

thing becomes gradually extended in a generic sense to phenomena which in the later stage of critical classification appears to have been given too extended a meaning, if it has not in a premature broad generalization been made to embrace phenomena which in the later stage of critical classification appertain to a different system of distribution in time and space. Quite often, owing to the limits placed on the choice of terms, it is discovered that the name itself has been preoccupied by use for a very different object. In short the history of many scientific names is somewhat as follows.

In the so called natural history sciences names are first given with the purpose of defining exactly some object, be it fish, plant, land form or terrane. Being the type of its kind, similar objects having some essential likeness, structure, form, mode or time of occurrence are grouped with it under the same name. As nature in her prodigality never exactly reproduces her creations, some of the objects present differences of one sort, some of another, so that the name inevitably comes to have a broadened and weakened meaning in proportion to the number of occurrences which it is construed to designate. In time it thus loses its original definite meaning and being replaced here and there by terms of more accurate definition falls gradually into disuse. Its friends may endeavor to save it either in its original sense or with a restricted meaning in some respects different from its original use; but it has now lost its chief value as a scientific name since it is ever a source of confusion to the reader who has to carry in his mind, if he knows his subject, the fluctuating values of the word in the different periods of its history. In all this, scientific terms but exemplify those laws of use and disuse to which any words of the language are subject. The names which have been introduced for the fossiliferous marine deposits described in this report appear at present to be under the operation of these laws. The term "Albany Clays" specifically applied to the glacial rock-flours of the Hudson valley north and south of Albany in 1846 antedates the name Albany since given by Texan geologists to certain carboniferous beds in Texas.