Annotated Checklist of the Fishes of the Rio Grande Drainage, Dona Ana, El Paso, and Hudspeth Counties

Carl S. Lieb

Laboratory for Environmental Biology, Centennial Museum, University of Texas at El Paso

An Informal, Non-refereed Electronic Publication of the Centennial Museum

Number 2, 15 March 2000
Annotated Checklist of the Fishes of the Rio Grande Drainage, Dona Ana, El Paso, and Hudspeth Counties

Carl S. Lieb, Laboratory for Environmental Biology, Centennial Museum, University of Texas at El Paso

This list of species includes all the historically occurring taxa that are now apparently extirpated from the region, as well as the upper Rio Grande forms that come as far south as Elephant Butte Reservoir in Sierra County. The latter may disperse considerable distances downstream as rare migrants or waifs. The list is based on Laboratory for Environmental Biology specimens and the literature given in the References section.

CLASS OSTEICHTHYES

Order Lepisosteiformes

Family Lepisosteidae

*Lepisosteus osseus*--Longnose Gar

C (A population occurs in the canyon of the Rio Grande that lies between the Eagle/Indio Mountains in Hudspeth County and the Sierra de Pilares of Chihuahua)

Order Anguilliformes--Eels

Family Angillidae

*Anguilla rostrata*--American Eel

$ (Eastern U.S. species introduced in Colorado, with apparently migrants downstream to Caballo/Elephant Butte reservoirs; waif dispersal southwards is possible)
Order Clupeiformes

Family Clupeidae

Dorosoma cepedianum--Gizzard Shad

$ (native, abundant)

Dorosoma petense--Threadfin Shad

$ (introduced into Rio Grande system, not abundant)

Order Salmoniformes

Family Salmonidae

Onchorhynchus mykiss [Salmo gairdneri]--Rainbow Trout

$ (local populations of stocked fish may occur as water conditions permit)

Family Esocidae

Esox lucius--Northern Pike

$ (introduced in northern New Mexico, present at Elephant Butte Reservoir; waif dispersal further south possible)

Order Characiformes

Family Characidae

Astyanax mexicanus--Mexican Tetra

$ (not taken after 1950 in Dona Ana Co., group 2 endangered in NM; status in El Paso-Hudspeth counties unknown, but probably extirpated there as well)
Family Serrasalmidae

cf. Colossoma macroponum--"Pacu"

(approximately an invasive aquarium fish apparently feral in Rio Grande and associated waters; apparently responsible for local "piranha-in-the-Rio-Grande" stories)

Order Cypriniformes

Cyprinidae

Carassius auratus--Goldfish

(approximately an invasive Asian species widely used as an aquarium fish; individuals may be found locally as releases from captivity, but no breeding populations are known in the Rio Grande proper)

Ctenopharyngodon idella--Grass Carp

(approximately an invasive Asian species introduced into U.S. to control excess aquatic vegetation; locally present but not abundant)

Cyprinella [Notropis] lutrensis--Red Shiner

(native, locally abundant)

Cyprinus carpio--Common Carp

(introduced from Asia to the U.S. in 1800's; very abundant)

Extrarius [Hypopsis] aestivalis--Speckled Chub

(native, but apparently extirpated from the Rio Grande of New Mexico; status in El Paso/Hudspeth counties unknown but probably absent from here as well)

Gila pandora--Rio Grande Chub

(native fish, primarily known from upper Rio Grande of New Mexico; once recorded from Elephant Butte prior to 1970; not recorded from Texas)
Hybognathus amarus--Rio Grande Silvery Minnow

$ (native fish, at present restricted to north-central Rio Grande of New Mexico; not collected in Dona Ana Co. since 1950; group 2 endangered in NM; recorded from Big Bend region of Rio Grande of Texas, but not from El Paso/Hudspeth counties)

Notemigonus crysoleucas--Golden Shiner

$ (Eastern U.S. species, a "bait bucket" introduction, extirpated since ca. 1980 from the Rio Grande drainage)

Notropis jemezanus--Rio Grande Shiner

$ (a native fish of the lower Rio Grande of Texas; not taken in Rio Grande of New Mexico since 1950; endangered in Texas)

Notropis orca--Phantom Shiner

$ (native fish to Rio Grande drainage, but even though extirpated in NM, last specimen taken in 1975, it is still listed as group 1 endangered in NM; considered conspecific with N. simus by Texas wildlife regulations)

Notropis simus--Bluntnose Shiner

$ (native fish in upper Rio Grande, but not taken seen in New Mexico since 1950, considered group 1 endangered in NM; endangered in Texas)

Pimephales promelas--Fathead Minnow

$ (widespread temperate North American species, but in Rio Grande drainage found mostly north of Elephant Butte in New Mexico and Presidio County southwards in Texas; not taken since 1970 in Sierra County, and so far unreported from Dona Ana/El Paso/Hudspeth counties, where it is replaced by the next species)
Pimephales vigilax--Bullhead Minnow

$ (East-central U.S. species transplanted to our region, now the most abundant minnow in Dona Ana/El Paso/Hudspeth counties)

Rhinichthys cataractae--Longnose Dace

$ (a fish associated with cooler waters of north-temperate North America that rarely disperses from the upper Rio Grande of New Mexico to El Paso County)

Family Catostomidae

Carpiodes carpio--River Carpsucker

$ (an abundant native fish in the Rio Grande drainage)

Catostomus commersoni--White Sucker

$ (a north-temperate and boreal North American species, with populations in the Northern Rio Grande; southernmost population at Elephant Butte Reservoir, and may be subject to rare dispersal downstream)

Ictiobus bubalus--Smallmouth Buffalo

$ (a fish of the Mississippi drainage, but with native populations in the upper and lower Rio Grande; apparently not abundant)

Ictiobus niger--Black Buffalo

$ (a native fish of the lower Rio Grande, possibly occurring as far north as Hudspeth County; not reported from New Mexico)

Order Siluriformes

Family Ictaluridae

Ameiurus (Ictalurus) melas--Black Bullhead
(historically introduced in northern Rio Grande, possibly persisting in northern Sierra County; not at present known from Dona Ana County; status in El Paso/Hudspeth counties unknown, but unlikely to occur there)

*Ameiurus (Ictalurus) natalis*--Yellow Bullhead

*(eastern U.S. species introduced before 1950 in Dona Ana and Sierra counties, has spread to El Paso County and Hudspeth County)*

*Ictalurus furcatus*--Blue Catfish

*(introduced Elephant Butte/Caballo area of NM; native in Rio Grande from Hudspeth County south; local status unknown)*

*Ictalurus punctatus*--Channel Catfish

*(central U.S. species introduced into Rio Grande drainage, where it is now the most abundant local catfish)*

*Pylodictis olivaris*--Flathead Catfish

*(native species of the Rio Grande that may persist in the canyons of southern Hudspeth County, but is apparently extirpated elsewhere in the region)*

**Order Cyprinodontiformes**

**Family Poeciliidae**

*Gambusia affinis*--Mosquitofish

*(native to lower Rio Grande, and now the most abundant fish in area; used widely for biological control of mosquitoes)*

*Poecilia (Mollienesia) latipinna*--Sailfin Molly

*(aquarium trade species; feral in lower Rio Grande and may appear locally)*
**Order Perciformes**

**Family Percichthyidae**

*Morone chrysops*--White Bass

$ \quad \text{(introduced, or possibly native, in Rio Grande; locally abundant, especially in reservoirs)}$

*Morone saxatilis*--Striped Bass

$ \quad \text{(primarily a marine and estuarine species; tolerance of high salinity has resulted in wide introductions in Texas; in New Mexico, known from Elephant Butte/Caballo reservoirs only; status in Dona Ana/El Paso/Hudspeth area unknown)}$

**Family Centrarchidae**

*Ambloplites rupestris*--Rock Bass

$ \quad \text{(Eastern U.S. species introduced into Elephant Butte & Caballo reservoirs before 1950, but now extirpated from Rio Grande)}$

*Lepomis (Chaenobryttus) cyanellus*--Green Sunfish

$ \quad \text{(native species, locally abundant)}$

*Lepomis (Chaenobryttus) gulosus*--Warmouth

$ \quad \text{(introduced Eastern U.S. species, chiefly persisting at Elephant Butte Reservoir in Sierra County)}$

*Lepomis macrochirus*--Bluegill

$ \quad \text{(native to Rio Grande; can be locally abundant)}$

*Lepomis megalotis*--Longear Sunfish

$ \quad \text{(introduced in lower Rio Grande, less abundant than other sunfishes)}$
Micropterus dolomieui -- Smallmouth Bass

$ (introduced and apparently persisting at Elephant Butte/Caballo reservoirs in Sierra County; could be occasionally found downstream)

Micropterus salmoides -- Largemouth Bass

$ (introduced in Rio Grande, locally abundant)

Pomoxis annularis -- White Crappie

$ (Eastern U.S. species introduced in Rio Grande, apparently not abundant and/or declining)

Pomoxis nigromaculatus -- Black Crappie

$ (introduced Eastern U.S. species, principally surviving at Elephant Butte/Caballo reservoirs in Sierra Co. and thus might rarely occur downstream)

Family Percidae

Perca flavescens -- Yellow Perch

$ (introduced before 1950 in New Mexico, persisting at Elephant Butte/Caballo reservoirs only)

Stizostedion vitreum -- Walleye

$ (introduced in Elephant Butte/Caballo reservoirs; reported dispersal as far south as Dona Ana and El Paso counties)

References


