AN ODE TO <u>B</u>INOMIALS: <u>L</u>INNAEUS'S <u>T</u>AXONOMY A FEAST OF AN EXTRAORDINARY SANDWICH OF KNOWLEDGE

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ABSTRACT

An Ode to Binomials: Linnaeus's Taxonomy is a prosetry (an integrated work of poetry and prose) with lyrical qualities on the history, description, value, and procedures of Linnaeus's binomial nomenclature.

RESUMEN

An Ode to Binomials: Linnaeus's Taxonomy es una "proesía" (trabajo que integra prosa y poesía) con cualidades líricas de la historia, descripción, valor, y procedimientos de la nomenclatura binomial de Linneo.

AN ODE TO BINOMIALS: LINNAEUS'S TAXONOMY A FEAST OF AN EXTRAORDINARY SANDWICH OF KNOWLEDGE

As the father of modern taxonomy Linnaeus was a naming genius.

For as a scientist he found names extremely long, even tedious.

Thus his lifework became a mission to transform a naming tradition

Which he did with erudition, juxtaposition, ranking, and finally fruition.

He endeavored to shorten Latin names once chaotically long but descriptive.

Voila! His 1753 Species Plantarum became a historic treatise, ooh! so delineative.

In so doing he reduced the words in a name of every known plant from five or more, to at most a few.

His sex parts-oriented system of names with a unique noun and adjective combination became just two.

Because a man of many names (Carl Linnaeus, Carolus Linnæus, Carl von Linné and L.) went on an organism naming spree

We now only have to deal with binomials and sometimes a form, hybrid or variety that creates at most a combination of three.

Since *Species Plantarum*, most original names are here to stay Because the Law of First Priority almost always has the final say. That is the first name validly published is permanent All others are not to be used anywhere in the firmament.

Why? Because a long time ago, a Botanical Congress passed laws That created a system of rules almost without exceptions or flaws. Declaring the first name floated would be the last name sunk Regardless of social uproar, scientific endeavor, or economic funk.

But one would be among the taxonomic fools

To think there were never exceptions to the rules.

Thus the Congress is mandated to bend or even amend the laws

To correct any oversights and exceptions they deem as flaws.

Thus an International Botanical Congress is held every six years or so for the benefit of all botanical kind That has the authority to add to or change the rules while keeping logic and common sense in mind.

Thus you might ask, being of an inquisitive mind,

Why a name apparently having stood the test of time

Can sometimes be superseded by a more recent find. The former being relegated to the phylogenetic sideline

Thus causing the senior name to be interred allowing the calendar junior name to stand Declaring the latter conserved, returning nomenclatural stability throughout the land.

In addition to those names earlier published, now buried, and declared not to last Legitimate names will be created in the future just like preceding ones in the past.

Thus with any evidence found: Be it anatomical, geographical, geological, or morphological, Epithetic, genetic, meristic, or phylogenetic, any change can be attempted so long as it is deemed logical.

In the past, "-icals" and "-tics" aside, in the Linnaean way of thinking many plants were living in sin Whose offspring should be given a new moniker since historically their parents were supposedly not kin.

So any botanist in his or her lab, when comparing two or more types, decides they are really the same They must now, unknown to the plants they carefully study, play their nomenclatural game. So thus, in their studied opinion, recognize that such plants are unable to validly pass taxonomic muster Reducing one or more to synonymy, making their names outdated within the generic cluster.

If a brand new species is thought to be discovered, a new name must be created. The first decision to be made is: Does the new taxon belong to a genus already found? If so, the binomial name is half made, otherwise a genus noun must be generated. The epithet that follows must be Latinized in case, declension, and gender, how profound.

The epithetic adjective can be almost any word as long as it is neither vulgar nor duplicated. But authors beware as it is bad taste to use one's own moniker as it should not be replicated.

Thus, when a necessary identification recombination takes place: For example, a classification lump or split

- A nomenclatural basionym is created and the old plant's rank along with the author's names and date takes a hit.
- Thus the old is forever attached to the original type with which the author's combination stays permanently behind.
- The new name's author follows the old author's name enclosed by parentheses all after the new epithetic adjective enshrined.
- If a subepithet is created and published OK, the original name gets duplicated with a subtaxon descriptor added in-between.
- The old epithet remains the same with a new subtaxon added, preceded by a rank, and proceeded by author and date, isn't that keen?

As botanists identify, classify, nomenclaturally and phylogenetically split and lump their way They build a complex monophyletic tree-of-life that is accepted by all, hopefully here to stay.

So classifiers, nomenclaturalists, identifiers and other scientists and lay people alike

All can thank Linnaeus for eliminating the wordy mess, as we move down the pike

Not having to navigate a jungle of descriptive (Greek or Latinized) words to juggle

While we sort out nomenclatural relationships as we venture forth in our taxonomic struggle.

However as older taxonomists age and retire without their positions being filled, it is no wonder they are glum Because fewer students of taxonomic subjects are being trained, foreboding the losses, and destruction to come

Troutman, Ode to Binomials

- As unknowledgeable, even naïve humankind lapses into chaos, not knowing what organisms to recognize, save, or find
- And in our collective lack of education, we will then be ignorant having lost the sacred treasures of our living kindred kind.
- Meanwhile in the end, the practice of lumping and splitting names to outsiders seems willy-nilly
- But science must remain scientific, even though to the unpracticed eye taxonomic activity seems unnecessary and silly
- Regardless of taxonomic, social, political and monetary reasons many, the practice must continue without gilding the lily.

REFERENCES

This work was created by the author over a period of time. The only references consulted were online botanical taxonomic sources in order to check spelling and current definitions.

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