Green Stormwater Infrastructure Workshop	
Introduction to Urban Watershed Hydrology and Green Stormwater Infrastructure 9:00am-9:50am	- Urbanization concerns - Drought vs Desertification - Flooding and soil loss - Pollutants (sediment, heat, metals, petroleum products, nutrients, etc.) - Urban heat island effect - Habitat loss - Green Stormwater Infrastructure Benefits - Reduced flooding, increased infiltration, passive irrigation - Shading/cooling, pollutant remediation, habitat improvement - Improved commerce
GSI Design Considerations 10:00am-11:15am	- Rain garden and Bio-retention design considerations - Area, volume, and direction of runoff - Basin volume - Inlets, sediment traps, and soils - Soil texture and structure, porosity and infiltration, nutrient improvement, moisture retention case study - Vegetation and soil selection - Moisture needs vs tolerance to flooding, rooting volume, nutrient improvement, pH, pollutant removal, pollinator habitat - Additional details - Outlets, stormwater daylighting, traffic control, maintenance, utilities, etc. - Passive stormwater catchment at a residential scale - Minor active storage (i.e. rain barrels), stormwater conveyance away from building foundation, vegetation considerations (e.g. shade aspect, food, pollination), etc. - Rain gardens in public right-of-way near sidewalks
Lunch 11:15am-12:00pm	Part of this time can be used to travel to the first field trip site.
Site Visits: 12:00-1:45pm (Existing GSI); 2:00-3:00pm (Practice assessment); 3:00-4:00pm Return to presentation location for project design and final questions	- Field trip to view design pros/cons of rain gardens and bio-retention basins - Aspen Drive Office Condominium rain gardens (2016): 1925 Aspen Dr. - ECO School parking lot rain gardens (2023) & SFHS student parking lot rain gardens (2019); 2301 W. Zia Road - Camino del Bosque bio-retention basin (2015): 2829 Camino del Bosque - General Miles Park rain gardens (2018): 914 Camino Carlos Rey - Site Assessment and Design - NM State Library: 1209 Camino Carlos Rey (just north of General Miles Skateboard Park) - Assess site for runoff, pollutants, opportunities for catchment, etc. - Calculation of materials needed (soil, mulch, stone, etc.) - Final discussion, Additional resources, and Advanced topics in soil engineering