussone (Fl. Sicul. Prodr. 1: 346. 1827) with citation of “*Anethum segetum*. Lin. mant. 219?” in synonymy. Because Gussone's expression of doubt did not exclude the type of *A. segetum* L. (Mant. Pl.: 219. 1771), he published the new combination *M. segetum* (L.) Guss., not the name of a new taxon.”

The current Art. 48 Ex. 2 has been restructured for consideration as a second Example under the new Note, as follows:

“*Ex. 2.* The name *Amorphophallus campanulatus* was published by Decaisne (in *Nouv. Ann. Mus. Hist. Nat.* 3: 366. 1834) with citation of *Arum campanulatum* Roxb. (Pl. Coromandel 3: 68. 1820) in synonymy, but with exclusion of certain elements included by Roxburgh (“*Excl. syn. Hort. malab. nec non t.* 112. *Herb. Amb. V.*”). Because Decaisne did not explicitly exclude the type of *A. campanulatum*, which in 1834 had no holotype, syntypes, lectotype or conserved type, he published the new combination *Amorphophallus campanulatus* (Roxb.) Decne., not the name of a new taxon.”

[Current wording: “*Ex. 2.* The name *Amorphophallus campanulatus* Decne. (in *Nouv. Ann. Mus. Hist. Nat.* 3: 366. 1834) was apparently based on the illegitimate *Arum campanulatum* Roxb. (*Hort. Bengal.*: 65. 1819). However, the type of the latter was explicitly excluded by Decaisne, and his name is therefore a legitimate name of a new species, to be attributed solely to him.”]

Prop. G (391 – *Wisnev in Taxon* 72: 1177) Amend Art. 48.2 as follows (new text in bold, deleted text in strikethrough):

“48.2. For the purpose of Art. 48.1, exclusion of a type means exclusion of (a) **if there is no type previously conserved**, (I) the holotype under Art. 9.1 or the original type under Art. 10; or all syntypes under Art. 9.6 or all elements eligible as types under **the first sentence of Art. 10.2 (excluding Art. 10.2(a))**; or (2b) the type previously designated **or selected** under Art. 9.11–9.13 or **previously indicated, designated, or chosen under** 10.2; or (be) the type previously conserved under Art. 14.9.”

Prop. H (396 – *Wisnev in Taxon* 72: 1178) Add a new Note in Art. 48 as follows:

“*Note n.* A later homonym published as described in Art. 48.1 only has nomenclatural status if it satisfies all the relevant requirements for valid publication of the name of a new taxon.”

Rapporteurs' comments – *Prop. A* would rearrange the last sentence of Art. 48.1, move it to Art. 48.2 and add some qualifying language to explicitly indicate that what is meant by “the type” in this sentence is the same as that elaborated in Art. 48.2(a)–(c), in order to avoid any misunderstanding that inclusion of a type designated in the future for another name could count as exclusion. An alternative way of satisfying this concern without any rearrangement of the two Articles would be to slightly alter the beginning of Art. 48.2 to read: “For the purpose of Art. 48.1, exclusion **or inclusion** of a type means exclusion **or inclusion** of [...]”. Those who favour this alternative should vote “ed.c.”

Prop. B would cover what is indicated in Art. 48 Note 1 only for new combinations, names at new rank or replacement names with a new opening sentence in Art. 48.1, extending this to all misapplications, also defining the term “misapplication” in the process and specifying that they have “no nomenclatural status”. According to

the proposer, this will enable Art. 48.1 to address both situations where the type of the earlier name has been excluded (a homonym or name of new taxon) or has not been excluded (a misapplication).

Prop. C rightly recognizes that of the two categories of names resulting from application of the two parts of Art. 48.1, illegitimate later homonyms or names of new taxa, only the former would require conservation in order to be retained, although this should be obvious. However, this misses the point that Art. 48 Note 2 has nothing to do with the resultant names but rather concerns the existing names, the earlier homonym or the apparent basionym or replaced synonym, whose types cannot simply be changed by creating new names that exclude the pre-existing type, but require conservation with a conserved type under Art. 14.9 to achieve this.

Prop. D, like Art. 22 *Prop. A* from the same author, would replace the usage of the term “original type”, a term employed in the last five *Codes*, from three Articles on the grounds that it is not defined (but see Art. 10 *Prop. E*, which includes a definition) and not uniformly used. However, the usage of the term in the *Code* (in three Articles, one Note, and four Examples) where it is not a modifier (three instances, e.g. “original type specimen”, Art. 9.15) is consistent.

Prop. E would add similar language to both Art. 48.2 and 52.2, which have a parallel structure, to reiterate that the type under discussion in these Articles could be that of the name itself or its basionym or replaced synonym. Does this relationship, which should already be apparent from Art. 7.3–7.5, bear repeating here?

Prop. F seeks to make Art. 48.2, defining exclusion of a type, more congruent with Art. 52.2, defining inclusion of a type, by adding a phrase currently missing in Art. 48.2 that is equivalent to Art. 52.2(e), permitting exclusion of the name itself or any name homotypic at that time. It also creates a Note parallel to Art. 52 Note 1 to clarify the effect of inclusion of a name in part or with an expression of doubt on Art. 48.1. If *Prop. F* is accepted, the associated Examples would be referred to the Editorial Committee.

Prop. G would modify Art. 48.2 to more precisely conform its referencing and wording to the other provisions it cites. The addition of the phrase “if there is no type previously conserved” appears to be necessary, because there is no indication elsewhere in the *Code* that a conserved type eliminates the standing of other types for a name. By the same token, exclusion of a neotype designated under Art. 9.13 should also take precedence in this formulation over exclusion of a holotype or all syntypes, because these would no longer be extant. However, while a distinction in the *Code* can be made between an “indicated” or “designated” type, there appears to be no real semantic distinction intended in the cited provisions on whether a type is “selected”, “chosen” or “designated”, so it may be better to use more similar terms elsewhere in the *Code* than to propagate unintended differences here. Given these considerations, an alternative wording for Art. 48.2 could be: “**For the purpose of Art. 48.1, exclusion of a type means exclusion of (a) the type previously conserved under Art. 14.9; or if there is no conserved type, (b) the type previously designated under Art. 9.11–9.13 or indicated or designated under the first sentence of Art. 10.2; or if there is no such previously indicated or designated type, (c) the holotype under Art. 9.1 or all syntypes under Art. 9.6 or all elements eligible as types under the first sentence of Art. 10.2.**” Those who prefer this wording should vote “ed.c.”

Prop. H would add a Note clarifying that a later homonym created under the first sentence of Art. 48.1 can only exist if it otherwise meets all requirements for valid publication. Because a similar

situation exists with the name of a new taxon potentially created under the second sentence of the same Article (see Art. 6 Prop. X), both situations could be effectively dealt with in this Note with some slight rewording, as follows: **“The ‘later homonym’ or ‘name of a new taxon’ published as described in Art. 48.1 only has nomenclatural status if it satisfies all the relevant requirements for valid publication as the name of a new taxon.”** Those who favour this alternative wording for Prop. H should vote “ed.c.”

Recommendation 50D

Prop. A (047 – Krishna & al. in Taxon 69: 1390) Add a new paragraph with a new Example to Rec. 50D:

“50D.2. In the citation of a name as a heterotypic synonym for the first time, its status should be indicated by adding the words “synonymum novum” or “syn. nov.””

“Ex. 2. Bhattacharjee (in Candollea 67: 32. 2012) cited *Cheirostylis seidenfadeniana* C. S. Kumar & F. N. Rasm. (in Nordic J. Bot. 7: 409. 1987) as “syn. nov.” indicating that it was newly considered as a heterotypic synonym of *Cheirostylis parvifolia* Lindl. (in Edwards’s Bot. Reg. 25(Misc.): 19. 1839).”

Rapporteurs’ comments – *Prop. A* proposes what is really a matter of taxonomy, not nomenclature.

Article 51

Prop. A (406 – Wisnev in Taxon 72: 1181) Amend Article 51.1 as follows (new text in bold, deleted text in strikethrough):

“51.1. A legitimate name ~~must~~ **may** not be rejected **or otherwise disregarded by later authors** merely because it, or its epithet, is inappropriate or disagreeable, or because another is preferable or better known (but see Art. 14, 56.1, and F.7.1), or because it has lost its original meaning. **None of these reasons affects the valid publication, legitimacy, and priority of a name.**”

Prop. B (119 – Hammer & Thiele in Taxon 70: 1393) Amend Art. 51.1 as follows (new text in bold, deleted text in strikethrough):

“51.1. A legitimate name must not be rejected merely because it, or its epithet, is ~~inappropriate or disagreeable~~ **not fitting for the taxon**, or because another is ~~preferable~~ **better suited** or better known (but see Art. 51.2, 56.1, and F.7.1), or because it has lost its original meaning.”

Prop. C (120 – Hammer & Thiele in Taxon 70: 1393) Add a new Article 51.2:

“51.2. A legitimate name may be rejected under Art. 56.1 because it, or its epithet, is culturally offensive or inappropriate, because it (a) is derogatory or insulting to a person or group of people, (b) is named in honour of a person that the taxonomic community agrees should not be honoured, or (c) otherwise causes deep offense.”

Rapporteurs’ comments – *Prop. A* would attempt to clarify that “rejected” in Art. 51.1 does not necessarily mean rejected in the sense of Art. 14, 56 or F.7. Whereas the current cross-reference “(but see Art. 56.1 and F.7.1)” implies that rejection in the sense of those Articles is not meant, the proposed addition of the alternative “otherwise disregarded” suggests that “rejected” does indeed mean rejected in the sense of Art. 14, 56 and F.7. The added final sentence does not alter the rules and, if included at all, would be appropriate in a Note rather than an Article. To avoid an unwanted change in meaning, It might be better to leave Art. 51.1 in its current wording.

Prop. B and *C*, together with Art. 56 Prop. A and Div. III Prop. T, form a set of proposals that would allow the rejection of culturally offensive and inappropriate names. *Prop. B* would restrict Art. 51.1 to matters of suitability of names to taxa and how well known those

names are. *Prop. C* would add a new Article dealing with “culturally offensive or inappropriate” names, allowing their rejection under an accordingly amended Art. 56.1 (see Art. 56 Prop. A), and defining the circumstances under which names would be considered culturally offensive or inappropriate. A new Permanent Nomenclature Committee, a specialist committee, would be established as part of the mechanism (see Div. III Prop. T) for making recommendations on proposals under these new provisions. See also comments under Art. 61 Prop. G.

Recommendation 51A (new)

Prop. A (092 – Mosyakin in Taxon 70: 1379) Add a new Rec. 51A.1:

“51A.1. When publishing names of new taxa or replacement names, authors are strongly encouraged to avoid such names as may be viewed or treated as inappropriate, disagreeable, offensive, or unacceptable by any national, ethnic, cultural, or other groups of actual or potential users.”

Rapporteurs’ comments – *Prop. A* would add a Recommendation to avoid coining names that are offensive or inappropriate, etc. Although the vast majority of authors and editors would presumably be sensitive to the avoidance of such names, an explicit Recommendation in the *Code* might help guide those who are not.

Article 52

Prop. A (252 – Wisnev & Prado in Taxon 72: 680) Amend Art. 52.1 as follows (new text in bold, deleted text in strikethrough):

“52.1. A name, unless conserved (Art. 14), protected (Art. F.2), or sanctioned (Art. F.3), is illegitimate and is to be rejected if it was nomenclaturally superfluous when published, i.e. if the taxon to which it was applied, as circumscribed by its author, definitely included the type (as qualified in Art. 52.2) of a name that ought to have been adopted, or of which the epithet ought to have been adopted, under ~~Art. 11 the rules~~ (but see Art. 52.4 and F.8.1).”

Prop. B (404 – Wisnev in Taxon 72: 1180) Amend Art. 52.1 as follows (new text in bold, deleted text in strikethrough):

“52.1. A name, unless conserved (Art. 14), protected (Art. F.2), or sanctioned (Art. F.3), is illegitimate (and is **not to be used as the correct name of a taxon**) ~~rejected~~ if it was nomenclaturally superfluous when published, [...]”

Prop. C (407 – Wisnev in Taxon 72: 1181) Amend Art. 52.1 as follows (new text in bold, deleted text in strikethrough):

“52.1. A name, unless conserved (Art. 14), protected (Art. F.2), or sanctioned (Art. F.3), is illegitimate (**but see Art. 52.4 and F.8.1**) and is to be rejected if it ~~is was~~ nomenclaturally superfluous when published, i.e. if the taxon to which it was applied, as circumscribed by its author, **A name is nomenclaturally superfluous if its protologue (including the protologue of names of simultaneously adopted subordinate taxa)** definitely included the type (as qualified in Art. 52.2) of a name that ought to have been adopted, or of which the epithet ought to have been adopted, under the rules ~~(but see Art. 52.4 and F.8.1).~~”

Prop. D (172 – Rijkceversel in Taxon 71: 1330) Add a cross-reference in clause (e) of Art. 52.2 (new text in bold):

“It is also effected (e) by citation of the name itself or any name homotypic at that time, unless the type is at the same time excluded **(as defined in Art. 48.2)** either explicitly or by implication.”

Perhaps also include this in Art. 47.1?

Prop. E (392 – Wisnev in Taxon 72: 1177) Amend Art. 52.2 as follows (new text in bold, deleted text in strikethrough):

“52.2. For the purpose of Art. 52.1, definite inclusion of the type of a name is effected by citation of **(a) if there is no type previously conserved, (1) the holotype under Art. 9.1 or the original type under Art. 10 or all syntypes under Art. 9.6 or all elements eligible as types under the first sentence of Art. 10.2 (excluding Art. 10.2(a)); or (2b) the type previously designated or selected under Art. 9.11–9.13 or previously indicated, designated, or chosen under 10.2; or (be) the type previously conserved under Art. 14.9; or (cd) the illustrations of these.** It is also effected **(de)** by citation of the name itself or any name homotypic at that time, unless the type is at the same time excluded either explicitly or by implication.”

Prop. F (393 – Wisnev in Taxon 72: 1177) Amend Art. 52.2 as follows (new text in bold, deleted text in strikethrough):

“52.2. For the purpose of Art. 52.1, definite inclusion of the type of a name is effected by citation of **(a) [...]; or (c) the type previously conserved under Art. 14.9; or (d) the illustrations of these. For this purpose, citation of an illustration of a specimen is treated as citation of the specimen.** It is also effected **(ed)** [...].”

Prop. G (411 – Wisnev in Taxon 72: 1182) Amend Art. 52.2 as follows (new text in bold, deleted text in strikethrough):

“52.2. [...]. It is also effected **(e)** by citation of the name itself or any name homotypic at that time, unless **the a potential type element of that name** is at the same time excluded **by the same author** either explicitly or by implication. **A potential type element is the holotype under Art. 9.1, the original type under Art. 10, or a previously designated or conserved type as qualified in Art. 52.2(b)–(c), or if none of the foregoing exists, any syntype or any element eligible as a type in the first sentence of Art. 10.2 (excluding Art. 10.2(a)).**”

If Prop. 411 [Prop. G] is rejected, the Editorial Committee may wish to consider amending Art. 52 Ex. 12 as follows (new text in bold, deleted text in strikethrough):

“Ex. 12. *Leccinum* Gray (Nat. Arr. Brit. Pl. 1: 646. 1821) does not include all **the species names included in the protologue potential types (in fact, none) of the then untypified *Boletus* L. (Sp. Pl.: 1176. 1753) : Fr. (in fact, none)** and is not therefore illegitimate even though it included, as *L. edule* (Bull. : Fr.) Gray, the subsequently conserved type of *Boletus*, *B. edulis* Bull. : Fr.”

Prop. H (412 – Wisnev in Taxon 72: 1182) If Prop. 411 [Prop. G] is accepted, amend the definition of “potential type element” in the amended Art. 52.2(e) as follows (new text in bold):

“52.2. [...]. A potential type element is the holotype under Art. 9.1, the original type under Art. 10, or a previously designated or conserved type as qualified in Art. 52.2(b)–(c), or if none of the foregoing exists, any syntype **or illustration cited in the protologue** or any element eligible as a type in the first sentence of Art. 10.2 (excluding Art. 10.2(a)).”

Prop. I (413 – Wisnev in Taxon 72: 1183) Amend Art. 52.2 and convert Art. 52 Note 1 into a new Article, as follows (new text in bold, deleted text in strikethrough):

“52.2. For the purpose of Art. 52.1, definite inclusion of the type of a name is effected by **the unqualified** citation of **(a) [...].** It is also effected **(e)** by **the unqualified** citation of the name itself or any name homotypic at that time, unless the type is at the same time excluded either explicitly, **definitely** or by implication **(e.g. inclusion of the type in another taxon).**”

Note 1–52.n. ~~The inclusion, For purposes of Art. 52.2, a citation of a name or element is not unqualified if (a) it is cited with an expression of doubt, of an element in a new taxon, (e.g. the citation of a name or element with a question mark); or in a sense that excludes~~

one or more of its potential type elements, ~~does not make the name of the new taxon nomenclaturally superfluous (e.g. the citation of a name pro parte, either explicitly or by exclusion of a homotypic name) or (b) the name itself or any name homotypic at that time is also simultaneously cited as a different taxon (or as a synonym of a different taxon) by the same author.~~”

If Prop. 413 [Prop. I] is accepted, certain changes are desirable for Art. 52 Ex. 5 and 6. In the former Example, Dandy cited *Galium tricornis* and also excluded *Valantia aparine*, its replaced synonym. Because a name is not the same as a type, Dandy did not explicitly exclude the type. In fact, *V. aparine* was not typified until 2000. The Editorial Committee may wish to consider amending the Examples as follows (new text in bold, deleted text in strikethrough):

“Ex. 5. ~~Explicit exclusion of type~~ **Unqualified citation.** When publishing the name *Galium tricornutum*, Dandy (in Watsonia 4: 47. 1957) cited *G. tricornis* Stokes (Bot. Arr. Brit. Pl., ed. 2, 1: 153. 1787) pro parte as a synonym while explicitly excluding ~~its type~~ ***Valantia aparine* L., its replaced synonym, which was not typified until 2000. *Galium tricornutum* is not superfluous for two reasons: the pro parte citation of *G. tricornis* and the exclusion of the homotypic name *V. aparine*.**”

“Ex. 6. ~~Exclusion of type by implication~~ **Unqualified citation.** *Tmesipteris elongata* P. A. Dang. (in Botaniste 2: 213. 1891) was published as a new species but *Psilotum truncatum* R. Br. was cited as a synonym. However, on the following page, *T. truncata* (R. Br.) Desv. is recognized as a different species and two pages later both are distinguished in a key, ~~thus showing that the meaning of the cited synonym was either “*P. truncatum* R. Br. pro parte” or “*P. truncatum* auct. non R. Br.”~~ **Because Dang’s citation was qualified, *Tmesipteris elongata* is not nomenclaturally superfluous.**”

Prop. J (409 – Wisnev in Taxon 72: 1181) Amend Art. 52 Note 2 as follows (new text in bold, deleted text in strikethrough):

“Note 2. The ~~citation inclusion, in the protologue of a new name taxon,~~ of an element that was subsequently designated as the type of a name that, so typified, ought to have been adopted, or of which the epithet ought to have been adopted, does not in itself make the ~~new name of the new taxon nomenclaturally superfluous illegitimate.~~”

Prop. K (410 – Wisnev in Taxon 72: 1181) Add the following sentence at the end of Art. 52 Note 2:

“Note 2. [...]. In addition, if the included type that caused the name to be superfluous is subsequently replaced or superseded in accordance with the rules, the name remains nomenclaturally superfluous.”

Prop. L (123 – Rijksevoorsel in Taxon 70: 1394) Add a new rule, somewhere in Art. 52:

“52.n. For the purpose of Art. 52.1, in determining if a name ought to have been adopted, or of which the epithet ought to have been adopted, the effects of conservation, protection, or sanctioning, even if otherwise retroactive, are to be disregarded, unless this conservation, protection, or sanctioning took effect (Art. 14.15) prior to the publication of the name being evaluated for superfluity.”

Rapporteurs’ comments – Prop. A would make a simple but straightforward adjustment to Art. 52.1 that may be perceived as helpful to some Code users.

Prop. B would replace the phrase “and is to be rejected” in Art. 52.1 with an alternative wording that would also be added to Art. 53.1 (by Art. 53 Prop. A) and that many might consider states the obvious, i.e. that an illegitimate name cannot be the correct name for a taxon, a fact that should be readily apparent from Art. 11.3 and 11.4. The

proposer points out a disparity between Art. 52.1 and 53.1, i.e. the latter rules that the name is illegitimate but does not state that it is to be rejected. Perhaps deleting “and is to be rejected” in Art. 52.1 would be preferable, if this phrase is indeed redundant and if it was felt that the two Articles should be worded consistently. Those who agree should vote “ed.c.”

Prop. C would effectively make two changes to Art. 52.1, the first would move the cross-reference to the exceptions of Art. 52.4 and F.8.1 from the end of the Article to after the word “illegitimate” in order to emphasize that these exceptions do not provide that certain names are not superfluous, but rather that they are not illegitimate. This would seem to be an editorial matter. The aim of the second is to remove the phrase “as circumscribed by its author”, which is seen as requiring “a taxonomic assessment of the author’s circumscription of the newly described taxon” in order to determine whether a name is superfluous, when the only criterion should be “whether the author cited certain elements or names in the protologue”. However, as currently worded “if its protologue [...] definitely included the type [...] of a name” seems too imprecisely worded, because it is not whether a protologue included the type of another name (which could simply have been mentioned for comparison or some other reason without explicit or implicit exclusion of its type – see Art. 52.2(e)), but whether the taxon in question included the type of another name. Although the current use of the term seems clear enough, for those who feel that the use of “circumscription” is best avoided here, an alternative wording might be: “**A name, unless conserved (Art. 14), protected (Art. F.2), or sanctioned (Art. F.3), is illegitimate and is to be rejected if it was nomenclaturally superfluous when published, i.e. if the taxon, or any of its simultaneously adopted subordinate taxa, to which the name was applied by its author in the protologue definitely included the type (as qualified in Art. 52.2) of a name that ought to have been adopted, or of which the epithet ought to have been adopted, under the rules (but see Art. 52.4 and F.8.1).**” Those who favour this option rather than simply leaving things as they are should vote “ed.c.”

Prop. D would add a cross-reference to Art. 48.2 in the last clause of Art. 52.2 to permit the interpretation of “exclusion of a type” from Art. 48.2 to apply here in negating the effect (e) of citation of a name itself. However, this does not take into account the conflict that would arise between Art. 52 Note 1, which permits the exclusion of any potential type element of a name (i.e. any syntype or any element eligible under Art. 10.2) to preclude superfluity, and Art. 48.2. The latter would require exclusion of “all syntypes under Art. 9.6 or all elements eligible as types under Art. 10.2” to achieve the same result (i.e. not being superfluous). See *Prop. G* for a more elaborate treatment of this issue.

Prop. E suggests similar changes to Art. 52.2 as were proposed by Art. 48 *Prop. G* for Art. 48.2. The same considerations discussed under Art. 48 *Prop. G* apply here, where an alternate wording for Art. 52.2 could be: “**For the purpose of Art. 52.1, definite inclusion of a type of a name is effected by citation of (a) the type previously conserved under Art. 14.9; or if there is no conserved type, (b) the type previously designated under Art. 9.11–9.13 or indicated or designated under the first sentence of Art. 10.2; or if there is no such previously indicated or designated type, (c) the holotype under Art. 9.1 or all syntypes under Art. 9.6 or all elements eligible as types under the first sentence of Art. 10.2; or (d) the illustrations of these. It is also effected (e) by citation of the name itself or any name homotypic at that time, unless the type is at the same time excluded either explicitly or by implication.**” Those who prefer this wording should vote “ed.c.”

Prop. F would replace the confusing phrase “the illustrations of these” with a new sentence explaining that citation of an illustration of a specimen equates to citation of that specimen, which seems clearer.

Prop. G would provide a more elaborate treatment of the issue addressed in *Prop. D*, i.e. defining the parameters of exclusion of a type under Art. 52.2(e) that would negate “citation of the name itself”. *Prop. G* takes into account the conflict that would arise between Art. 52 Note 1, which permits the exclusion of any potential type element of a name (i.e. any syntype or any element eligible under Art. 10.2) to preclude superfluity, and Art. 48.2. The latter would require exclusion of “all syntypes under Art. 9.6 or all elements eligible as types under Art. 10.2” to achieve the same result (i.e. not being superfluous). Nevertheless, repeating most of the elements of Art. 48.2 in Art. 52.2(e) appears unnecessary, as would adding the phrase “by the same author”, if *Prop. C* or the suggested amendment to it, which both specify in Art. 52.1 that this would be in the protologue, was accepted. A more concise wording of clause (e) could be: “**(e) by citation of the name itself or any name homotypic at that time, unless the nomenclatural type (see Art. 7.2) or any potential type element (see Note 1) is at the same time excluded either explicitly or by implication.**” The meaning of “potential type element”, which is already mentioned in Note 1, could then be explained in Note 1 as “**(any syntype or any element eligible as type in Art. 10.2 first sentence (excluding clause (a)))**”, leaving the actual type, i.e. the “nomenclatural type” under Art. 7.2, out of this explanation. This has the added benefit of better integrating Art. 52.2 with its Note 1. Those who favour this alternative approach should vote “ed.c.”

Prop. H is contingent upon acceptance of *Prop. G*, either in its original wording or the suggested alternative language. The reference to an “illustration cited in the protologue” in *Prop. H* could be accommodated either way. However, this would amount to extending the meaning of “exclusion of a type” beyond what is defined in Art. 48.2. One could argue that a potential type element could be *any* element of original material, but as Art. 48.2 does not consider it this broadly, it seems undesirable to do it here.

Prop. I, which bears some relationship with *Prop. G*, in that both consider the interaction between Art. 52.2(e) and Art. 52 Note 1, would rewrite Note 1 and, because it “appears to introduce a new concept”, elevate it to an Article. Indeed, while Note 1 explains what should be already apparent from Art. 52.1, i.e. that citing a name or type with doubt or in part under a taxon would not have “*definitely* included the type”, it appears to conflict with Art. 52.2. Under Art. 52.2, citing a name or type would achieve “definite inclusion of the type” regardless of how it was cited, e.g. with doubt or in part under a taxon, because Art. 52.2 does not account for the situations covered in Note 1. For this reason *Prop. I* would add a requirement to Art. 52.2 that a citation of a type or name must be “unqualified” in order to definitely include a type. A few other less consequential changes to Art. 52.2 would also be made. The proposed new Art. 52.n would limit what can be considered as “qualified” under Art. 52.2 to specified situations. Nevertheless, an improved wording for the new Article could be: “**For purposes of Art. 52.2, a citation is qualified and does not constitute definite inclusion of the type if (a) it contains an expression of doubt (e.g. a question mark), (b) it excludes one or more potential type elements (e.g. when a name is cited *pro parte* or a homotypic name is excluded) or (c) the cited name or any name homotypic at that time is simultaneously applied to a different taxon by the same author in the same publication.**” Those who support this proposal in concept with this amended wording for the new Article should vote “ed.c.”

Prop. J proposes changes to Art. 52 Note 2 that seem unwarranted. It would replace “inclusion” (the term used in Art. 52.1, 52.2 and Note 1) with “citation”, disrupting the continuity of these provisions, and replace “in a new taxon” with “in the protologue of a new name”, changing the meaning from inclusion within a taxonomic group to citation in a place. It would also extend the application of Note 2 to new combinations and names at new rank, which having a basionym are never illegitimate on account of their superfluity anyway (Art. 52.4), and to replacement names, which were not previously considered under this Note. The proposed change from “illegitimate” to “nomenclaturally superfluous” would better apply to all of these categories of names. Some slight rewording of Note 2 taking account of these issues could be: **“The inclusion in a taxon of an element that was subsequently designated as the type of a name that, so typified, ought to have been adopted for that taxon, or of which the epithet ought to have been adopted, does not in itself make a new name for that taxon nomenclaturally superfluous.”** Those who prefer this altered wording should vote “ed.c.”

Prop. K would provide an addition to Note 2, clarifying that subsequent replacement or supersession of a once-included type by one that was not originally included would have no effect on the superfluity of a name, which some might find useful.

Prop. L is discussed under Art. 14 Prop. D.

Article 53

Prop. A (405 – Wisnev in *Taxon* 72: 1180) Amend Art. 53.1 as follows (new text in bold):

“53.1. A name of a family, genus, or species, unless conserved (Art. 14), protected (Art. F.2), or sanctioned (Art. F.3), is illegitimate **(and is not to be used as the correct name of a taxon)** if it is a later homonym, [...]”

Prop. B (219 – Prado & al. in *Taxon* 72: 454) Amend Art. 53.4 (new text in bold, deleted text in strikethrough):

“53.4. When it is doubtful whether names or their epithets are sufficiently alike to be confused, a request for a decision may be submitted to the General Committee, which will refer it for examination to the specialist committee(s) for the appropriate taxonomic group(s) (see Div. III Prov. 2.2, 7.9, and 7.10). A **General Committee** recommendation **as to** whether or not to treat the names concerned as homonyms **is to be treated as a binding decision subject to ratification by a later** ~~may then be put forward to an~~ International Botanical Congress (see also Art. 14.15, 34.2, 38.4, and 56.3) and, ~~if ratified, will become a binding decision with~~ **takes** retroactive effect. These binding decisions are listed in App. VII.”

Rapporteurs’ comments – *Prop. A* would add to Art. 53.1 a parenthetical clause that many might consider states the obvious; see comments under the related (although independent) Art. 52 Prop. B.

Prop. B is discussed under Art. 38 Prop. N.

Article 54

Prop. A (431 – Turland & Wiersema in *Taxon* 72: 1187) Reword Art. 54.1 clause (b) as follows (new text in bold, deleted text in strikethrough):

“54.1. [...] (b) A name applied to an organism covered by this *Code* and validly published under it (Art. 32–45) but originally published for a taxon other than an alga, fungus, or plant, i.e. under another *Code*, is illegitimate if it (1) is unavailable for use under the provisions of the other *Code*¹, usually because of homonymy, or (2) ~~becomes~~ **is a later** homonym of an algal, fungal, or plant name ~~when~~

the taxon to which it applies is first treated as an alga, fungus, or plant (see also Art. 45.1).”

Rapporteurs’ comments – *Prop. A* would remove some unnecessary language from Art. 54.1 and insert the necessary (if the homonym is to be illegitimate) word “later” before “homonym”.

Article 56

Prop. A (121 – Hammer & Thiele in *Taxon* 70: 1393) Amend Art. 56.1 as follows (new text in bold):

“56.1. Any name that would cause a disadvantageous nomenclatural change (Art. 14.1) **or that is regarded as culturally offensive or inappropriate (Art. 51.2)** may be proposed for rejection. A name thus rejected, or its basionym if it has one, is placed on a list of nomina utique rejicienda (suppressed names, App. V). Along with each listed name, all names for which it is the basionym are similarly rejected, and none is to be used (see Rec. 50E.2).”

Rapporteurs’ comments – *Prop. A*, together with Art. 51 Prop. B and C and Div. III Prop. T, forms a set of proposals that would allow the rejection of culturally offensive and inappropriate names. Further discussion appears under these other proposals.

Article 60

Prop. A (414 – Demoulin in *Taxon* 72: 1184) Add a new paragraph after Art. 60.1 (current wording of Art. 60.1 unchanged but quoted for context):

[“60.1. The original spelling of a name or epithet is to be retained, except for the correction of typographical or orthographical errors and the standardizations imposed by Art. 60.4 (letters and ligatures foreign to classical Latin), 60.5 and 60.6 (interchange between u/v, i/j, or eu/ev), 60.7 (diacritical signs and ligatures), 60.8 (terminations; see also Art. 32.2), 60.9 (intentional latinizations), 60.10 (compounding forms), 60.11 and 60.12 (hyphens), 60.13 (apostrophes and full stops), 60.14 (abbreviations), and F.9.1 (epithets of fungal names) (see also Art. 14.8, 14.11, and F.3.2).”]

“60.1bis. Orthographical errors to be corrected under this Article are those occurring when a name or epithet issued from Greek or Latin is incorrectly written or constructed, even with a large tolerance for usages of post-classical Latin, especially botanical Latin.”

Prop. B (415 – Demoulin in *Taxon* 72: 1184) Add a second new paragraph after Art. 60.1:

“60.1ter. Correction is also to be applied when names or epithets derived from the name of a person, a geographical place, or a language other than Greek or Latin is written in a way incompatible with the real orthography of the name or word, unless it is an evident intentional latinization under Art. 60.9.”

Prop. C (416 – Demoulin in *Taxon* 72: 1184) Add a third new paragraph after Art. 60.1:

“60.1quater. In case of doubt, a voted Example (Art. 7 *Ex. 16 footnote) may be proposed. When an erroneous usage has been dominant for a long period, conservation may be proposed under Art. 14.11.”

Prop. D (418 – Demoulin in *Taxon* 72: 1184) Add a new voted Example to the Examples under Art. 60.1 or 60.2:

“*Ex. n. The generic name *Brachycome* Cass. (in Bull. Soc. Philom. Paris 1816: 199. 1816) is to be so spelled, even though it was originally spelled ‘*Brachyscome*’ (see Demoulin in Lejeunea 200. 2019).”

Prop. E (228 – Rijkkevorsel in *Taxon* 72: 459) Amend the second sentence of Art. 60.7 as follows (new text in bold, deleted text in strikethrough):

“60.7. Diacritical signs are not used in scientific names. When **such signs appear in the spelling of a name at valid publication** names (either new or old) are drawn from words in which such signs appear, the signs are to be suppressed with the necessary transcription of the letters so modified; [...]”

Prop. F (229 – Rijckevorsel in Taxon 72: 459) Rephrase the second sentence of Art. 60.7, so that it reads:

“60.7. [...] When such a sign appears in the original spelling of a name, this sign is to be suppressed without transcription (*é, è, ê* become *e*; *ñ* becomes *n*), except a Germanic *ä, ö, or ü*, which is to be transcribed, to become, respectively, *ae, oe, and ue*; or the Scandinavian *å* or *ø*, which is also to be transcribed, to become, respectively, *ao* and *oe*.”

[Current wording: “60.7. Diacritical signs are not used in scientific names. When names (either new or old) are drawn from words in which such signs appear, the signs are to be suppressed with the necessary transcription of the letters so modified; for example *ä, ö, ü* become, respectively, *ae, oe, ue* (not *æ* or *œ*, see below); *é, è, ê* become *e*; *ñ* becomes *n*; *ø* becomes *oe* (not *æ*); *å* becomes *ao*.”]

Prop. G (230 – Rijckevorsel in Taxon 72: 459) Move the last sentence of Art. 60.7 to Art. 60.4 (new text in bold, deleted text in strikethrough).

“60.4. The letters *w* and *y*, foreign to classical Latin, and *k*, rare in that language, are permissible in scientific names (see Art. 32.1 (b)). Other letters and ligatures foreign to classical Latin that may appear in scientific names, such as the German *ß* (*fs*, or double *s*), are to be transcribed. **The ligatures *æ* and *œ*, indicating that the letters are pronounced together, are to be replaced by the separate letters *ae* and *oe*.**”

“60.7. [...] ~~The ligatures *æ* and *œ*, indicating that the letters are pronounced together, are to be replaced by the separate letters *ae* and *oe*.~~”

It may be worth considering a clarifying addition after “*æ* and *œ*” such as “(first adopted in medieval Latin)”.

Prop. H (231 – Rijckevorsel in Taxon 72: 459) Add a new Example to Art. 60.7:

“*Ex. n.* The letter *å* to become *ao*. ‘*Forsskålea*’ (dedicated to Peter Forsskål) is to be cited as *Forsskaolea* L. (Opobalsamum: 17. 1764), not as ‘*Forskohlea*’, as done by Linnaeus (Mant. Pl.: 72. 1767), or as ‘*Forskalea*’, as done by Jussieu (Gen. Pl.: 403. 1789).”

Prop. I (022 – Moran & al. in Taxon 69: 636) Amend Art. 60.8 (a) as follows (new text in bold):

“(a) If the personal name ends with a vowel or *-er*, substantival epithets are formed by adding the genitive inflection appropriate to the gender and number of the person(s) honoured (e.g. *scopoli-i* for Scopoli (m), *fedtschenko-i* for Fedtschenko (m), *fedtschenko-ae* for Fedtschenko (f), *glaziou-i* for Glaziou (m), *lace-ae* for Lace (f), *gray-i* for Gray (m), ***hooker-i* for Hooker (m), *hooker-ae* for Hooker (f), *hooker-orum* for the Hookers (m)**), except when the name ends with *-a*, in which case adding *-e* (singular) or *-rum* (plural) is appropriate (e.g. *triana-e* for Triana (m), *pojarkova-e* for Pojarkova (f), *orlovskaja-e* for Orlovskaja (f), ***espinosa-rum* for the Espinosas (m)**)).”

Prop. J (023 – Mabberley in Taxon 69: 637) Amend the last paragraph of Art. 60.8 as follows (new text in bold) and add an Example:

“Terminations contrary to the above standards are treated as errors to be corrected to *[i]i*, *[i]ae*, *[i]ana*, *[i]anus*, *[i]anum*, *[i]arum*, or *[i]orum*, as appropriate (see also Art. 32.2). However, epithets formed in accordance with Rec. 60C.1 are not correctable (see also Art. 60.9), **nor are those with terminations conforming to other**

classical Latin adjectival usage, namely *-[i]a*, *-[i]us*, or *-[i]um*, or such epithets ending in an *-ea*.”

“*Ex. n. Gladiolus watsonius* Thunb. (*Gladiolus*: 14. 1784) and *Syringa josikaea* J. Jacq. ex Rchb. (*Iconogr. Bot. Pl. Crit.* 8: 32. 1830) are not correctable to *G. “watsonianus”* and *S. “josikaeana”*, respectively.”

Prop. K (024 – Rijckevorsel in Taxon 69: 638) Add a voted Example to Art. 60.8:

“*Ex. n.* Tradition has accepted a number of eighteenth and nineteenth century names with epithets based on personal names that are not formed according to Art. 60.8, but that are classical Latin adjectives (formed by analogy to Rec. 60B, but not restricted to a feminine form), such as *Erica bauera* Andrews (*Col. Engr. Heaths*: t. 221. 1810–1830), *Gladiolus watsonius* Thunb. (*Gladiolus*: 14. 1784), *Hibiscus patersonius* Andrews (*Bot. Repos.*: t. 286. 1803) (= *Lagunaria patersonia* (Andrews) G. Don, *Gen. Hist.* 1: 485. 1831), *Syringa josikaea* J. Jacq. ex Rchb. (*Iconogr. Bot. Pl. Crit.* 8: 32. 1830), *Taxus harringtonia* Knight ex J. Forbes (Pinet. Woburn.: 217. 1839) (= *Cephalotaxus harringtonia* (Knight ex J. Forbes) K. Koch, *Dendrologie* 2(2): 102. 1873). This tradition is to be respected, and such epithets are not correctable.”

Prop. L (048 – Moran & Prado in Taxon 69: 1391) Amend Art. 60.8(b) and (d) and Ex. 17 as follows (new text in bold, deleted text in strikethrough) and add a new entry to the Glossary:

“(b) If the personal name ends with a consonant (but not in *-er*), substantival epithets are formed by **latinizing them with *-ius*, then dropping the *-us* and adding *-i* (stem augmentation) plus the genitive inflection appropriate to the gender and number of the person(s) honoured** (e.g. ***Lecard-ius*, *lecard-i-i*** for Lecard (m), ***Wilson-ius*, *wilson-i-ae*** for Wilson (f), ***Verlot-ius*, *verlot-i-orum*** for the Verlot brothers, ***Braun-ius*, *braun-i-arum*** for the Braun sisters, ***Mason-ius*, *mason-i-orum*** for Mason, father and daughter).”

“(d) If the personal name ends with a consonant, adjectival epithets are formed by **latinizing the personal name with *-ius*, then dropping the *-us* and adding *-i* (stem augmentation) plus *-an-* (stem of adjectival suffix) plus the nominative singular inflection appropriate to the gender of the generic name** (e.g. ***Rosa webbi-ana*** for Webb, ***Desmodium griffithi-anum*** for Griffith, ***Verbena hassleri-ana*** for Hassler).”

“*Ex. 17.* In *Rhododendron ‘potanini’* Batalin (in Trudy Imp. S.-Peterburgsk. Bot. Sada 11: 489. 1892), commemorating G. N. Potanin, the epithet is to be spelled *potaninii* under Art. 60.8(b) **because Potanin is first put in Latin form by adding *-ius* to create *potaninius*; then the genitive is formed by first dropping the *-us* to yield *potanini-* (the final *-i* is the stem augmentation) and then adding the masculine genitive singular ending *-i*, resulting in the epithet *potaninii***. However, in *Phoenix theophrasti* Greuter (in *Bauhinia* 3: 243. 1967), commemorating Theophrastus, it is not spelled ‘*theophrastii*’ because Rec. 60C.1 applies.”

“*stem augmentation.* [Not defined] – the *-i-* at the end of the stem of a specific or infraspecific epithet derived from a personal name not already of Latin form and ending in a consonant. It results from latinizing the personal name by adding *-ius* (e.g. Smith to *smithius*), then dropping the *-us* to yield the stem (*smithi-*), to which is added the appropriate genitive ending (*smithi-i*, masc. sing.; *smithi-orum*, masc. pl.; *smithi-ae*, fem. sing.; *smithi-arum*, fem. pl.) (Art. 60.8(b) and (d)). Similarly, adjectival epithets are formed by first latinizing the personal name by adding *-ius*, then adding an adjectival suffix (*-an-*) to which is attached the appropriate nominative singular inflection.”

Prop. M (186 – McNeill & al. in Taxon 71: 1341) Insert in Art. 60.8 a qualification on epithets derived from abbreviations of personal names (new text in bold), and add a new Article, a new Note, and three new Examples:

“60.8. The termination of specific or infraspecific epithets derived from personal names that are not already in Greek or Latin and do not possess a well-established latinized form (see Rec. 60C.1) is as follows (**but see Art. 60.8bis for epithets derived from abbreviation of personal names**):”

“60.8bis. An epithet, or in the case of a compound epithet its final portion, formed from abbreviation of one or more personal names is considered to have been composed arbitrarily (Art. 23.2) and is not subject to modification, e.g. under the provisions of Art. 60.8.”

“*Note 4bis*. If the epithet itself is indicated as being abbreviated, Art. 60.14 applies.”

“*Ex. 26bis*. *Silene karekirii* Bocquet (in *Candollea* 22: 10. 1967), published as a replacement name for *Lychnis sordida* Kar. & Kir. (in *Bull. Soc. Imp. Naturalistes Moscou* 15: 170. 1842), is an arbitrarily formed epithet constructed by abbreviating the names of Karelin and Kirilov, authors of the replaced synonym, and the epithet is not to be corrected to ‘*karekiriorum*’ or ‘*karelini-kiriloviorum*’.”

“*Ex. 26ter*. *Lepanthes carvii* Archila (*Lepanthes* Guatemala: 99. 2001) was said to be “dedicated to the family of Carlos Villela especially LIC Jorge A Carlos who directed the photography in this investigation”. As a composite epithet apparently made up of “Car” from the Carlos family and the “V” from Villela, it is considered to be composed arbitrarily and is not to be modified in any way.”

“*Ex. 26quater*. *Telipogon ‘crisariasae’* Baquero & Iturralde (in *Phytotaxa* 564: 249. 2022), commemorating María Cristina Arias (female), in which the final portion of a compound epithet is not formed from an abbreviation, is correctable to *Telipogon crisariasiae* (see Art. 60.8(b)).”

Prop. N (233 – Rijkvorschel in Taxon 72: 460) Rephrase the opening sentence of Art. 60.8 so that it reads:

“60.8. When a specific or infraspecific epithet is formed by adding a termination to a personal name (see Rec. 23A.1), this is done as follows (but see Art. 60.9 and Art. 60 Note 5):”

[Current wording: “60.8. The termination of specific or infraspecific epithets derived from personal names that are not already in Greek or Latin and do not possess a well-established latinized form (see Rec. 60C.1) is as follows:”]

Prop. O (234 – Rijkvorschel in Taxon 72: 460) Provide the final (main text) paragraph of Art. 60.8 (“Terminations contrary [...]”) with its own number.

The same could apply to the final (main text) paragraph of Art. 60.10 (“Adjectival epithets not formed [...]”).

Prop. P (282 – Olshanskyi in Taxon 72: 698) Amend Art. 60 Note 4 as follows (new text in bold):

“*Note 4*. If the gender and/or number of a substantival epithet derived from a personal name is/are inappropriate for the gender and/or number of the person(s) whom the name commemorates, the termination is to be corrected in conformity with Art. 60.8. **However, the grammatical gender used for a person whom the epithet commemorates may be determined by the preferred gender identity of that person. Also, an epithet honouring a non-binary person in some cases may be created by adding -iorum, -iarum, or another indicator of grammatical plurality.**”

Prop. Q (235 – Rijkvorschel in Taxon 72: 460) Rephrase Art. 60.9 so that it reads:

“60.9. When the spelling of a name or epithet used at valid publication resulted from the intentional latinization of a personal, geographical, or vernacular name, this original spelling (Art. 60.2) is to be retained (Art. 60.1). Excepted from this are epithets formed from personal names when the latinization involves (a) only a termination to which Art. 60.8 applies, or (b) only (1) omission of the terminal vowel or terminal consonant or (2) conversion of the terminal vowel to a different vowel, for which the omitted or converted letter is to be restored.”

[Current wording: “60.9. When changes in spelling by authors who adopt personal, geographical, or vernacular names in nomenclature are intentional latinizations, they are to be preserved, except, in epithets formed from personal names, when they concern (a) only a termination to which Art. 60.8 applies, or (b) personal names in which the changes involve only (1) omission of the terminal vowel or terminal consonant or (2) conversion of the terminal vowel to a different vowel, for which the omitted or converted letter is to be restored.”]

Prop. R (236 – Rijkvorschel in Taxon 72: 460) Amend the last sentence of Art. 60 Note 5 so that it reads (new text in bold, deleted text in strikethrough):

“*Note 5*. The provisions of Art. 60.8, 60.9, and Rec. 60C deal with the latinization of names through their modification. Latinization is not the same as translation of a name (e.g. *Tabernaemontanus*, Latin for Bergzabern; *Nobilis*, Latin for Noble), Epithets **resulting from or** derived from ~~such~~ Latin translations ~~fall under Rec. 60C.1 and~~ are not subject to standardization under Art. 60.8, **although Rec. 60C.1 and 60C.2 may apply.**”

Prop. S (237 – Rijkvorschel in Taxon 72: 460) Add two Examples to Art. 60 Note 5:

“*Ex. n1*. *Melaleuca fabri* Craven (in *Austral. Syst. Bot.* 12: 876. 1999) honours Basil and Mary Smith, with *fabri* the translation into Latin of the name Smith, in the nominative plural, as a noun in apposition. This epithet was not formed by adding a termination to a personal name (Art. 60.8), but is just a translation to a Latin word. Although this practice is not recommended, the epithet is to be accepted in its original spelling (and is not to be altered to “*fabrorum*”).”

“*Ex. n2*. The epithet, in apposition, in *Crataegus spes-aestatum* J. B. Phipps (in *Novon* 16: 382. 2006) honours Bill Summers, one person, but the genitive plural (“*aestatum*”) is not to be altered to the singular. The epithet is just a translation to Latin.”

Prop. T (238 – Rijkvorschel in Taxon 72: 461) Add a new rule to Art. 60 supported by two Examples:

“60.9bis. For a specific or infraspecific epithet formed from two or more parts, with the part in final position a personal name to which a termination is added, the provisions of Art. 60.8 and 60.9 apply equally to the part of the epithet formed from that personal name.”

“*Ex. n1*. The epithet in *Vochysia hannekesaskiae* Marc.-Berti (in *Pittieria* 18: 7. 1989) is dedicated to the wife and two daughters of the author; in total three persons, two of whom are named Hanneke and one Saskia. Although such a practice is not recommended, this epithet is not to be altered, because the correct termination was added to the personal name Saskia (in final position), which refers to a single person. However, the epithet in *Qualea ‘hannekesaskiarum’* Marc.-Berti (in *Pittieria* 13: 5. 1986), dedicated to the two daughters of the author (i.e. Hanneke and Saskia), is to be corrected to the singular.”

“*Ex. n2*. The epithet in *Cestrum ‘johnniegentrianum’* D’Arcy (in *Ann. Missouri Bot. Gard.* 60: 601. 1974) is composed of a given

name and a surname (“Nomen Johannis L. Gentryi [...] designatur”). The component in final position is a personal name, Gentry, to which a termination is added: the final part of the epithet is correctable and the name is to be cited as *Cestrum johnniegentryanum*.”

Prop. U (211 – Rijkvorschel in Taxon 72: 450) Add a new rule to Art. 60 supported by two Examples:

“60.10bis. The provisions of Art. 60.10 apply equally to epithets in apposition that are compounded by combining one or more Greek or Latin words with the noun *-cola* in final position (see Art. 23.5).”

“Ex. 39bis. The epithet meaning “inhabiting *Betula*” is *betulicola* (*Betul-*, connecting vowel *-i-*, and noun, in final position, *-cola*).”

“Ex. 39ter. The epithet in *Septoria ‘Castaneicola’* Desm. (in Ann. Sci. Nat., Bot., ser. 3, 8: 26. 1847) is to be spelled *castaneicola*.”

Prop. V (212 – Rijkvorschel in Taxon 72: 450) Add a new rule to Art. 60 supported by three Examples:

“60.10ter. The provisions of Art. 60.10 apply equally to epithets in apposition that semantically serve as if they were adjectives and that are compounded by combining one or more Greek or Latin words with a noun in final position (especially *-cola*, see Art. 23.5).”

[The same two Examples as in Prop. 211 [Prop. U] above.]

“Ex. n. *Ilex ‘ardisiaefrons’* Reissek (in Martius, Fl. Bras. 11(1): 58. 1861) is to be spelled *I. ardisiifrons*.”

Prop. W (049 – Prado & Moran in Taxon 69: 1392) Amend Art. 60.11 and Ex. 40–43 as follows (new text in bold, deleted text in strikethrough) and add a new Example:

“60.11. The use of a hyphen in a compound epithet is treated as an error to be corrected by deletion of the hyphen. ~~A~~ **However, a hyphen is permitted only when must be used if (a) the epithet is formed of words that usually stand independently (see also Art. 23.1 and 23.3), including separately latinized personal names, but excluding a leading prefix, or (b) when the letters before and after the hyphen are the same (see also Art. 23.1 and 23.3). The absence of such a hyphen is treated as an error to be corrected by insertion of the hyphen.**”

“Ex. 40. Hyphen ~~to be deleted~~ **not used because it was originally published in error:** *Acer pseudoplatanus* L. (Sp. Pl.: 1024. 1753, ‘pseudo-platanus’); *Croton ciliatoglandulifer* Ortega (Nov. Pl. Descr. Dec.: 51. 1797, ‘ciliato-glandulifer’); *Eugenia costaricensis* O. Berg (in Linnaea 27: 213. 1856, ‘costa-ricensis’); ~~*Eumotia rolandschmidtii* Metzeltin & Lange Bert. (Leonogr. Diatomol. 18: 117. 2007, ‘roland schmidtii’), in which the given name and surname do not stand independently because the former is not separately latinized;~~ *Ficus neobudorum* Summerh. (in J. Arnold Arbor. 13: 97. 1932, ‘neo-ebudorum’); *Lycoperdon atropurpureum* Vittad. (Monogr. Lycoperd.: 42. 1842, ‘atro-purpureum’); ~~*Mesospora vanbosseae* Borgesen (in Skottsberg, Nat. Hist. Juan Fernandez 2: 258. 1924, ‘van-bosseae’);~~ *Peperomia lasierrana* Trel. & Yunck. (Piperac. N. South Amer.: 530. 1950, ‘la-sierrana’); *Scirpus* sect. *Pseudoeriophorum* Jurtzev (in Byull. Moskovsk. Obsch. Isp. Prir., Otd. Biol. 70(1): 132. 1965, ‘Pseudo-eriophorum’).”

“Ex. 41. Hyphen ~~to be maintained~~ **used because the letters before and after the hyphen are the same:** *Athyrium austro-occidentale* Ching (in Acta Bot. Boreal.-Occid. Sin. 6: 152. 1986); ~~*Enteromorpha roberti-lamii* H. Parriaud (in Botaniste 44: 247. 1961), in which the given name and surname stand independently because they are separately latinized;~~ *Loranthus pseudo-odoratus* Lingelsh. (in Repert. Spec. Nov. Regni Veg. Beih. 12: 357. 1922, ‘pseudoodoratus’); *Piper pseudo-oblongum* McKown (in Bot. Gaz.

85: 57. 1928); ~~*Ribes non-scriptum* (Berger) Standl. (in Publ. Field Mus. Nat. Hist., Bot. Ser. 8: 140. 1930);~~ *Solanum fructu tecto* Cav. (Leon. 4: 5. 1797); ~~*Vitis novae-angliae* Fernald (in Rhodora 19: 146. 1917).~~”

“Ex. 42. Hyphen ~~to be inserted~~ **used because the two words stand independently:** *Arctostaphylos uva-ursi* (L.) Spreng. (Syst. Veg. 2: 287. 1825, ‘uva ursi’); *Aster novae-angliae* L. (Sp. Pl.: 875. 1753, ‘novae angliae’); *Coix lacryma-jobi* L. (l.c.: 972. 1753, ‘lacryma jobi’); ~~*Marattia rolandi-principis* Rosenst. (in Repert. Spec. Nov. Regni Veg. 10: 162. 1911, ‘rolandi principis’);~~ *Veronica anagallis-aquatica* L. (Sp. Pl.: 12. 1753, ‘anagallis ∇’) (see Art. 23.3); *Veronica argute-serrata* Regel & Schmalh. (in Trudy Imp. S.-Peterburgsk. Bot. Sada 5: 626. 1878, ‘argute serrata’) (see also Art. 23 Ex. 20).”

“Ex. 43. Hyphen ~~not to be inserted~~ **used in an epithet derived from personal names that are not separately latinized or have a leading prefix:** *Acer shihweii* F. Chun & W. P. Fang (in Acta Phytotax. Sin. 11: 165. 1966) – named for Teng Shih Wei; *Astragalus langranii* Podlech (in Novon 14: 225. 2004, ‘lang-ranii’) – named for “Xu Lang-Ran”; *Calamus johndransfieldii* W. J. Baker (in Phytotaxa 197: 144. 2015); *Cardamine cheotaiyienii* Al-Shehbaz & G. Yang (in Harvard Pap. Bot. 3: 73. 1998) – named for “Cheo Tai-yien”; *Corydalis harrysmithii* Lidén & Z. Y. Su (in Novon 17: 482. 2007, ‘harry-smithii’); *Mesospora vanbosseae* Borgesen (in Skottsberg, Nat. Hist. Juan Fernandez 2: 258. 1924, ‘van-bosseae’); *Peperomia lasierrana* Trel. & Yunck. (Piperac. N. South Amer.: 530. 1950, ‘la-sierrana’); *Erysimum handel-mazzettii* Polatschek (in Phytotaxa (Horn) 34: 200. 1994, ‘handel-mazzettii’); *Ligusticum kingdonwardii* H. Wolff (in Repert. Spec. Nov. Regni Veg. 27: 306. 1930, ‘kingdon-wardii’); *Polypodium alansmithii* R. C. Moran (in Ann. Missouri Bot. Gard. 77: 845. 1990); *Symphypappus lymansmithii* B. L. Rob. (in Contr. Gray Herb. 96: 19. 1931); *Synsepalum letestui* Aubrév. & Pellegr. (in Notul. Syst. (Paris) 16: 263. 1961, ‘Le Testui’), ~~not ‘le-testui’.~~”

“Ex. n. Hyphen used in an epithet derived from separately latinized personal names: *Englerodoxa alberti-smithii* Sleumer (in Notizbl. Bot. Gart. Berlin-Dahlem 12: 57. 1934); *Kalanchoe adolphi-engleri* Raym.-Hamet (in Bull. Soc. Bot. France 102: 239. 1955); *Pleurothallis curti-bradei* Pabst (in Arch. Jard. Bot. Rio de Janeiro 14: 10. 1956).”

Prop. X (213 – Rijkvorschel in Taxon 72: 451) Rephrase Art. 60.11 so that it reads (new text in bold, deleted text in strikethrough):

“60.11. The use of a hyphen in an ~~compound~~ **epithet** is treated as an error to be corrected by deletion of the hyphen. A hyphen is permitted only when **an epithet is hyphenated according to Art. 23.1 or 23.3 (if the epithet consisted originally of two or more words, or a word and a symbol) or when the hyphen was present at the valid publication of the name or its basionym, if it has one.** A hyphen is permitted only when the epithet is formed of words that usually stand independently, or when the letters before and after the hyphen are the same ~~(see also Art. 23.1 and 23.3).~~”

Prop. Y (214 – Rijkvorschel in Taxon 72: 451) Add a Note to Art. 60, somewhere after 60.11, supported by an Example:

“Note n. In Art. 60.11, “words that usually stand independently” refers to usage in (botanical) Latin (see Prin. V), not in the language from which the words are derived.”

“Ex. n1. In the epithet of *Nicandra johnnyleriana* S. Leiva & Pereyra (in Arnela 14: 46. 2007, ‘john-tyleriana’), “john” is not a Latin word and it cannot stand independently in that language. A hyphen is not permitted.”

Prop. Z (215 – *Rijckevorsel in Taxon* 72: 451) If *Prop. 214* [Prop. Y] is accepted, add a voted Example to the Note:

“**Ex. n2.* In the epithet of *Peperomia santa-elisae* C. DC. (in Bull. Herb. Boissier, ser. 2, 7: 917. 1907), “santa” is not a Latin word but is accepted by tradition as a word that can stand independently in botanical Latin. A hyphen is permitted.”

Prop. AA (187 – McNeill & al. in *Taxon* 71: 1341) Amend Art. 60.14 to read (new text in bold, deleted text in strikethrough):

“60.14. ~~Abbreviated names and~~ **Names or** epithets indicated as **abbreviated** are to be expanded in conformity with nomenclatural tradition (see also Art. 23 **Ex. 23* and Rec. 60C.4(d)).”

Rapporteurs’ comments – *Prop. A* and *B* would define what constitutes an orthographical error that would be correctable under Art. 60.1. *Prop. A* concerns Latin (including post-classical Latin) or Greek orthography, whereas *Prop. B* deals with other languages (and would make it clear why ‘*Nilsonia*’, named after Sven Nilsson, is correctable to *Nilssonia*; see Art. 60 *Ex. 7*). The effort seems to be to promote standardization in the orthography of names or epithets. However, this appears to be at the expense of short-term nomenclatural stability. Under *Prop. B*, names with epithets such as *pensylvanica* would presumably be correctable to ‘*pennsylvanica*’ (because Pennsylvania is named after William Penn). The epithet of *Carya illinoensis*, the name of an important North American crop (the pecan) whose spelling is just beginning to stabilize after a failed proposal to conserve its orthography 35 years ago, could also be affected. This is just the tip of the iceberg in terms of the destabilizing spelling corrections that might be made to epithets based on, e.g., Uruguay, Venezuela, Maryland, Kentucky, Missouri, etc. Furthermore, how could one determine the “real orthography” of a Chinese name or word? Or what constitutes an “evident intentional latinization under Art. 60.9” (which would be exempt from correction)?

Prop. C suggests two solutions “in cases of doubt” about orthographical errors, presumably as to whether they are correctable under Art. 60.1. This would really be a Note, because both options – proposing an amendment to the *Code* to add a voted Example or proposing a name for conservation with a conserved spelling – would be possible under the current rules. However, it would be very unusual for either an Article or a Note to suggest such an action, and this would set a precedent resulting in an undesirable flood of such proposals.

Prop. D is related to Art. 20 *Prop. B*, which would amend Art. 20.1 to rule that generic names containing orthographical errors are not arbitrarily composed and are correctable under Art. 60.1. *Prop. D* would illustrate this with a new voted Example. It could be a normal Example if Art. 20 *Prop. B* is accepted, although the proposer comments “given the long-standing controversy about this name, it may nonetheless be useful to close the book in this way”.

Prop. E would offer an improved wording for the part of Art. 60.7 that concerns the non-use of diacritical signs in scientific names.

Prop. F is an alternative to *Prop. E*, and would make it clearer that “transcription” entails adding an extra letter, such as in *ä* becoming *ae*, but not in *é* becoming *e*, whereas the wording “necessary transcription” in current Art. 60.7 only implies that transcription does not occur in all cases. *Prop. F* would also specify that certain letters with diacritical signs are to be transcribed only when their usage is Germanic or Scandinavian, which would allow, for example, Turkish *ö* and *ü* to become *o* and *u* and not be transcribed as *oe* and *ue*.

Prop. G is purely editorial and would move the last sentence of Art. 60.7, dealing with two ligatures (*æ* and *œ*), to follow the sentence in Art. 60.4 that also deals with a ligature (*ß*).

Prop. H would be automatically referred to the Editorial Committee.

Prop. I, by adding the epithets *hookeri* and *hookerae* to Art. 60.8 (a), would demonstrate how persons with names ending in *-er*, such as Hooker, are to be honoured with substantival epithets appropriate to their gender. *Prop. I* would also show how more than one person with a name ending in *-a* are to be so honoured. The additions would provide a more inclusive set of examples in the Article.

Prop. J seeks to ensure nomenclatural stability and respect authors’ intent by protecting epithets such as those of *Cephalotaxa harringtonia* and *Syringa josikaea* from inappropriate “correction” under Art. 60.8 to a rarely or never-used spelling, even though they were coined in conformity with classical Latin before the genitive and adjectival forms currently prescribed by the *Code* came into force. The current usage of at least 39 epithets would be preserved (those mentioned by the proposers in *Prop. J* and *K* and others in a list received from D. Mabberley, pers. comm.).

Prop. K seeks to achieve exactly the same goal as *Prop. J* but by means of a voted Example containing a detailed explanation and several names for which the original spelling would be protected. The two proposals are alternatives: while *Prop. J* would provide a more comprehensive solution, *Prop. K* would provide more explanation. If *Prop. J* was preferred, the content of the voted Example of *Prop. K* could be incorporated into the regular Example of *Prop. J*.

Prop. L would provide background information on how substantival and adjectival epithets are formed from personal names ending in a consonant, e.g. *lecardii* from Lecard or *webbiana* from Webb. It seems that one aim of the proposal is to illustrate why, e.g., Lecard is honoured by *lecardii* and not *lecardi*. Although Art. 60.9 and *Ex. 28, 29, 31* and *32* already mention intentional or implicit latinization(s) of non-Latin personal names, making latinization an explicit part of the mechanism of forming epithets under Art. 60.8 appears unnecessary and confusing. The term “stem augmentation” would also be removed from Art. 60.8 but added in parentheses to *Ex. 17* and provided with a detailed definition to the Glossary, which would then define a term that appears once in the *Code*, in an Example, and there only in parentheses so that it could be deleted with little loss of meaning. Some might consider that the revised provisions would be more complex and less understandable than the current wording.

Prop. M would prevent “correction” under Art. 60.8 of an epithet formed from abbreviation of one or more personal names, as compared with an epithet itself indicated as being abbreviated (to which Art. 60.13 and 60.14 apply; see *Prop. AA*). How many such names are affected is unclear, although three are mentioned in the proposed Examples. If there are significantly more, the proposed solution of adding another Article to the *Code* might be considered justifiable.

Prop. N would address perceived issues with the opening sentence of Art. 60.8. The proposer explains these as follows. Firstly, the wording “derived from personal names” could include various epithets that do not and should not accord with Art. 60.8, e.g. names derived from abbreviations of personal names discussed under *Prop. M*. Secondly, the phrase “not already in Greek or Latin and do not possess a well-established latinized form” seems to prevent Art. 60.8 from applying to names like *Martius*, so that while *martiusii* accords with Art. 60.8, as does *martii* because it is formed in accordance with Rec. 60C.1, epithets such as *martiusi* and *martiusiensis* (both mentioned by the proposer, but apparently hypothetical) are not correctable. Thirdly, the phrase “well-established latinized form”

seems to conflict with Art. 60.9, which permits intentional latinization of a personal name, whether well-established or not. However, a disadvantage of the proposed new wording is that it would be much less obvious that epithets formed from Latin or latinized personal names should follow Rec. 60C.1, not Art. 60.8.

Prop. O is purely editorial and is intended to make Art. 60.8 less “uncomfortably long” and to facilitate reference to the final paragraph by making it a separate Article. The proposer suggests that Art. 60.10 could be amended similarly. Moving the final paragraph would not shorten Art. 60.8 significantly, and it would compromise the integrity of the Article, which currently establishes the proper form for terminations of epithets derived from personal names and specifies the remedy if they are not properly formed.

Prop. P would permit the grammatical gender of a substantival epithet commemorating a person to be determined by that person’s preferred gender identity. Should that gender identity be non-binary, the plural form of an epithet would be permitted as an alternative to the singular masculine or feminine form, although “another indicator of grammatical plurality” would still have to accord with Art. 60.8. An alternative for non-binary gender identity could be to coin an adjectival epithet, which would be independent of the gender of the person commemorated.

Prop. Q would provide an improved wording for Art. 60.9, removing redundancies. However, the proposed first sentence, in stating “the spelling of a name or epithet”, appears to also cover new combinations or names at new rank, even though these would not be included because Art. 60.2 defines “original spelling” as being that of the “name of a new taxon or replacement name” at valid publication. A rewording of this sentence would make this clearer: **“The original spelling (Art. 60.2) of a name or epithet is to be retained (Art. 60.1) if it resulted from the intentional latinization of a personal, geographical, or vernacular name.”** Those who favour this rewording should vote “ed.c.”

Prop. R suggests adjustments to Art. 60 Note 5 that might more accurately reflect the relevant provisions. However, the proposer uses “derived from” and “resulting from” to seemingly distinguish the sources for epithets that are Latin translations, perhaps differentiating honorees who used pen names that were Latin translations from those who did not. It is unclear why such a distinction is necessary, but this could be resolved editorially.

Prop. S would be automatically referred to the Editorial Committee.

Prop. T seeks to limit correction under Art. 60.8 and 60.9 to the final part of a compound epithet, when that part is derived from a personal name. As shown in one of the proposed Examples, the spelling of *Qualea hannekesaskiarum* Marc.-Berti, named after Hanneke and Saskia, would have to be corrected to ‘*Q. hannekesaskiae*’ under this proposal. Although the proposer apparently regards such epithets as falling outside Art. 60.8 and 60.9, others might consider that rare cases like these do not justify adding a new Article to the *Code*.

Prop. U would permit compound epithets ending in *-cola*, which are nouns in apposition (Art. 23.5), to be correctable under Art. 60.10, which applies only to adjectival epithets. Instead of adding a new Article to the *Code*, it might be simpler to amend Art. 60.10 by adding **“and substantival epithets ending in *-cola*”** after “Adjectival epithets”. Those supporting this alternative should vote “ed.c.”

Prop. V is an alternative to *Prop. U* and has a more inclusive effect, applying to all compound epithets that end in a noun but “semantically serve as if they were adjectives”, with endings such as *-calyx*, *-cola*, *-cornu* and *-frons* (the only examples mentioned by

the proposer, the vast majority compounded with *-cola*). As with *Prop. U*, a simpler option might be to amend Art. 60.10 accordingly: **“Adjectival epithets (and substantival epithets that semantically serve as if they were adjectives) that combine elements derived from two or more Greek or Latin words are to be compounded as follows:”**. Those supporting this alternative should vote “ed.c.”

Prop. W seeks to make use of a hyphen obligatory in certain circumstances, instead of “permitted”, as at present, for example to *insert* a hyphen in epithets such as that of *Loranthus pseudoodoratus* Lingelsh., which was originally spelled thus. This seems to be the intent of the proposal, although the wording “a hyphen must be used [...] when the letters before and after the hyphen are the same [...]” The absence of such a hyphen is treated as an error to be corrected by insertion of the hyphen” is difficult to understand because, when a hyphen is absent, there are no letters before and after the hyphen, so where must it be inserted? Between any double letter? This issue would require some editorial adjustment. *Prop. W* also attempts to formalize in Art. 60.11 what was added by the Editorial Committee (with hindsight, unwisely) to Art. 60 Ex. 40 and 41 of the *Shenzhen Code*, i.e. the use or non-use of a hyphen in epithets formed from a given name and surname that are separately latinized or not separately latinized, respectively. The *Code* could instead be simplified by deleting *Eunotia roland[-]schmidtii* from Ex. 40 and *Enteromorpha roberti[-]flamii* from Ex. 41. It seems that whether or not a hyphen should be inserted, maintained or deleted is tiresomely confusing for many *Code* users, and one wonders if the use of hyphens should be abolished for all names governed by the *Code*. Database matching and search engine algorithms can easily disregard hyphens anyway. Indeed, Art. 20 *Prop. G* proposes deletion of hyphens in all generic names, and Art. 23 *Prop. D* proposes that hyphens would no longer be permitted in specific (and infraspecific) epithets after 2025.

Prop. X could provide a clearer explanation of when a hyphen is permitted in an epithet and when it is to be deleted, thereby making life easier for *Code* users so long as hyphens are still tolerated. It would clarify that hyphens added after the original publication are never allowed, except when epithets are published as separate words. The second and third sentences both begin with “A hyphen is permitted only when”, which might seem as if they conflict with each other, whereas in fact the third sentence is an additional condition, but this would be clarified by the Editorial Committee if the proposal was accepted.

Prop. Y would introduce a new rule, and cannot therefore be a Note but would have to be a new Article. It seems to parallel the Editorial Committee’s additions to Art. 60 Ex. 40 and 41 (see *Prop. W*), and those who feel that these additions need to be formalized in the *Code*, rather than removed, will presumably support the proposal.

Prop. Z offers a voted Example to permit retention of the hyphen in the epithet of *Peperomia santa-elisae* C. DC., which would otherwise lose its hyphen if *Prop. Y* was accepted. The proposer notes that “it appears to be something of a marginal case”, so perhaps it does not merit an amendment to the *Code*.

Prop. AA would restrict the application of Art. 60.14 to names or epithets that are themselves indicated as abbreviated, e.g. by use of a full stop (period) or other symbol, not any name or epithet that might be formed from one or more abbreviations, e.g. *Silene karekirii* Bocquet (see *Prop. M*).

Recommendation 60 (new)

Prop. A (232 – *Rijckevorsel in Taxon* 72: 459) Add a new Recommendation to Art. 60 (perhaps after Rec. 60A or before, in or after Rec. 60E):

“60(new). In forming names or epithets that are based on personal, geographical, or vernacular names or on other words, in which signs (such as diacritical signs or ligatures) or letters appear that do not belong to the twenty-six letters of the modern Latin alphabet (Art. 32.1(b)), authors should suppress or transcribe these signs or letters in conformity with modern nomenclatural usage (see also Art. 60.4 and 60.7).”

Prop. B (239 – Rijckevorsel in Taxon 72: 461) Add a new Recommendation to Art. 60 supported by an Example:

“60(new1). When dedicating a name to a person, authors should preferably form the new epithet by adding a termination to the personal name (surname, given name, or nickname) as described in Art. 60.8, unless Rec. 60C.1 or 60C.2 applies.”

“*Ex. n.* An epithet such as that in *Verhulstia trisororum* Hern.-Rest. (in Persoonia 39: 449. 2017), dedicated to “the three sisters Jikke, Anoeck and Elke Verhulst, who collected the soil sample from which the fungus was isolated”, while perfectly permissible (and understandable here as it avoids the near-tautonym ‘*Verhulstia verhulstiarum*’), in general is not recommended as it does not signal that it honours persons.”

Prop. C (240 – Rijckevorsel in Taxon 72: 461) Add a new Recommendation to Art. 60:

“60(new2). When forming an epithet from a word derived from a personal name, such as an abbreviation of a personal name, an anagram, its initials, etc., authors should follow the Recommendations made in this *Code* for personal names as far as possible.”

This could be supported by Examples of such cases as mentioned in the introduction [Rijckevorsel, l.c.] or those provided in Prop. 186 [Art. 60 Prop. M].

Rapporteurs’ comments – *Prop. A* is connected to, but not contingent on acceptance of, Art. 60 Prop. E–G, which would amend Art. 60.4 and 60.7 with regard to diacritical signs or ligatures. The proposer offers this new Recommendation because it “is better to prevent misformed names and epithets rather than to correct them afterwards”. It could be argued that current (or amended, see Prop. E–G) Art. 60.4 and 60.7 serve to prevent as well as correct such errors. However, they do not offer guidance in some cases, e.g. is a Turkish *ö* to be transcribed as *oe* or just *o*? Prop. A would recommend conforming with modern nomenclatural usage, assuming this can be determined.

Prop. B seems more to reflect the personal tastes of the proposer than botanical tradition, and seems to restrict creativity in coining eponyms.

Prop. C would recommend, arguably unnecessarily, that *Code* users follow the Recommendations of the *Code* for personal names in forming epithets indirectly derived from personal names.

Article 61

Prop. A (420 – Demoulin in Taxon 72: 1185) Replace Art. 61.1 by the following:

“61.1. For homotypic names, variations in spelling, as well as other cases of variations (compounding or inflectional forms) dealt with in detail in Art. 32, do not represent nomenclatural novelties.”

Prop. B (421 – Demoulin in Taxon 72: 1185) Replace Art. 61.2 by the following:

“61.2. The following adjectival epithets, which are orthographical variants s. str., are to be standardized as indicated (conservation is appropriate for generic names). The list is open to additions approved by an International Botanical Congress in the same manner as voted Examples.”

Prop. C (422 – Demoulin in Taxon 72: 1185) Add to the new Art. 61.2: “*cespitosus* to *caespitosus*”.

Prop. D (423 – Demoulin in Taxon 72: 1185) Add to the new Art. 61.2: “*lacrymans* to *lacrimans*”.

Prop. E (424 – Demoulin in Taxon 72: 1185) Add to the new Art. 61.2: “*pyriformis* to *piriformis*”.

Prop. F (425 – Demoulin in Taxon 72: 1185) Add to the new Art. 61.2: “*sylvestris* to *silvestris*”.

Prop. G (126 – Smith & Figueiredo in Taxon 70: 1396) Add a new Article 61.6 and two Examples:

“61.6. Epithets with the root *caff*[f][e]r-, such as *cafra*, *caffra*, *cafrorum*, and *cafrum*, are not permitted in the nomenclature of organisms covered by this *Code*. Where these epithets were used in validly published names, they are to be treated as orthographical variants that are to be replaced by epithets with the root *af*[e]r-, such as *afra*, *afrorum*, and *afrum*, respectively. If this results in a later homonym, the correct name is determined by Art. 11.4.”

“*Ex. 4.* When the epithet ‘*cafra*’ in *Plantago ‘cafra’* Decne. (in Candolle, Prodr. 13(1): 719. 1852) is replaced by *afra*, *P. afra* Decne. (l.c.), i.e. with retention of author attribution and date and place of publication, is a later homonym of *P. afra* L. (Sp. Pl., ed. 2: 168. 1762) and therefore illegitimate. Under Art. 11.4 the name that has to be adopted is *P. capillaris* E. Mey. ex Decne. (in Candolle, Prodr. 13(1): 719. 1852), which is widely treated as a heterotypic synonym of *P. cafra*.”

“*Ex. 5. Portulaca ‘caffra’* Thunb. (Prodr. Pl. Cap.: [85]. 1800) is to be treated as having been published as *P. afra* Thunb. (l.c.), i.e. with retention of author attribution and date and place of publication. When treated as a species of *Talinum* Adans., the name is *T. afrum* [with one *f*] (Thunb.) Eckl. & Zeyh. (Enum. Pl. Afric. Austral.: 282. 1836).”

Rapporteurs’ comments – *Prop. A* is discussed under Art. 32 Prop. A, which would transfer the current content of Art. 61 to Art. 32. Article 61 Prop. A would create a new Art. 61.1 that simply cross-references the transferred content.

Prop. B–F would introduce a new Art. 61.2 creating a mechanism for standardizing the spelling of some adjectival epithets (“orthographical variants s. str.”) “in the same manner as voted Examples”. Each of Prop. C–F, if separately approved, would standardize the spelling under Art. 61.2 of a single pair of common orthographically variant adjectival epithets.

Prop. G seeks to eliminate the racial offence inherent in epithets such as *cafra*, *caffra* and *cafrorum*, which refer to a region of southern Africa and its inhabitants and derive from a noun that is a racial slur in languages such as Afrikaans, English, Portuguese and Spanish. The proposers have devised a way of neutralizing these epithets by retroactively treating, e.g., *cafra* as an orthographical variant of *afra*, among which only *afra* may be retained (which means African, or of or pertaining to Africa). Some 218 names of vascular plants or bryophytes are involved, of which 56 are in current use according to the proposers (see the Supporting information under the proposal at <https://doi.org/10.1002/tax.12622>); there are also 13 names of algae and 70 names of fungi. Four cases of homonymy would be created by the proposal, but only one of these affects a name in current use (see Ex. 4 in the proposal). The situation addressed appears to be a unique case, in which a whole group of epithets represents a racial slur. Alternatives to Prop. G seem less desirable: the epithets could remain in current use and continue to offend; or the names (at least those in current use) could be dealt with individually by the mechanism proposed under Art. 51 Prop. B and C, Art. 56 Prop. A and

Div. III Prop. T. The latter would entail rejection of the names under Art. 56, which would cause considerably more nomenclatural disruption than merely changing their spelling as proposed by Prop. G. The proposal appears to be compliant with the new formulation for the current content of Art. 61 proposed in Art. 32 Prop. A and Art. 61 Prop. A–F. However, if the latter proposals are rejected, an exception for the new rule of Art. 61 Prop. G would be inserted editorially in Art. 61.1: “except as provided in Art. 60, **61.6**, and F.9”.

Article 62

Prop. A (188 – McNeill & al. in Taxon 71: 1342) Insert a parenthesis at the end of the first sentence of Art. 62.1 to read “(but see Art. 62.2–62.4)” (new text in bold):

“62.1. A generic name retains the gender assigned by nomenclatural tradition, irrespective of classical usage or the author’s original usage (**but see Art. 62.2–62.4**). A generic name without a nomenclatural tradition retains the gender assigned by its author (but see Art. 62.4).”

Prop. B (189 – McNeill & al. in Taxon 71: 1343) Add a new qualifying sentence in Art. 62.2, so that it reads (new text in bold):

“62.2. Compound generic names take the gender of the last word in the nominative case in the compound (but see Art. 14.11). If the termination is altered, however, the gender is altered accordingly. **An exception is made for compounds, with endings other than those listed in (a), (b), or (c), that were classical Latin words and in which tradition has adopted the classical Latin gender of that word even although the gender of the last word differs in the original language (usually Greek). In such cases the classical Latin gender is adopted.**”

The following suggestions exemplify the addition to Art. 62.2:

“*Ex. 6bis.* The classical Latin feminine noun *polygala*, applied to the herb milkwort, was derived from the Greek word with the same meaning, *πολύγαλον* (*polygalon*), itself a compound of *πολύ-* (*poly-*), many, and *γάλα* (*gala*), milk, a neuter noun. Linnaeus (Sp. Pl.: 701–706. 1753) adopted the classical Latin feminine gender for *Polygala* and that is to be maintained.”

“*Ex. 6ter.* The classical gender both of the Latin *onosma* and the original Greek *ὄνοσμα* (*onosma*) is neuter. Linnaeus (Sp. Pl., ed. 2: 196. 1762), in taking up the name for a new genus, treated *Onosma* as feminine; in this he was followed by some botanists but more adopted the classical neuter gender. Because the ending *-osma* is listed in Art. 62.2(b) as feminine, *Onosma* maintains its feminine gender.”

Prop. C (190 – McNeill & al. in Taxon 71: 1343) Make the following additions to Art. 62.2 (a) & (c) (new text in bold):

“(a) Compounds ending in *-botrys*, *-codon*, **-dens**, *-myces*, *-odon*, *-panax*, *-pogon*, *-stemon*, and other masculine words, are masculine.”

“(c) Compounds ending in *-ceras*, *-dendron*, **-derma**, **-doma**, *-nema*, **-sperma**, *-stigma*, *-stoma*, and other neuter words, are neuter.”

Prop. D (191 – McNeill & al. in Taxon 71: 1343) Transfer the ending *-anthes* from Art. 62.4 to Art. 62.2(b) (new text in bold, deleted text in strikethrough):

“62.2. Compound generic names take the gender of the last word in the nominative case in the compound [...]

(b) Compounds ending in *-achne*, **-anthes**, *-chlamys*, *-daphne*, *-glochis*, *-mecon*, *-osma* (the modern transcription of the feminine Greek word *οσμή*, *osmē*), and other feminine words, are feminine. An exception is made in the case of names ending in *-gaster*, which strictly speaking ought to be feminine but are treated as masculine in accordance with tradition.”

“62.4. Generic names ending in ~~*-anthes*~~, ~~*-oides*~~, or ~~*-odes*~~ are treated as feminine and those ending in ~~*-ites*~~ as masculine, irrespective of the gender assigned to them by the original author.”

Rapporteurs’ comments – *Prop. A–D* form a set of proposals from nine members of the General Committee designed to clarify the rules on gender. Prop. A would make it clear by means of a cross-reference that Art. 62.2, 62.3 and 62.4 contain exceptions to the first sentence of Art. 62.1 and that the specific rules in Art. 62 take precedence over the general principle of “nomenclatural tradition”.

Prop. B would make an exception in Art. 62.2 for compound generic names in which the last word has different genders in classical Latin and the original language from which it was derived (mostly ancient Greek), in which case the classical Latin gender would be ruled to prevail. The question could be asked, to how many names would the added sentence of Prop. B apply? If it is only those ending in *-gala* (the only one mentioned by the proposers), and even if there are a few others, would it not be simpler to list the endings in clauses (a), (b) or (c), as appropriate? Of the two Examples proposed, Ex. 6ter does not illustrate the amendment to Art. 62.2, but would nevertheless help explain why earlier authors have treated *Onosma* L. as neuter. If Prop. B is accepted, both Examples would be referred to the Editorial Committee.

Prop. C would add four more word elements to Art. 62.2: *-dens* (masculine) and *-derma*, *-doma* and *-sperma* (neuter). *Bidens* L. has been conserved with feminine gender (see Art. 62 Ex. 7 and App. III), so the first addition would make it clear that other generic names ending in *-dens* are masculine. The other three additions are suggested because the proposers reasonably observe that “[ancient] Greek is becoming increasingly unfamiliar”. The addition of *-doma* would establish that the part of proposal 2577 to conserve feminine gender for *Amphidoma* F. Stein would have been necessary after all, despite the statement to the contrary in the report of the Nomenclature Committee for Algae (Andersen in Taxon 69: 1099. 2020).

Prop. D would appropriately move the word element *-anthes* from Art. 62.4, where it is somewhat obscured because that Article otherwise concerns only suffixes (*-oides*, *-odes* and *-ites*), to Art. 62.2, which concerns words that could stand independently.

Chapter E (new)

Prop. A (192 – Malavasi & Škaloud in Taxon 71: 1344) Add a new Chapter E in Division II:

“1. Authors proposing new names should observe the following principles, which together constitute a Code of Ethics.

2. An author should not publish a new name if he or she has reason to believe that another person has already recognized the same taxon and intends to establish a name for it (or that the taxon is to be named in a posthumous work). An author in such a position should communicate with the other person (or their representatives) and only feel free to establish a new name if that person has failed to do so in a reasonable period (not less than a year).

3. An author should not publish a new replacement name (nomen novum) or other substitute name for a junior homonym when the author of the latter is alive; that author should be informed of the homonymy and be allowed a reasonable time (at least a year) in which to establish a substitute name.

4. No author should propose a name that, to his or her knowledge or reasonable belief, would be likely to give offence on any grounds.

5. Intemperate language should not be used in any discussion or writing which involves nomenclature, and all debates should be conducted in a courteous and friendly manner.

6. Editors and others responsible for the publication of scientific papers should avoid publishing any material which appears to them to contain a breach of the above principles.

7. The observation of these principles is a matter for the proper feelings and conscience of individual scientists, and none of the Permanent Nomenclature Committees (Div. III Prov. 7.1) is empowered to investigate or rule upon alleged breaches of them.”

Rapporteurs’ comments – *Prop. A*, like *Pre. Prop. B* and *C*, would not change the rules themselves but would add a dimension to the *Code* (a “Code of Ethics”) that is not currently present, which users may or may not feel is needed. It is implicit in the wording of paragraphs 1–6 (e.g. the use of “should”) that these new provisions are intended as Recommendations and not rules. Paragraphs 2 and 3 are similar in intent to *Rec. 23A.3(i)* and *Rec. 50G*, while paragraph 4 has similar content to *Art. 51 Prop. A*. Paragraph 7, however, appears to establish a rule that would disempower the proposed Nomenclature Committee on Culturally Offensive or Inappropriate Names, which would be one of the Permanent Nomenclature Committees, if *Art 51 Prop. B* and *C*, *Art. 56 Prop. A* and *Div. III Prop. T* were accepted.

Article H.5

Prop. A (080 – Smith in Taxon 70: 458) Amend *Art. H.5.2* as follows (new text in bold):

“*H.5.2*. If the postulated or known parent taxa are at unequal ranks, the appropriate rank of the nothotaxon is the lowest of these ranks, **unless the nothotaxon is the only one known for hybrids between the species to which the parent taxa of the nothotaxon belong.**”

“*Ex. 3*. *Smith & Figueiredo* published the name *Aloe* $\times$ *engelbrechtii* Gideon F. Sm. & Figueiredo (in *Phytotaxa* 464: 253. 2020) for the nothospecies with parents *A. arborescens* Mill. var. *arborescens* and *A. hardyi* Glen. If a nothotaxon is described between *A. arborescens* var. *mzimnyi* van Jaarsv. & A. E. van Wyk and *A. hardyi*, it will be at the rank of nothovariety and valid publication of its name will establish an autonym that will apply to *A. arborescens* var. *arborescens* $\times$ *A. hardyi*.”

Rapporteurs’ comments – *Prop. A* would solve a problem in naming hybrids between parent taxa at unequal ranks, e.g. between a species and a subspecies, for which the “appropriate rank” of the new nothotaxon would be nothosubspecies. However, so long as no other hybrids between the parent species of a nothospecies are known, the nothospecies cannot be divided into nothosubspecies. In such a case, while a nothospecies name could be correct, under the current rules its rank would be inappropriate; but it would be appropriate with the proposed amendment to *Art. H.5.2*.

Article H.6

Prop. A (283 – Shaw in Taxon 72: 698) Amend *Art. H.6.3* and *Art. H.6.4* to form nothogeneric names when a personal name already ends with *-a* by addition of the modified termination *-ra*, and add to *Ex. 6* and *Ex. 7* (new text in bold):

“*H.6.3*. The nothogeneric name of an intergeneric hybrid derived from four or more genera is formed from the name of a person to which is added the termination *-ara*, **except when the personal name already ends with *-a* in which case the termination *-ra* is added**; no such name may exceed eight syllables. Such a name is equivalent to a condensed formula.”

“*Ex. 6*. $\times$ *Beallara* Moir (in *Orchid Rev.* 78(929): *New Orch. Hybr.* [1, 3]. 1970) **commemorating J. Ferguson Beall** (*Brassia*

R. Br. $\times$ *Cochlioda* Lindl. $\times$ *Miltonia* Lindl. $\times$ *Odontoglossum* Kunth); $\times$ *Cogniauxara* Garay & H. R. Sweet (see *Art. H.8 Ex. 3*) **commemorating Célestin A. Cogniaux** (*Arachnis* Blume $\times$ *Euanthe* Schltr. $\times$ *Renanthera* Lour. $\times$ *Vanda* W. Jones ex R. Br.); $\times$ *Hayataara* J. M. H. Shaw (in *Sander’s List Orchid Hybrids Addendum 2002–2004: xxxv. 2005, ‘Hayataara’*) **commemorating Bunzō Hayata** (*Brassavola* R. Br. $\times$ *Cattleya* Lindl. $\times$ *Laelia* Lindl. $\times$ *Myrmecophila* Rolfe $\times$ *Pseudolaelia* Porto & Brade).”

“*H.6.4*. The nothogeneric name of a trigeneric hybrid is either (a) a condensed formula in which the three names adopted for the parental genera are combined into a single word not exceeding eight syllables, using the whole or first part of one, followed by the whole or any part of another, followed by the whole or last part of the third (but not the whole of all three) and, optionally, one or two connecting vowels, or (b) a name formed like that of a nothogenus derived from four or more genera, i.e. from a personal name to which is added the termination *-ara*, **except when the personal name already ends with *-a* in which case the termination *-ra* is added.**”

“*Ex. 7*. $\times$ *Sophrolaeliocattleya* Hurst (in *J. Roy. Hort. Soc.* 21: 468. 1898) (*Cattleya* Lindl. $\times$ *Laelia* Lindl. $\times$ *Sophranitis* Lindl.); $\times$ *Rodrettiopsis* Moir (in *Orchid Rev.* 84: ix. 1976) (*Comparettia* Poepp. & Endl. $\times$ *Ionopsis* Kunth $\times$ *Rodriguezia* Ruiz & Pav.); $\times$ *Holtumara* Holtum (see *Art. H.8 Ex. 3*) **commemorating Richard E. Holtum** (*Arachnis* Blume $\times$ *Renanthera* Lour. $\times$ *Vanda* W. Jones ex R. Br.); $\times$ *Kagawara* Kagawa & Wreford (*Orchid Rev.* 76: *New Orch. Hybr.* [2, 4]. 1968) **commemorating Hiroshi Kagawa** (*Ascocentrum* J. J. Sm. $\times$ *Renanthera* Lour. $\times$ *Vanda* R. Br.).”

Prop. B (081 – Wiersema & al. in Taxon 70: 459) Add a new Article under *Art. H.6*:

“*H.6.n*. The use of a hyphen instead of or in addition to a connecting vowel in a nothogeneric name that is a condensed formula is treated as an error to be corrected by deletion of the hyphen(s) (but see *Art. 20.3* for non-hybrid generic names; see also *Art. 60.12* for names of fossil-genera).”

Consequently amend *Art. H.6.2* as follows (deleted text in strikethrough):

“*H.6.2*. The nothogeneric name of a bigeneric hybrid is a condensed formula in which the names adopted for the parental genera are combined into a single word, using the first part or the whole of one, the last part or the whole of the other (but not the whole of both) and, optionally, a connecting vowel. ~~The use of a hyphen instead of or in addition to a connecting vowel is treated as an error to be corrected by deletion of the hyphen.~~”

Prop. C (082 – Wiersema & al. in Taxon 70: 459) Amend *Art. H.6 Ex. 5* as follows (new text in bold, deleted text in strikethrough) and place it after the new *Art. H.6.n*:

“*Ex. n*. The nothogeneric name $\times$ *Anthemetricaria* Asch. (in *Ber. Deutsch. Bot. Ges.* 9: (99). 1892), proposed for **bigeneric** hybrids with the parentage *Anthemis* L. $\times$ *Matricaria* L., was originally published as ‘*Anthe-Matricaria*’; ~~the nothogeneric name~~ $\times$ *Brassocattleya* Rolfe (in *Gard. Chron.*, ser. 3, 5: 438. 1889), proposed for **bigeneric** hybrids with the parentage *Brassavola* R. Br. $\times$ *Cattleya* Lindl., was originally published as ‘*Brasso-Cattleya*’; $\times$ *Brassolaeliacattleya* J. G. Fowler (in *Gard. Chron.*, ser. 3, 41: 290. 1907), proposed for trigeneric hybrids with the parentage *Brassavola* R. Br. $\times$ *Cattleya* Lindl. $\times$ *Laelia* Lindl., was originally published as ‘*Brasso-Laelia-Cattleya*’; $\times$ *Sophrolaeliocattleya* Hurst (in *J. Roy. Hort. Soc.* 21: 468. 1898), proposed for trigeneric hybrids with the parentage *Cattleya* Lindl. $\times$ *Laelia* Lindl. $\times$

Sophronitis Lindl., was originally published as ‘*Sophr-Laeliocattleya*’.”

Consequently amend Art. H.6 Ex. 7 as follows (deleted text in strikethrough):

“Ex. 7. ~~×*Sophr-Laeliocattleya* Hurst (in J. Roy. Hort. Soc. 21: 468. 1898) (*Cattleya* Lindl. × *Laelia* Lindl. × *Sophronitis* Lindl.);~~ ×*Rodrethiopsis* Moir (in Orchid Rev. 84: ix. 1976) (*Comparettia* Poepp. & Endl. × *Ionopsis* Kunth × *Rodriguezia* Ruiz & Pav.); ×*Holtumara* Holtum (see Art. H.8 Ex. 3) (*Arachnis* Blume × *Renanthera* Lour. × *Vanda* W. Jones ex R. Br.).”

Rapporteurs’ comments – Prop. A would prevent nothogeneric names ending in *-ara* that commemorate persons whose names end in *-a* from being inappropriately rendered as *-aara*, e.g. ‘*Hayataara*’ from Bunzô Hayata.

Prop. B would address an issue with nothogeneric names that are condensed formulas, in which under Art. H.6.2 the use of a hyphen is treated as an error to be corrected by its deletion. However, because this appears only in the last sentence of Art. H.6.2, it applies only to names of bigeneric hybrids and not to those of trigeneric hybrids, which are treated under Art. H.6.4. By converting the last sentence of Art. H.6.2 into a separate Article, it will apply to all nothogeneric names that are condensed formulas. Without this amendment, names such as ×*Brassolaeliacattleya* J.G. Fowler and ×*Sophr-Laeliocattleya* Hurst, originally published with hyphens, would not be validly published because Art. 32.1(c) requires them to have a form that complies with Art. H.6.

Prop. C is dependent on the acceptance of Prop. B and, because it concerns Examples, would be automatically referred to the Editorial Committee.

Article H.9

Prop. A (284 – Krieger & Govaerts in *Taxon* 72: 699) Add a new Note after Art. H.9.1:

“Note *Ibis*. A statement of the names of the parent species of a nothogenus, or of the names of the parent species of any of its included taxa, is sufficient to validly publish the name of a nothogenus, if the full names of all parent genera appear among the species names, when there is no separate statement of the names of the parent genera.”

Rapporteurs’ comments – Prop. A would provide a Note making it explicit that the “statement of the names of the parent genera”, required by Art. H.9.1 for the name of a nothogenus to be validly published, could be achieved by a statement of the names of species in those parent genera.

Article H.11

Prop. A (241 – Mosyakin & McNeill in *Taxon* 72: 462) Amend Art. H.11.1 as follows (new text in bold) and add a footnote and a new Example:

“H.11.1. The name of a nothospecies of which the postulated or known parent species belong to different genera is **either** a combination of a nothogeneric name with a nothospecific epithet **or a combination of a name of a hybridogenous genus¹ with a nothospecific epithet.**”

[footnote] ¹For the purposes of this *Code*, a hybridogenous genus is a genus that is derived from and has evolved from an intergeneric hybridization event or events and that contains one or more hybridogenous species, i.e. evolutionarily stabilized species that, although of hybrid origin, are regularly treated similarly to other species of non-hybrid origin; however, a hybridogenous genus may also contain hybrids (including intergeneric ones).”

“Ex. *Ibis*. *Majovskya* × *ambigua* (Decne.) Sennikov & Kurtto (in Memoranda Soc. Fauna Fl. Fenn. 93: 63. 2017) is considered to have originated from the cross between *Chamaespilus alpina* (Mill.) K. R. Robertson & J. B. Phipps and *Aria edulis* (Willd.) M. Roem. Sennikov & Kurtto (l.c.) treated it as a non-stabilized intergeneric hybrid (for which, however, the correct name is ×*Chamaeria ambigua* (Decne.) Mosyakin & McNeill in *Taxon* 72: 462. 2023) but placed it in a hybridogenous genus. Despite that, their combination is considered correct and acceptable under certain taxonomic treatments, e.g. if all crosses between *Chamaespilus* Medik. × *Aria* (Pers.) Host are treated as belonging to a hybridogenous genus but not a nothogenus.”

If our proposed amendment is adopted, the definitions of a hybridogenous genus and a hybridogenous species should be added to the Glossary.

Rapporteurs’ comments – Prop. A seeks to differentiate between a nothogenus and a hybridogenous genus and to provide a definition of the latter. The proposers argue that, at present, Art. H.11.1 “requires the double generic nomenclature, with different nothogeneric and generic names for nothospecies and hybridogenous species, respectively, that resulted from the same intergeneric crosses.” The proposed amendments would presumably allow a nothospecific epithet to be combined with either a hybridogenous generic name validly published with a description or diagnosis (and a type) or a nothogeneric name validly published with only a statement of parentage. Although new Ex. *Ibis* would appear to preclude authors from publishing nothospecies names under both hybridogenous generic and nothogeneric names simultaneously, the proposed wording of the Article does not address this. This may require further clarification at the Nomenclature Section. In combination with this proposal, it would seem advisable to clarify, perhaps in a Note under Art. H.9, that hybridogenous generic names, unlike nothogeneric names, are subject to the same provisions of the *Code* as generic names. Such a Note could read: “**The name of a hybridogenous genus (Art. 11.1 footnote) is subject to the same provisions of this Code as the name of a genus; it is not the name of a nothogenus.**” Those who support the proposal together with this additional Note should vote “ed.c.”

Division III

Prop. A (052 – Rijkvorschel in *Taxon* 70: 448) Add a new Provision following Prov. 1.4:

“1.5. The provisions for governance of the *Code* (Div. III) apply to the edition of the *Code* of which they form a part: they are not retroactive.”

If Prop. 051 [Pre. Prop. A] is accepted this will be redundant, but it is a useful redundancy: Pre. 7 is not the place where the reader will necessarily look first for something like this. Another option would be to add a Note, referring to the amended Pre. 7.

Prop. B (285 – Turland in *Taxon* 72: 700) Amend Div. III Prov. 2.1 as follows (new text in bold, deleted text in strikethrough), add a new Prov. 2.1bis and delete Prov. 5.6:

“2.1. Proposals concerning the Preamble, **and** Divisions I–III, **and the Glossary (but see Prov. 2.1bis)** are submitted by publication (see Prov. 1.4) to the Nomenclature Section of an International Botanical Congress.”

“2.1bis. Proposals that concern only Examples (excluding voted Examples) or the Glossary are submitted via the Rapporteur and Vice-rapporteur, without publication, to the Editorial Committee, which will consider them and act in accordance with Prov. 7.11.”

~~“5.6. Any proposal to amend the Code that concerns only Examples (excluding voted Examples) or the Glossary is automatically referred to the Editorial Committee unless a proposal to discuss it is moved by a member of the Section and supported (seconded) by five other members (but see Prov. 5.5).”~~

Prop. C (286 – Ulloa Ulloa & al. in Taxon 72: 702) Amend Div. III Prov. 3 and 5.9 as follows (new text in bold, deleted text in strikethrough):

“3.1. Prior to an International Botanical Congress, the Committee on Institutional Votes updates the list of institutions from the previous Congress and allocates **one vote** to each institution ~~one to seven votes~~ (see Prov. 5.9(b)). The list must be approved by the General Committee and published (see Prov. 1.4) prior to the Congress. No single institution, even in the wide sense of the term (e.g. mycological and botanical divisions together), is entitled to more than ~~seven votes~~ **one vote.**”

“3.2. Prior to an International Botanical Congress, any institution desiring to vote in the Nomenclature Section and not listed as having been allocated ~~any votes~~ **a vote** in the previous Nomenclature Section should notify the Rapporteur-général of its wish to be allocated ~~one or more votes~~ **a vote** and provide relevant information regarding its level of taxonomic activity (e.g. number of active staff, size of collections, current publications). ~~An institution allocated one or more votes in the previous Nomenclature Section and desiring to alter its number of votes may similarly notify the Rapporteur-général.~~”

“3.3. An institution wishing to exercise its ~~vote(s)~~ **vote**, as allocated in the published list (Prov. 3.1), must provide its official written authorization to be presented at the Nomenclature Section by its delegate (Prov. 5.9(b)).”

“3.4. A delegate who is a member of an institution that has not previously applied for, or been allocated, ~~votes~~ **a vote** may apply in person for one institutional vote at the Nomenclature Section.”

“5.9. There are two kinds of votes at the Nomenclature Section:

(a) Personal votes. Each member of the Section has one personal vote. No accumulation or transfer of personal votes is permissible.

(b) Institutional votes (see Prov. 3). An institution may authorize in writing any member of the Section as a delegate to carry its ~~votes~~ **one institutional vote.**

No single person will be allowed more than 15 votes, including personal vote and institutional votes.”

Prop. D (287 – Ulloa Ulloa & al. in Taxon 72: 703) Amend Div. III Prov. 3.2 as follows (new text in bold):

“3.2. Prior to an International Botanical Congress, any institution desiring to vote in the Nomenclature Section and not listed as having been allocated any votes in the previous Nomenclature Section should notify the Rapporteur-général of its wish to be allocated one or more votes and provide relevant information regarding its level of taxonomic activity (e.g. number of active staff, size of collections, current publications) **and show that it is registered in an online, open-access international or regional index of herbaria, collections, or institutions.** An institution allocated one or more votes in the previous Nomenclature Section and desiring to alter its number of votes may similarly notify the Rapporteur-général.”

Prop. E (288 – Ulloa Ulloa & al. in Taxon 72: 703) Amend Div. III Prov. 3.3 as follows (new text in bold):

“3.3. An institution wishing to exercise its vote(s), as allocated in the published list (Prov. 3.1), must provide its official written authorization **on the institution’s letterhead** to be presented at the Nomenclature Section by its delegate (Prov. 5.9(b)).”

Prop. F (432 – Turland & Wiersema in Taxon 72: 1187) Amend Div. III Prov. 4.5 and 4.10 as follows (new text in bold, deleted text in strikethrough):

“4.5. The Bureau of Nomenclature of the International Botanical Congress comprises the following officers: President of the Nomenclature Section; up to five Vice-presidents; the Rapporteur-général; the Vice-rapporteur; ~~the Recorder~~ **one or more Recorders**. The Bureau of Nomenclature defines the sequence and timing of debates; appoints Tellers to collect and count voting cards in the event of a card vote (see Prov. 5.10); and advises the President on procedural matters.”

“4.10. ~~The Recorder is~~ **Recorders are** appointed by the Organizing Committee of the International Botanical Congress in consultation with the Rapporteur-général. ~~The Recorder is~~ **Recorders are** responsible for all local facilities needed by the Nomenclature Section, such as the venue and its equipment, and in particular for the detailed recording of the proceedings of the Section and for facilitating the voting.”

Prop. G (290 – May & al. in Taxon 72: 704) Amend Div. III Prov. 4.12 and 4.13 as follows (new text in bold):

“4.12. The Nominating Committee is charged with preparing lists of candidates to serve on the Permanent Nomenclature Committees (with the exception of the Nomenclature Committee for Fungi **and the Editorial Committee for Fungi**; see Prov. 4.13), in consultation with the current secretaries of those committees, and to propose the Rapporteur-général for the next International Botanical Congress. The nominations of the Nominating Committee are subject to approval by the Nomenclature Section.”

“4.13. The Nominating Committee of the Fungal Nomenclature Session (Prov. 8.1) is charged with preparing lists of candidates **(a)** to serve on the Nomenclature Committee for Fungi, in consultation with the current Secretary of that Committee, **and (b) to serve on the Editorial Committee for Fungi**; and to propose the Secretary of the Fungal Nomenclature Bureau for the next International Mycological Congress. The nominations of the Nominating Committee of the Fungal Nomenclature Session are subject to approval by the Fungal Nomenclature Session.”

Prop. H (127 – Landrum & al. in Taxon 70: 1397) Add a new Provision to Div. III Prov. 4:

“4.new1. Interested individuals or groups are to be able to observe the Nomenclature Section of an International Botanical Congress online on the World Wide Web. The Organizing Committee of the International Botanical Congress in consultation with the Bureau of Nomenclature are together responsible for ensuring that this is implemented.”

Prop. I (128 – Landrum & al. in Taxon 70: 1397) Add a new Provision to Div. III Prov. 4:

“4.new2. Individuals or groups without voting rights observing the Nomenclature Section online on the World Wide Web will not be charged for this service, or a small fee will be set at the discretion of the Organizing Committee of the International Botanical Congress in consultation with the Bureau of Nomenclature.”

Prop. J (129 – Landrum & al. in Taxon 70: 1398) Add a new Provision to Div. III Prov. 4:

“4.new3. Registered members of the Nomenclature Section (with voting rights) attending online on the World Wide Web (online members) will pay fees similar to those that they would pay if they attended in person.”

Prop. K (130 – Landrum & al. in Taxon 70: 1398) Add a new Provision to Div. III Prov. 4:

“4.new4. Individuals desiring to be online members of the Nomenclature Section will register their intention to participate in advance of the Nomenclature Section, by a date to be determined by the Organizing Committee of the International Botanical Congress in consultation with the Bureau of Nomenclature.”

Prop. L (193 – Smith & al. in Taxon 71: 1345) Amend Div. III Prov. 5 by rewording the current Prov. 5.1, 5.2, and 5.4 as follows (new text in bold, deleted text in strikethrough):

“5.1. A qualified majority (at least 60%) of votes cast is required for the following decisions:

~~(e) rejecting a singled out recommendation of the General Committee (see Prov. 5.3);~~

~~(f) rejecting one or more recommendations of the General Committee on conservation, protection, or rejection of names, suppression of works, or binding decisions.”~~

“5.2. A simple majority (more than 50%) of votes cast is required for all other decisions, including the following:

~~(g) accepting recommendations of the General Committee not included in Prov. 5.1(e) or (f);”~~

“5.4. When a vote to ~~reject~~ **accept** a General Committee recommendation ~~achieves~~ **does not achieve** the required majority (Prov. ~~5.1(e) or (f)~~ **5.2(g)**), that recommendation is cancelled and the matter is referred back to the General Committee. Retention or rejection of a name or suppression of a work is no longer authorized (Art. 14.15, 56.3, and 34.2).”

Prop. M (220 – Prado & al. in Taxon 72: 454) Amend Div. III Prov. 5.4 (new text in bold, deleted text in strikethrough):

“5.4. When a vote to reject a General Committee recommendation achieves the required majority (Prov. 5.1(e) or (f)), that recommendation is cancelled and the matter is referred back to the General Committee. Retention or rejection of a name ~~or~~ suppression of a work, **or a binding decision on valid publication or homonymy** is no longer authorized (Art. 14.15, 56.3, ~~and~~ 34.2, **38.4, and 53.4**).”

Prop. N (289 – Ulloa Ulloa & al. in Taxon 72: 703) Amend the final sentence of Div. III Prov. 5.9 as follows (new text in bold):

“5.9. [...] **A member of the Section may carry the institutional votes of more than one institution.** No single person will be allowed more than 15 votes, including personal vote and institutional votes.”

Prop. O (131 – Landrum & al. in Taxon 70: 1398) Add a new Provision to Div. III Prov. 5:

“5.new1. Online members of the Nomenclature Section may accumulate and cast institutional votes just as in-person members (see Prov. 5.9(b)).”

Prop. P (132 – Landrum & al. in Taxon 70: 1398) Add a new Recommendation to Div. III Prov. 5:

“*Recommendation 1.* The Nomenclature Section should take place in a country and place where broadcasting the Nomenclature Section on the web is possible and allowed.”

Prop. Q (133 – Landrum & al. in Taxon 70: 1398) Add a new Recommendation to Div. III Prov. 5:

“*Recommendation 2.* Local groups of non-voting observers, and members (online and in-person), of the Nomenclature Section are encouraged to meet together before and during the Section to facilitate discussion of proposals, including the results of the preliminary guiding vote (see Prov. 2.5).”

Prop. R (134 – Landrum & al. in Taxon 70: 1398) Add a new Recommendation to Div. III Prov. 5:

“*Recommendation 3.* When proposals or amendments to proposals are introduced during the Nomenclature Section without

having been published beforehand, voting on them should be delayed, to alert members (online and in-person) who may not be present for the whole Section.”

Prop. S (135 – Landrum & al. in Taxon 70: 1398) Add a new Recommendation to Div. III Prov. 5:

“*Recommendation 4.* Written recognition for participation in the Nomenclature Section should be provided to members (online and in-person) by the Organizing Committee of the International Botanical Congress.”

Prop. T (122 – Hammer & Thiele in Taxon 70: 1393) Amend Div. III Prov. 7.1 as follows (new text in bold, deleted text in strikethrough):

“7.1. There are ~~nine~~ **ten** Permanent Nomenclature Committees, including ~~five~~ **six** specialist committees (clauses (e)–~~(j)~~ **(i)**):

[...]

(j) Nomenclature Committee on Culturally Offensive or Inappropriate Names.”

Consequent editorial amendments:

In Art. 56.2 change “specialist committees for the various taxonomic groups” to “appropriate specialist committee”.

In Art. 56.3 change “specialist committee for the taxonomic group concerned” to “appropriate specialist committee”.

In Div. III Prov. 7.3 and 7.10 change “five specialist committees” to “six specialist committees”.

Prop. U (291 – May & al. in Taxon 72: 704) Amend Div. III Prov. 7.1 as follows (new text in bold, deleted text in strikethrough) and add two new provisions:

“7.1. There are ~~nine~~ **ten** Permanent Nomenclature Committees, including five specialist committees (clauses ~~(ef)~~–**(ij)**):

(a) General Committee;

(b) Editorial Committee;

(c) Editorial Committee for Fungi;

~~(ed)~~ Committee on Institutional Votes;

~~(de)~~ Registration Committee;

~~(ef)~~ Nomenclature Committee for Vascular Plants;

~~(fg)~~ Nomenclature Committee for Bryophytes;

~~(gh)~~ Nomenclature Committee for Fungi;

~~(hi)~~ Nomenclature Committee for Algae;

(ij) Nomenclature Committee for Fossils.”

“7.4bis. The Editorial Committee for Fungi is elected by an International Mycological Congress and comprises individuals who should preferably have been present at the Fungal Nomenclature Session of the relevant International Mycological Congress and includes the Secretary of the Editorial Committee for this *Code*. The Secretary and Deputy Secretary of the Fungal Nomenclature Session of the relevant International Mycological Congress serve as Chair and Secretary, respectively, of the Editorial Committee for Fungi.” [Based on existing Prov. 7.4]

Renumber existing Prov. 7.5–7.11 accordingly.

“7.11bis. The Editorial Committee for Fungi is charged with the preparation and publication of Chapter F in conformity with the decisions approved by the relevant International Mycological Congress. It is empowered to make the editorial modifications specified in Prov. 7.11.” [Based on existing Prov. 7.11]

Renumber existing Prov. 7.12–7.15 accordingly.

Prop. V (433 – Turland & Wiersema in Taxon 72: 1188) Amend Div. III Prov. 7.5 as follows (new text in bold):

“7.5. The Committee on Institutional Votes comprises six members, each to represent a different continent, plus the Rapporteur-général, who serves as its chair, **plus any additional members that the Committee considers are required.**”

Prop. W (161 – Smith in Taxon 71: 713) Add a new phrase at the end of the final sentence of Div. III Prov. 7.9 (new text in bold, deleted text in strikethrough):

“7.9. [...] The General Committee may also communicate an international standard format in addition to, or as a successor to, Portable Document Format (PDF) for effective publication of electronic material (Art. 29.3), ~~and~~ is empowered to ratify a list of institutional votes drawn up by the Committee on Institutional Votes (see Prov. 3.1), **and is authorized to appoint, as needed, Special-purpose Committees between International Botanical or Mycological Congresses.**”

Prop. X (338 – Thiele & al. in Taxon 72: 1145) Amend Div. III Prov. 7.9 as follows (new text in bold, deleted text in strikethrough):

“7.9. The General Committee is charged with: (a) receiving proposals to conserve, protect, or reject names, proposals to suppress works, and requests for decisions (Art. 14.12, F.2.1, 56.2, F.7.1, 34.1, 38.4, and 53.4) and ~~for~~ referring these proposals or requests to the specialist committee(s) concerned (receipt and referral of proposals and requests are automatic upon their publication). ~~The General Committee is also charged with;~~ (b) considering recommendations of the specialist committees and either approving or overturning those recommendations or referring them back to the specialist committees for further consideration; (c) **maintaining a list of approved repositories for storing sequences and issuing sequence identifiers; and (d) maintaining a list of approved journals for valid publication of names with DNA sequences as types (Art. X.1 and X.2).** The General Committee may also communicate an international standard format in addition to, or as a successor to, Portable Document Format (PDF) for effective publication of electronic material (Art. 29.3) and is empowered to ratify a list of institutional votes drawn up by the Committee on Institutional Votes (see Prov. 3.1).”

Prop. Y (348 – Thiele & al. in Taxon 72: 1148) Amend Div. III Prov. 7.9 as follows (new text in bold, deleted text in strikethrough):

“7.9. The General Committee is charged with: (a) receiving proposals to conserve, protect, or reject names, proposals to suppress works, and requests for decisions (Art. 14.12, F.2.1, 56.2, F.7.1, 34.1, 38.4, and 53.4) and ~~for~~ referring these proposals or requests to the specialist committee(s) concerned (receipt and referral of proposals and requests are automatic upon their publication). ~~The General Committee is also charged with;~~ (b) considering recommendations of the specialist committees and either approving or overturning those recommendations or referring them back to the specialist committees for further consideration; (c) **maintaining a list of approved repositories for storing sequences and issuing sequence identifiers; and (d) maintaining a list of approved journals for valid publication of names with reference DNA sequences (Art. X.8 and X.9).** The General Committee may also communicate an international standard format in addition to, or as a successor to, Portable Document Format (PDF) for effective publication of electronic material (Art. 29.3) and is empowered to ratify a list of institutional votes drawn up by the Committee on Institutional Votes (see Prov. 3.1).”

Prop. Z (364 – Wisnev in Taxon 72: 1157) Amend Div. III Prov. 7.11 as follows (new text in bold):

“7.11. The Editorial Committee is charged with the preparation and publication of the *Code* in conformity with the decisions approved by the relevant International Botanical Congress. It is empowered to make any editorial modification not affecting the meaning of the provisions concerned, e.g. to change the wording of any Article,

Note, or Recommendation and to avoid duplication, to add or remove non-voted Examples, and to place Articles, Notes, Recommendations, and Chapters of the *Code* in the most convenient place, while retaining the previous numbering insofar as possible. **The Editorial Committee shall prepare and publish online a document noting all changes added editorially.**”

Prop. AA (292 – May & al. in Taxon 72: 705) Amend Div. III Prov. 8.1 as follows (new text in bold, deleted text in strikethrough):

“8.1. For proposals relating to the content of Chapter F, which brings together the provisions of this *Code* that deal solely with names of organisms treated as fungi (but excluding any other content), exactly the same procedures outlined in Prov. 1–7 are to be followed except that in Prov. 1, 2, 4, and 5 mentions of International Botanical Congress, Nomenclature Section [of that Congress], Bureau of Nomenclature, ~~and~~ Nominating Committee, **and Editorial Committee** are to be replaced by International Mycological Congress, Fungal Nomenclature Session [of that Congress], Fungal Nomenclature Bureau, ~~and~~ Nominating Committee of the Fungal Nomenclature Session, **and Editorial Committee for Fungi**, respectively; and officers such as President, Rapporteur-général, and Vice-rapporteur (these specifically renamed Chair, Secretary, and Deputy Secretary, respectively) are to be understood as members of the Fungal Nomenclature Bureau rather than the Bureau of Nomenclature (specifically in Prov. 1.1, 1.2, 1.4 footnote, 2.1, 2.3, 2.4, 2.6, 4.2, 4.4, 4.5, 4.7, 4.8, 4.10, 4.11, **5.1**, 5.2, 5.5, 5.6, 5.7, and 5.8; but not in Prov. 5.3 and 5.4; and the following clauses do not apply: Prov. 5.1(e) and (f) and Prov. 5.2(g)). **See also Prov. 4.12, 4.13, 7.1, 7.4bis, and 7.11bis.**”

Prop. BB (293 – May & al. in Taxon 72: 705) Amend Div. III Prov. 8.5 as follows (new text in bold, deleted text in strikethrough):

“8.5. The Fungal Nomenclature Session has the following functions:

[...]

(e) elects the ordinary members of the Nomenclature Committee for Fungi;

(f) elects the ordinary members of the Editorial Committee for Fungi;

(fg) elects the Secretary of the Fungal Nomenclature Bureau for the next International Mycological Congress;

(gh) receives reports of Special-purpose Committees dealing with matters relating solely to names of organisms treated as fungi.”

Prop. CC (295 – May & al. in Taxon 72: 705) Amend Div. III Prov. 8.7 as follows (new text in bold, deleted text in strikethrough):

“8.7. In the Fungal Nomenclature Bureau, the Deputy Secretary is appointed by the Secretary and approved by the Nomenclature Committee for Fungi in consultation with the General Committee no later than ~~three~~ **two** years prior to the International Mycological Congress. The Deputy Secretary assists and, if necessary, serves in place of the Secretary.”

Prop. DD (294 – May & al. in Taxon 72: 705) Amend Div. III Prov. 8.10 and 8.11 as follows (new text in bold, deleted text in strikethrough):

“8.10. The decisions taken at the Fungal Nomenclature Session of an International Mycological Congress relating solely to names of organisms treated as fungi, once accepted by a subsequent plenary session of the same Congress, are binding on the Nomenclature Section convened at the subsequent International Botanical Congress. Such decisions will, however, be open for any editorial adjustments deemed necessary by **the Editorial Committee for Fungi after consultation with the Editorial Committee for this Code.**”

“8.11. Certain publications, which may be electronic or printed or both, appear as soon as feasible after an International Mycological Congress, not necessarily in this sequence:

(a) the Congress-approved decisions and elections of the Fungal Nomenclature Session including the results of the preliminary guiding vote;

(b) the announcement of Special-purpose Committees and their membership;

(c) **the new edition of Chapter F of this Code;**

(d) a transcript of the Fungal Nomenclature Session.”

Rapporteurs’ comments – *Prop. A*, as noted by the proposer, “will be redundant, but it is a useful redundancy” if *Pre. Prop. A* is accepted.

Prop. B seeks to streamline proposals to amend the *Code* that concern only non-voted Examples or the Glossary. Currently, under Prov. 5.6, such proposals are automatically referred at the Nomenclature Section to the Editorial Committee (unless a separate proposal to discuss them is approved). *Prop. B* would stipulate that any such proposals be submitted without publication in *Taxon* or discussion at the Nomenclature Section directly to the Editorial Committee, an option that is already allowed. Proposals to amend Examples in Chapter F or fungal entries in the Glossary could be handled similarly under Prov. 8.1 (see *Prop. AA*).

Prop. C, from the Committee on Institutional Votes, would establish a fairer global distribution of institutional votes by allocating one vote to each institution. Currently, larger institutions, with up to 7 votes, retain more overall influence, and they can achieve a double advantage if they have the resources to send staff, each with one personal vote, to the Nomenclature Section. *Prop. C* would better empower institutions in Africa, Asia, and Latin America and the Caribbean by providing them with a slightly higher percentage of institutional votes worldwide, whereas Europe and Australasia and the Pacific would have a lower percentage and northern America would stay the same as currently (see Table 1 in the proposal). The impact of greater attendance at the Nomenclature Section by members from the host country is reduced by institutional votes, and this would continue to be the case if *Prop. C* is accepted (Table 2 in the proposal). The Committee analysed the card votes at the Melbourne and Shenzhen Congresses and found that in no case would the outcome have been different had each institution been allocated one vote (see Table S1 in the Supporting information for the proposal at <https://doi.org/10.1002/tax.12959>).

Prop. D would add a condition to institutions applying for institutional votes for the first time, i.e. they would need to be registered in an international or regional index. In practice, this is already the case and was requested by the Committee on Institutional Votes. All institutions applying for a vote at the Madrid Congress were already registered in Index Herbariorum (IH). Nevertheless, it is unclear how institutions lacking herbaria and/or collections and therefore not indexed in IH might fare under this provision.

Prop. E would require an institution to use its letterhead when providing written authorization for its delegate to exercise its institutional vote(s). The purpose would be to enable the officers at the Nomenclature Section to recognize written authorization as “official”, as required by Prov. 3.3. At previous Congresses, the written authorization was a letter from the Rapporteurs sent to the institution including a form that the institution filled out with the name of the delegate. Most institutions’ delegates presented this form at the Nomenclature Section, although some did not, and it is the latter group that *Prop. E* addresses, although the additional requirement would render the

form by itself no longer sufficient. *Prop. E* is therefore perhaps too prescriptive.

Prop. F is a housekeeping proposal and would remove any implication that there may be only one Recorder at the Nomenclature Section, whereas in Shenzhen there were two, and there will again be two in Madrid.

Prop. G, together with *Prop. U*, *AA*, *BB* and *DD*, would establish a new Permanent Nomenclature Committee, i.e. the Editorial Committee for Fungi, which would be responsible for Chapter F in the same way that the Editorial Committee is responsible for the whole *Code*. After the 2018 San Juan International Mycological Congress (IMC), the new San Juan Chapter F was prepared by an ad hoc committee in consultation with the Editorial Committee with three members in common. These proposals formally define the membership and functions of the new Committee, elected by each IMC, as being parallel to those of the Editorial Committee. The new Committee is required to work in consultation with the Editorial Committee and to include its Secretary, i.e. the Vice-rapporteur of the relevant International Botanical Congress (Prov. 7.4). Because the Rapporteur-général (Chair of the Editorial Committee) is invited to attend the IMC (Prov. 8.8), it might be better if the Editorial Committee for Fungi included the Chair as well as the Secretary of the Editorial Committee. This requirement for consultation and to have at least one member in common will be important in maintaining the integrity of the *Code* whenever new editions of the *Code* or only Chapter F are prepared. The Nomenclature Committee for Fungi supports *Prop. G*, *U* and *AA–DD* (votes 14 : 1 : 0, including *Prop. CC*, see comments there).

Prop. H, together with *Prop. I–K* and *O–S*, comes from the Special-purpose Committee on Virtual Participation in the Nomenclature Section (NS). The Committee acknowledges that “virtual or online participation in the NS [...] can only be accepted [...] after its feasibility has been proven” and proposes that “a trial be conducted at the NS” and that the proposals “can be considered near the end of the NS if the trial proves successful”. *Prop. H* would require the Section to be live-streamed on the internet, so that it could at least be observed, while *Prop. J* and *O* assume that registered members would have voting rights, and *Prop. K* would actually entitle those online members to vote. Depending on the location of the Congress, live-streaming the Section would usually be feasible. Indeed, the Organizing Committee of the Madrid Congress is planning to do exactly this (see Knapp & al. in *Taxon*: <https://doi.org/10.1002/tax.13127>). However, online commenting and voting could considerably increase the time needed for debates, which could cause the Section to overrun its normally allocated five days. Online voting has further issues. The software required would not be the kind used for online elections or opinion polls, but would have to be similar to that used by parliamentary meetings. It would need to allow frequent and spontaneous creation of new votes, e.g. an amendment to a proposal or a motion to end discussion and proceed to a vote (see Prov. 5.1 and 5.2). It would need to handle institutional votes as well as personal votes, so that a member could cast up to 15 votes in any proportion of “yes” and “no” votes. Such software is expensive, as are the associated hardware and support personnel. The Organizing Committee of the Congress might not have the financial support needed.

Prop. I and *J*, which can be considered independently, would rule that non-voting individuals or groups observing the Nomenclature Section online would be charged either a “small fee” or no fee (*Prop. I*), whereas registered voting members online would pay a fee similar to registered members who were physically present

(Prop. J). While it seems laudable to minimize the cost of merely observing the Section online, and sensible to require a fee for voting rights (at least to obstruct any attempt to manipulate voting), would it really be necessary for the *Code* to rule on these matters?

Prop. K would require that online members of the Nomenclature Section be registered members and registration be done in advance, for which a deadline may be set. This level of detail might be considered unnecessarily prescriptive, although, if online voting is desired, it would be important to rule that registered membership of the Section may be either in-person or online, so that both kinds of members are entitled to vote. *Prop. K* could be simplified by instead amending Prov. 4.2 as follows: “Registration for the Nomenclature Section, **whether for in-person or online membership**, is through the International Botanical Congress. Only registered members of the Nomenclature Section are entitled to vote at the Nomenclature Section.” Those who favour this alternative should vote “ed.c.”

Prop. L would change the current qualified majority (at least 60%) of votes required to reject recommendations of the General Committee on conservation, protection, or rejection of names, suppression of works, or binding decisions. Instead, a simple majority (more than 50%) would be required to *accept* these recommendations. The proposers of *Prop. L* argue that requiring a majority of at least 60% to reject a General Committee recommendation is undemocratic because if, say, 55% voted to reject, it would not be rejected and would in effect be approved by a 45% minority. However, current Art. 14.15, 34.2 and 56.4 stipulate that when proposals have been approved by the General Committee, conservation, protection or rejection of a name or suppression of a work is authorized subject to the decision of a later International Botanical Congress. On this authority, asterisked entries are made to the online Appendices to the *Code*, available to all users, so reversing such a decision amounts to amending the *Code*, which otherwise requires a qualified majority to accept (Prov. 5.1(a)).

Prop. M is contingent on acceptance of Art. 38 *Prop. N* and Art. 53 *Prop. B*, in which case *Prop. M* would make necessary adjustments to include binding decisions in Div. III Prov. 5.4.

Prop. N would make explicit what is currently only implicit in Prov. 5.9 read together with Prov. 3.1, i.e. a member of the Nomenclature Section may serve as a delegate of more than one institution, because one person may carry up to 14 institutional votes and no institution is allowed more than 7 votes.

Prop. O would explicitly allow both online and in-person members of the Nomenclature Section to accumulate and cast institutional votes. If it was made explicit that registered members of the Section may be online or in-person (see suggested amendment to *Prop. K*), this additional rule would become redundant, because Prov. 5.9(b) already rules that an institution may authorize any member of the Section as a delegate to carry its votes. *Prop. O* could, however, be included as a Note under Prov. 5, probably under Prov. 5.9.

Prop. P would add a Recommendation that the Nomenclature Section take place in a location where broadcasting it on the internet is possible and allowed. It is debatable whether the *Code* should recommend on such matters, because the *Code* has no influence on the location of an International Botanical Congress, which is instead the responsibility of the International Association of Botanical and Mycological Societies (<https://www.iaptglobal.org/iabms>).

Prop. Q would add another Recommendation that observers and members of the Nomenclature Section get together and discuss proposals before and during the Section. Surely this is already normal practice? It hardly seems to need a formal Recommendation in the *Code*.

Prop. R seems to be aimed at members of the Nomenclature Section who cannot (or do not wish to) attend the whole Section, so that they do not miss voting on new proposals or amendments to proposals, i.e. items that are not published in advance. *Prop. R* fails to take into account that proposals are amended frequently during the Section's discussions, and delaying voting on each amendment would be utterly impractical. On the other hand, voting on new proposals to amend the *Code* is in effect already delayed because it has become established practice to discuss them on the final day of the Section.

Prop. S would recommend that the Organizing Committee provide members of the Nomenclature Section with a certificate of attendance or an equivalent. While some members might need such a document for professional reasons, it is debatable whether such a Recommendation is relevant to the governance of the *Code*.

Prop. T, together with Art. 51 *Prop. B* and C (see comments there) and Art. 56 *Prop. A*, forms a set of proposals to allow the rejection of culturally offensive and inappropriate names. *Prop. T* would create a new specialist committee, the “Nomenclature Committee on Culturally Offensive or Inappropriate Names”, with the sole responsibility of making recommendations on proposals to reject culturally offensive or inappropriate names under Art. 56. To delimit the function of this Committee, some adjustment to the first sentence of Prov. 7.10, in addition to that suggested by the proposers, is warranted, as follows: “**Five specialist committees (Prov. 7.1(e)–(i)) examine proposals to conserve or reject names, proposals to suppress works, and requests for decisions (Art. 14.12, 56.2, 34.1, 38.4, and 53.4) referred to them by the General Committee, to which they then submit their recommendations; a sixth specialist committee (Prov. 7.1(j)) examines only proposals to reject names (Art. 56.2).**” Those who support this proposal together with this amendment should vote “ed.c.”

Prop. U, concerning the proposed Editorial Committee for Fungi, is discussed under *Prop. G*.

Prop. V would explicitly allow the Committee on Institutional Votes to consist of more than the currently prescribed seven members. Sometimes additional expertise might be needed, e.g. the present Committee invited an “Advisor for Fungi” to join because none of the seven members elected at the Shenzhen Congress is a mycologist.

Prop. W would permit Special-purpose Committees to be appointed by the General Committee *between* International Botanical or Mycological Congresses, whereas at present they may be established only at such a Congress (Prov. 4.3(d) and 5.2(f)). The proposer notes: “controversial matters with a bearing on the nomenclature of algae, fungi, and plants might require being addressed with greater urgency than every six, or more, years”.

Prop. X is part of a set of proposals that would provide for the future valid publication of names of microscopic algae or microfungi with DNA sequences as types (see Chap. V Sect. 2 *Prop. A*). The Nomenclature Committee for Algae does not support *Prop. X* (votes 1 : 14 : 1).

Prop. Y is part of a set of proposals that would provide for the future valid publication of names of certain taxa other than vascular plants or bryophytes without nomenclatural types (so-called “typeless names”; see Chap. II new Art. *Prop. A*). The Nomenclature Committee for Algae does not support *Prop. Y* (votes 1 : 14 : 1).

Prop. Z would burden the Editorial Committee with an extremely complex additional task. It would be required to publish a document noting all editorial amendments made in the *Code* since

the previous edition, i.e. those not directly resulting from a proposal accepted at an International Botanical or Mycological Congress. It is likely that the end users of this document would be a very small group.

Prop. AA, concerning the proposed Editorial Committee for Fungi, is discussed under *Prop. G*. If *Prop. B* was accepted, *Prov. 5.6* would be deleted from *Div. III* and so too would the cross-reference to it toward the end of *Prov. 8.1*. If the mycological community wanted *Prop. B* to apply also to proposals to amend Chapter F at an International Mycological Congress, so that proposals to amend Examples in Chapter F or fungal entries in the Glossary were referred via the Secretary and Deputy Secretary to the Editorial Committee for Fungi, the new *Prov. 2.1bis* could be added to the cross-references in *Art. 8.1* by means of a friendly amendment.

Prop. BB, concerning the proposed Editorial Committee for Fungi, is discussed under *Prop. G*.

Prop. CC concerns the deadline for the appointment of the Deputy Secretary of the Fungal Nomenclature Bureau. Because International Mycological Congresses normally take place every four years, requiring this appointment no later than two years before a Congress, instead of the current three years, seems more realistic. The Nomenclature Committee for Fungi supports *Prop. CC* (votes 14 : 1 : 0, on the whole set consisting of *Prop. G*, *U* and *AA-DD*).

Prop. DD, concerning the proposed Editorial Committee for Fungi, is discussed under *Prop. G*. *Prop. DD* would also add the new edition of Chapter F to the publications listed in *Prov. 8.11* as appearing after an International Mycological Congress.

Glossary

Prop. A (321 – Wisnev & Prado in *Taxon* 72: 955) Add a new sentence to the definition of “description” in the Glossary (new text in bold):

“*description*. [Not defined] – a published statement of a feature or features of an individual taxon; a description (or a diagnosis) is required for valid publication of a name of a new taxon (*Art. 38.1* (a) and *38.3*); a validating description need not be diagnostic (*Art. 38 Note 2*). **A name, by itself, may convey some descriptive information about the taxon to which it is applied but is not, by itself, sufficient to serve as a description.**”

Prop. B (322 – Wisnev & Prado in *Taxon* 72: 955) Amend the definition of “description” in the Glossary as follows (new text in bold, deleted text in strikethrough):

“*description* [in boldface]. ~~[Not defined]~~ — a published A statement of a feature or features of an individual taxon, **which may include morphological, anatomical, biochemical, karyological, molecular, or similar features of the taxon, but cannot be limited to those properties noted in Art. 38.3.** A a description (or a diagnosis) is required for valid publication of a name of a new taxon (*Art. 38.1*(a) and *38.3*); a validating description need not be diagnostic (*Art. 38 Note 2*).”

Prop. C (162 – Prado & Moran in *Taxon* 71: 713) Add two new entries to the Glossary:

“**first-step typification**. See *second-step typification*.”

“**second-step typification**. Designating a single specimen as the lectotype, neotype, or epitype for a name where a single gathering but more than one specimen was originally (in the first-step typification) designated as lectotype or neotype, or epitype (*Art. 9.17* and *Ex. 14*).”

Prop. D (397 – Wisnev in *Taxon* 72: 1178) Add the following sentence at the end of the definition of “homonym” in the Glossary (new text in bold):

“homonym. [...]. **A homonym also results from the application of an existing name to a different taxon if the author definitely excludes its type (see Art. 48).**”

Prop. E (403 – Wisnev in *Taxon* 72: 1180) Amend the definition of “rejected name” in the Glossary as follows (new text in bold, deleted text in strikethrough):

“rejected name. **Subject to Art. 14.6, a A name ruled as that is not to be used as the correct name of a taxon (Art. 11),** either by formal action under *Art. 14*, *56*, or *F.7* overriding other provisions of the *Code* (see *nomen rejiciendum*, *nomen utique rejiciendum*) ~~or because it was nomenclaturally superfluous when published (Art. 52) or a later homonym (Art. 53 and 54).~~ A name treated as rejected under *Art. F.7* may become eligible for use by conservation under *Art. 14*.”

Prop. F (050 – Bhattacharjee & al. in *Taxon* 69: 1393) Amend the definition of “synonym” in the Glossary as follows (new text in bold):

“*synonym*. [Not defined] – one of two or more names that apply to the same taxon. **It may or may not be a correct name for that taxon** (see *heterotypic synonym*, *homotypic synonym*).”

Prop. G (005 – Schwartsburd & al. in *Taxon* 69: 624) Include the following four terms and their respective meaning in the Glossary:

“*type-genus*. See *type-species*.

“*type-species*. [Not defined] – the term “*type-species*” is not used in this *Code* (*Art. 8.1* and *Note 0*). A type is never a collective entity. The same applies to “*type-genus*”, “*type-subspecies*”, and “*type-variety*”.

“*type-subspecies*. See *type-species*.

“*type-variety*. See *type-species*.”

Rapporteurs’ comments – *Prop. A–G* would be automatically referred to the Editorial Committee.

Prop. A would attempt to add an element to the definition of “description” that would be more appropriate as a new Note or Article in *Art. 38*.

Prop. B would add new elements to the definition of “description”, also deleting “[Not defined]”, which would imply that the definition is taken from the provisions of the *Code*, which is not the case.

Prop. C would add an entry to the Glossary based on terms used only *Art. 9 Ex. 14*.

Prop. D would add a sentence to the definition of “homonym”, implying an additional way in which a homonym can exist, although the explanation is redundant, already covered by the first sentence. Perhaps adding a cross-reference “(see also *Art. 48.1*)” to the Glossary definition would be sufficient, although this would be editorial.

Prop. E is connected to *Art. 52 Prop. B* and *Art. 53 Prop. A*, which would restrict the term “rejected” so that it no longer applied to names that are illegitimate under *Art. 52*, *53* or *54*.

Prop. F could be a useful addition in view of the other sense in which the term synonym is used, i.e. a name that applies to, but is not the correct name for, a taxon.

Prop. G is discussed under *Art. 8 Prop. A*.

Appendices III and IV

Prop. A (194 – Wiersema in *Taxon* 71: 1346) Each of the names listed in Appendix III and Appendix IV as being the basionym or replaced synonym of a conserved name with a conserved type is to be treated as conserved on the same date and with the same type as the conserved name under which it is cited.

Rapporteurs’ comments – *Prop. A* is essentially a housekeeping proposal, and would update a proposal (No. 245, Perry in *Taxon* 59:

1916. 2010) that was approved at the 2011 Melbourne Congress but failed to account for post-*Vienna Code* (2006) conservations, particularly those involving replacement names with conserved types, because conservation of a replaced synonym at the rank of subdivision of a genus or infraspecific taxon was not then possible under Art. 14.1. Prop. A would ensure that the conserved types of listed names are the same as those of their basionyms or replaced synonyms.

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