Further Notes on Scaphiopus Holbrooki Hurteri in Pool P.

ARTHUR N. BRAGG, University of Oklahoma, Norman

In an earlier paper (Bragg, 1964) I called attention to the use of a pool site (Pool P, of my notes) for the first time in 24 years by breeding spadefoots (Scaphiopus holbrooki hurteri Strecker). Some speculation was also given as to why this pool should so suddenly appeal to these animals as a breeding site. Since this time, I have watched and studied this pool closely.

This spadefoot has used the pool successfully each year since. In April 1967, for example, their tadpoles progressed normally in this pool, feeding mostly in aggregations, and emerged to the land from one huge metamorphic aggregation in about three weeks from the night during which eggs were laid. In other recent years, they have done about the same. Therefore, the pool now is used regularly by this species.

The reason for the change in behavior of this spadefoot has now become obvious. Originally the pool was permanent. In 1957, during a very rainy spring (Bragg, 1959), so much rain continually overflowed the pool at the lowest place along its bank that this eroded the area so much that the pool now holds less water than formerly. In each of several years now, the site has several times become completely dry. Cattails (Typha sp.), originally abundant, are disappearing to such an extent that, in April 1967, only three stocks emerged. The pool, therefore, has now become a temporary one such as this spadefoot has always used, at least in my experience in central and eastern Oklahoma.

-14

LITERATURE CITED

Bragg, Arthur N. 1959. Behavior of tadpoles of Hurter's spadefoot during an exceptionally rainy season. Wasmann J. Biol. 17:23-42.

1964. An hypothesis to explain the almost exclusive use of temporary water by breeding spadefoots. Proc. Okla. Acad. Sci. 44:24-25.