

*Cardium spillmani* Conrad, are found at both horizons. Still others found both in the Peedee and Black Creek in North Carolina are confined to the Monmouth in the north, among them *Pecten simplicius* Conrad and *Lima pelagica* (Morton). The fauna as a whole is, however, clearly that of the Monmouth and upper Ripley.

The Peedee in North Carolina is not followed by younger Cretaceous deposits, as in New Jersey, where a decidedly younger fauna quite distinct from that in the lower beds is found. The Peedee formation is overlain only by Tertiary or post-Tertiary deposits, so that its upper limits are everywhere sharply defined on both physical and paleontological grounds.

As already stated, this fauna has been generally regarded as Senonian, while the overlying Cretaceous fauna in New Jersey has been regarded by the writer and others as probably Danian in age.

TABLE SHOWING CORRELATION OF UPPER CRETACEOUS FORMATIONS.

| APPROXIMATE<br>EUROPEAN<br>EQUIVALENTS. | DELAWARE<br>AND<br>MARYLAND. | VIRGINIA.         | NORTH CAROLINA.  | ALABAMA.                 |
|-----------------------------------------|------------------------------|-------------------|------------------|--------------------------|
| Danian -----                            | Rancocas -----               | -----             | -----            | -----                    |
| Senonian -----                          | Monmouth -----               | -----             | Peedee -----     | Ripley, Selma.<br>Eutaw. |
| Turonian -----                          | Matawan -----                | In well borings-- | Black Creek ---- | Tuscaloosa.              |
|                                         | Magothy -----                |                   |                  |                          |
| Cenomanian -----                        | Raritan -----                | -----             | -----            | -----                    |

## TRENT FORMATION.

The Trent formation lies unconformably on the underlying Cretaceous deposits. The lithologic materials are very unlike those of the Eocene of adjacent States, consisting of a light-colored marl that is either loose or locally consolidated. The strata were evidently deposited after a long interval of erosion, but there is nothing in the position or character of the beds that renders it possible to correlate them with certainty with the Eocene of adjacent areas. In some particulars the beds, both in position and character, suggest the Santee marl of South Carolina, which has been regarded as belonging in the Claiborne group. It is quite possible that they may belong to that horizon.

The fossils of the Trent horizon are largely casts of marine forms, although in a few instances teeth and shells are preserved. The groups best represented are the mollusca, bryozoa, and echinodermata. A large oyster which has been identified as *Ostrea georgiana* Conrad, sev-