

## EXTENSION

Institute of Food and Agricultural Sciences

# Florida scrub lizard (Sceloporus woodi)<sup>1</sup>

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## Description

The Florida scrub lizard is a small, gray or gray-brown lizard with spiny scales (Figure 1). Adults are about 5 inches in total length. A prominent characteristic of scrub lizards is a thick brown stripe that runs down each side of the body from the neck to the base of the tail. Adult males have bright turquoise patches on the sides of the belly and a black throat with small turquoise patches at the base. Females generally lack the turquoise patches, but sometimes have faded patches on their bellies. The fence lizard (*Sceloporus undulatus*) overlaps geographically with the scrub lizard in northern Florida but is easily distinguished from this species because it lacks the dark stripe.

### **Distribution and Habitat**

The range of the Florida scrub lizard is restricted entirely to Florida. These lizards occur in disjunct populations in central Florida and on the Atlantic Coast (Figure 2). Populations also once occurred along the Gulf Coast of Florida in Lee and Collier counties, but most or all of these populations may have been extirpated due to increasing development along the coast. Scrub lizards are habitat specialists that live in dry upland such as sand pine scrub, oak



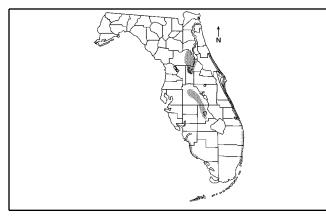
**Figure 1.** The Florida scrub lizard Credits: Photograph by Grant Hokit

scrub and sandhill. They require sunny areas with large amounts of bare sand. Scrub lizards are most common in habitats that have been kept open by fire or other disturbances such as logging of sand pine, but also may persist for some time at the edges of more dense scrub.

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**Figure 2.** Distribution (shaded) of the Florida scrub lizard Credits: Redrawn from Branch et al. 1999 and DeMarco 1992

#### **Behavior and Diet**

Scrub lizards forage on the ground, perch on the base of tree trunks, and sun themselves on logs or other debris. They are active during warm days throughout the year. Activity is lower on cool days or during very hot hours in the summer. Their diet consists of insects, spiders, and other small arthropods. This species has very limited dispersal capabilities. Scrub lizards generally do not move through dense vegetation, and are unlikely to disperse between scrub patches unless the patches are no more than a few hundred meters apart and connected by open areas.

#### Reproduction

Courtship and mating of scrub lizards occur from late March through June. Females deposit eggs (2-8 eggs per clutch) in the sand beginning in April. A single female may lay eggs 3-5 times in a season. Eggs deposited in April take about 75 days to hatch, but hatching time probably gets shorter as summer progresses and ground temperatures increase. Hatchlings appear from June until early November. Young lizards reach sexual maturity in 10-11 months.

## Legal Status, Conservation Issues and Management

The scrub lizard is not listed legally as a threatened or endangered species at the state or federal level. The Florida Committee on Rare and Endangered Plants and Animals, a group of experts on the flora and fauna of Florida, has classified this species as threatened. The primary conservation concern for scrub lizards is loss of habitat. During the last two decades, large areas of scrub have been converted to urban development and agriculture. Loss of habitat has caused a decline in scrub lizard populations and increased isolation of remaining populations. Small, fragmented populations are more vulnerable to extinction. Also, as small patches of habitat become more isolated, by housing projects and other development, lizards are not able to move between habitat patches to repopulate areas. Long-term survival of the Florida scrub lizard is dependent upon preservation of sufficient scrub habitat through growth management.

Suppression of fires, which are a natural component of the scrub ecosystem, also has resulted in habitat loss for scrub lizards. Scrub management should incorporate prescribed burns, or other practices, to reduce shrubs and ground cover and maintain open, sandy habitat for lizards. Habitat management for scrub lizards needs to be designed with consideration of the limited movement capabilities of this species. Current field studies indicate that maximum dispersal distance of scrub lizards is only a few hundred meters. If scrub patches become so overgrown with dense vegetation that lizards disappear from the patch, lizards may not be able to recolonize unless restored areas are adjacent to habitats that can supply lizards. It may be possible to link patches that are farther apart with open corridors for scrub lizards, but more scientific research is needed to develop effective designs for corridors.

Because scrub lizards are restricted to dry, upland habitats that naturally occur in patches, populations in different parts of the state have been isolated from genetic exchange for thousands of years. Over evolutionary time, this isolation has resulted in high genetic diversity in scrub lizards and large genetic differences between populations. Conservation strategies for wildlife frequently involve translocation of animals between populations by managers. For example to increase the size of a small population, females may be introduced from a larger population. Careful consideration should be given to any plans for translocation of scrub lizards between populations because such movements may result in loss of the unique genetic diversity of different scrub lizard populations.

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