Fishes were collected by hook and line in tournaments primarily in Puerto Rico (1974-96) and Dauphin Island, Alabama (1967-74). We identified defined and illustrated 273 species of parasites with diagnostic characters, records, geographic range, location in host, and length; and often life history, ecology, associations, host specificity, damage to host, detection, harm to humans, preparation for study, treatment, and significance to sport fishing were discussed. Non-parasitic diseases were noted. The importance of parasites, their use as environmental indicators, controlling and avoiding fish parasites, and their effects on humans were discussed. Host Summaries and Host-disease Checklists included the classification of these 39 fishes and a list of the parasites known in each host worldwide. A new species of *Pennella* (Copepoda) and *Maricostula* (Nematoda), numerous new host and locality records, new synonymies, and matches of larval and adult species were noted. (Complete copies will be available at the American Society of Parasitologists meeting.) (Supported by the Commonwealth of Puerto Rico Department of Natural and Environmental Resources with Wallop-Breaux Sportfish Restoration Funds [Puerto Rico Projects F-28 and F-35] and Departments of Biology and Marine Sciences, Mayagüez Campus, and Southeastern Cooperative Fish Disease Project, Department of Fisheries and Allied Aquacultures, Auburn University, with Wallop-Breaux Funds in Alabama.)