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SELECTED PUBLICATIONS (Google Scholar H-Index = 56; citations in brackets)

Functional Ecology of Desert Plants and Ecosystems:

Smith SD, Monson RK, Anderson JE (1997) *Physiological Ecology of North American Desert Plants*. Springer-Verlag, Berlin. [423]

Monson RK, Smith SD (1982) Seasonal water potential components of Sonoran Desert plants. *Ecology* 63:113-123. [107]

Smith SD, Didden-Zopf B, Nobel PS (1984) High temperature responses of North American cacti. *Ecology* 65:643-651. [81]

Smith SD, Osmond CB (1987) Stem photosynthesis in a desert ephemeral, *Eriogonum inflatum*. *Oecologia* 72:533-541. [59]

Devitt DA, Smith SD (2002) Root channel macropores enhance downward movement of water in a Mojave Desert ecosystem. *Journal of Arid Environments* 50:99-108. [151]

Titus J, Nowak RS, Smith SD (2002) Soil resource heterogeneity in the Mojave Desert. *Journal of Arid Environments* 52:269-292. [243]

Effects of Elevated CO₂ on Desert Plants and Ecosystems:

Smith SD, Huxman TE *et al.* (2000) Elevated CO₂ increases productivity and invasive species success in an arid ecosystem. *Nature* 408:79-82. [597]

Smith SD, Strain BR, Sharkey TD (1987) Effects of CO₂ enrichment on four Great Basin grasses. *Functional Ecology* 1:139-143. [158]

Nowak RS . . . Smith SD (2004) Elevated atmospheric CO₂ does not conserve soil moisture in the Mojave Desert. *Ecology* 85:93-99. [59]

Housman DC . . . Smith SD (2006) Increases in desert shrub productivity under elevated CO₂ vary with seasonal water availability. *Ecosystems* 9: 374-385. [68]

Newingham BA . . . Smith SD, Nowak RS (2013) No cumulative effect of ten years of elevated [CO₂] on perennial plant biomass components in the Mojave Desert. *Global Change Biology* 19:2168. [59]

Evans RD . . . Smith SD, Nowak RS (2014) Greater ecosystem carbon in the Mojave Desert after ten years of exposure to elevated CO₂. *Nature Climate Change* 4:394-397. [37]

Smith SD *et al.* (2014) Long-term response of a Mojave Desert winter annual plant community to a whole ecosystem atmospheric CO₂ manipulation (FACE). *Global Change Biology* 20:879-892. [27]

Functional Ecology of Desert Riparian Plants:

Busch DE, Smith SD (1995) Mechanisms associated with decline of woody species in riparian ecosystems of the southwestern U.S. *Ecological Monographs* 65:347-370. [437]

Busch DE, Smith SD (1993) Effects of fire on water and salinity relations of riparian woody taxa. *Oecologia* 94:186-194. [167]

Cleverly JR, Smith SD, Sala A, Devitt DA (1997) Invasive capacity of *Tamarix ramosissima* in a Mojave Desert floodplain: the role of drought. *Oecologia* 111:12-18. [274]

Sala A, Smith SD, Devitt DA (1996) Water use by *Tamarix ramosissima* and associated phreatophytes in a Mojave Desert floodplain. *Ecological Applications* 6:888-898. [284]

Smith SD, Devitt DA, Sala A, Cleverly JR, Busch DE (1998) Water relations of riparian plants from warm desert regions. *Wetlands* 18:687-696. [216]

Synthesis Work:

Osmond CB . . . Berry JA, Billings WD . . . Smith SD *et al.* (1987) Stress physiology and the distribution of plants. *BioScience* 37:38-48. [281]

Weltzin J, Schwinning S *et al.* (2003) Assessing the response of terrestrial ecosystems to potential changes in precipitation. *BioScience* 53:941-952. [725]

Huxman TE, Smith MD *et al.* (2004) Convergence across biomes to a common rain use efficiency. *Nature* 429:651-654. [733]

Nowak RS, Ellsworth DS, Smith SD (2004) *Tansley Review*: Functional responses of plants to elevated atmospheric CO₂ – Do photosynthetic and productivity data from FACE experiments support early predictions? *New Phytologist* 162:253-280. [675]

Knapp AK, Beier C *et al.* (2008) Consequences of more extreme precipitation regimes for terrestrial ecosystems. *BioScience* 58:811-822. [677]