

Mr. H. C. Watson has worked for me
in British Flora, & the same result
is given. I know how vague all
such results must be & there
~~[should the following be apparent to you, I should be most grateful]~~
may be some fallacy in the
result, but I cannot detect
it; & am inclined to believe
that the above proposition may
be trusted; but I shall of
course try to test it by
other means. — Pray accept
of time & critical thanks for
all your very great kindness,
& believe me. Your very truly

(L. Darwin

How you seem to consider the new
pett work on Geoph. British.
Hooke thinks very well
of it. —

From Fair bough Kent
Aug. 24th

My dear Dr. Gray

I received your letter about a fortnight
ago & immediately forwarded to
Hooke. Who since then has
started for a tour in Germany with
Dr. Lindley's eldest son. —

I am sorry you Dr. have had such
trouble about the Deltius, but it
was not of my causing.

And now I really hardly know how
to thank you enough for the very
great trouble which the list of
"close species" must have caused
you. — What knowledge & labour &
judgment is entailed in that
little sheet of paper! I fear
the you will think the British with
all the wall the labour; but I

can say the if I could have done it myself I would have done it, had it caused me ten times the labour which it must have caused you. I had met with a remark by Fries that the species of large genera are more closely related to each other, than are the species of smaller genera. I consulted a very good entomologist, & Hostale & Berthier, & they did not at all believe in this. But several facts & considerations nevertheless, made me think that there might be some truth in it; and all general statements of such kind it is my habit in my collection, keeping it in my cabinet, reading it off work to test. It occurred to me that if I could get some good systematical, & species-splitter, to mark (without the object being known)

to the species in a list, then if I counted the average number of the species in such genera, & compare it with the general average [for this end all the genera with single species have to be omitted; & I have omitted Solis & Carex also] of the species to Solis & Carex also of the same country; if the genera in the same extent, take would, in a certain extent, tell whether or among the close species whether or among the larger genera. occurred in the larger genera. now in your No. 3 list (Solis & Carex being omitted) there are 115 genera & 6.87 species to genera; whereas in your Manual (omitting Solis & Carex & all genera with single species) the average is 4.67. So that it seems the when many # organic forms are allied, making what is called a genus, some of them are apt to be more closely allied than others in the smaller genera.

P.S. Gray 10

as it is ten to one you will
not be able to give me any
fact on the following head, I
venture to put it before
you for the chance. —

I have met several (chiefly amongst
animals) cases, "to say that I can
hardly think it purely accidental,"
in which, when ~~are organs~~
~~similar~~ the species of a genus
differ in some organ or
part, which is usually constant
in the species of the same genus,
that are or more of the
species individually varied in
some degree in the same
organ or character. Then to
give my best example, I

remember seeing it somewhere
described that the position of
the embryo differed in a very
marked manner in the species
of *Helianthemum*; & hence,
if there be any truth in
the above rule, some of the
species ~~ought~~ might be
expected to vary in this
respect. —

I am giving you good example in animal Kingdom
— *Pygmaea* (a species) the greater values
(^{very} ~~usually~~ constant) differ wonderfully in the
different species, & in some of the
species, these values, (usually "constant")
vary in the most perplexing manner,
so that they differ more in the same
species, than often in different species
of different genera. —



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