

ASSESSING INTERIOR AND EXTERIOR DIVISIONS OF SPACE USING PHOSPHATE ANALYSIS SPOT TEST METHODS

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Phosphate analysis is a geoarchaeological spatial soil analytical technique that can identify areas where organic debris was discarded or collected in the soil. Phosphate patterning is used to differentiate between areas where debris was deposited and areas that were kept clear of debris. This information is then analysed to create use-of-space models, help determine land-use patterns over sites and aid the archaeological interpretation of site and social dynamics. I utilized this technique at the site of four promontory forts on Achillbeg and Achill Island, Co. Mayo, Ireland, to determine how space was organised both on and adjacent to the sites. Several activity areas were identified based on the phosphate patterning, including a sleeping area, food preparation area, storage area, a midden, previously unknown internal areas, entryways, pathways and possible gate features. This article will catalogue the identified phosphate patterns, explicate the formation processes, give examples where these patterns have been truthed on excavated sites and discuss the ways in which space was organised at the highlighted features. A study of this type will serve to illustrate how this information can be best applied in archaeology generally as well as to answer questions based on site-specific research aims.