

# Management of urban waterways using saltgrass [*Distichlis spicata* var. *stricta* (L.) Greene] to improve water quality and land aesthetics

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## Study Area

- Along the Nemexas Drain
- Sunland Park, NM; West of El Paso, TX

## Objectives

- 1) Measure environmental conditions of the site that would affect saltgrass establishment and growth
- 2) Establish saltgrass along the bank of a peri-urban drain.

## Scope

- Measure soil and water physical and chemical properties at this site
- Transplant individual saltgrass specimens to evaluate the feasibility of establishing them as a re-vegetation strategy along the waterway



Transplanted Saltgrass



Early saltcedar germination

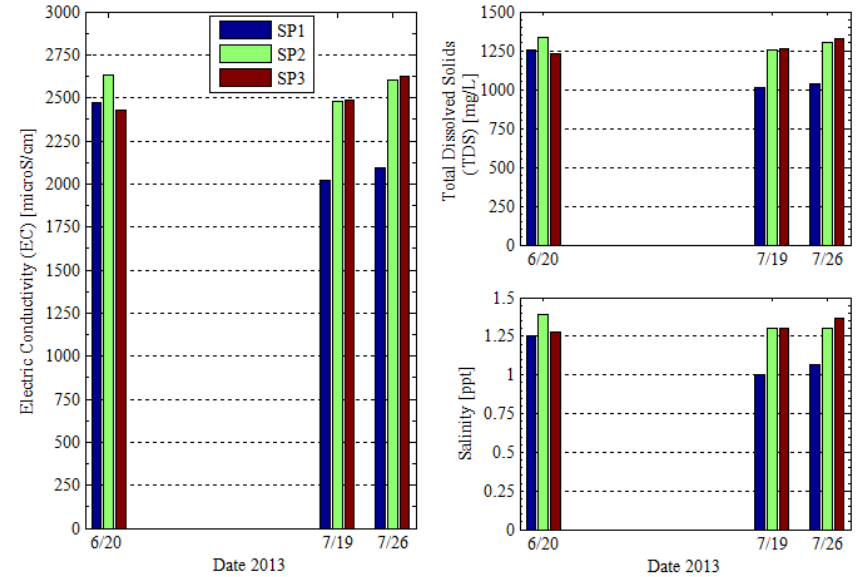


Bare Study Area

# Major Outcomes

- High salinity is not a limiting factor of the establishment and development
- The fine sand and loamy soil texture of the transplanted area compared well to other studies on saltgrass growth
- Saturated soils of the planted terrace provide good moisture for the plants
- A survival rate of 74 percent one week after transplantation of 140 individuals

## Drain Surface Water Quality



Saltgrass Row



SP2 at Study Area

## Terrace Soil Quality

6/20/13

