

Location: Central East Austin

Project type: Studio office

Year installed: 2009

Description: This extensive green roof covers a rectangular studio office space using a non-proprietary system designed for a 1:12 pitch shed roof.



Photos provided by Stanley Studio - Architects

Green roof area: 525 square feet

Green roof type: Extensive, monolithic, 4-5 inches of soil depth

Reason for green roof: Explore shallow depth limit for this region, insulation (thermal, sound), ambient cooling, educational/demo, aesthetic, wildlife habitat

Green roof components: Non-proprietary system of waterproof layer, aluminum edging, drainage/water retention layer, growth media, and plants

Vegetation: Native prairie grasses, wildflowers, ground covers (drought/heat tolerant)

Water use: Intermittent light irrigation during periods of heat and drought; system for using harvested sources (rain and AC condensate) nearing completion

Amenities: Adjacent PV array acts as awning and rainwater catchment for irrigation

Lessons learned: Settling of growth media over time reduces overall depth, mulching key component for moisture retention, prairie grasses prove hardy in extreme conditions, irrigation must occur within narrow dry/moist threshold.