

# CURRICULUM VITAE

**RICHARD GRANT GILMORE, JR., Ph.D.**

*President, Senior Scientist  
Estuarine, Coastal and Ocean Science, Inc.*

*5900 First St. SW  
Vero Beach, FL 32968  
772/562-9156  
rggilmorej@gmail.com*

## CONTENTS

	<b><u>PAGE</u></b>
I. PROFESSIONAL EXPERIENCE/RESEARCH & TEACHING.....	2
II. SCIENTIFIC CONTRIBUTIONS.....	4
III. RESEARCH GRANTS AND CONTRACTS.....	16
IV. RESEARCH EXPEDITIONS .....	21
V. GOVERNMENT AND COMMUNITY SERVICE.....	22

# I. PROFESSIONAL POSITIONS AND INTERESTS

## A. EDUCATION

Ph.D., Biological Sciences, Florida Institute of Technology, Melbourne, 1988

Dissertation: “**Subtropical seagrass fish communities: Population dynamics, species guilds and microhabitat associations in the Indian River Lagoon, Florida.**”. . i-xvii, 199 pp

M.S., Biological Sciences, University of West Florida, Pensacola, 1972

Thesis: “**Comparison of the halfbeak, *Hyporhamphus unifasciatus*, and the Atlantic needlefish, *Strongylura marina*, with regard to cephalic nerve patterns and relative brain size related to feeding behavior and associated phenomena (Pisces: Exocoetidae, Belonidae).**”

B.S., Biological Sciences, University of West Florida, Pensacola, 1969

## B. EXPERIENCE

Over 158 edited and reviewed publications, articles and book chapters in international, national, regional journals, magazines and books. Primary research includes marine/estuarine fish and community ecology, behavior, systematics, evolution and innovative technology development to study these topics. Technologies include manned and unmanned submersibles, remote and manned passive acoustic and visual systems, and a variety of quantitative and qualitative active/passive marine faunal assessment techniques, electro-shock, tracking techniques (CWT, PIT, RFID, ultrasonic tagging systems) to study fish ecology and behavior. Studies emphasize behavior, migration and fish distribution, biogeographic patterns, population dynamics, community relationships, trophic interactions, habitat relationships and reproductive biology in neotropical/subtropical deep sea reef habitat, continental shelf, estuarine seagrass, mangrove forest and freshwater tributaries in Florida, the Caribbean basin and the Eastern Pacific. Veteran of 355 manned submersible dives for ichthyological research in the American tropics, Atlantic & Pacific. My international expeditions using deep sea submarines have also been responsible for the discovery of over 120 new fish species and taxonomic publications, new species descriptions over the past 50 years. Studies were supported by over 104 extramural research and education grants totally more than \$5 million. I advised 56 research assistants and graduate students, served on adjunct, or joint appointment faculty at six state and private universities within the United States, one abroad (Frei Universitat Berlin). I taught undergraduate biology and ecology 1972 to 1982. Participant/co-organizer of 22 nationally and internationally televised documentaries of marine research (Discovery Channel, National Geographic, Audubon, FOX, New Zealand TV). Harbor Branch Oceanographic Institution research division director supervising fifty employees and staff scientists, 1988 -1994.

## C. EMPLOYMENT

### 1. RESEARCH AND ADMINISTRATIVE POSITIONS, 1971 to 2024.

**Estuarine, Coastal and Ocean Science, Inc.,** Vero Beach, FL, 2004 - 2024

**Senior scientist,** company president, 2004-present (ECOS) conducts research (R & D) in estuarine/marine science using all scientific methods including innovative technologies such as passive and active acoustic systems, UW visual systems and robotics. Funding from variety of federal, state, local governmental agencies and private interests.

**Dynamac Corporation, Kennedy Space Center, Florida, 1999-2004.**

**Senior Aquatic Scientist,** 1999 - 2004

Created innovative estuarine and marine research and technology development programs for NASA/NOAA & Dynamac Corporation under contract with the National Aeronautics and Space Administration at the Kennedy Space Center, Florida. Research programs funded through NASA, NOAA, USGS and FFWCC.

**Harbor Branch Oceanographic Institution, Ft. Pierce, Florida, 1971-1998**

**Senior Scientist, 1993-1998** Annually conducted 4-9 externally funded research programs within the Fish Biology Department, Harbor Branch Oceanographic Institution, Inc. (HBOI) Supervised from two to nine graduate students from four universities, European and U.S. and HBOI post-doctoral fellows within a \$170-400,000 annual budget.

**Research Division Director/Senior Scientist - 1989 -1994**, *HBOI Division of Environmental, Coastal, and Ocean Sciences* (1991-1994); *Division of Coastal, Environmental and Aquaculture Sciences* (1989-1991). Managed administration for eight to eleven research and support departments, approximately 30-50 employees, included \$3 million annual budget, strategic goals, program and facility development. **Associate Scientist, 1989-1992; Assistant Research Scientist/Assistant Scientist, 1976-1989.; Research Associate, 1974-1976; Research Assistant, 1971-1974.**

## **2. ACADEMIC - FACULTY POSITIONS:**

**33 years Graduate and Undergraduate FACULTY; CHAIRED or CO-CHAIR 35 Graduate Students: 32 Master of Science; 3 Ph.D.; Hosted 5 Post-Doctoral Researchers, 1978-1995:** Dr. Hin Kiu Mok, Dr. Edward Matheson, Dr. Joseph Luczkovich, Dr. Mark Peterson and Dr. Sabine Alshuth.

**FLORIDA INSTITUTE OF TECHNOLOGY: Dept. of Biological Sciences; Dept. Environmental & Ocean Sciences Faculty-Joint Appointment, Adjunct Faculty, 1991- 2005; Adjunct Graduate Instructor, 1975 - 1983:** Chair graduate committees (7 Ph.D, 7 MS; co-chair 4 PhD, 15 MS). taught courses in Tropical Fish Ecology and Reef Fish Ecology 1990 - 1997, Systematics and Evolution of Fishes 2002; graduate Ichthyology 1975.

### **HARBOR BRANCH OCEANOGRAPHIC INSTITUTION EDUCATION PROGRAM.**

**Graduate Instructor, 1990- 1997:** Developed education program and facilities with colleagues and taught six graduate level courses in Tropical Fish Ecology. Credit accepted through student home university, FIT and FAU.

**Postdoctoral Fellows, 1978- 1994,** Supervised research and budgetary activities of five post-doctoral fellows: Dr. Hin Kiu Mok (1979-81); Dr. Richard Matheson (1984-86); Dr. Joseph Luczkovich (1987-88); Dr. Mark Peterson (1987-89); Dr. Sabine Alshuth (1992-1994).

### **FLORIDA ATLANTIC UNIVERSITY, BOCA RATON: Department of Biological Sciences.**

**Adjunct Faculty 1991- 1998:** Co-chair & sit on graduate committees. Taught accredited courses in Tropical Fish Ecology, Reef Fish Ecology and co-instructed Identification of Florida Fishes w Dr. Jaime Villia

### **UNIVERSITY OF MIAMI, ROSENSTIEL SCHOOL OF MARINE AND ATMOSPHERIC SCIENCES:**

**Dept. of Marine Science. 1993-1997:** Co-chaired and committee service two Ph.D. students in Marine Sciences, Dr. Kenneth Lindeman and Dr. Gerald Lorenz..

**UNIVERSITY OF SOUTH FLORIDA, 2006 – 2010:** Graduate committee, Ph.D. Student.

**NOVA SE UNIVERSITY: 2005-2007:** Graduate committee, M.S. student.

### **FREIE UNIVERSITÄT, BERLIN, GERMANY: Department of Biological Sciences.**

**Adjunct Faculty 1991- 1994:** Co-chaired one MS student for his Diplomarbeit.in biological sciences. Dr. Oliver Putz.

### **INDIAN RIVER COMMUNITY COLLEGE (now INDIAN RIVER STATE COLLEGE), Ft. Pierce, Fla. 10 years.**

**Assistant Professor, 1973-1983:** Assistant Professor at Indian River Community College, Rank II Florida Teaching Certificate (No. 344259). Taught 16 freshman & sophomore courses in general biology, ecology, fish biology.

## II. SCIENTIFIC CONTRIBUTIONS

1. **Edited POPULAR PUBLICATIONS** 2008 to 2013: **Florida Sportsman Magazine**, 3- 4 million+ subscribers: Wrote monthly column entitled: “**Sportsman Biologist**” on a variety of topics to educate the fishing public on fish life history and ecology.

### **2. Refereed SCIENTIFIC PUBLICATIONS**

Gilmore, R.G., Jr. **Biology is a historical science and does not exist without a historical perspective: Is this why millennial science is littered with false discoveries?** Marine Fisheries Review. In review.

Mok H-K, Chang Y-W, Fine ML, Soong K, Chen Y-Y, Gilmore RG, Chiu LY-S, Hsu S-L, Chang H-J. 2024. **Pulsed sounds caused by internal oxygen transport during photosynthesis in the seagrass *Halophila ovalis***. PeerJ 12:e18114 DOI 10.7717/peerj.18114. International Association of Biological Oceanography.

Baldwin, C.C., L. Tornabene, D.R. Robertson, A. Nonaka and R.G. Gilmore. 2018. **More new deep-reef basslets (Teleostei, Grammatidae, *Lipogramma*), with updates on the eco-evolutionary relationships within the genus**. ZooKeys 729: 129-161 (2018) doi: 10.3897/zookeys.729.21842. <http://zookeys.pensoft.net>

Gilmore, R.G., Jr. 2016. **You can’t catch a fish with a robot**. Gulf and Caribbean Research, Vol. 27, Issue 1: ii-xiv.

Gilmore, R.G., Jr. 2016. **Ecospecies profile: Black Sea Bass**. Florida Fish and Wildlife Conservation Commission, Marine Research Institute, St. Petersburg, FL and the South Atlantic Fisheries Management Council, Charleston, SC. 105 pp.

Tornabene, L., J.L. Van Tassell, R. G. Gilmore, D.R. Robertson, F. Young and C.C. Baldwin. 2016. **Molecular phylogeny, analysis of character evolution, and submersible collections enable a new classification of a diverse group of gobies (Teleostei: Gobiidae: Nes subgroup), including nine new species and four new genera**. Zool. J. Linnean Soc. 2016. Pp. 1-49, w. 39 figs.

Gilmore, R.G., Jr. 2015. **Ecospecies profile: Gag Grouper**. Florida Fish and Wildlife Conservation Commission, Marine Research Institute, St. Petersburg, FL and the South Atlantic Fisheries Management Council, Charleston, SC. 72 pp.

Dale, P.E., J.M. Knight, L.Griffin, J. Beidler, R. Brockmeyer, D. Carlson, D.Cox, J. David, V. Encomio, G. Gilmore, P. Haydt, R. Lewis, J. McNelly, S.M. O’Connell, B. Perry, J. Rey and J. Tucker. 2014. **Multiagency perspectives on managing mangrove wetlands and the mosquitos they produce**. JAMCA

Bryan, D.R., K.Kilfoyle, R. G. Gilmore, Jr. and R.E. Spieler. 2013. **Characterization of the mesophotic reef fish community in south Florida, USA**. Journ. Applied Ichthyology, 29(2013): 108-117.

Messing, C. G., K. Stanley, J. K. Reed, and R. G.Gilmore. 2013. **The first in situ habitat observations and images of the Caribbean roughshark, *Oxynotus caribbaeus* Cervigon, 1961 (Squaliformes: Oxynotidae)**. PROC. BIOL. SOC. WASH. 126(3):000–000. 2013.

Gilmore, Jr., R.G. 2012. **Ecospecies: Speckled Hind (*Epinephelus drummondhayi*) Species Life History FLELMR Code: 167698**. Florida Fish and Wildlife Conserv. Commission, St. Petersburg, FL., South Atlantic Fisheries Management Council, Charleston, SC: 1-38.

Gilmore, Jr., R.G. 2012. **Ecospecies: Warsaw Grouper (*Hyporhodus nigritus*) Species Life History FLELMR Code: 167704**. Florida Fish and Wildlife Conserv. Commission, St. Petersburg, FL. , South Atlantic Fisheries Management Council, Charleston, SC: 1-42

Baumberger, R.E., N.J. Brown-Peterson, John Reed and R.G. Gilmore. 2010. **Spawning aggregation of beardfish, *Polymixia lowei*, in a deep-water sinkhole off the Florida Keys**. Copeia 2010, No.1, 41-46.

- Lewis, R.R. III, and R.G. Gilmore, Jr., 2007. **Important Considerations to Achieve Successful Mangrove Forest Restoration with Optimum Fish Habitat.** Proc. International Mangroves as Fish Habitat Symposium, Bull. Mar. Sci. 80(3): 823-837.
- Reed, J.K., C.C. Koenig, A.N. Shepard and R.G. Gilmore, Jr. 2007. **Long term monitoring of a deep-water coral reef: effects of bottom trawling.** Proc. Am. Acad. Underwater Sciences 26<sup>th</sup> Symposium Dauphin Island, AL. AAUS, 2007. Pp. 169 - 179, In. Pollock, NW, Godfrey JM, eds. Diving for Science 2007.
- Rountree, R.A. , R.G. Gilmore, C.A. Goudey, A.D. Hawkins, J.J. Luczkovich, and D.A. Mann. 2006. **Listening to fish: applications of passive acoustics to fisheries science.** Feature Fisheries Research in Fisheries, 31(9): 433- 446.
- Gilmore, Jr., R.G., O. Putz and J.W. Dodrill. 2005. Chapter 14. **Oophagy, intrauterine cannibalism and reproductive strategy in lamnoid sharks.** pp. 435-462, In, W. Hamlett (ed.). Reproductive Biology and Phylogeny of Chondrichthyes. Science Publishers, Inc., Enfield, NH, USA.
- Reed, J. K., A.N. Shepard, C.C. Koenig, K.C. Scanlon, R.G. Gilmore. 2005. **Mapping, habitat characterization, and fish surveys of the deep-water *Oculina* coral reef marine protected area: a review of historical and current research.** Pp. 443-465, In A. Freiwald and JM Roberts (eds). Cold-water Corals and Ecosystems, Springer-Verlag, Berlin.
- Gilmore, R.G., A. M. Clark and J. Cooke. 2003. **Technologies for sustained biological resource observations with potential applications in coastal homeland security.** Marine Tech. Soc. Journal, Vol. 37(3). pp. 134- 141.
- Gilmore, Jr., R.G. 2003. **Chapter 11. Sound production in the spotted seatrout.** pp. 177-195, In. The biology of the spotted seatrout, S.A. Bortone, ed. CRC Press, Boca Raton, FL.
- Gilmore, Jr., R.G. 2002. **Passive acoustic transects: mating calls and spawning ecology in east Florida sciaenids.** pp 39-48, In R. Rountree, C. Goudey and T. Hawkins, eds. Listening to Fish: Passive Acoustic Applications in Marine Fisheries. Proc. International Workshop Applications of Passive Acoustics to Fisheries, April 8-10, 2002, MIT Sea Grant Program.
- Gilmore, R.G. and D.A. Greenfield. 2002. **Gerreidae**, Pgs. 1506-1521, In FAO Species Identification sheets for Central Western Atlantic, FAO, Rome, Italy.
- Gilmore, R.G. 2001. **A comparative study of manned and unmanned submersible capabilities, generic sensor systems needs for the study of mobile marine fauna.** Symposium proceedings: Generic sensor system needs for undersea research vehicles, sponsored by the Autonomous Undersea Systems Institute, Oceanology 2001, Miami, FL.
- Gilmore, R.G. 2001. **The Origin of Florida Fish and Fisheries.** Proc. Gulf and Caribbean Fisheries Institute, 52<sup>nd</sup> Annual Meeting, Key West, Florida. 713-731.
- Claro, R., R.G. Gilmore, C.R. Robins and J.E. McCosker. 2000. **Nuevos registros para la ictiofauna marina de Cuba [New records for the marine ichthyofauna from Cuba].** Avicennia, 2000, 12/13: 19-24
- Musick, J.A., M.M. Harbin, S.A. Berkeley, G.H. Burgess, A.M. Eklund, L. Findley, R.G. Gilmore, J.T. Golden, D.S. Ha, G.R. Huntsman, J.C. McGovern, S.J. Parker, S.G. Poss, E. Sala, T.W. Schmidt, G.R. Sedberry, H. Weeks and S.G. Wright. 2000. **Marine, Estuarine, and Diadromous Fish Stocks at Risk of Extinction in North America (Exclusive of Pacific Salmonids).** Fisheries, 25(11): 6-30.
- Gilmore, R.G. 1999. **A National Treasure: Fish Biodiversity of the Indian River Lagoon.** Florida Naturalist, 72(1): 22-23.
- Gilmore, R.G. 1997. ***Lipogramma robinsi*, a new grammatid fish from the tropical western Atlantic with descriptive and distributional notes on *L. flavescens* and *L. anabantoides*.** Bull Mar. Sci. 60(3): 782-788.
- Brockmeyer, Jr., R.E., J.R. Rey, R.W. Virnstein, R.G. Gilmore and L. Earnest. 1997. **Rehabilitation of impounded estuarine wetlands by hydrologic reconnection to the Indian River Lagoon, Florida (USA).** Wetlands Ecol. And Manag., 4(2): 93-109.

McCosker, J.E., G. Merlen, D.J. Long, R.G. Gilmore and C. Villon. 1997. **Deepslope fishes collected during the 1995 eruption of Isla Fernandina, Galapagos.** Noticias de Galapagos, (May) 58: 22-26.

Gilmore, R.G. 1995. **Environmental and biogeographic factors influencing ichthyofaunal diversity: Indian River Lagoon.** Bull. Mar. Sci., 57(1): 153-170.

Swain, H.M., D.R. Breining, D.S. Busby, K.B. Clark, S.A. Cook, R.A. Day, D.E. De Freese, R.G. Gilmore, A.W. Hart, C.R. Hinkle, D.A. McArdle, P.M. Mikkelsen, W.G. Nelson and A. J. Zahorcak. 1995. **Introduction, Biodiversity of the Indian River Lagoon Conf..** Bull. Mar. Sci., 57(1): 1-7.

Luczkovich, J.J., S.F. Norton and R.G. Gilmore. 1995. **The influence of oral anatomy on prey selection during the ontogeny of two percid fishes, *Lagodon rhomboides* and *Centropomus undecimalis*.** Envir. Biol. Fishes. 44: 79-95.

Alshuth, S. and R.G. Gilmore. 1995. **Egg and early larval characteristics of *Pogonias cromis*, *Bairdiella chrysoura* and *Cynoscion nebulosus* (Pisces: Sciaenidae), from the Indian River Lagoon, Florida.** Internat. Council Explor. Sea, Biol. Ocean. Comm., C.M. 1995/L:17, Biol. Ocean. Comm. Ref. M. (HBOI Misc. Publ. 215.)

Alshuth, S. and R.G. Gilmore. 1994. **Salinity and temperature tolerance limits for larval spotted seatrout, *Cynoscion nebulosus* C. (Pisces: Sciaenidae).** Internat. Council Explor. Sea, Biol. Ocean. Comm., C.M. 1994/L:17, Ref. M. (HBOI Misc. Publ. 213.)

Gilmore, R.G. 1993. **Reproductive strategies in Lamnoid sharks.** Env. Biol. Fishes 38: 95-114.

Gilmore, R.G. and S.C. Snedaker. 1993. **Chapter 5: Mangrove Forests** pp 165-198 In W. H. Martin, S.G. Boyce and A.C. Echternacht (eds.) Biodiversity of the Southeastern United States: Lowland Terrestrial Communities. John Wiley & Sons, Inc., Publishers, N.Y. 502 pp.

Tyler, J.C., C.R. Robins, C.L. Smith and R.G. Gilmore. 1992. **Deepwater populations of the western Atlantic pearlfish, *Carapus bermudensis* (Ophidiiformes: Carapidae).** Bull. Mar. Sci. 51: 218-223.

Gilmore, R.G., C.R. Gilbert, F.F. Snelson and R.W. Yerger. 1992. **Coastal habitat description (pp. xxxii-xl) and species accounts for *Microphis brachyurus lineatus* (pp. 73-78); *Gobiomorus dormitor* (pp. 105-111); *Awaous tajasica* (pp. 112-117); *Gobionellus pseudofasciatus* (pp. 118-121); *Bairdiella sanctaeluciae* (pp. 218-222) and *G. stigmaturus* (pp. 223-226).** In C.R. Gilbert (ed.). Rare and Endangered Biota of Florida: Volume Four, Fishes. Univ. Presses of Florida. 247 pp.

Gilmore, R.G. and R.S. Jones. 1992. **Color variation and associated behavior in the epinepheline groupers, *Mycteroperca microlepis* (Goode and Bean) and *M. phenax* Jordan and Swain.** Bull. Mar. Sci. 51(1): 83-103.

Gilmore, R.G. 1991. **Reproductive biology of Lamnoid sharks,** pp. 64-67 In Discovering Sharks, S.H. Gruber (ed.), Am. Lit. Soc. Vol. 19(4), Vol. 20(1).

Peterson, M.S. and R. Grant Gilmore, Jr. 1991. **Eco-physiology of juvenile snook *Centropomus undecimalis* (Bloch): Life-history implications.** Bull. Mar. Sci. 48: 46-57.

Gilmore, R.G. 1990. **Nekton-Biomass and Abundance.** pp. 129-135 in: Chapter in Seagrass Research Methods. P. McRoy and R. Phillips (Eds.). UNESCO. 210 pp.

O'Bryan, P.D., D.B. Carlson and R.G. Gilmore. 1990. **Salt marsh mitigation and example of balancing mosquito control, natural resources and development interests.** Fla. Sci. 53: 189-203.

Gilmore, R.G. and R.S. Jones. 1988. ***Lipogramma flavescens*, a new grammid fish from the Bahama Islands with descriptive and distribution notes on *L. evides* and *L. anabantoides*.** Bull. Mar. Sci., 42: 435-445.

Peterson, M.S. and R.G. Gilmore, Jr. 1988. **Hematocrit, osmolality and ion concentration in fishes: consideration of circadian patterns in the experimental design.** J. Exp. Mar. Biol. Ecol., 121(1): 73-78.

- Gilmore, R.G. 1987a. **Fish, macrocrustacean and avian population dynamics and cohabitation in tidally influenced impounded subtropical wetlands.** pp. 373-394 in Whitman, W.R. and W.H. Meredith, eds. Proceedings of a Symposium on Waterfowl and Wetlands Management in the Coastal Zone of the Atlantic Flyway. Delaware Depart. Nat. Res. and Envir. Control, Dover, Delaware.
- Gilmore, R.G. 1987b. **Subtropical-tropical seagrass communities of the Southeastern United States: Fishes and fish communities.** Pp. 117-137 in: M.J. Durako, R.C. Phillips and R.R. Lewis III (Eds.). Proceedings of the Symposium on Subtropical-tropical seagrasses of the Southeastern United States. Marine Research Publication 42, Fla. Dept. Nat. Res.
- Lewis, R.R. III, R.G. Gilmore, Jr., D.W. Crewz and W.E. Odum. 1985. **Mangrove habitat and fishery resources of Florida.** Pp. 281-336 in W. Seaman, Jr. (Ed.), Florida Aquatic Habitat and Fishery Resources. Florida Chapter, American Fisheries Society, Kissimmee, Florida. 543 pp.
- Carlson, D., R.G. Gilmore and J. Rey. 1985. **Perspectives on management of impounded salt marsh habitats in Florida.** Proceedings of the 12th Annual Conference on Wetlands Restoration and Creation sponsored by Hillsborough Community College Environmental Studies Center, Tampa.
- Kerschner, B.A., M.S. Peterson and R.G. Gilmore. 1985. **Ecotopic and ontogenetic trophic variation in mojaras (Gerreidae).** Estuaries, 8(3): 311-322.
- Gilmore, R.G., J.W. Dodrill and P.A. Linley. 1983. **Embryonic development of the sand tiger shark *Odontaspis taurus Rafinesque*.** Fishery Bulletin 81: 201-225.
- Gilmore, R.G., C.J. Donohoe and D.W. Cooke. 1983. **Observations on the distribution and biology of east-central Florida populations of the common snook, *Centropomus undecimalis* (Bloch).** Florida Scientist, Special Supplemental Issue, 46: 313-336.
- Gilmore, R.G., P.A. Hastings and D.J. Herrema. 1983. **Ichthyofaunal additions to the Indian River lagoon and adjacent waters, east-central Florida.** Florida Scientist 46: 22-30.
- Gilmore, R.G. 1983. **Observations on the embryos of the longfin mako, *Isurus paucus* Guitart Manday and bigeye thresher shark, *Alopias superciliosus* (Lowe).** Copeia: 375-382.
- Mok, H.K. and R.G. Gilmore. 1983. **Analysis of sound production in estuarine spawning aggregations of *Pogonias cromis*, *Bairdiella chrysoura*, and *Cynoscion nebulosus* (Sciaenidae).** Academia Sinica Bull. Institute Zool. Academia Sinica 22: 157-186.
- Gilmore, R.G. and P.A. Hastings. 1983. **Observations on the ecology and distribution of certain tropical peripheral fishes in Florida.** Florida Scientist 46: 31-51.
- Gilmore, R.G., D.W. Cooke and C.J. Donohoe. 1982. **A comparison of the fish populations and habitat in open and closed salt marsh impoundments in east-central Florida.** Northeast Gulf Science, 5: 25-37.
- Gilmore, R.G., P.A. Hastings and G.R. Kulczycki. 1981. **Crystalline rotenone as a reliable and effective fish toxin.** Florida Scientist 44: 193-203.
- Reed, J.K. and R.G. Gilmore. 1981. **Inshore occurrence and nuptial behavior of the roughtail stingray, *Dasyatis centroura* (Dasyatidae), on the continental shelf, east-central Florida.** Northeast Gulf Science 5: 59-62.
- Gumula, M.L. and R.G. Gilmore. 1980. **Spoil islands: determining how local governments can manage them.** Proceedings of Coastal Zone 1980: The Second Symposium on Management, Conservation and Utilization of the Coastal Zone. 10 pp.
- Gilmore, R.G. 1979. ***Varicus marilynae*, a new gobiid fish from Florida.** Copeia 1979: 126-128.
- Gilmore, R.G., K.H. Bullock and F.H. Berry. 1979. **Hypothermal mortality in marine fishes of south, central Florida, January, 1977.** Northeast Gulf Science 2: 77-97.

- Dodrill, J.W. and R.G. Gilmore. 1979. **First North American continental record of the longfin mako (*Isurus paucus* Guitart Mandy).** Florida Scientist 24: 52-58.
- Gilmore, R.G., J.K. Holt, R.S. Jones, G.R. Kulczycki, L.G. MacDowell, III, and W.C. Magley. 1978. **Portable tripod drop-net for estuarine fish studies.** Fishery Bulletin 76: 285-289.
- Dodrill, J.W. and R.G. Gilmore. 1978. **Land birds in stomachs of tigersharks *Galeocerdo cuvieri* (Peron and Lesueur).** The AUK 95: 585-586.
- Gilmore, R.G. 1978. **The current status of the fish fauna of the Indian River lagoon.** Proceedings of Brevard Water Resources Conference 1: 137-151.
- Gilmore, R.G. 1977. **Fishes of the Indian River lagoon and adjacent waters, Florida.** Bulletin of the Florida State Museum 22: 101-147.
- Gilmore, R.G. 1977. **Notes on the opossum pipefish, *Oostethus lineatus* from the Indian River lagoon and vicinity, Florida.** Copeia 1977: 781-783.
- Gilmore, R.G. and R.H. Gore. 1974. **Observation on a sea urchin capturing a juvenile mullet.** Florida Scientist 37: 52-56.

### **3. TECHNICAL REPORTS: FROM EXTRAMURAL FUNDING PROGRAMS**

- Gilmore, R.G. 2018-2021: Martin County Commission. Information and resources for a **Petition to List as Endangered and Threatened Rare Indigenous Freshwater Fishes of SE Florida Tributaries.**
- Gilmore, R.G. 2018. Final Report: Coastal Conservation Association Sponsored East Florida **Assessment of Spawning by the Spotted Seatrout.** December 2018: 31 pp.
- Gilmore, R.G. & M. Mazzeo. 2016. **Feeding behavior of bottlenose dolphin via passive acoustic sensors.**
- Gilmore, R.G. & V. Encomio. 2015. **Remote sensing of oyster reef health and fish spawning using acoustic observatories.**
- Gilmore, R.G. & V. Encomio. 2015. **Seagrass fish population assessment.**
- Gilmore, R.G. 2011. FOS.NOAA. **Acoustic signatures of oyster reef communities.**
- Gilmore, R.G. 2010/2011.. Lewis Environmental Inc., **Mangrove fish population restoration, Tampa Bay**
- Gilmore, R.G. 2010/2011. NOAA.NOVA U. **Deep reef, *Lophelia* coral fish populations, Florida Straits**
- Gilmore, R.G. 2009. SFWMD. **Invertebrate Zooplankton, St. Lucie River**
- Gilmore, R.G. 2009. Ecological Associates. Martin County/ACE/NOAA. **Continental Shelf Fisheries Habitat**
- Gilmore, R.G. 2009. Coastal Tech. St. Lucie County/ACE/NOAA. **Continental Shelf Fisheries Habitat**
- Gilmore, R.G. 2008. SFWMD. **Larval Fish Distribution, Snook Migration, St. Lucie River.**
- Gilmore, R.G. 2007. **Fish monitoring final report 2006 work for the RECOVER monitoring and assessment plan: Northern Estuaries.** . SFWMD -Florida Oceanographic Society, Stuart, Florida. **Snook tagging, Acoustic Observatory, Fish Spawning, Seagrass Fish Populations.**
- Gilmore, R.G. 2006. **Automated monitoring: Artificial reef project.** Final Report to Florida Space Authority, Cape Canaveral, FL, & Florida Fish and Wildlife Conserv. Comm., FFWCC Grant No. 0403, Agreement No. 04026.
- Gilmore, R. G. 2005. **RECOVER fish module components, indicator species, monitoring techniques and hypotheses.** . SFWMD, W. Palm Beach.
- Gilmore, R.G. 2004. **Loxahatchee River Study: Phase II. Critical habitat for fish species, emphasis, juvenile snook, *Centropomus* spp.** . SFWMD, W. Palm Beach.
- Gilmore, R.G. 2004. **Loxahatchee River biological studies: Phase I, Zooplankton dynamics, Summer 2004.** Final Report to SFWMD, W. Palm Beach.
- Gilmore, R.G. 2003. **Water resources management plan: Criteria for isolation of critical fish spawning and nursery habitat, Canaveral National Seashore.** NPS/USGS Final Grant Rpt.
- Gilmore, R.G. 2000. **Life history and critical habitat/environment of opossum pipefish, *Mycrophis brachyurus lineatus*:** A population viability analysis status report. Final Report to Protected Resources Division, National Mar. Fisheries Service, Washington, D.C.



Gilmore, R.G. 1999. **The opossum pipefish, *Mycrophis brachyurus lineatus*: A candidate for NOAA/NMFS endangered marine species designation.** Final Candidate Report to Protected Resources Division, Natl. Mar. Fish. Service, Washington, D.C.

Gilmore, R.G. 1998. **Wetland ecosystem management: Indian River Lagoon, Florida, USA: A comprehensive review of Indian River Lagoon wetland ecosystems and human influence on these systems.** Final Rpt., Nat. Est. Prog. & St. Johns River Water Manag. District. Contract No. 98W230: 243 pgs.

Gilmore, R.G. 1998. **Wetland impoundment management: Influence on stock enhancement, survival and migration in the striped mullet, *Mugil cephalus* Linnaeus.** Final Rpt. Fla. Dep. Envir. Prot. Proj. No. MR074. : 44 pgs. + Appendix.

Gilmore 1996.. **Isolation of spawning groups of spotted seatrout, *Cynoscion nebulosus*, using passive hydroacoustic methodologies.** Final Report, 21 November 1996, 12 pp., Fla. Dept. Environ. Protection, Mar. Res. Inst., St. Petersburg, Fla. Subcontract to Dr. Roy Crabtree, Principal Investigator, study entitled: The reproductive biology of spotted seatrout, *Cynoscion nebulosus*, in the Indian River Lagoon.

Gilmore, R. G. 1995. **Tarpon recruitment to impounded wetlands of the Indian River Lagoon in the vicinity of Fort Pierce Inlet, St. Lucie County Florida.** 28 pgs. St. Lucie County.

Gilmore, R.G., Jr. 1994. **Environmental parameters associated with spawning, larval dispersal and early life history of the spotted seatrout, *Cynoscion nebulosus* (Cuvier).** Final Program Rev., Contract No. LCD 000. Mar. Res. Inst., Fla. Dept. Environ. Protection, St. Petersburg, Fla.

Gilmore, R. Grant, Ronald E. Brockmeyer, Douglas M. Scheidt and Steven J. VanderKooy. 1992. **Final Report: Nekton sampling program evaluation of faunal utilization of a created tidal marsh, Grand Harbor, Indian River County, Florida.** 20 pp., 12 tbls., 22 figs. + 1 app.

Gilmore, R. Grant and M. Dennis Hanisak. 1991. **Final Report: Environmental survey relative to the expansion and development of the Port of Fort Pierce, St. Lucie County Port and Airport Authority.** 187 pp.

Gilmore, R.G., D. Scheidt, R. Brockmeyer and S. VanderKooy. 1990. **Final Report: Spatial and temporal dynamics of secondary productivity in high marsh habitats vegetated with algae, herbaceous and woody flora under natural and managed hydrological cycles.** Fla. Dept. Envir. Reg. CZM-258 (Coastal Zone Manag.) through the Indian River Mosquito Control District. 21 pp., 8 tbls., 21 figs.

Gilmore, R.G. and M.S. Peterson. 1989. **Interspecific differences in metabolic adaptations to hypoxia and mass mortalities of impounded salt marsh and mangrove swamp fishes.** 44 pp, 12 figs. Final Report: Fla. Dept. Envir. Reg. CZM - 194 (II) (Coastal Zone Manag.) through the Indian River Mosquito Control District.

Gilmore, R.G., R.E. Brockmeyer and D.M. Scheidt. 1988. **Induced fish migration as a means of reducing hypoxic fish mortalities in impounded salt-marsh and mangrove swamp habitats.** Final Report: Fla. Dept. Health and Rehabilitative Serv. Contract No. LCNA6.

Gilmore, R.G. and R. Eames. 1987. **Fish, macrocrustacean and hydrological studies of an impounded subtropical high marsh.** Final Rept., Fla. Dept. Environ. Reg., Coast Zone Manag. Contract No. 167. 17 pp.

Gilmore, R.G., P.B. Hood, R.E. Brockmeyer, Jr. and D.M. Scheidt. 1987. **Final Report: Effects of increased culvert density on utilization of marsh impoundments by fishes and macrocrustaceans.** Fla. Dept. Health and Rehabilitative Serv. Contract No. LD703. 43 pp., 21 Tbls., 46 Figs.

Gilmore, R.G., P.B. Hood and J.J. Luczkovich. 1987. **Fishes occurring within a breached salt-marsh impoundment (Number 19B) in St. Lucie County, Florida:** A report for the St. Lucie County Mosquito Control District. Harbor Branch Ocean. Inst. Work Order No. 705314. 7 pp. 2 Tabls., 1 Fig.

Gilmore, R.G. and D.J. Peters. 1986. **Rotational management impoundment affects on fish, macrocrustacean and avian population dynamics and basic hydrological parameters.** Final Report, Fla. Dept. Environ. Reg., Coast. Zone Manag. Contract No. 122. 78 pp.

Gilmore, R.G., B.J. McLaughlin and D.M. Tremain. 1986. **Fish and macrocrustacean utilization of an impounded and managed red mangrove swamp with a discussion of the resource value of managed mangrove swamp habitat.** Final Report., Homer Hoyt Inst. 132 pp.

Gilmore, R.G., P.B. Hood, R.E. Brockmeyer, Jr. and D.M. Scheidt. 1986. **Final Report: Impoundment No. 16A and 24, St. Lucie County, John Smith Impoundment, Brevard County, Florida: Water control systems and their hydrological impact.** Fla. Dept. Health and Rehabilitative Serv. Contract No. LD704. 63 pp., 20 Tbls., 79 Figs.

Gilmore, R.G. 1985. **The productive web of life in the estuary. pp. 27-32. in Proceedings of Indian River Resources Symposium.** D.D. Barile (ed.). Fla. Sea Grant Project No. 84-28.

Gilmore, R.G., P.B. Hood, R.E. Brockmeyer, Jr. and D.M. Scheidt. 1985. **Final report salt marsh fishery management and restoration technique analysis.** Fla. Sea Grant Proj. No. R/C-E-23 (E/T-3-PD). 50 pp., 15 Tbls., 56 Figs.

Gilmore, R.G., D.J. Peters, J.L. Fyfe, and P.D. O'Brian. 1985. **Fish, macrocrustacean and avian population dynamics in a tidally influenced impounded subtropical salt marsh.** Final Report, Fla. Dept. of Environ. Reg., Coast. Zone Manag. Contract No. 93. 42 pp. + Appendix.

Gilmore, R.G. 1984. **Fish and macrocrustacean population dynamics in a tidally influenced impounded subtropical salt marsh.** Final Report. Fla. Dept. Environ. Reg. - Coast. Zone Manag. Contract No.s 47/73. 35 pp., 20 Tabs., 31 Figs.

Gilmore, R.G., C.J. Donohoe, D.W. Cooke, and D.J. Herrema. 1981. **Fishes of the Indian River lagoon and adjacent waters, Florida.** Harbor Branch Foundation, Inc. Tech. Rep. No. 41. 36 p.

Gilmore, R.G. 1978. **The current status of the fish fauna in the Indian River lagoon,** in Volume 1. Proc. of the 2nd Ann. Brevard Water Resources Conf., Fla. Inst. of Tech., Melbourne, Florida.

Gilmore, R.G., G.R. Kulczycki, P.A. Hastings and W.C. Magley. 1976. **Chapter 11: Studies of fishes of the Indian River lagoon and vicinity.** pp 133-147 in Third Annual Report: Indian River Coastal Zone Study, D.K. Young (ed.). Harbor Branch Consortium, Fort Pierce, Florida, Vol. 1.

Wilcox, J.R. and R.G. Gilmore. 1976. **Some hydrological data from the Indian River between Sebastian and St. Lucie Inlets, Florida: January 1972 - February 1975.** Harbor Branch Foundation, Inc. Technical Rpt. No. 17. 104 pp.

Jones, R.S., R.G. Gilmore, Jr., G.R. Kulczycki, W.C. Magley and B. Graunke. 1975. **Chapter 4: Studies of the fishes of the Indian River coastal zone.** pp 57-88. in Second Annual Report: Indian River Coastal Zone Study, D.K. Young (ed.). Harbor Branch Consortium, Fort Pierce, Florida, Vol.1.

Jones, R.S., R.G. Gilmore, Jr., G.R. Kulczycki, W.C. Magley. 1974. **Chapter 5: Studies of the fishes of the Indian River region.** pp. 110-183 in Annual Report: Indian River Study. D.K. Young (ed.). Harbor Branch Consortium, Fort Pierce, Florida. Vol. 1.

#### **4. REVIEWS:**

**Grant Proposal Reviews:** NOAA/MARFIN Program; NOAA/NURP Wilmington Center. NOAA/NURP Rutgers Center; NOAA/S-K Program; NOAA/National Estuarine Sanctuary Program. National Marine Fisheries Service Coastal Oceans Program (Review Panel); NOAA/Sea Grant: Texas, Louisiana, Mississippi, South Carolina, New Jersey, Fla, & National; Fla Department of Natural Resources; Non-Game Wildlife Program: Fla Game and Freshwater Fish Commission .; Fla Department of Health and Rehabilitative Services.

**Manuscript Reviews:** Journal articles for: *Biological Bulletin*, *Marine Biology*, *Canadian Journal of Zoology*, *Copeia*, *Transactions American Fisheries Society*, *Northeast Gulf Science*, *Fishery Bulletin*, *Bulletin of Marine Science*, *Estuaries*, *Environmental Biology of Fishes*, *Copeia*, *Fish Biology*, *Estuaries*, *Reviews in Fishery Science*, *Journal of Morphology*, *North American Journal of Fisheries Management*, *Northeast Gulf Science*, *Florida Scientist*, manuscripts submitted to Sea Grant sponsored symposia in South Carolina, Georgia and Florida 1982- 1987; Second International Conference on Biology of Indo-Pacific Fishes, 1985; Japanese - American Conference on the Biology of Sharks, 1987-88. *Ecology of Fishes of Cuba*, ed. Rodolfo Claro, Chapt 4 and species list, 1999. *Revista de Biologia Tropical* (Scripps Inst. Oceanog.).

#### **Pre-Publication Book Reviews at Publisher and/or Author's Request:**

Kenyon Lindeman and Rodolfo Claro: *The Biology & Management of Western Atlantic Snappers.*

William Belleville, 2003, "Deep Cuba", Univ. Georgia Press;

Claro, Rodolfo. Lynn Parenti, and Kenyon Lindemann 2000 "Ecology of Marine Fishes of Cuba" Smithsonian Inst. Press; Smith-Vaniz, W.F., B.B. Collette, B.E.Luckhurst. *Fishes of Bermuda: History, Zoogeography, Annotated Checklist, and Identification keys.* Am.Soc. Ichthyologists and Herpetologists, Spec. Publ. No. 4.

Gore, Robert. 1992. *Ecology of the Gulf of Mexico.* Pineapple Press, Sarasota, FL.

Reviewed eleven chapters. Pratt, H.L., S.H. Gruber and T. Taninchi (eds.). 1991.; *Elasmobranchs as Living Resources: Advances in the Biology, Ecology, Systematics, and the Status of the Fisheries.* NOAA Technical Rept. NMFS 90: 519 pp.; *Fishes of the Bahamas and Adjacent Tropical Waters*, J.E.Bohlke and C.C.G. Chaplin. 2<sup>nd</sup> ed. 1993, plates, species lists. *Species accounts*, Univ. Texas Press.

Pre-publication concept: McEachran. *Fishes of the Gulf of Mexico.*

DiSilvestro, R.L. 1990. *Fight for Survival: Audubon Perspectives.* John Wiley and Sons, Inc. 284 pp.

*Proceedings of the Second International Conference on the Biology of Indo-Pacific Fishes*, 1985.

**Post-Publication Book Reviews:** C.E. Dawson and R. Vari, 1979, *Fishes of the Western North Atlantic, Part VIII, Syngnathidae*, Sears Foundation for Marine Research.

**Faculty Tenure, Promotion, Honorary and Meritorious Positions:** Reviewed faculty for University of South Florida for Professor Emeritus (1990), University of Florida (1992), East Carolina University (2003), Humbolt State University (1988), Mississippi State University (1990), Univ. Southern Mississippi/GCRL (2000, 2002) and Louisiana State University (2000) for tenure; Harbor Branch Oceanographic Institution staff 1988-1994.

## 1. CHAIRED/ ORGANIZED PROFESSIONAL CONFERENCE AND SYMPOSIA

**Florida Fisheries Dependent on Caribbean Recruitment?** 52<sup>nd</sup> International Gulf and Caribbean Fisheries Institute Meetings, 1-5 November 1999, Key West, FL. Chaired, sponsored (thru Florida Chapter of American Fisheries Society - \$1,000) and organized symposium (speakers: Dahlgren, Gilmore, Frias-Torres, Hawtof et al., Davis-Hodgkins, Claro and Garcia, Cowen et al, Lindeman, et al.)

**Processes in Estuarine Lagoons:** Fifteenth Biennial International Conference Estuarine Research Federation, 25-30 September 1999, New Orleans, LA. Organized Indian River Section (Gilmore, Virnstein and Smith).

**International AFS Symposium entitled: "Subtropical-Tropical Marine Fish and Fisheries: Habitat and Biodiversity,"** Organized symposium to include Caribbean scientists held at the National AFS meetings Tampa, Florida 31 August 1995. This required soliciting financial aid to totally support seven participating scientists from Cuba, Venezuela, Colombia, Mexico and Canada. Succeeded in procuring these funds from the Center for Marine Conservation in Washington, D.C., Florida, Oregon, Washington, Wisconsin, Pennsylvania, Ohio, Mississippi, and Colorado chapters of the American Fisheries Society, and the national AFS headquarters.

**American Fisheries Society, Florida Chapter: Program and Symposium Organizer, President Elect- Chair: 1998,** *Stock Enhancement: A Realistic Evaluation.* Brooksville, Fla.

**American Fisheries Society, Florida Chapter: Program and Symposium Organizer, Chair: 1997,** *Aquatic Reserves and Habitat Protection: Is it possible?*

**Program Organization and Review Committee for the National meetings of the American Fisheries Society** for 27-31 August 1995. Reviewed all symposia abstracts for 35 proposed symposia. Twenty-five National and International symposia were accepted.

**Caribbean Chapter of the American Fisheries Society.** Selected and funded by the executive committee and membership of the Florida Chapter of the American Fisheries Society to attend an organizational conference in Puerto Rico in March. Met with representative biologists from various locations to set up operational procedures and chapter bylaws and have organized a meeting to be held in Florida this summer to further insure of a Caribbean Chapter origination.

**Larval Ecology Conference** at HBOI - 16-19 August 1995. Reviewed and organized abstracts with symposium organizers, Dr. Craig Young and Dr. Alan Stoner. *International content and participation.*

**Biodiversity Conference** at HBOI February 1994. Helped organize conference including abstract and manuscript review, session chair/panel organization, co-sponsored by the EPA National Est. Program, HBOI and FIT.

**Shark Reproduction Section: American Soc. of Ichthyologists and Herpetologists, Annual National Meeting,** Univ. Texas, Austin, TX. June 1993.

## 2. PRESENTATIONS, ABSTRACTS AND PROCEEDINGS

### INTERNATIONAL

Gilmore, R.G. 2011. **Florida east coast fish assemblages : Fifty-six years of research**, Coastal Estuarine Research Federation international annual meeting, Daytona Beach, FL. INVITED Symposium.

Gilmore, R.G. 2005. **Evolution of species specific acoustic signatures in sciaenid fishes.** American Society Ichthyologists & Herpetologists, Tampa, FL.

Gilmore, R.G. **Functional Variation of Fish Call Behavior: A Comparison Between Serranids and Sciaenids.** International Meeting, American Fisheries Society, Quebec, Canada. 14 August 2003. INVITED Symposium on Fish Acoustics, First for AFS.

Gilmore, R.G. **Spawning site fidelity, classification of spawning environments and evolutionary stable strategies: Serranids versus Sciaenids.** 80<sup>th</sup> Annual Meeting Am. Soc. Ichthy. And Herp., La Paz, Mexico, June 14-20, 2000. INVITED-Symposium.

Gilmore, R.G. **Annual Sea Level Rise, Predator-Prey Population Dynamics, Wetland Nekton Recruitment, Indian River Lagoon, Florida, USA.** Fifteenth Biennial International Conference Estuarine Research Federation, New Orleans, LA., 29 Sept. 1999. INVITED-Symposium

Gilmore, R.G. **The Origin of Florida Fish and Fisheries.** Gulf and Caribbean Fisheries Institute, 52<sup>nd</sup> Annual Meeting, Key West, Florida, 5 Nov. 1999. INVITED-organized Symposium

**First America Fisheries Society, China Delegation.** Presentation/conference, China Fisheries Bureau director, Beijing; Chinese Academy of Sciences, and Fishery Industry Cooperatives, Beijing, Dalian, Qingdao and Shanghai. October 1997. INVITED

National/International Meeting American Society of Ichthyologists and Herpetologists, Edmonton, Canada. Presented contributed paper entitled: **Zoogeographic variation in Antillean and continental deep reef fish faunas at depths between 100 and 700 m in the Caribbean and Bahama Islands.** 14-20 June 1995.

International Biodiversity Conference (III Simposio de Zoología: Talleres - Biodiversidad y Conservación), Palacio de las Convenciones **Havana, Cuba**. Presented invited paper entitled: *Zoogeographic variation in Antillean and continental deep reef fish faunas at depths between 100 and 700 m in the Caribbean and Bahama Islands*. 20-24 June 1994. [INVITED]

International Conference on Underwater Education; NAUI, Miami, FL. *Reproductive biology of galaeoid sharks*. 14-16 March 1991. INVITED

Gulf and Caribbean Fisheries Institute 43rd Annual Session, Miami, FL. *Color variation and associated behavior in the epinepheline groupers *Mycteroperca microlepis* (Goode and Bean) and *M. phenax* Jordan and Swain*. November 4-9, 1990. INVITED

Tenth Biennial International Estuarine Research Conference, Baltimore, Maryland. *Seagrass and mangrove swamp fish communities, spatial and trophic guilds, faunal overlap and the importance of relative habitat associations*. October 8-12, 1989. INVITED

Second International Indo-Pacific Fishes Conference in Tokyo, Japan. *Lamnoid shark reproduction mechanisms*. July 28-August 3, 1985. INVITED

### **NATIONAL**

**2005** Gilmore, R.G. NOAA, NOS. Seminar, 13 April, Charleston, SC.

**2004** Gilmore, R.G. 2004. **Remote Monitoring of Coral Reef Reserves and Fishery Activity using Passive Acoustics**. Ocean Biodiversity Information System - Ocean Research Advisory Panel (ORAP) Stakeholder Workshop, Washington, D.C., 23-24 March.

R.Grant Gilmore, Jr., Ph.D. and A. Marie Eklund, Ph.D. **2004. Remote Monitoring of Coral Reef Reserves and Fishery Activity using Passive Acoustics**. NOAA Coral Reef Workshop, Miami, FL. 3-5 March.

**2003** Gilmore, R.G. 2003. **Integrated environmental assessment: new technologies and systems for terrestrial, aquatic and extra-terrestrial applications**. Emerging Technologies, Tools, and Techniques To Manage Our Coasts in the 21st Century Technology Transfer Conference Sponsored by the U.S. EPA Office of Water, Office of Wetlands, Oceans, and Watersheds, Oceans and Coastal Protection Division: RGG Title: January 28-31, 2003. Published abstract.

KSC Joint Environmental Science Investigations (JESI) Program Planning Meeting, Naval Undersea Warfare Center (NUWC), Newport R.I. RGG **Briefing on Dynamac NASA goals for demonstration**. 26 June 2003

Oceans.US. Summit, Washington, D.C. 1 April, 2003.

Emerging Technologies, Tools, and Techniques To Manage Our Coasts in the 21st Century Technology Transfer Conference Sponsored by the U.S. EPA Office of Water, Office of Wetlands, Oceans, and Watersheds, Oceans and Coastal Protection Division: RGG Title: **Integrated environmental assessment: new technologies and systems for terrestrial, aquatic and extra-terrestrial applications**. January 28-31, 2003. Published abstract.

**2002** Gilmore, R.G. Factors creating regional biodiversity. NSF Biodiversity, Cocoa Beach 2002

**2001** Gilmore, R.G. 2001. **A comparative study fo manned nad unmanned submersible capabilities, generic sensor systems needs for the study of mobile marine fauna**. Ocean Policy Commission briefing, FAU - SEATECH Campus, Fort Lauderdale, FL.

Gilmore, R.G. 2001. **A comparative study fo manned nad unmanned submersible capabilities, generic sensor systems needs for the study of mobile marine fauna**. Symposium proceedings: Generic sensor system needs for undersea research vehicles, sponsored by the Autonomous Undersea Systems Institute, Oceanology 2001, Miami, FL. (**Published paper**).

Gilmore, R.G. 2001. **Chorus ecology in warm temperate sciaenids (Pisces: Sciaenidae) within a warm-temperate to tropical coastal lagoon**. Proceedings: 142<sup>nd</sup> Meeting of the Acoustical Society of America, Fort Lauderdale, FL, 3-7 December 2001. (Publ. Abstracts)

Gilmore, R.G. 2001. **Biodiversity of the Indian River Lagoon ecosystem**. Proceedings Natural Areas Association Conference. Cocoa Beach FL October 2001.

**2000** Gilmore, R.G. 2000. **Spawning site fidelity, classification of spawning environments and evolutionary stable strategies: Serranids versus Sciaenids**. 80<sup>th</sup> Annual Meeting Am. Soc. Ichthy. And Herp., La Paz, Mexico, June 14-20, 2000. INVITED-Symposium.

**1999** Gilmore, R.G., Jr. 1999. **Annual Sea Level Rise, Predator-Prey Population Dynamics, Wetland Nekton Recruitment, Indian River Lagoon, Florida, USA**. Fifteenth Biennial International Conference Estuarine Research Federation, New Orleans, LA., 29 Sept. 1999 Est Res Fed., New Orleans, Louisiana. Pg.

**1996** Gilmore, R.G., Jr. and J.E. McCosker. 1996. **Comparative submersible observations of epibathyal fish assemblages: Caribbean Sea and Galapagos Islands**. 76<sup>th</sup> Annual Meeting Am. Soc. Ichthy. Herp., New Orleans, Louisiana. Pg. 154.

McCosker, J.E. and R.G. Gilmore, Jr. 1996. **Recent studies of the Galapagos ichthyofauna using scuba and submersible**. 76<sup>th</sup> Annual Meeting Am. Soc. Ichthy. Herp., New Orleans, Louisiana. Pg. 154.

**1995** 100th Annual Meeting American Fisheries Society, Tampa Florida. **Factors influencing biodiversity throughout the Caribbean region**. 10-16 August 1995. INVITED

**1993** 73rd Annual Meeting, American Society of Ichthyologists and Herpetologists, Austin, TX. **Temporal and spatial isolation of spawning populations of sciaenid fishes using passive acoustic techniques.** May 27 - June 2, 1993. INVITED.

**1992** 97th Annual Meeting, American Fisheries Society, Rapid City, SD. **Conservation of rare species of tropical peripheral freshwater and marine fishes in southern Florida.** Symposium on Rare and Endangered Species. September 14-17, 1992. INVITED.

**1991** 96th Annual Meeting, American Fisheries Society, San Antonio, TX. **Predictability of fish community niche structure within subtropical seagrass meadows located along hydrological and zoogeographic gradients.** Symposium on Seagrass Habitat. September 8-12, 1991. INVITED.

**1990** National Meeting of the American Fisheries Society, Pittsburgh, PA. **Life history and ecology of rare and threatened peripheral and marine fishes of South Florida.** August 26-30, 1990. INVITED

70th National Meeting American Society of Ichthyologists and Herpetologists, Charleston, SC. **Reproductive biology of lamnoid sharks.** June 14-20, 1990. INVITED

**1987** 67th National Meeting of the American Society of Ichthyologists and Herpetologists, Albany, N.Y. **Microhabitat associations and spatial-temporal guild structure of mangrove swamp fish communities.** June 1987.

**1986** Wetland and Waterfowl Symposium, Wilmington, Delaware, sponsored by the Delaware Department of Environmental Regulation and Department of Fish and Wildlife. **Fish, macrocrustacean and avian population dynamics and cohabitation in tidally influenced impounded subtropical wetlands.** October, 1986. INVITED.

National Meeting of the American Society of Ichthyologists and Herpetologists, Victoria, British Columbia. **Exploration and description of Bahamian tropical deep reef ichthyofauna.** June 1986.

**1985** National Annual Meeting of the American Institute of Biological Sciences Symposium on Tropical and Subtropical Seagrass Ecosystems. **Fish populations in tropical and subtropical seagrass beds in the western Atlantic: Research since 1960.** August 12, 1985. INVITED

**1982** 62nd Annual Meeting of the American Society of Ichthyologists and Herpetologists, DeKalb, Illinois. **Reproduction and embryonic development of the sandtiger shark *Odontaspis taurus*.** June 13-19, 1982.

**1977** 57th National Meeting American Society of Ichthyologists and Herpetologists, Gainesville, FL.: **Subtropical fish community changes due to lethal low temperature effects** and chaired session. June, 1977.

**1976** National Meeting American Fisheries Society, Detroit, Michigan. **Comparative quantitative estuarine fish studies using seine and drop-nets.** Sept. 1976

Seminar: Smithsonian Institution, U.S. Museum of Natural History, Washington, D.C.: **Fishes of the Indian River lagoon and vicinity, east-central Florida.** June, 1976.

## **REGIONAL -SOUTHEASTERN UNITED STATES**

**2011.** Gilmore, R.G. Keynote address. **Indian River Lagoon** invited symposium presentation, February, Harbor Branch Oceanographic Institute, Florida Atlantic Univ.

**2005** Gilmore, R.G., S. Frias Torres, J. Dutka Gianelli. Fla. Chapt. Am. Fish. Soc. annual meeting, invited symposium presentation, March, Ocala National Forest.

**2004** University Miami, Rosenstiel School of Marine and Atmospheric Science: Seminar: **Bioacoustics and ocean observatories, NASA/NOAA collaboration, Cape Canaveral, Florida.** 15 April 2004.

**2003** NOAA. NOS. Gray's Reef Sanctuary Workshop. Savannah, GA. RGG Presentation: **Intergrated environmental assessment: new technologies and systems for terrestrial, aquatic and extra-terrestrial applications.** 22-24 April 2003. SEACOOS, PreOceans.US Summit meeting, Charleston, SC, NOAA NOS Center. **RGG Briefing on KSC aquatic technology developments in passive acoustics and sensor webs.** 11 Mar. 2003

EPA Indian River Lagoon National Estuarine Program IRL Symposium & Panel. RGG - **Presentation with emphasis on oceanographic model (Peter Sheng Model) demonstrating vulnerability of IRL to pollutants.** 22 Feb 2003.

Kennedy Space Center Workshop and Seminars with US Navy-NUWC, US Coast Guard, Univ. Sflorida-Center for Ocean Technology. **Acoustical Research in Banana River/Homeland Security.** 9 January 2003.

**2002** Southeast Fisheries Management Council, Marine Protected Area Workshop, Wilmington NC. **Merritt Island National Wildlife Refuge Case Study.** 29 October 2002.

Southeast Fisheries Management Council, Marine Protected Area Workshop, Charleston SC. **Merritt Island National Wildlife Refuge Case Study.** 28 October 2002.

Southeast Fisheries Management Council, Marine Protected Area Workshop, Melbourne, FL. **Merritt Island National Wildlife Refuge Case Study.** 28 August. 2002

45<sup>th</sup> Space Command, Cape Canaveral Air Force Station, Seminar: **Aquatic research programs at the Kennedy Space Center.** Aug 26, 2002

1999 Annual Meeting, Southern Division American Fisheries Society, Chattanooga, TN. ***Peripheral freshwater fish: Endangered species of the tropical southeastern United States***. 27 Feb 1999.

1998 National Marine Fisheries Service/Committee On Endangered & Threatened Fauna: **Threatened Tropical Peripheral Fauna of Florida**. Washington, D.C. March 1998. INVITED

American Fisheries Society - Florida Chapter, Withlacoochee National Forest. ***Results of Recent mullet stock enhancement program, Indian River Lagoon***. Withlacoochee National Forest, Fla. March, 1998.

1997 American Fisheries Society - Florida Chapter, Withlacoochee National Forest. ***Tropical western Atlantic biogeography and endangered habitat protection***. Withlacoochee National Forest, Fla. March, 1997.

1996 South Atlantic Fisheries Management Council, St. Simon's Island, GA. **New technologies for management of remote marine reserves: Oculina Research Reserve, Florida**. Beaufort, NC. April, 1996. INVITED

1995 National Estuarine Program/EPA. **The ecological value of aquatic predators**. HBOI, Fla. March 1995. INVITED.

National Estuarine Program/EPA. Biodiversity Symposium. **Biodiversity of the Indian River Lagoon: An overview**. HBOI, Fla. April 1995. INVITED

1994 Invited Seminar Archibald Biological Station, Lake Placid, Florida. Presentation entitled: **Holocene zoogeographic distribution and endemism in fishes of the Florida peninsula**. October 1994. [INVITED]

Invited Seminar at U.S. Fish and Wildlife Regional Laboratories/Biological Survey/University of Florida, Gainesville, Florida. Presentation entitled: **Quantitative and Qualitative Techniques of Fish Population and Community Study**. August 1994.

American Fisheries Society - Florida Chapter, Withlacoochee National Forest. **Endangered/threatened marine and euryhaline species of Florida: the imminent decline of a rich ichthyofauna**. February, 1994.

1993 South Atlantic Fisheries Management Council, St. Simon's Island, GA. **An overview of grouper mating behavior and habitat distribution on the continental shelf**. April, 1993. INVITED.

4th Snook Symposium, sponsored by Mote Marine Laboratory, Florida Department of Natural History and the Florida Chapter of the American Fisheries Society, Sarasota, FL. **Genetics, ecology, growth, embryology and reproductive biology of snook**. April, 1993. INVITED.

American Fisheries Society - Florida Chapter, Withlacoochee National Forest. **Isolation of spawning sites of soniferous estuarine species using bioacoustic techniques**. March, 1993. **Best paper award**.

1991 National Estuarine Program, Coastal Lagoons Assembly Symposium. Florida Institute of Technology, Melbourne, FL. **Ecosystem overview**. October 11, 1991. INVITED

1990 Navigating the Nineties, Florida Coastal Conference, Clearwater, FL. **What good is a periodically flooded mud flat? Who lives, eats and reproduces in marginal wetlands of Florida?" and "The role of seagrasses as habitat and those factors that adversely affect this role**. September 26-28, 1990. INVITED

44th Annual Conference of Southern Division of American Fisheries Society, Richmond, VA. **Annual sea level rise as an effector of high-low marsh trophic interactions in subtropical Florida** October 21-24, 1990. Chaired Session, Prepared Session. INVITED

1989 Association of Southeastern Biologists, Charlotte, N.C.. Title: **Mangrove Forests**. Published abstract, ASB Bulletin, 36(2): pg 62. April 6, 1989. INVITED

Fishery Recruitment in Florida Waters: Toward a Predictive Capability (A Workshop), Sponsored by the Florida Chapter of the American Fisheries Society and Sea Grant. Title: **Seagrass, mangrove swamp and herbaceous halophyte marsh fish communities, spatial and trophic guilds, faunal overlap, population dynamics and the importance of relative habitat association**. 16 February 1989. INVITED

1988 Florida Coastal Resources Interagency Management Committee, Tallahassee, FL. **Mangrove swamp research and wetland management**. 31 Oct. 1988. INVITED

Second Indian River Research Symposium, sponsored by Marine Resources Council of East Central Florida. Title: **Salt marsh and mangrove swamp fish communities of the Indian River lagoon**. 13 Sept. 1988. INVITED

Workshop on Salt Marsh Management and Research, Fla. Medical Entomology Laboratory. **Subtropical herbaceous marsh, mangrove swamp fish communities**. Published abstract:

Proceedings: Workshop on Salt Marsh Management and Research. October 25, 1988. INVITED

1987 3rd Snook Symposium, sponsored by the Florida Department of Natural Resources. **"The microhabitat and niche of juvenile snook**. March 1987. INVITED

1985 Florida Chapter of American Fisheries Society, Brooksville, Florida. **Salt marsh impoundment management and fishery resources**. February 12, 1985.

Indian River Resources Symposium sponsored by Marine Resources Council, Florida Institute of Technology, Melbourne, published presentation entitled: **The productive web of life in the estuary**. January 18, 1985. INVITED

Symposium on Natural Marine Functions and Alternative Management of Salt Marshes, sponsored by Florida Medical Entomology Laboratory, IFAS, University of Florida, Indian River Mosquito Control District and the Governor's Subcommittee on Mosquito Impoundments. **Fish communities inhabiting subtropical-warm temperate high marsh habitats.** January 9, 1985. INVITED

**1984** Semi-annual meeting of Florida Anti-Mosquito Association. **Permanent effects of impounding.** Florida Medical Entomology Laboratory, Vero Beach. December 8, 1984. INVITED

Conference on Biology and Management of Red fish and Spotted Seatrout in Florida, co-sponsored by Florida Department of Natural Resources and Florida Marine Fisheries Commission, St. Petersburg. **Notes on adult spawning and juvenile spotted seatrout habitat in the Indian River Lagoon.** Published Abstract. November 14-15, 1984. INVITED

55th Annual Meeting of the Florida Anti-Mosquito Association, Key West. **Fish and macrocrustacean population dynamics in a tidally influenced impounded subtropical high marsh, within the symposium entitled: Effects of differing water management techniques in a southeast Florida mosquito control impoundment open to the estuary.** April 29-May 2, 1984. INVITED

**1983** Our Fishing Crisis: A Symposium sponsored by The Conservancy, Naples, Florida. **Marine species in the estuarine habitat.** April 9, 1983. INVITED

American Institute of Fishery Research Biologist Meeting, National Marine Fisheries Service, Southeast Fisheries Center, Miami, Florida. **East Central Florida fish communities and habitat associations.** March 10, 1983. INVITED

3rd Annual Meeting Florida Chapter of American Fisheries Society, Brooksville, Florida, Florida Aquatic Habitat and Fishery Resources Symposium. **Mangrove habitat and fishery resources.** February 10, 1983. INVITED

**1982** Seagrass Workshop, Harbor Branch Foundation, Fort Pierce, Florida. **Diel study results and discussion of fish distributions and behavior in seagrass meadows.** May 25, 1982. INVITED

Inter-Agency Technical Meeting sponsored by the Florida Department of Environmental Regulation for Governor's Working Group on Mosquito Control, Florida Medical Entomology Laboratory, Vero Beach, Florida. **Marsh research findings and suggested management approaches.** May 17, 1982. INVITED

Snook Symposium co-sponsored by Florida Department of Natural Resources and International Game Fish Association, Ft. Lauderdale, Florida. **Alternative in critical snook habitat management in east central Florida.** November 20, 1982. INVITED

Southeastern Estuarine Research Society/Gulf Estuarine Research Society, Marineland, Florida. **A comparison of the flora and fauna open and closed marsh mosquito impoundments of the Indian River lagoon and Diel variations in seagrass bed fish populations.** November 11-13, 1982.

46th Annual Meeting of the Florida Academy of Sciences, Stetson University, Deland, Florida. **Diel variation in seagrass bed fish populations and A comparison of the flora and fauna of open and closed marsh mosquito impoundments of the Indian River lagoon.** April 23, 1982.

**1981** Future of the Indian River System Symposium. Melbourne, FL. **Observations on the distribution and biology of east-central Florida populations of the common snook, *Centropomus undecimalis* (Bloch).** November, 1981.

45th Annual Meeting Florida Academy of Science. Orlando, FL. (1) **Ecological and distributional observations of certain tropical peripheral fishes in Florida;** (2) w M.S. Peterson and T.H. Roberts, **The feeding ecology of gerreid fishes.** April, 1981.

**1980** Association of Southeastern Biologists, Tampa, FL. **Color variation in epinepheline groupers.** April, 1980.

**1977** Seminar, Florida Institute of Technology. Melbourne, FL. **Fish fatality due to cold lethal water temperature, Indian River lagoon and vicinity.** March, 1977. INVITED.

**1976** Smithsonian Institution, National Museum of Natural History. Washington, D.C. **Ichthyofaunal studies and juvenile fish recruitment to the Indian River Lagoon** June 1976. INVITED.

Southeastern Estuarine Research Society, Brunswick, Georgia. **Comparative quantitative estuarine fish studies using seine and drop-nets.** November, 1976.

**1973** Florida Academy of Sciences. U. W. Fla., Pensacola. **Ecological and zoogeographic aspects of the fishes of the Indian River region of Florida.** March, 1973.

**1972** Florida Academy of Sciences, Rollins Univ.. Winter Park. **Observations on the behavior and feeding habits of the Atlantic needlefish, *Strongylura marina* (Walbaum) and the halfbeak, *Hyporhamphus unifasciatus* (Ranzani) -- suborder *Exocoetoidei*.** April, 1972. Harassed during presentation by juvenile Dr. Tom Hopkins, UWF professor! Sick leave to give.

### III. RESEARCH GRANTS AND CONTRACTS:

#### 104 Awards totaling \$5 million from 1978 to 2021

- Gilmore, R.G. 2018-2021: Martin County Commission. Information and resources for a **Petition to List as Endangered and Threatened Rare Indigenous Freshwater Fishes of SE Florida Tributaries**. \$121,520.00
- Florida Chapter Coastal Conservation Association. **Spotted Seatrout Spawning Assessment, Indian and Banana River Lagoon**. 1918. \$25,000
- Florida Fish and Wildlife Conservation Commission, Marine Research Institute. **Fishery Species Life History and Ecology Profiles. Gag Grouper, *Mycteroperca microlepis*; Black Seabass, *Centropristis striatus*; Warsaw Grouper, *Hyporthodus nigrurus*, Speckled Hind, *Epinephelus drummonhayi*; Red Grouper, *Epinephelus morio*; Goliath Grouper, *Epinephelus itajara*; Gray Snapper, *Lutjanus griseus***. 2011- 2016. \$35,000.00
- Harbor Branch Oceanographic Institution/Fla. Atlantic Univ. **Wild Dolphin Program: Feeding behavior of bottlenose dolphin via passive acoustic sensors**. 2015-2016. \$25,000.
- Indian River Land Trust. **Wetland restoration and management plan development**. 2013 to 2015. \$22,000
- Florida Oceanographic Society. 2012-14. **Seagrass monitoring program**. St. Lucie River Alliance, Stuart FL. \$35,000
- Florida Oceanographic Society. 2012-14. **Remote acoustic stations for water quality monitoring, St. Lucie Estuary**. . St. Lucie River Alliance, Stuart FL \$48,000
- Lewis Environmental Services, Inc., 2008 – 2014. **Mangrove fish assemblage restoration, Tampa/Hillsborough Bay, Alafia River**, Mosaic Corp. \$300,000+.
- Indian River Land Trust, David Cox Consulting. 2012. **Mangrove wetland restoration**. \$5,000.
- Columbia Sportswear, Inc. 2011- 2012. **Clothing color perception by bonefish, bonefish behavior**. \$12,000.
- Florida Oceanographic Society **NOAA Martin County**. 2009 – 2012. **Oyster communities assayed with passive acoustic technologies**. \$35,000.
- HBOI John Reed. 2008. **Oculina coral reef transect survey, Chapman's and Jeff's Reef operations, ALMS acoustic system recovery, three year deployment**. Two JSL submarine dives. (\$20,000.00 in kind)
- Ecological Associates: Martin County. 2008. **Continental shelf fisheries habitat data survey**. \$47,000.
- Coastal Technology: St. Lucie County. 2008. **Continental shelf fisheries habitat data survey**. \$47,000
- NOVA University: Florida Department of Environmental Protection. 2008. **Manned submarine deployment ocean bio-acoustic observatory, PACU prototype test program, Miami Terrace, Florida Straits & *Lophelia* coral fish survey, 300 – 1000 m**. \$12,500. (+\$10,000 in kind).
- NOVA University: NOAA Deep Coral Habitat Program. 2007-2008. **Deep coral reef (*Lophelia* spp) fish assessment and PACU bio-acoustic surveys**. \$28,000. (+\$20,000 in kind, two JSL submarine dives).
- NOAA/NOS sponsored travel grant, 2007. **Bioacoustic workshop**, Univ. Hawaii, Coconut Is., Kaneohe Bay, Hawaii. NOAA/NOS \$2,500.00.
- South Florida Water Management District, St. Lucie Estuary Program. 2007. **St. Lucie River zooplankton surveys**. \$38,000.
- Florida Oceanographic Society; South Florida Water Management District, **RECOVER PROGRAM**. 2007. **Fish bio-acoustic and visual observatory program, snook migration and tagging program**. \$115,000.
- Florida Oceanographic Society: South Florida Water Management District, **RECOVER PROGRAM**., 2006. **Fish Assessment Techniques and Technologies, Northern Estuaries, Acoustic transects, Seagrass Fish Pop., DIDSON Sonar, Electroshock, FW Juv. Seine. Technology demonstrations by USF, NOAA, BAS**. \$135,000.
- Oregon State University: NOAA, Coral Reef Program, 2005. ***Lophelia* Deep Reef fish population and bio-acoustic assessment, Autonomous technologies for fishery assessment. Discovery of "Grant's Bump" *Lophelia* reef; PACU deployment at 1,000 m**. \$25,500 (+20,000 in kind, two JSL submarine dives, 500 to 1,000 m).
- NOAA, NMFS Coral Reef Program, May 2005. **Oculina Reef bio-acoustic assessment, Autonomous technologies for fishery assessment. Jeff's Reef ALMS deployment**. \$25,500.
- Fla. Fish & Wildlife Conservation Commission, Artificial Reef Program, Florida Space Authority, Cape Canaveral, FL, 2004-2006.. **Acoustic monitoring: Artificial reef project Remote assessment of human and aquatic organism activity on artificial reef substrates**. Final Report to & Florida Fish and Wildlife Conserv. Comm., FFWCC Grant No. 0403, Agreement No. 04026. \$58,000 (\$100,000.00 United Space Alliance and NASA, in kind)
- South Florida Water Management District, 2004, **Loxahatchee River biological studies: Phase I, Zooplankton dynamics, Summer 2004**. \$9,990.00.
- South Florida Water Management District., 2004. **Loxahatchee River Study: Phase II. Critical habitat for fish species, emphasis, juvenile snook, *Centropomus* spp**. \$9,990.00.



Martin County, Environmental Dept., 2004. **RECOVER assessment, St. Lucie Estuary, 2003-2004.** \$10,000

- NOAA, NURP/NMFS, Coral Reef Program, May 2003., **Oculina Habitat Area of Particular Concern, Ship ops to support deployment of Passive Acoustic Monitoring System PAMS - 3 units. for 48 hrs ops. @\$10,000**

- U.S. Navy Submarine Operations Atlantic. 2001-2004 . **East Florida continental slope reef survey, Cape Canaveral and Kennedy Space Center.** U.S. Navy NR-1 nuclear research submarine mission project acceptance for by R.G. Gilmore, briefing at SUBLANT HQ, Norfolk, VA, US. Navy HQ, Washington D.C. and on NR-1 submarine, Mayport Navy Base, Mayport, FL. (\$250,000 in kind)

- NOAA, National Marine Fisheries Service, Protected Resources/Coral Reef Program, 2002-2003. **Goliath grouper call classification. PAMS R & D and deployment., 2002-2003.** NMFS SEFSC, Miami. **\$58,000.** (\$25,000 in kind ship & diver personnel support from the Smithsonian Institution.)

- NOAA, National Marine Fisheries Service, Coral Reef Program, 2002-2003. to NASA for **PAMS R & D and deployment., 2002-2003. Islands in the Stream NOAA Ocean Exploration Program, Florida Straits Leg.** NOAA NMFS SEFSC Miami. \$25,000. (\$60,000.00 in kind to R.G. Gilmore for submarine operations and NASA/NOAA PAMS deployment).

- NASA KSC, 2003. Title: **Passive Acoustic Data Acquisition Systems for Obtaining Biological Information in Remote Aquatic Environments** Amount: **\$30,000/** one yr, Aug. 1 2002 - July 31 2003. Includes Joint Environmental Systems Investigation Project with Naval Undersea Warfare AUV unit, Newport RI, Florida Ocean Technology Institute, NASA & Florida Fish and Wildlife Conservation Commission Marine Research Institute, St. Petersburg, FL . (\$500,000 in kind support from NASA Jet Propulsion Laboratory, Pasadena, CA, US Navy, and Florida, four REMUS AUVs, benthic acoustic array, satellite com systems, remote Martian (Mars) sensor systems)

- NASA KSC, Commercial Program. 2001-2003. **Marine operations infrastructure support for Passive Acoustic Monitoring System, PAMS development program, for deployment to 1,000 m.** \$60,000. (\$200,000 in kind personnel and ROV support from NASA Prototype Laboratory in fabrication, boat purchase & ops, United Space Alliance SS Liberty Star and SS Freedom Star operations)

- NOAA, National Marine Fisheries Service, Protected Resources/Coral Reef Program, 2001-2002. **Goliath grouper call classification.** 2001-2002. NMFS SEFSC Miami. **\$53,000.**

- NOAA, National Marine Fisheries Service, Coral Reef Program, 2001-2002. to NASA for **PAMS R & D and deployment., 2001-2002.** NMFS SEFSC Miami. **\$23,000.**

- NOAA, Ocean Exploration Program, "Islands in the Stream", Aug.- Sept 2001. 5 Clelia sub dives, **\$35,000**, 7 days at sea. **Oculina Habitat Area of Particular Concern.** NOAA/OE Washington, D.C. (\$35,000 in kind support for JSL submarine dives).

- National Aeronautics and Space Administration. 2000-2001. Title: **Passive Acoustic Data Acquisition Systems for Obtaining Biological Information in Remote Aquatic Environments** \$30,000.

- National Fish and Wildlife Foundation, 2001. Title: **Vital Marine Fish Habitat : Satellite Imagery and Ground Truth for Tropical Oceanic and Coastal Nurseries.** \$15,000.

- National Marine Fisheries Service Division of Threatened Resources: 1999. **Candidate species profile: The Opossum Pipefish, *Mycrophis brachyurus lineatus*: a candidate for NOAA/NMFS endangered marine species designation.** \$6,700.

- Canaveral National Seashore/National Park Service thru U.S. Geological Survey, Biological Resources Division to NASA: 1999-2000. Title: **Isolation of Critical Fish Spawning and Nursery Habitat, Canaveral National Seashore.** \$136,300, 2 yrs.

- Dr. Carleton Ray, University of Virginia. 1999. Travel grant: **Bimini Expedition for Nassau Grouper Spawning Aggregation Acoustic Studies.** \$500.00.

- NOAA/National Marine Fisheries Service Division of Threatened Resources: Work/Travel grant: **Opossum Pipefish, *Mycrophis brachyurus l.*: candidate for NOAA/NMFS endangered marine species designation.** \$3,500.

- NOAA/National Marine Fisheries Service Division of Threatened Resources: 1998. **Candidate species profile: The Opossum Pipefish, *Mycrophis brachyurus lineatus*: a candidate for NOAA/NMFS endangered marine species designation.** \$21,000.

- St. Johns River Water Management District. 1998. **Conceptual wetland ecosystem model and wetland nekton sampling protocol.** \$20,367.

- Jim Lipscomb Productions. 1998. **Cuba submarine expedition, R.G. Gilmore Chief Scientist, Logistics and Materials..** \$12,500. **Discovery Channel: 1997. Cuba Expedition, Chief Scientist, JSL submersible operations along the south coast of Cuba to survey and fish and invertebrate faunas from surface to 2,000 ft;** Program airs on Discovery Channel June 6, 1999 as "*Forbidden Depths*". \$464,000 JSL support from HBOI., \$4,000,000 from Discovery Channel for operations and program production.

- Tom Lucas Productions. 1997. *Bimini Expedition*, JSL submersible operations to film deep sea sharks: National Geographic European showing as “*Mysteries of the Twilight Zone*” Feb. 1998, Discovery Channel same title, May-June and Christmas Day 1998. \$14,500.

- Jack McKenney Productions. 1997. *Bimini Expedition*, JSL submersible operations to film deep sea sharks. Discovery Channel airing in October 1998 as “*Phantoms of the Deep*”, program won most popular sales in Germany during European showing. \$10,500.

- Florida Department of Environmental Regulation (Florida Fish & Wildlife Conservation Commission in 2012). 1996. **Spawning and reproductive biology of the spotted seatrout in the Indian River Lagoon.** Completed March 1997. \$20,000.1996

- St. Lucie County. 1996. **Ecology and population dynamics of impounded wetland fiddler crabs, genus *Uca*.** w Dr. Bjorn Tunberg, Kristinneberg Marine Laboratory, Sweden. \$12,000.

- Discovery Documentary. 1995. **Participant Galapagos expedition Al Giddings and Dave : Galapagos Beyond Darwin, award winning internationally televised program (still televised in 2008).** 35 operational days. \$6,000,000; 5 R.G.Gilmore sub sphere dive, 3 aft dives. \$64,000 in kind,

- NOAA/National Undersea Research Program. 1995. **Effects of fishing on the structure and function of spawning aggregations of gag, (*Mycteroperca microlepis*) and scamp, (*Mycteroperca phenax*) in the Atlantic and Gulf of Mexico. R/V Sea Diver, CLELIA operations.** Co-authored with Dr. Churchill Grimes (NMFS) and , Dr. Christopher Koenig (FSU). \$31,200.

- EPA/National Estuarine Program. 1995. **Evaluation of specific wetland ecosystem management scenarios: Indian River Lagoon.** \$56,920.

- Florida Department of Environmental Protection/Fishing License Program. 1995. **Wetland impoundment management accessibility and influence on stock enhancement, survival and migration in the striped mullet, *Mugil cephalus* Linnaeus.** two year program. \$261,956.

- Florida Department of Environmental Protection/Fisheries Program- Florida Marine Research Institute. 1995. **The reproductive biology of spotted seatrout, *Cynoscion nebulosus*, in the Indian River Lagoon.** \$40,000.

- Florida Department of Environmental Protection/Hard Bottom Survey- Florida Marine Research Institute. 1995. **Identification of information on hard bottom localities: Florida east coast.** \$3,935.71.

- Saint Lucie County/ County Commission & St. Lucie Mosquito Control District. 1995. **Characterization of sonifery in juvenile tarpon, *Megalops atlanticus*.**(continuation of tarpon early life history studies - phase one completed February 1995 at \$25,000). Additional award of \$5,000.

- Saint Lucie County/ County Commission & St. Lucie Mosquito Control District. 1995. ***Uca* Ecology.** Award to R.G. Gilmore (subcontract to Björn Tunberg, Kristinneburg Marine Laboratory, Sweden. Awarded June 1995. \$8,000.

- Florida Chapter, American Fisheries Society. 1995. **Travel grant (Puerto Rico) for the development of a Caribbean Chapter American Fisheries Society.** \$650.

- St. Lucie Mosquito Control District. 1994. **Tarpon recruitment to impounded wetlands of the Indian River Lagoon in the vicinity of Fort Pierce Inlet, St. Lucie County, Florida.** \$25,000.

- Florida Department of Environmental Protection 1993-94. **Fisheries and habitat information database development project. Review Species Profiles for NOAA/Estuarine Living Marine Resources Program.** \$20,000.

- St. Lucie Mosquito Control District 1993. **Ecological impacts of wetland impoundments on the Fiddler crab (Genus *Uca*) populations within the Indian River Lagoon.** \$8,000.

- NURP/UNCW (NOAA)- MISSION NO. UNCW 9105/Jack McKenney Productions, Los Angeles, CA 1993. **Remotely operated vehicle observations of social behavior in aggregations of the sand tiger shark, *Odontaspis taurus* (Rafinesque).** Ship time and ROV, “Superphantom”. Culminated in Discovery Program aired internationally as “Sandtigers” in 1994. (NOAA and Jack McKenney Productions in kind support, @ \$50,000)

- Mote Marine Laboratory. 1991-92. **Fisheries/Habitat Information Database Research. Species Profiles for NOAA/Estuarine Living Marine Resources Program.** \$60,000.

- St. Lucie County. 1991. **Port of Fort Pierce environmental survey.** \$98,702.

- St. Lucie Mosquito Control District. 1991. ***Uca* population study.** \$3,000.

- NURP/UNCW (NOAA) Mission NO. UNCW 9105. 1991. **Remotely operated vehicle observations of social behavior in aggregations of the sand tiger shark, *Odontaspis taurus* (Rafinesque).** R.G. Gilmore. Ship time and ROV Superphantom.operations for two weeks (14 operational days) off Cape Hatteras North Carolina, (in kind NOAA support @\$100,000).

- Florida Department of Natural Resources. 1990-93. **Environmental parameters associated with spawning, larval dispersal and early life history of the spotted seatrout, *Cynoscion nebulosus* (Cuvier).** 1990-1993. \$377,784.

- Florida Department of Environmental Regulation (CZM). 1993. **Fish migration relative to environmental conditions in impounded tidal creeks, perimeter ditch habitats impacted by management for mosquito control.** 1990-1993. \$85,496.

- Harbor Branch Oceanographic Institution. 1990. **Central American submersible expedition co-sponsored by Universidad Nacional Autonomia de Mexico, 21 operational days, Mexico and Belize**, \$294,000.

- Smithsonian Institution. Courtesy of Dr. James Tyler and Dr. Mary Rice. 1989. **Caribbean submersible mission**. \$4,000.

- Harbor Branch Oceanographic Institution. 1989. **Windward Islands, West Indies Caribbean Submarine Expedition, 21 operational days, Barbados, St. Lucia, St. Vincent, Grenadine, Grenada.**, \$294,000.

- Sea World of Orlando. 1989. **Facilities and capture of specimen for cooperative research program on embryonic development of the sand tiger shark, *Odontaspis taurus* with Mr. Frank Murru, Director, Sea World.** (in kind, \$5,000)

- NURP/UNCW (NOAA)- MISSION NO. UNCW 9105/Jack McKenny Productions, Los Angeles, CA. 1989. Remotely operated vehicle observations of social behavior in aggregations of the sand tiger shark, *Odontaspis taurus* (Rafinesque). R.G. Gilmore. **Ship time and ROV, Superphantom. operations off Cape Hatteras, North Carolina.** (NOAA & J. McKenny Productions \$100,000)

- Florida Department of Environmental Regulation. CZM-194(III). 1989, **High marsh fish community dynamics in association with natural and managed hydroperiods**. \$70,000.

- Florida Department of Environmental Regulation. CZM-194(II). 1988. **Effects of water quality, hydrology and syntopic sulfide conditions on fishes indigenous to impounded, semi-impounded and natural salt marsh/mangrove swamp habitats**. \$24,303.,

- Ecoshores, Inc. 1988-1991. **Fish migration, community succession and habitat association in natural and artificial tidal tributaries and adjacent seagrass ecosystems**. \$116,485.

- Florida Department of Environmental Regulation. CZM-194(I). 1987. **Fish adaptations to metabolic stress**. \$13,940.

- Florida Department of Health and Rehabilitative Services. 1987. **Induced fish migration from impounded mangrove swamp and salt marsh habitats**. \$35,000.

- St. Lucie Mosquito Control District. 1987. **Short-term comparison of ichthyofaunas of breached and closed mangrove swamp impoundments**. \$4,990.

- Florida Department of Health and Rehabilitative Services. 1986. **Effects of increased culvert density on utilization of marsh impoundments by fishes and macrocrustaceans**. \$46,333.44.

- Florida Department of Environmental Regulation. CZM-167. 1986, **Fish, macrocrustacean and hydrological studies of unimpounded and impounded subtropical high marsh habitats**. \$50,000.

- Florida Department of Natural Resources. 1985. **Radioisotope studies of trophic habits of fish and macrocrustaceans inhabiting a subtropical high marsh ecosystem**. \$9,000.

- Florida Department of Environmental Regulation. 1985. **CZM-122 Fish, macrocrustacean and avian population dynamics, fish trophic habits and impact on mosquito populations in an impounded subtropical high marsh under a rotational management program**. \$72,000.

- Florida Department of Health and Rehabilitative Services. 1985. **Water control structures and microhabitat effects on fish and macrocrustacean population dynamics in an impounded subtropical high marsh**. \$48,500.

- Homer Hoyt Institute. 1985. **Fish and macrocrustacean utilization of an impounded tropical red mangrove forest**. \$21,000.

- Campeau Corporation. 1985. **Study of fish and macrocrustacean utilization of a red mangrove forest, subtropical high marsh**. \$21,000.

- Campeau Corporation. 1984. **Study of fish and macrocrustacean utilization of a red mangrove forest, subtropical high marsh**. \$42,000.

- Florida Department of Environmental Regulation. 1984. **CZM-93. Study of mosquito impoundment management techniques and piscine mosquito predation**. \$74,000.

- NOAA/Sea Grant. 1984. **Study of impounded salt marsh water control techniques and their effect on fish and macrocrustacean population dynamics**. \$49,000.

- Florida Department of Environmental Regulation. 1983. **CZM-73 Mosquito Impoundment Management and Salt Marsh Wildlife Resources**. \$50,000.

- The Planning Office of the City of Vero Beach. 1983. **Preparation of maps delineating marsh habitat, including groundtruthing of this habitat within the Vero Beach City limits preliminary to implementation of a wetlands ordinance**. \$933.00

- Florida Department of Environmental Regulation. 1982. **CZM 47 Study of fish and macrocrustacean population dynamics in a reopened impounded marsh**. \$30,000.

- Florida Power and Light 1981. **Support for the publication of R.G. Gilmore, C. Donohoe and D. Cook. "The Fishes of the Indian River and Vicinity," HBF Tech. Rpt. No. 41, 36 pp., Tables 28 pp.** \$1,000.00

- Indian River County. 1978-1980. **Spoil Island Survey, vegetation, substrate, & aquatic resource assessment**. With Mark Gamula, Coastal Zone Management Program, Stuart, Florida. \$50,000.

## IV. RESEARCH EXPEDITIONS

### A. RESEARCH EXPEDITIONS as CHIEF SCIENTIST:

**1. DEEP SEA SUBMARINE OPERATIONS**, all with JOHNSON-SEA-LINK I & II subs. Veteran of over 355 manned submersible research dives 500 to 1,000 m depths.

R/V Seward Johnson - 1<sup>st</sup> U.S. Research Sub Cruise to Cuba, 1997-98 - 32 days

R/V Edwin Link - 1 cruise 1997; Bimini, Grand Bahama Is., - 8 days

R/V Edwin Link - 1 cruise 1990; Mexico/Belize - 22 days

R/V Seward Johnson - 1 cruise 1989; Windward Is., West Indies.- 30 days

R/V Seward Johnson - 1 cruise 1987; San Salvador, Bahama Is. - 21 days

R/V Johnson =Edwin Link - 3 cruises 1982-1985; Bahama Is.- 46 days

R/V Johnson - 4 cruises 1978-1982; Atlantic, E. Fla.- 20 days

R/V Sea Diver - 4 cruises 1978-1981; Atlantic, E. Fla.- 20 days

R/V Sea Diver - 2 cruises 1980-82; Atlantic, E. Fla. - 6 days

**2. ACOUSTIC & ROV OPERATIONS**: Fish/Shark Tagging, Acoustics, Mating Behavior Expeditions.

R/V Sunburst, Smithsonian Marine Station Research Vessel - 3 cruises, 2001-2002: Goliath grouper ocean field tests for PAMS & .NASA Video Ray ROV. Atlantic, E. Fla..

Charter boat: w SuperPhantom ROV - 1 cruise 1993; Jack McKenney Prod. Los Angeles CA & NOAA/NURC - Wilmington, NC; Cape Hatteras, NC. 14 days

R/V Elusive w SuperPhantom ROV - 1 cruise - 1991; NOAA/NURC-Wilmington; Cape Hatteras, NC -7 days

Charter boat: Jaws w SuperPhantom ROV - 2 cruises 1988-89; w. NOAA/NURC-Wilmington; Jack McKenny Prod. & Stan Waterman & Howard Hall Prod. Cape Hatteras, N. Carolina. 20 days.

**3. EXPLORATORY TRAWLING/LONG LINING**

R/V Last Mango - 1 cruise 1991; Atlantic, E. Fla. - 2 days

R/V Sea Diver - 2 cruises 1980-82; Atlantic, E. Fla. - 6 days

R/V Gosnold - 2 cruises - 1973-74; Atlantic, E. Fla. - 8 days

R/V Hernan Cortez - 1 cruise - 1973; Atlantic, Cape Canaveral - 3 days

R/V Joie de Vivre - 3 cruises 1972-73; Atlantic, E. Fla.

R/V Sea Hunter - 1 cruise 1972; Atlantic, E. Fla.- 1 day

R/V Bellows - 1 cruise May 1971, 10 days at sea; Dry Tortugas to Marco Is. Gulf of Mexico; 1 cruise January 2001, 7 days Fresh Creek, Andros Is., Bahama Is.

### B. RESEARCH EXPEDITIONS as PARTICIPATORY SCIENTIST

**1. GUIDE & LECTURER**

M/V Polaris, Linbad Special Expeditions, 1 cruise 1998, Galapagos Islands, 11 days

**2. EXPLORATORY DIVING, ACOUSTICS, TRAWLING/LOGLINING**

R/V NANCY FOSTER - NOAA NOS, Gray's Reef Nat't Mar. Sanctuary, expedition, 10-21 May, 2004 (10 days)

SS FREEDOM STAR/LIBERTY STAR - NASA/USA/NOAA, Oculina Reserve Expedition, May, 2003

R/V Bellows (FCOR) - 1 cruise Jan-Feb.1999, Andros, Bahama Is. 4 days.

M/V Wendy (Teddy Tucker, Nat'l Geographic Society, Emery Kristof.) 1 cruise 1985, Bermuda 8 days. Longlines to 1,000 m with cameras for shark, captures. Anniversary of William Beebe's bathescape dives.

R/V Gosnold (HBF/Woods Hole) - 3 cruises 1973-75, Atlantic, E. Fla.- 9 days

R/V Hernan Cortez (FDNR) - 1 cruise 1974, Atlantic off Cape Canaveral- 5 days

R/V Sea Hunter (HBOI-FIT) - 1 cruise 1974, Atlantic, E. Fla - 1 day

R/V Joie de Vivre (HBOI.FIT) - 2 cruises, 1973,1974, Trawling, E. Fla. Shelf - 4 days

R/V Bellows (NOAA/NMFS) - 1 cruise 1971; Gulf of Mex. S.W.Fla shelf.- 14 days

R/V Joie de Vivre (UWF) - 1 cruise 1970: N. Gulf of Mex. 1 day

**3. MANNED SUBMARINE OPERATIONS**

SS xxxx - Triton I submarine, Oct. 2009, (US Submarines sea trials, Bimini, Bahama Islands. 1 dive to 300 ft.

*R/V Seward Johnson* w. *JSL-2* - 1 cruise May 2008, (John Reed, NOAA-HBOI sponsored coral program) Oculina coral reef, Chapman and Jeff's Reef assessment, 100 m max.depth, **East Florida**, 2 days, Acoustic instrument, ALMS.3, retrieval. 2 dives; Dr. Sandra Brooke, John Reed, Chief Scientists

*R/V Seward Johnson* w. *JSL-I* - 1 cruise May 2006, (NOAA/Deep Coral Program **Florida Straits**, Lophelia coral reef, Miami Terrace.500 - 1,000 m depths, **East Florida**, 4 days. Dr. Sandra Brooke, John Reed and Chuck Messing, Chief Scientists, one dive, Deploy PACU for acoustic recordings.

*R/V Seward Johnson* w. *JSL-I* - 1 cruise November 2005, (NOAA/Deep Coral Program, **Florida Straits**, Lophelia coral reef, 500 - 1,000 m depths, **East Florida**, 5 days; Dr. Sandra Brooke, John Reed and Cuck Messing, Chief Scientists

*R/V Edwin Link* (=Seward Johnson II), w. *Clelia* Submarine, (NOAA/Ocean Exploration Program, Islands in the Stream), 1 cruise Aug.-Sept. 2001, **Oculina Bank, East Florida**, 10 days.

*R/V Seward Johnson* w. *JSL-I* (Discovery Channel support) - 1 cruise November 1995, **Galapagos Is.**, 35 days (56 sub dives), Program title "Galapagos Beyond Darwin"

*R/V Sea Diver* w. *CLELIA* (NOAA/NURP/MARFIN support) - 1 cruise April 1995, **E. Fla. Oculina Reef Reserve.**- 4 days, w Churchill Grimes and Chris Koenig. Last *R/V Sea Diver* salute to Mrs. Edwin Link before her death.

*M/V Seaward Explorer* w. *PISCES II* sub (NOAA/NURP) - 1 cruise 1988, **Northern Gulf of Mexico, Mississippi Delta** - 10 days, giant snake eel expedition w George Burgess and Franklin Snelson.

## V. PROFESSIONAL AND COMMUNITY SERVICE

### A. NATIONAL/INTERNATIONAL SERVICE

#### 1. INTERNATIONAL:

**INUC.** Red Book list advisor, *Caribbean fishes, Barbados, 2012, Jamaica 2014.*

**UNESCO, FAO,** guide author and taxonomic advisor, reviewer, 1995-2011.

**Sociedad Ictiologica Mexicana,** editorial board, 2000-2001

**American Fisheries Society,** China delegation, 1997.

#### 2. NATIONAL:

**South Atlantic Fisheries Management Council, Grouper – Snapper Committee,** Author fish and fisheries profile series, 1988 to 2005.

**National Ocean Observatory Program: Congress,** Washington D.C. 2004.

**National Ocean Partnership Program/ Ocean Research Advisory Panel/ National Ocean Partnership Program/ Ocean Research Advisory Panel/ Ocean Biogeographic Information System, Workshop,** Wash., D.C. Apr 2004.

**National Oceanic & Atmospheric Administration (NOAA) -**

*National Marine Fisheries Service Coral Reef Program, Miami, FL, Mar. 2004.*

..... *Ocean.US Summit, Washington D.C. Mar.-Apr. 2003.*

*SEACOOS (Oceans.US) Program, Charleston, SC. Feb. 2003.*

*National Marine Fisheries Service Protected Resources Program,* Washington D.C., 9-12 February 2000.  
NOAA Planning workshop for 2001-2005; Reviewed all candidate marine species for U.S., Washington D.C., 10-13 March 1998.

*National Undersea Research Program/Mid-Atlantic Bight National Undersea Research Center,* Rutgers University--reviewed NURP/Mid-Atlantic Bight research proposals for 1995-96. 15-17 Nov. 1994.

*National Sea Grant Program,* NSF Style Review Panel, Univ. Delaware, National Program Review for 1995-96 funding, - May 1994.

*NOAA National Coastal Ocean Program,* Seagrass Program Review Panel. Washington, D.C., Mar. 1990.

**NOAA/EPA - Tech. Advisor,** South Atlantic Research Program 1993.

**NOAA: Fisheries Management Plans:** "Shark & Grouper Management Plans" 1993/1996.

**National Science Foundation (NSF)**

**National Bio-Informatics Panel,** Philadelphia Academy of Science, Philadelphia, PA, 2001; Indian River Lagoon biodiversity workshop and symposium, Cocoa Beach, 2002.

**U.S. Environmental Protection Agency (EPA) -**

**Science Advisory Board, Ecological Processes and Effects Committee/Marsh Management Subcommittee,** Reviewed nationwide wetland/marsh management programs and issues and helped develop a draft working paper for the EPA Science Advisory Board. Washington, D.C. 7-8 September 1994.

**National Estuarine Program.** Indian River Lagoon, Tech. Subcom, Biol. Sci., 1991-present.;

**U.S. Department of Interior -**

**Fish and Wildlife Service,** Pelican Island National Wildlife Refuge, Merritt Island National Wildlife Refuge, Fisheries management issues, 1982-Present ; Modeling Workshop for Merritt Island Wildlife Refuge and NASA Launch Sites, USFWS, NASA. 1986-87.

**National Park Service,** Canaveral National Seashore, Fisheries management issues, 1999-present.

**U.S. Geological Survey,** funded research in fisheries management Canaveral National Seashore & Merritt Island National Wildlife Refuge, 1999- 2002.

**U.S. Army Corps Engineers (ACE)-**

Regional office Jacksonville, Merritt Island on various E. Florida environmental issues 1985- present

**South Atlantic Fisheries Management Council,** Grouper-Snapper Advisory Committee; Fisheries Management Plan Reviews; "Oculina Reef Fishery Reserve Management Plan" 1995;

**Smithsonian Institution, National Museum of Natural History, Washington, D.C., -**

2005. Research Associate, and the **Smithsonian Marine Station,** Ft. Pierce.

**Smithsonian Environmental Research Center, MD.** Research Associate, 2002-2004.

## **B. FLORIDA AND REGIONAL SERVICE**

**Florida Ocean and Coastal Resource Council**, 2005 to 2009, appointed by Governor and Cabinet to develop research priorities for the state of Florida.

**South Florida Water Management District**: Lead -Northern Estuaries Fish Subgroup, RECOVER program, 2005 to 2009; reviews in St. Lucie River - Lake Okeechobee freshwater management, 1978 to 2009; St. Lucie Estuary Modeling Group 2000; Loxahatchee River ichthyoplankton, & juvenile snook survey, 2004.

**Fish and Wildlife Conservation Commission (1975-present)**, Stock Enhancement Advisory Committee, 1996- present; Beach renourishment issues (1985-present); Commercial net ban issues (1990-93); Spotted sea trout conservation issues, 1990-present; Snook management issues (1982-1985). FDNR "Trout-Red drum Fisheries Management Plan" 1992.

**Game and Freshwater Fish Commission**: Endangered and Threatened Species Committee, Florida Committee on Rare, Endangered, Plants and Animals. 1990-1993

**Fla. Chair, Coordinating Council on Mosquito Control: Tech. Subcommittee on Managed Marshes** (1983- 1994, Chaired 1983-84). Representatives of EPA, ACE, FWS, NMFS, FDER, FDNR, FDEP, SWRWMD, SFWMD, FHRS, FGFWFC, and regional mosquito control districts as well as scientists with UF, HBOI.

**Florida Department of Environmental Protection (=Regulation)**: St. Sebastian River muck removal project 2002-2004; Mosquito control issues and wetland management, 1982 - 1995, invited presentations before Governor's Cabinet 1988.

**St. John's Water Management District**: Wetland model development of Indian River Lagoon, 1998-99.

**Board Conservation Alliance of St. Lucie County**, 2016-2018, 2025

## **2. LOCAL GOVERNMENT**

**Indian River County Commissioner's Collaborative**, 2013-14. Invited presentations & technical guidance. County Master Plan & Watershed Action Committee, 1978-1989.

**St. Lucie River Alliance**, 2012 to present, Invited technical guidance and research support.

**Brevard County Commission/Marine Resources Council**, Invited guidance, presentation, collaborative research.

**Martin County Commission** , 2003- 2004, Everglades restoration initiative; 2018-2021 Endangered Species petition preparation to the USFish and Wildlife Service.

**Indian River County Commission**, 1978-2004, Spoil Island survey (78-80); Master Plan environmental sections (75-90); Mosquito Control Board (82-87); Marine Advisory Committee (Water Shed Action Committee), Indian River County, 1987-91.

**St. Lucie County Commission**, 1990-present land use comments, Harbor Development plans; Wetland purchase advice (95-02); Mosquito Control District (82-97); Environmental Resources Dept.

**City of Vero Beach**, 1978-1985. Wetland survey for new bridge (78-81); Master plan environmental (78-87).

**City of Satellite Beach**, 2002-present

**Treasure Coast Regional Planning Council** 1973-1977, meetings on wetland issues, coastal plan comments.

**Waterfront Planning Council of St. Lucie County**, 1993-1996. Planning economic and environmentally compatible development within the Fort Pierce Harbor Basin.

**Brevard County/Satellite Beach**, IRL and Atlantic Ocean conservation issues.

## **C. PROFESSIONAL SOCIETIES, RESEARCH ASSOCIATIONS**

### **1. PROFESSIONAL SOCIETIES**

**American Fisheries Society** (1969- present) President Florida Chapter 1998-99; V. Pres (1997-98); Treas/Sec. (1989-91); international, national and state meeting/symposium organizer; reviewer, research contributor; S. Div. Am. Fish. Soc., Marine and Estuarine Resources Committee and Symposia Organizing Committee, 1988- present; Endangered Species & Program/Symposium Organizing Committees 1990-1991

**American Society of Ichthyologists and Herpetologists** (1969 - present); reviewer, research contributor, judge.

**Coastal & Estuarine Research Federation** (1975- present); international, national & state meeting/ symposium organizer, reviewer, research contributor,.

**Ichthyological Society of Japan** (1985- 1997);member reviewer.

**Gulf and Caribbean Fisheries Institute** (1988 to 2001); international, national meeting symposium organizer research contributor,.

**Acoustical Society of America**, member, reviewer 2004 – 2006.

**American Elasmobranch Society**, (1990 - 2005) Charter Member; reviewer, research contributor

## D. PUBLIC EDUCATION

### 1. INTERNATIONAL & NATIONAL PUBLIC EDUCATION – TELEVISION/RADIO BROADCASTS

**2013 – 2020 National Geographic Wild International – “Shark Attacks and Ecosystem Health”** w Ed Hambleton. Aired seven years to National and International audience, Gilmore appearance for 30 min.

**2011 – Animal Planet: River Monsters International – “Bull Sharks of the Indian River Lagoon”** w Jeremy Wade.

**2010-2011 – Discovery Channel International – “Day of the Shark II & III”**, Beanfield Productions, Robert Campos & Donna LoCicero. Series of commentaries and interviews on shark behavior and distinctive dentition relative to preferred prey, not humans.

**1999 – 2001 Discovery Channel USA: “Forbidden Depths”, Jim Lipscomb Productions and Al Giddings. Chief Scientist** on first US research mission with US vessel and submersible to Cuba since the Cuban revolution 1957-1958. Program has been aired multiple times annually throughout the world, 1999 to 2007. (*RGG funded fish collection supplies & equipment, eventually reimbursed by Lipscomb, was chief scientist, script reviewer*);

**1998- Discovery Channel USA and Europe: “Phantoms of the Deep”, John McKenney, Jack McKenney Productions, LA, Cal. Oct. 1998;** winner of most popular technical Film in Europe winter 1998. (*RGG funded 80% of program field operations, was chief scientist, script reviewer*);

**1998- 2007 National Geographic Special, United Kingdom/Europe: “Mysteries of the Twilight Zone”, Tom Lucas Productions, Tom Lucas Producer.** (*RGG funded 80% of program field operations, was chief scientist, script reviewer*); **Discovery Channel, United States: “Mysteries of the Twilight Zone”, Tom Lucas Productions, Tom Lucas Producer.**

**1996- 2003 Discovery television programs: “Galapagos: Beyond Darwin”, Dave Clark Prod. & Al Giddings producers** (scientist, aided with script and sub ops, props).(*RGG funded fish collection supplies & equipment. reviewer*)

**1996- *Cannibals*, Wild South - New Zealand TV** (scientist, aided with script and props).

**1996- *Ocean Currents*, Jack McKenney Productions, Inc., John McKenney Producer** (scientist, made additional scientist contacts used for program, aided with script and props).

**1996- 1998 Fox TV production: “When Animals Attack #2”, Brad Lachman Productions** (scientist).

**1995- Discovery television program: “Jurassic Reef”, Secrets of the Deep series, Jack McKenney Productions, Inc., John McKenney Producer** (scientist, aided with script and props)

**1994- Television New Zealand Ltd., Natural History - “Cannibalism in the Animal Kingdom”:**. (Mark Fern, producer), (scientist, aided with script and props).

**1993- 2005 Discovery television program: “Sand Tigers, Secrets of the Deep” series, Jack McKenney Productions Inc., John McKenney Producer** (scientist & consultant, aided with script and props)

**1991- Discovery - “Shark Ecology”, Jack McKenney Prod., John McKenney Producer** (actor, aided with script and props); ***Aquaculture*, Louisiana Education Network 1991-**(scientist, aided with script and props)-

**1988 - Audubon Special - *Sharks on Their Best Behavior*** filmed by Stanton Waterman (East/West Film Productions, Inc. and Howard Hall, (Howard Hall Productions,) producers. (scientist & consultant, aided with script and props).

### RADIO

**NPR – 2010, Miami Herald Radio, Mating calls of the spotted seatrout.**



NPR - 2004 Miami, fish acoustics, Indian River Lagoon

NPR - 2002 National radio broadcasts: “**Living on Earth**” on fish acoustics, my Mosquito Lagoon research.

## **2. STATE, REGIONAL & LOCAL PUBLIC EDUCATION**

**PUBLISHED ARTICLES:** 2008 – 2003, wrote a monthly column, 58 essays, as “Sportsman’s Biologist” for the largest sports fishing magazine in Florida, **Florida Sportsman Magazine**, 3 million readers; Florida Audubon Magazine on regional biodiversity. Topics emphasized life histories and ecology of all fishes, not just fishery species.

**TELEVISION** - 1974-present. Miami, Orlando, West Palm Beach, Fort Pierce, Vero Beach, Melbourne, NBC, ABC, CBS, FOX, PBS affiliates One to three **annual** regional television appearances on marine issues. Topics include environmental and fishery issues, international expeditions, shark attacks, unusual sea creatures.

**PUBLIC LECTURES** – Gave numerous public lectures 1972 to 2020, veteran of 400+ public presentations to civic organizations, clubs and governmental forums, Florida Naturalist Program; Environmental Learning Centers from Orange/Volusia to Palm Beach counties, Rotary, Exchange Club, Kiwanis, Audubon, Fly Fisherman’s Assoc., angler’s groups, various Conservation groups, Oxbow Center St. Lucie Co., public schools and handicapped students, K-12, in Florida, North Carolina and New York, NY.

**NEWSPAPER** - Published in 2-3 articles annually originated as editorials: articles and feature stories on fisheries & environmental issues, research and discoveries. *Washington Post, Scripps Newspaper Syndic./Vero Press Journal, Miami Herald, St. Petersburg Times, Orlando Sentinel, Fort Pierce News Tribune, Florida Today, Stuart News, Palm Beach Post, Bradenton Herald, Fort Meyers Dailey*; several national & international AP releases, 1983-present. Frequent interviews in regional newspapers on aquatic and marine issues.

**BOARD & ADVISORY ACTIVITIES:** **Served on:** Florida Ocean Resources Council, Tallahassee; Board of Directors, Marine Resources Council of the Indian River Lagoon, Environmental Learning Center of Indian River County; Fort Pierce Port Citizen's Environmental Committee; St. Lucie County Visioning Committee; Audubon Society, Indian River County Commission Narrows Committee; Conservation Alliance of St. Lucie County; Florida Oceanographic Society Aquaculture Advisory Group. Hubbs Research Institute, research associate 1999- 2004; Board of Trustees Palm Beach Aquarium 1999- 2001 Florida Committee on Rare and Endangered Plants and Animals, 1987- 1993; Research and Education Committee Fla. Ocean. Soc., 1988; Alafia River Advisory Committee, Environmental Subcommittee. 1989-91. Indian River Lagoon River Keeper board directors, 2019-2020.

**K-12 SCIENCE COMPETITION & SCHOLARSHIP JUDGE – AWARDS:** **Link Foundation & Harbor Branch Scholastic Scholarship** awards annually, 1986-1993. **Judge regional science competition** from primary school to high school, local and state levels 1975-1990; **Merit Badge Counselor**, Boy Scouts of America, 1985-1988.