

secondary formations, the most recent insensibly glide into the modern deposits, and contain remains of many existing species of animals and plants, associated with forms that are now blotted out for ever. Mr. Lyell has adopted a classification of the tertiary strata, founded on the proportion of recent species of animals which they contain; and as shells occur in many of the strata in great abundance, and in an excellent state of preservation, those types of animal organization have been selected for the distinctive characters of the subdivisions into which, for the convenience of study, he separates these deposits. In the present state of our knowledge, this arrangement is of great utility, but it appears probable that it may require considerable modification, or, perhaps, hereafter be altogether abandoned with the progress of geological research; for it cannot be doubted, that strata in which no recent species have yet been found, may yield them to more accurate and extended observations.

9. CLASSIFICATION OF THE TERTIARY STRATA.—According to this classification the tertiary system forms four principal groups, each of which is characterised by the relative proportion of recent and extinct species of shells which it contains; and a nomenclature has been adopted to denote the characters upon which the arrangement is founded. These divisions are as follow:—

1. THE PLIOCENE (*signifying more new or recent*).—Tertiary strata, in which the shells are for