

The Endangered Species Act (ESA) subcommittee would like to report two possible listings within the Endangered Species Act by the US Fish and Wildlife Agency for the beginning of the 2018 year.

The first listing is Docket number FWS-R4-ES-2017-0061, pgs. 330-341 concerning the species *Procambarus econfinae* the Panama City crayfish. The proposed rule states that mosquitocides are used within the range of the Panama City crayfish to treat both larval and adult mosquitoes, yet "all mosquitocides registered for use in Florida, when applied properly and in recommended concentrations, pose no known threats to water quality." ([FWC 2016](#), p. 10)

This finding may come as a surprise because in many instances, mosquito control larvicides and adulticides are labeled as the culprit for impacts on listed species in and around habitats where public health sprays are conducted. We on the committee see this as a win, and feel that our efforts to educate regulators on the use of mosquito control pesticides has paid off.

The second listing is Docket number FWS-R4-ES-2017-0094, pgs. 490-498. *Fundulus julisia*, the barrens top minnow. Chemical control is not included in the proposed listing of this species which resides only in the Cumberland plateau of Tennessee. The US Fish and Wildlife Service denotes the proposed listing is due to the 1960's introduction of the Western mosquitofish, *Gambusia affinis*, in the region for biological control. *G. affinis* is considered an invasive species in Tennessee and has had a drastic effect on the populations of the native minnow over time. *F. julisia*'s distribution is only the Cumberland plateau within the border of Tennessee with encroachment over the border in some areas within Kentucky.

Remember to only stock native fish for mosquito control, and preferably into man-made habitats such as abandoned pools, possible cyclic catch basin series that do not connect to natural waterways, and other self-contained habitats. Mosquitofish can be an aggressive species when introduced to any habitat, and if placing them in ephemeral ponds, try to be aware of imperiled amphibians, fish and invertebrates that may be present.

Mosquito control professionals must proceed with caution when utilizing natural control measures, keeping in mind the ecological caveats they entail. When stocking fish, have current knowledge of listed threatened and/or endangered aquatic species within your mosquito control area to avoid non-target effects.