Longbridge Deverill Roundhouse Experiment Report

David Freeman & Simon Jay

Objective:

To remove one of the supporting upright posts within the roundhouse based upon the Longbridge Deverill' roundhouse excavated in Wiltshire. The aim of this was to investigate whether a replacement post could be inserted into the structure without the ring beam's mortised holes having moved apart in alignment. The post joins two segments of the ring beam, in that the segments are on top of each other with ahole in each and the post slotting through the two. This would provide us with some indication of whether the same would have been possible with the original roundhouses of the Iron Age.

Method:

In order to achieve our objective, we intended to use acroprops to raise the ring beam from off the post and support the structure whilst we performed the experiment. We then intended to dig the post out, as there would be approximately 50cm of post beneath the ground. This would enable us to slide the post out as the ring beam would no longer restrict it at the top. This would enable us to see if the ring beam had moved. If the alignment was still in place, we hoped to be able to slide a new post in to replace the old one. We would then lower the ring beam down with the acros.

Experiment: 2nd November 2006

We fitted the acros 8 inches either side of post number 10 in the roundhouse to support the structure (Fig. 1). We then slowly began to wind up the apparatus so that the ring beam lifted (Fig. 2), however it appeared that the post began to lift with it, out of the ground (Fig. 3). After the whole thing was raised 4 inches, we found it possible to lift the post out. This was due to the fact that the post had rotted inside the ground which we had not predicted (Fig. 4)

Having taken the post out of the structure, we observed that the mortised holes had not moved (Fig 5). As they were still in alignment, we then fitted the original post back in again (in theory, we would have fitted a new post but there seemed to be little point as the roundhouse was due to be rebuilt).

We then lowered the ring beam down onto the post again and the structure was complete.

Conclusion:

It would have been possible to replace such posts in a roundhouse provided that supports were used to hold the weight of the structure whilst the task was completed. Pieces of wood propped against the ring beam and forced from a diagonal to upright position would have raised the ring beam enough to remove the old post and replace it.

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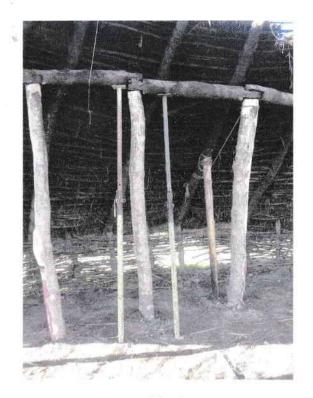


Fig. 1



Fig. 4



Fig. 5



Fig. 2



Fig. 3