Data presented are results of surveys and monitoring for 2015-2019 for San Diego Cactus Wren (Campylorhynchus brunneicapillus) in southern San Diego County. Surveys were conducted at 493 plots. Plots were surveyed twice in 2015 and 2017-2019 and the number, age (adult or juvenile), banding status (color banded or not), breeding status (paired, unpaired, or unknown), and nesting status (active nest detected or not) of all wrens recorded. Habitat covariate data were collected including amount of dead and stressed cactus in the plot, percent cover of bare ground, and the dominant and percent cover of invasive species. During weekly monitoring visits, nests were located and checked to determine the number of eggs laid, the number of eggs that hatched, and the number of chicks that fledged. Nesting data were compiled to present seasonal productivity for each Cactus Wren pair. All nestlings and adults (when possible) were color banded with unique color combinations to identify individuals on subsequent visits to provide data on survival within and between years. During banding, data were collected on age, sex, weight, and reproductive status. Fecal samples and genetic samples (pin feathers) were collected from nestlings when possible. In each territory where vegetation data were collected in 2015, 2016, 2017, and 2018, a 75 x 75 m grid of 30 points was placed to include as many nests as possible. At each point, data were collected within a 2 m radius circle including presence or absence of native bunch grasses, non-native annual grasses, cactus, elderberry (Sambucus nigra), lemonadeberry (Rhus integrifolia), sagebrush (Artemisia californica), buckwheat (Eriogonum fasciculatum), black mustard (Brassica nigra), and bare ground. These presence/absence data were summarized to present the percent cover of each species or ground cover representing habitat at the Cactus Wren territory.