

Effects of Trap Design on the Capture of Large Cerambycidae in Northern Florida

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Abstract

Four experiments were conducted in the spring and fall of 2000 and 2001 in stands of mature longleaf and slash pine in the Osceola National Forest in northern Florida. In each experiment, traps were baited with devices releasing ethanol and (-)- α -pinene at high rates of 1-3 g/day. Traps were grouped into 8-10 replicates of 4 treatments per replicate. Trap catches were collected at 2-3 week intervals, with propylene glycol or dichlorvos strip replaced on each occasion. Trap design had little influence on catches of *Arhopalus rusticus* (ARU), *Monochamus titillator* (MTI), *Xylotrechus sagittatus* (XSA) and *Acanthocinus nodosus* (ANO) (Coleoptera: Cerambycidae) (Figs. 1-3). Similarly, trap and funnel width had little influence on catches of ARU, XSA and ANO (Fig. 3). Traps with collection cups containing glycol (RV antifreeze) outperformed those with cups containing dichlorvos (VaporTape) (Fig. 4).

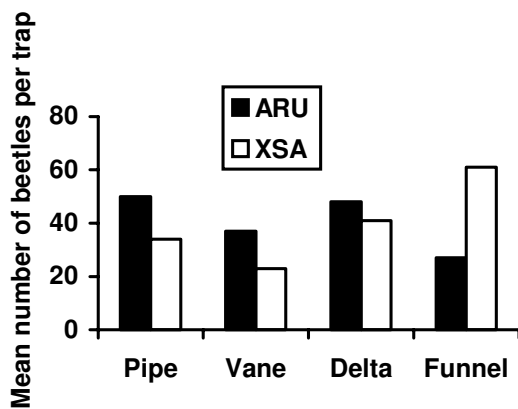


Figure 1.—Pipe vs.vane vs. delta vs. funnel design

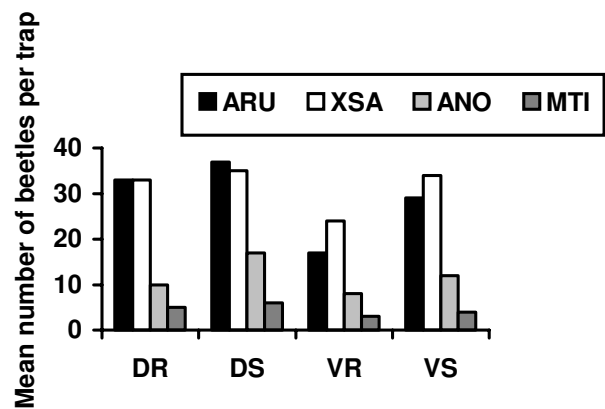


Figure 2.—Soft (S) vs. rigid plastic (R) with Delta (D) and vane (V) designs

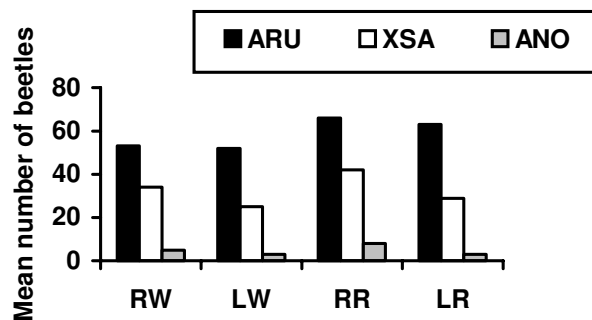


Figure 3.—Wide (W) vs. regular (R) with and large (L) vs. regular (R) funnel

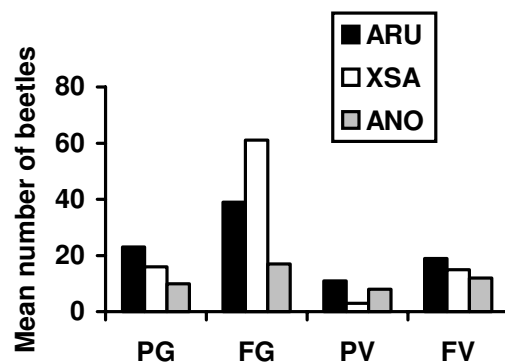


Figure 4.—Glycol (G) vs. dichlorvos (V) in pipe (P) and funnel (F) designs