

an infiltration of iron. In this example of a horse-shoe firmly impacted in a mass of pebbles and sand, from the sea-beach at Eastbourn, the cement which binds the mass is derived from the iron. Nails are frequently found in the centre of a nodule of hard sandstone formed by this process; the nail having supplied the water with the material by which the surrounding sand has become changed into stone. I have here a cannon ball imbedded in the centre of a nodule of iron-stone, in which are several oyster shells: this specimen was dredged up off the Sussex coast, and has evidently been consolidated by the solution of iron afforded by the partial oxidation of the cannon ball. In this very interesting mass of breccia,* which has been produced by a like process, are two silver pennies of Edward I. This curious specimen, for which I am indebted to George Grantham, Esq. of Barcombe Place, Sussex, was obtained from a Dutch vessel, which was stranded off Hastings a century ago; it is a conglomerate of glass beads, knives,

* This specimen was dug up at a depth of ten feet in the bed of the river Dove, in Derbyshire; and the coins are presumed to be part of the treasures contained in the military chest of the Earl of Lancaster, which was lost in crossing the river in the dark; the guards being alarmed by a sudden panic, and the chest with all its contents thrown into the Dove. The Earl of Lancaster was beheaded in March 1322: the specimen was discovered about six years since; more than five centuries have, therefore, elapsed since its submersion.—*See the Vignette of the Title-page, vol. i.*