

***Platytrapius siamensis* (a catfish, no common name)**

Ecological Risk Screening Summary

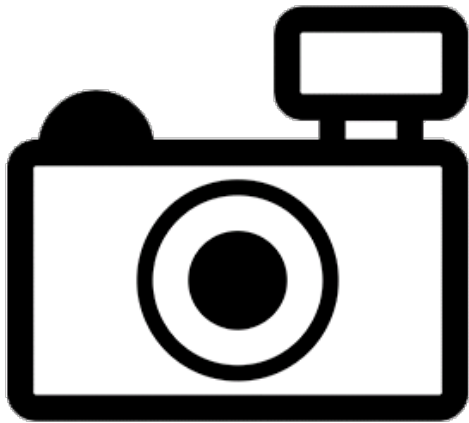
U.S. Fish & Wildlife Service, February 2011

Revised, October 2018

Web Version, 10/15/2020

Organism Type: Fish

Overall Risk Assessment Category: Uncertain



No Photo Available

1 Native Range and Status in the United States

Native Range

From Froese and Pauly (2018):

“Asia: endemic to Chao Phraya and Bang Pakong basins in Thailand.”

Status in the United States

From Shafland (2008):

“In 1988, five False Siamese Shark [*Platytrapius siamensis*] (175–191 mm TL) were collected by an FWC Wildlife Officer from a creek that drains into the Hillsborough River near Tampa [Florida, USA] (Roudebush, [Florida Fish and Wildlife Conservation Commission, Tallahassee, personal communication] 1988). This species is fairly common in the aquarium trade, and almost certainly more than five False Siamese Shark were originally illegally released. None have been collected or reported since, indicating this species failed to reproduce.”

From Neilson (2018):

“Shafland et al. (2008) described a single observation of this species near Tampa, Florida in 1988. This likely represents a case of incorrect taxonomic identification. The size range listed for the collected individuals is much larger than the known size range of *Platytrapius siamensis*. Additionally, Shafland et al. (2008) state that this species is common in the aquarium trade, but *P. siamensis* has not been observed in the wild since 1977 and is currently regarded as extinct (Ng 2011).”

Means of Introductions in the United States

No established populations of *Platytrapius siamensis* have been recorded in the United States.

Remarks

From Ng (2011):

“This species [...] is now considered extinct, as no individuals have been encountered since 1975–1977 (from specimens seen from Ayutthaya; specimens at Thai Department of Fisheries (C. Vidthayanon pers. comm. 2011)) in spite of numerous surveys within the Chao Phraya River drainage and areas where this species has been historically reported. The Bang Pakong has also been extensively surveyed over the period 1990–2000 (C. Vidthayanon, pers. comm. 2011), and the species has not been recorded, nor do fishers report the species.”

“This species is believed to have gone extinct as a result of damming and canalization of the Chao Phraya River (Harrison and Stiassny 1999), as well as extensive reclamation of wetlands around Bangkok and the known range of the species. In addition, the lower parts of both rivers are very highly polluted.”

2 Biology and Ecology

Taxonomic Hierarchy and Taxonomic Standing

According to Fricke et al. (2018), *Platytrapius siamensis* (Sauvage 1883) is the current valid name for this species.

From ITIS (2018):

Kingdom Animalia
Subkingdom Bilateria
Infrakingdom Deuterostomia
Phylum Chordata
Subphylum Vertebrata
Infraphylum Gnathostomata
Superclass Actinopterygii
Class Teleostei
Superorder Ostariophysi

Order Siluriformes
Family Schilbeidae
Genus *Platytrapius*
Species *Platytrapius siamensis* (Sauvage, 1883)

Size, Weight, and Age Range

From Froese and Pauly (2018):

“Max length : 20.0 cm TL male/unsexed [Vidthayanon 2005]”

Environment

From Froese and Pauly (2018):

“Freshwater; demersal [...] 21°C - 25°C [assumed to be recommended aquarium temperature]”

Climate

From Froese and Pauly (2018):

“Tropical [...]”

Distribution Outside the United States

Native

From Froese and Pauly (2018):

“Asia: endemic to Chao Phraya and Bang Pakong basins in Thailand.”

Introduced

No records of introduction outside of the United States were found for *Platytrapius siaamensis*.

Means of Introduction Outside the United States

No records of *Platytrapius siamensis* introduction outside the United States were found.

Short Description

From Vidthayanon (2005):

“Slender, tapering body with slightly depressed head; 4 pairs of long, flattened barbels; pectoral and dorsal fins with spinous ray, anal fin base long, caudal fin deeply fork. Pale silvery body, fins hyaline with dusky margin; barbels dark.”

Biology

From Froese and Pauly (2018):

“Inhabits lower to middle reaches, mainstreams, tributaries and larger marshlands [Vidthayanon, 2005]. Carnivorous, feeding on insects and shrimps [Vidthayanon, 2005]. Oviparous, eggs are unguarded [Breder and Rosen, 1966].”

“Distinct pairing [Breder and Rosen, 1966]”

“open water/substratum egg scatterers”

Human Uses

From Ng (2011):

“This species was utilized as a food fish, most likely in artisanal fisheries.”

Diseases

No information on diseases of *Platytrapius siamensis*. No records of OIE-reportable diseases (OIE 2020) were found for *Platytrapius siamensis*.

Threat to Humans

From Froese and Pauly (2018):

“Harmless”

3 Impacts of Introductions

While there was one report of an introduction of *Platytrapius siamensis* to the United States, it was later determined to be based on a misidentification. No confirmed records of *Platytrapius siamensis* introductions were found; therefore, there is no information on impacts of introductions.

4 History of Invasiveness

No confirmed records of *Platytrapius siamensis* introductions were found; therefore, the history of invasiveness is classified as No Known Nonnative Population.

5 Global Distribution

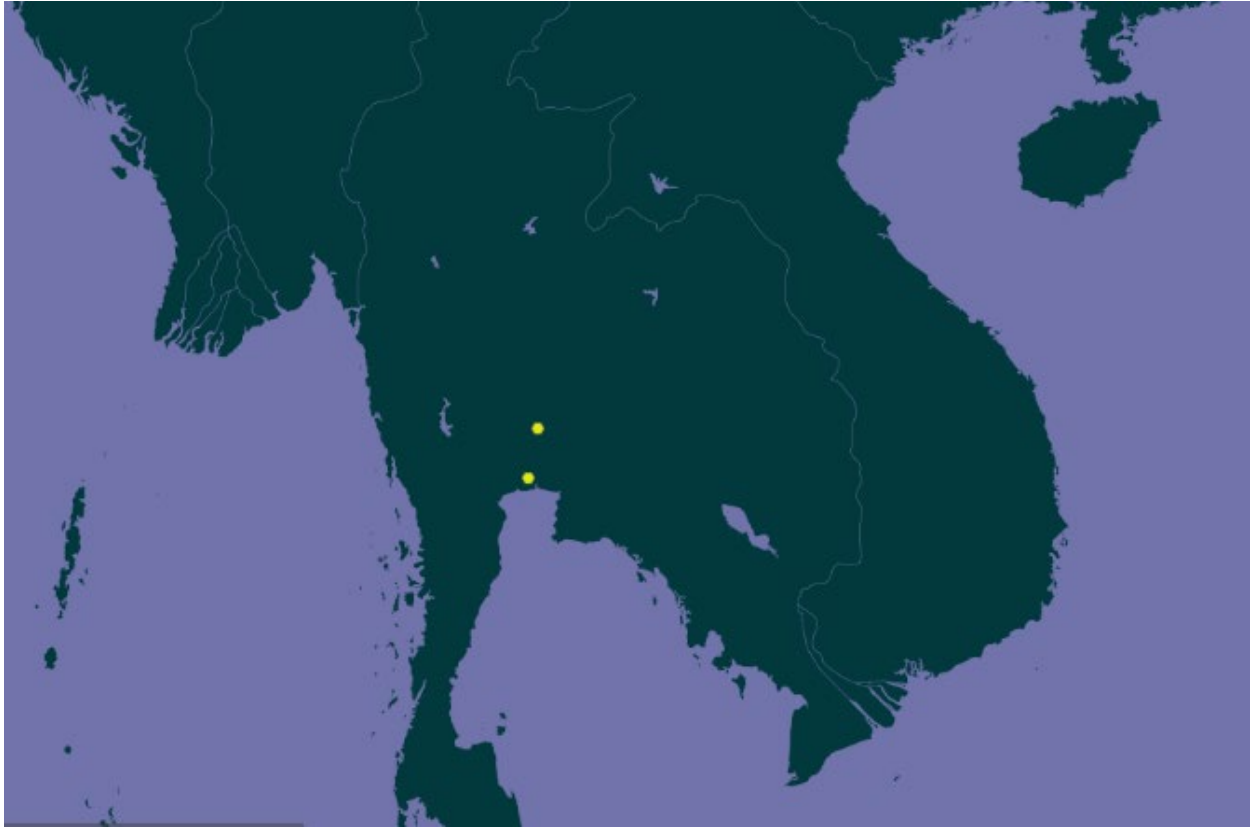


Figure 1. Known global distribution of *Platytrypius siamensis*. Locations are in southern Thailand. Map from GBIF Secretariat (2018).

6 Distribution Within the United States

No established populations of *Platytrypius siamensis* were recorded within the United States.

7 Climate Matching

Summary of Climate Matching Analysis

The climate match for *Platytrypius siamensis* was low for most of the contiguous United States. There were two areas of medium match in southern Florida and Texas. There were no areas of high match. The Climate 6 score (Sanders et al. 2018; 16 climate variables; Euclidean distance) for contiguous United States was 0.000, low (scores between 0.000 and 0.005, inclusive, are classified as low). All States had low individual climate scores.

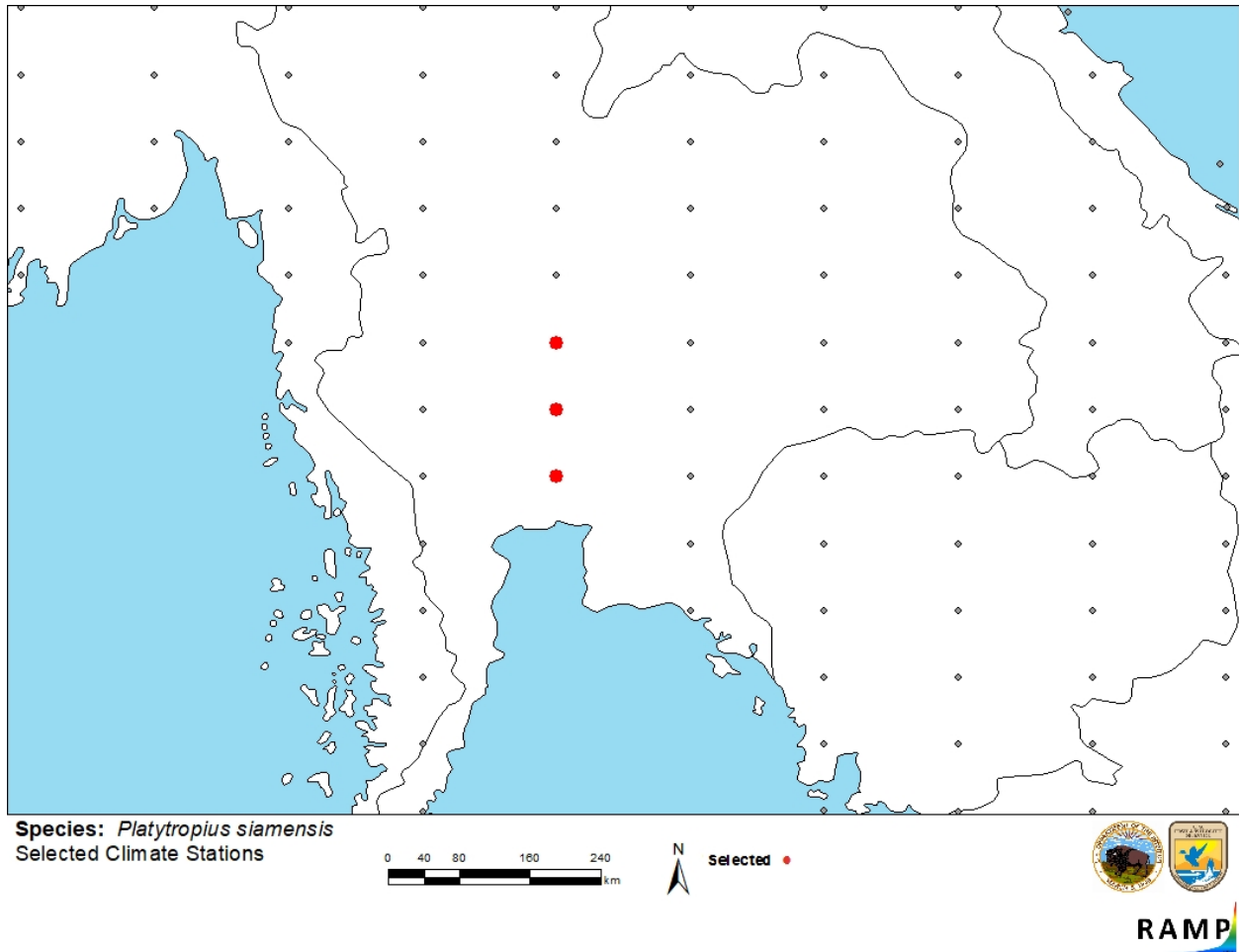


Figure 2. RAMP (Sanders et al. 2018) source map showing weather stations in Thailand selected as source locations (red) and non-source locations (gray) for *Platytrypius siamensis* climate matching. Source locations from GBIF Secretariat (2018). Selected source locations are within 100 km of one or more species occurrences, and do not necessarily represent the locations of occurrences themselves.

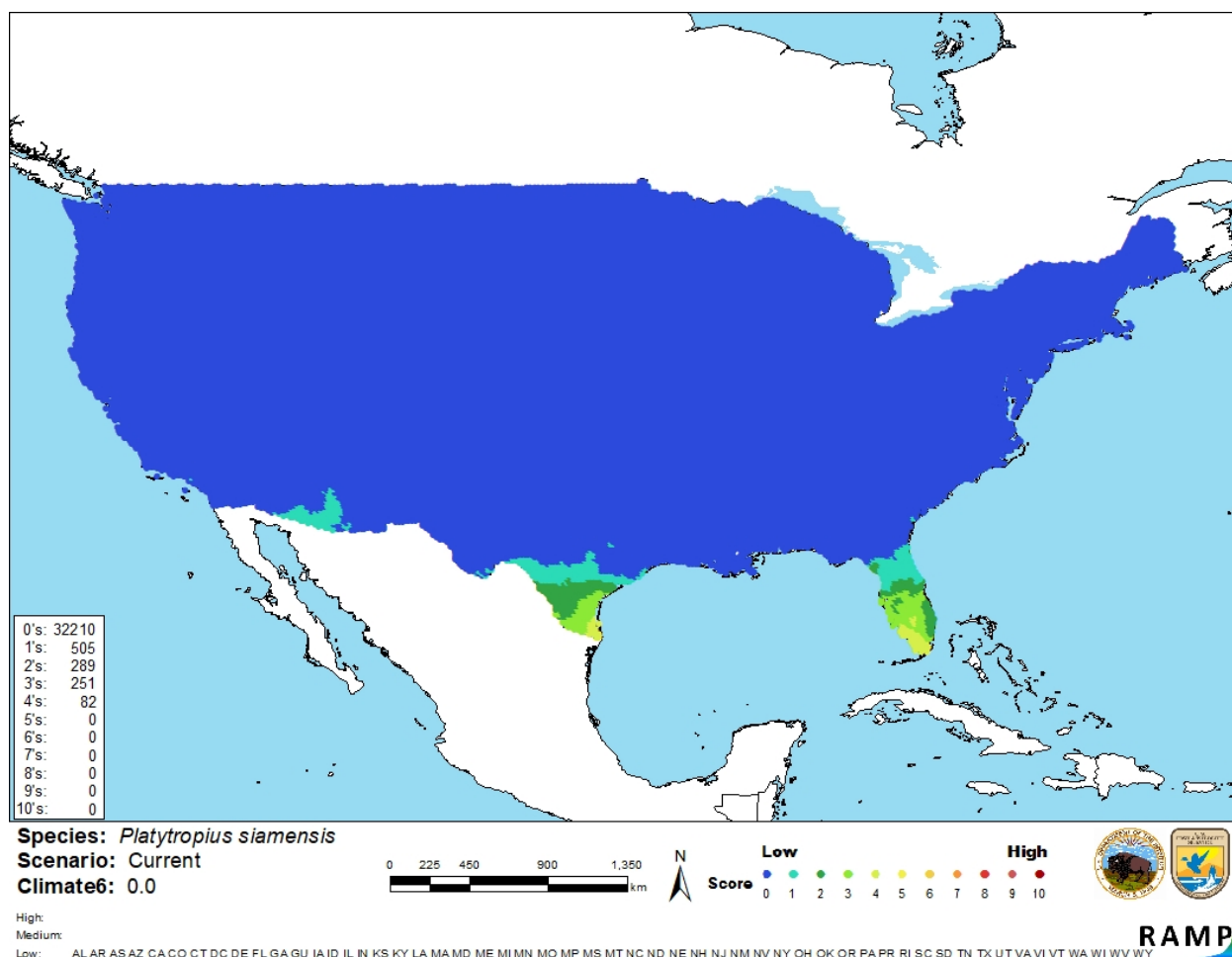


Figure 3. Map of RAMP (Sanders et al. 2018) climate matches for *Platytrypius siamensis* in the contiguous United States based on source locations reported by GBIF Secretariat (2018). Counts of climate match scores are tabulated on the left. 0/Blue = Lowest match, 10/Red = Highest match.

The High, Medium, and Low Climate match Categories are based on the following table:

Climate 6: (Count of target points with climate scores 6-10)/ (Count of all target points)	Overall Climate Match Category
$0.000 \leq X \leq 0.005$	Low
$0.005 < X < 0.103$	Medium
≥ 0.103	High

8 Certainty of Assessment

The certainty of assessment for *Platytrypius siamensis* is low. No records of introductions were found so there is no information on impacts to evaluate. Information on distribution needed for the climate match is good, since *P. siamensis* was regarded as an endemic. However, *P. siamensis* is thought to be extinct.

9 Risk Assessment

Summary of Risk to the Contiguous United States

Platytrapius siamensis is a freshwater catfish endemic to two river basins in Thailand. This species has not been found in the wild since 1977, and is believed to be extinct. The history of invasiveness for this species is classified as No Known Nonnative Population. While one introduction to Florida was reported, it is now regarded as a misidentification. There were no confirmed records of introductions. The climate match for the contiguous United States was low. There were two small areas of medium match in southern Florida and Texas. The certainty of assessment is low due to lack of information regarding the history of introduction. The overall risk assessment for *Platytrapius siamensis* is uncertain.

Assessment Elements

- **History of Invasiveness (Sec. 4): No Known Nonnative Population**
- **Overall Climate Match Category (Sec. 7): Low**
- **Certainty of Assessment (Sec. 8): Low**
- **Remarks/Important additional information:** *Platytrapius siamensis* is believed to be extinct, with no sightings since 1975–1977.
- **Overall Risk Assessment Category: Uncertain**

10 Literature Cited

Note: The following references were accessed for this ERSS. References cited within quoted text but not accessed are included below in Section 11.

Fricke R, Eschmeyer WN, van der Laan R, editors. 2018. Catalog of fishes: genera, species, references. California Academy of Science. Available: <http://researcharchive.calacademy.org/research/ichthyology/catalog/fishcatmain.asp> (September 2018).

Froese R, Pauly D, editors. 2018. *Platytrapius siamensis* (Sauvage, 1883). FishBase. Available: <http://www.fishbase.se/summary/Platytrapius-siamensis.html> (October 2018).

GBIF Secretariat. 2018. GBIF backbone taxonomy: *Platytrapius siamensis* (Sauvage, 1883). Copenhagen: Global Biodiversity Information Facility. Available: <https://www.gbif.org/species/2341710> (October 2018).

[ITIS] Integrated Taxonomic Information System. 2018. *Platytrapius siamensis* (Sauvage, 1883). Reston, Virginia: Integrated Taxonomic Information System. Available: https://www.itis.gov/servlet/SingleRpt/SingleRpt?search_topic=TSN&search_value=681866#null (October 2018).

- Neilson ME. 2018. *Platytrapius siamensis* (Sauvage, 1883). Gainesville, Florida: U.S. Geological Survey, Nonindigenous Aquatic Species Database. Available: <https://nas.er.usgs.gov/queries/FactSheet.aspx?speciesID=2602> (October 2018).
- Ng HH. 2011. *Platytrapius siamensis*. The IUCN Red List of Threatened Species 2011. Available: <https://newredlist.iucnredlist.org/species/180996/7657156#geographic-range> (October 2018).
- [OIE] World Organisation for Animal Health. 2020. OIE-listed diseases, infections and infestations in force in 2020. Available: <http://www.oie.int/animal-health-in-the-world/oie-listed-diseases-2020/> (October 2020).
- Sanders S, Castiglione C, Hoff M. 2018. Risk Assessment Mapping Program: RAMP. Version 3.1. U.S. Fish and Wildlife Service.
- Shafland PL, Gestring KB, Murray MS. 2008. Florida's exotic freshwater fishes. Florida Scientist 71:220–245.
- Vidthayanon C. 2005. Thailand red data: fishes. Bangkok, Thailand: Office of Natural Resources and Environmental Policy and Planning.

11 Literature Cited in Quoted Material

Note: The following references are cited within quoted text within this ERSS, but were not accessed for its preparation. They are included here to provide the reader with more information.

- Breder CM, Rosen DE. 1966. Modes of reproduction in fishes. Neptune City, New Jersey: T.F.H. Publications.
- Harrison IJ, Stiassny MLJ. 1999. The quiet crisis. A preliminary listing of the freshwater fishes of the world that are extinct or “missing in action.” New York: Kluwer Academic/Plenum Publishers.
- Sauvage H-E. 1883. Sur une collection de poissons recueillis dans Mè-Nam (Siam) par M. Harmand. Bulletin de la Société philomathique de Paris 7:150–155.