NOTES ON STONEHENGE.¹

III.—THE EARLIEST CIRCLES.

WHEN we come to examine Stonehenge carefully in relation to the orientation theory, it soon becomes clear that its outer circle of upright stones with lintels and the inner naos, built of trilithons, oriented in the line of the "avenue" and the summer solstice sunrise, are not the only things to be considered. These stones, all composed of sarsen, which, be it remarked, have been trimmed and tooled, are not alone in question. We have:—

(1) An interior circle broken in many places, and other stones near the naos, composed of stones,

FIG. 8.—Map of the Stones made by the Ordnance Survey. A, N.W. stone; B, S.E. stone; C, Friar's Heel; D, Slaughter stone.

"blue stones," which, as we have seen, are of an entirely different origin and composition.

(2) Two smaller *untrimmed* sarsen stones lying near the vallum, *not* at the same distance from it, the line joining them passing nearly, but not quite, through the centre of the sarsen circle. The amplitude of the line joining them is approximately 26° S. of E. and 26° N. of W. Of these the stump of the N.W. stone is situated 22 feet from the top of the vallum according to the Ordnance plan. The S.E. stone has fallen, but according to careful observations and measurements by Mr. Penrose, when erect its centre was 14 feet from the top of the vallum. The centre of the line joining the stones is therefore 4 feet to the S.E. of

¹ Continued from p. 342.

the axis of the present circles, which, it may be stated, passes 3 feet to the N.W. of the N.W. edge of the Friar's Heel (see Fig. 8).

There are besides these two large *untrimmed* sarsen stones, one standing some distance outside the vallum, one recumbent, lying on the vallum, both nearly, but not quite, in the sunrise line as viewed from the centre of the sarsen circle. These are termed the "Friar's Heel" and "Slaughter Stone" respectively.

I will deal with (1) first, and begin by another quotation from Mr. Cunnington, who displayed great acumen in dealing with the smaller stones not sarsens.

"The most important consideration connected with the smaller stones, and one which in its archæological bearing has been too much overlooked, is the fact of their having been brought from a great distance. I expressed an opinion on this subject in a lecture delivered at Devizes more than eighteen years ago, and I have been increasingly impressed with it since. I believe that these stones would not have been brought from such a distance to a spot where an abundance of building stones equally suitable in every respect already existed, unless some special or religious value had been attached to them. This goes far to prove that Stonehenge was *originally a temple*, and neither a monument raised to the memory of the dead, nor an astronomical calendar or almanac.

"It has been suggested that they were Danams, or the offerings of successive votaries. Would there in such case have been such uniformity of design or would they have been all alike of foreign materials? I would make one remark about the small impost of a trilithon of syenite, now lying prostrate within the circle. One writer has followed another in taking it for granted that there must have been a second, corresponding with it, on the opposite side. Of this there is neither proof nor record, not a trace of one having been seen by any person who has written on the subject. This small impost, not being of sarsen, but syenite, must have belonged to the original old circle; it may even have suggested to the builders of the present Stonehenge the idea of the large imposts and trilithons, with their tenons and mortices."

In Prof. Gowland's examination of the contents of the holes necessarily dug in his operations, it was found that the quantity of blue stone chippings was much greater than that from the sarsen stones. While the sarsen stones had only been worked or tooled on their surface, the blue stones had been hewed and trimmed in extraordinary fashion; indeed, it is stated by Prof. Judd that some of them had been reduced to half their original dimensions in this process, though evidence of this statement is not given.

It seems, then, that when the sarsen stones were set up, the sarsen and blue stones were treated very differently. This being so, the following quotation from Prof. Judd's "Note" is interesting (*Archæologia*, lvi., p. 81):—

"I may repeat my conviction that if the prevalent beliefs and traditions concerning Stonehenge were true, and the 'bluestone' circles were transported from some distant locality, either as trophies of war, or as the sacred treasures of a wandering tribe, it is quite inconceivable that they should have been hewed and chipped, as we now know them to have been, and reduced in some cases to half their dimensions, *after having been carried with enormous difficulty over land and water, and over hills and valleys.* On the other hand, in the glacial drift, which once probably thinly covered the district, the glacial deposits dying out very gradually as we proceed southwards, we have a source from which such stones might probably have been derived. It is quite a well-known peculiarity of the glacial drift to exhibit considerable assemblages of stones of a particular character at certain spots, each of these assemblages having probably been derived from the same source.

"I would therefore suggest as probable that when the early inhabitants of this island commenced the erection of Stonehenge, Salisbury Plain was sprinkled over thickly with the great white masses of the sarsen-stones ('grey wethers'), and much more sparingly with darker coloured boulders (the so-called 'blue-stones'), the last relics of the glacial drift, which have been nearly denuded away. From these two kinds of materials the stones suitable for the contemplated temple were selected. It is even possible that the abundance and association of these two kinds of materials, so strikingly contrasted in colour and appearance, at a particular spot, may not only have decided the site, but to some extent, have suggested the architectural features of the noble structure of Stonehenge."

If we grant everything that Prof. Judd states, the question remains—why did the same men at the same time treat the sarsen and blue stones so differently in the same place?

I shall show subsequently that there is a definite answer to the question on one assumption.

I next come to (2). The important point about these stones is that with the amplitude 26° , at Stonehenge, a line from the centre of the circle over the N.W. stone would mark the sunset place in the first week in May, and a line over the S.E. stone would similarly deal with the November sunrise. We are thus brought in presence of the May-November year.

Another point about these stones is that they are not at the same distance from the centre of the sarsen stone circle, which itself is concentric with the temenos mound; this is why they lie at different distances from the mound. Further, a line drawn from the point of the Friar's Heel and the now recumbent Slaughter Stone with the amplitude determined by Mr. Penrose and myself for the summer solstice sunrise in 1680 B.C. cuts the line joining the stones at the middle point, suggesting that the four untrimmed sarsen stones provided alignments both for the May and June years at about that date.

Nor is this all; the so-called tumuli within the vallum may merely have been observation mounds, for the lines passing from the northern tumulus over the N.W. stone and from the southern tumulus over

the S.E. one are parallel to the avenue, and therefore represent the solstitial orientation.

So much, then, for the stones. We see that, dealing only with the untrimmed sarsens that remain, the places of the May sunset and June and November sunrises were marked from the same central point.

Statements have been made that there was the stump of another stone near the vallum to the S.W., in the line of the Friar's Heel and Slaughter Stone, produced backwards, at the same distance from the old centre as the N.W. and S.E. stones. This stone was not found in an exploration by Sir Edmund Antrobus, Mr. Penrose, and Mr. Howard Payn by means of a sword and an auger. But the question will not be settled until surface digging is permitted, as a "road" about which there is a present contention passes near the spot.

But even this is not the only evidence we have for

FIG. 9.—The rod on the recumbent stone is placed in and along the common axis of the present circle and avenue. It is seen that the Friar's Heel, the top of which is shown in the distance, would hide the sunrise place if the axis were a little further to the S.E.

the May worship in early times. There is an old tradition of the slaughter of Britons by the Saxons at Stonehenge, known as "The Treachery of the Long Knives"; according to some accounts, 460 British chieftains were killed while attending a banquet and conference. Now at what time of the year did this take place? Was it at the summer solstice on June 21? I have gathered from Guest's "Mabinogion," vol. ii. p. 433, and Davies's "Mythology of the British Druids," p. 333, that *the banquet took place on May eve "Meinvethydd."* Is it likely that this date would have been chosen in a solar temple dedicated exclusively to the solstice?

Now the theory to which my work and thought have led me is that the megalithic structures at Stonehenge—the worked sarsens with their mortices and lintels, and above all the trilithons of the magnificent naos—represent a re-dedication and a re-construction, on a much more imposing plan and scale, of a much older temple.

NORMAN LOCKYER.