

spike toothed harrow. In the fall the peas should be gathered from the vines, which will pay as well as any other crop on these lands. The succeeding year they will bring at least thirty per cent more of corn, than if they had not been cultivated in this way. There are soils of this kind near Worton Point, in Kent county, and also on the Chester river. They are found in the neighborhood of Sudlersville, in Queen Anne's, extending on the Chester river, for some distance below the Chestertown bridge, and reaching out into the country, until they become gradually blended with the red and yellow clay lands; they are found in Talbot, bordering on the Choptank, and they prevail very much in Caroline county; in the upper and middle districts in Dorchester county, on the Choptank, above Cambridge, to the Delaware line; and in the upper part of Somerset, and that part of Worcester called the Forrest. They also are found east of the Pocomoke, below Snow Hill, extending a few miles above it, until they meet with the yellow and red clay lands of Quepongo and Berlin.

The above compose the most marked varieties of soil found in the first gubernatorial district. To describe all which occur, would swell this report to an unreasonable length. The sub-varieties are very numerous, and as far as opportunity permitted, their characteristics were examined, their deficiencies determined, and the manures and cultivation best adapted to them, were made known by the means pointed out by the law.

The analyses of all kinds made of soil, exceed one hundred and fifty in number, but as their publication, would subserve no practical benefit, I have not included them in this report.

The owners of the soils will give me, in the course of a few years, the result of their experiments, which will form a collection of the most valuable facts yet given to the art or science of Agriculture.

I have adverted to the variety and richness of the marls of some parts of the Eastern Shore. These are comprised under two general classes, viz: the green sand marl, and shell marl. These are the terms applied to the two varieties on the Shore, by which all there will readily understand my meaning.

THE GREEN SAND, OR JERSEY MARL,

Is found in large deposits on the head of Sassafras, in Kent county; on the Sassafras river, in Cecil; on the branches of the Great and Little Bohemia river; and in many other localities in the lower part of Cecil. A bed of it is found also below Chestertown, near the Chester river, but evidently not in its original position. Another bed, to the thickness of about eighteen inches, is found overlaying shell marl of the very latest deposit in Talbot, at the head of Wye, on the land of Mr. Thomas Hopkins. This is also out of place, having been transported here by a current of water at some distant period. The green sand to which I refer, owes its value to the presence of potash. Sometimes, however, it contains carbonate of lime, and occasionally some sulphate of