

perfect specimen being eight inches long, and many large fragments of other individuals indicating a length of not less than eighteen or twenty inches.

In Mr. Clark's garden were several land-tortoises (*Testudo clausa*, Say), which had lived there for ten years; and, after a hibernation of some months, had just re-appeared. They were crawling about in search of snails, but will also eat strawberries and meat, both raw and cooked. They grow very slowly; the largest are eight inches long, and some of the young ones not bigger than a half-crown piece. Mr. Clark tells me, that the female lays four eggs, and digs a hole for them in the ground, hollowing it out with her hind feet to the depth of four inches, and shaping it so that it enlarges below. After being occupied for about a week in this excavation, she deposits the eggs, and fills up the hole with earth, beating it down with her hind feet to make it firm. The spot is well concealed by a covering of soil two inches thick, which does not prevent the sun's heat from hatching the eggs as the summer advances.

In one of the cabinets of Ohio insects, I saw specimens of that common English butterfly, *Vanessa atalanta*, or "red admirable," which I had observed, in the winter, flying about in the woods of Alabama. I could not distinguish it from the European species, yet Mr. Doubleday, the entomologist of the British Museum, at once recognized all I showed him as American specimens; for there is a minute, but constant difference, first pointed out by Mr. J. F. Stephens, in the markings of the beautifully colored anterior wing. On an accumulation of facts of this kind must depend ultimately the answer to that difficult question, What is the difference between a species and a permanent variety? How far can climate, food, heat, light, and other causes, give rise to fixed and constant modifications in individuals descended from one parent stock?

We ascended the hill, on which a new observatory has been built by subscription since we were last here, and where there is an equatorial telescope seventeen feet, twelve inches in diameter. Dr. Mitchell, the astronomer, proposes to explore a part of the heavens more to the south than that which falls within the range