

New Publications and Grants from the Research Faculty at the DISL

Publications

Aronson, R. B and D. B. Blake. 2001. Global climate change and the origin of modern benthic communities in Antarctica. *American Zoologist* 41: 27-39.

Aronson, R. B., K. L. Heck, Jr. and **J. F. Valentine**. 2001. Measuring predation with tethering experiments. *Marine Ecology Progress Series* 214: 311-312.

Bologna, P.A.X. and **K.L. Heck, Jr.** 2000. Impact of pea crab parasitism on bay scallop reproductive potential. *Gulf Research Reports* 12: 43-46.

Graham, W.M. and *R. Kroutil*. 2001. Size-based prey selectivity and dietary shifts in the jellyfish, *Aurelia aurita*. *Journal of Plankton Research* 23: 67-74.

Peterson, B.J. and **K.L. Heck, Jr.** 2001. Positive interactions between suspension-feeding bivalves and seagrass—a facultative mutualism. *Marine Ecology Progress Series* 213: 143-155.

Purcell, J.E., D.L. Breitburg, M.B. Decker, **W.M. Graham**, M.J. Youngbluth, and K. Rastoff. 2001. Pelagic Cnidarians and Ctenophores in Low Dissolved Oxygen Environments. Effects of hypoxia on living resources, with emphasis on the northern Gulf of Mexico. In Rabalais, N.N. and R.E. Turner (eds.). pp 77-100, American Geophysical Union.

Havens, K. E., J. Hauxwell, A.C. Tyler, S. Thomas, K.J. McGlathery, **J. Cebrian**, I. Valiela, A.D. Steinman and S. Hwang. 2001. Complex interactions between autotrophs in shallow marine and freshwater ecosystems: implications for community responses to nutrient stress. *Environmental Pollution* 113: 95-107.

Hauxwell, J., **J. Cebrian**, C. Furlong, and I. Valiela. 2001. Macroalgal canopies contribute to eelgrass (*Zostera marina*) decline in temperate estuarine ecosystems. *Ecology* 82: 1007-1022.

Hauxwell J., **J. Cebrian**, J.A. Herrera-Silveira, J. Ramirez, A. Zaldivar, N. Gomez and N. Aranda-Cirerol. 2001. Measuring production of *Halodule wrightii* Ascherson: additional evidence suggests clipping underestimates growth rate. *Aquatic Botany* 69: 41-54.

Valentine, J.F. and **K.L. Heck, Jr.** 2001. The role of leaf nitrogen content in determining turtlegrass (*Thalassia testudinum*) grazing by a generalized herbivore in the northeastern Gulf of Mexico. *Journal of Experimental Marine Biology and Ecology* 258: 65-86.

Valiela, I., G. Tomasky, J. Hauxwell, M.L. Cole, **J. Cebrian** and K.D. Kroeger. 2000. Operationalizing sustainability: Management and risk assessment of land-derived nitrogen loads to estuaries. *Ecological Applications* 10(4): 1006-1023.

Valiela I., M.L. Cole, J. McClelland, J. Hauxwell, **J. Cebrian**, and S. Joye. 2000. Role of Salt Marshes as Part of Coastal Landscapes. In: Weinstein, Michael P. and Daniel A Kreeger, (eds.) "Concepts and Controversies in Tidal Marsh Ecology", Kluwer Academic Publishers, Dordrecht, The Netherlands. Pp. 23-28.

Williams, S.W. and **K.L. Heck, Jr.** 2001. Seagrass Communities, pp. 317-337 In: Bertness, M. D., S.D. Gaines and M.E. Hay (eds.). *Marine Community Ecology*, Sinauer Associates, Sunderland, Mass.

Grants

Aronson, R.B. National Science Foundation Geology and Paleontology Program. Disturbance and the Reorganization of Caribbean Reef Communities: Unique Event or Repeated Pattern? Budget Supplement. Principal Investigator, 2001-2002, \$15,000.

Graham, W.M. Mississippi-Alabama Sea Grant. Rapid response sampling to a recent non-indigenous jellyfish bloom. 2000-2001, \$15,000.

Graham, W.M. Mississippi-Alabama Sea Grant and Gulf of Mexico Program. Developing a model 'Dock-Watch' program to track nuisance and invasive jellyfish blooms. 2000-2001, \$60,001.

Graham, W.M. National Sea Grant College. Rapid response funding for ecological studies of the invasive jellyfish *Phyllorhiza punctata*. 2000-2001, \$75,922 (\$50,000 Sea Grant share).



Dr. John Valentine surveys the coral reefs and seagrass beds of Belize. (Photo by R. Aronson)

Graham, W.M. NOAA/DOI. Deriving the origin and nature of the invasive jellyfish, *Phyllorhiza punctata*, through molecular studies of native and non-native populations. 2001-2002, \$59,875.

Graham, W.M. Minerals Management Service. Cooperative Agreement: Study of oil and gas platforms in the northern Gulf of Mexico as habitat for jellyfish polyps. 2001-2002, \$106,443.

Heck, K. L. Jr. and **J.F. Valentine**. EPA (Gulf of Mexico Program). Effects of fragmentation on the structure and function of submerged aquatic vegetation (SAV) habitats in the northern Gulf of Mexico. 2001-2002, \$53,596.

Kiene, R.P. EPA (Alabama Center for Estuarine Studies). Osmolytes and their role as antioxidants in the salt marsh macrophyte *Spartina alterniflora*. 2001-2002, \$26,264.

Schoeder, W.W. and W. Nowlin. Texas Sea Grant College Program. Processes responsible for hypoxia in the Gulf of Mexico: A re-evaluation with new data and perspective. 2001-2004, \$83,206

Valentine, John, F. and *Anna M. Cinkovich*. EPA (Alabama Center for Estuarine Studies). The influence of shallow water hydrodynamics on the importance of seagrass detritus in estuarine food webs. 2001-2002, \$19,425.