The side-blotched lizard, *Uta stansburiana*, occurs abundantly in urban and disturbed habitats with populations often overlapping with the little stripped whiptail lizard, *Aspidoscelis inornata*; a species reportedly less abundant. Previous surveys conducted at the Rio Bosque Wetlands Park, in El Paso Texas, have shown that both species occupy the same areas, and have been collected effectively using traditional pitfall traps. However, specific information about capture times for each species are still limited. In this study, eight traditional bucket-style pitfall traps, implemented with a motion-activated camera, and hardware mesh that allows lizards to escape, were used to document the time at which each species is captured. Additionally, lizards of both species were sampled weekly during June and July by removing the mesh that allows the lizards to escape; each trapping period consisted of 48-hour sampling. Captured lizards were identified to species, snout-to-vent length (SVL), tail length (TL), and mass (g) was recorded, and gender was identified. Prior to their release, lizards were tagged permanently by branding their venter, while also placing a temporary identification number using a non-toxic paint for rapid identification. Overall, the number of lizard captures and video footage have supported prior evidence of side-blotched lizards (N=32) being more abundant than the little stripped whiptail (N=13). Furthermore, diversity indices for both species calculated using data obtained from actual lizard captures ($H = 0.64$) was similar to the estimation using data from video captures only ($H = 0.59$).

**Keywords:** side-blotched whiptail lizard pitfall abundance