

The following presentation was given by Jill Boullion during the November 10, 2020, Sand Mining Rulemaking Petition Stakeholder Meeting. Ms. Boullion is a stakeholder representing Bayou Land Conservancy and is not employed by, or otherwise affiliated with, the Texas Commission on Environmental Quality (TCEQ). This document is being made available by the Executive Director purely as a courtesy. The views expressed in this presentation are those of the authors. The TCEQ does not endorse, represent, or necessarily agree with the following information or its accuracy.

TEXAS COMMISSION ON
ENVIRONMENTAL QUALITY
SAN JACINTO RIVER BASIN
BEST MANAGEMENT PRACTICES RULE MAKING
FOR APOS
NOVEMBER 10, 2020

Jill Boullion, Executive Director



We preserve land along streams for flood control, clean water, and wildlife



Conservation Focus Area

Lake Houston (Upper San Jacinto River) Watershed

85% of Metro Houston's drinking water

Population centers are downstream and impacted by flooding



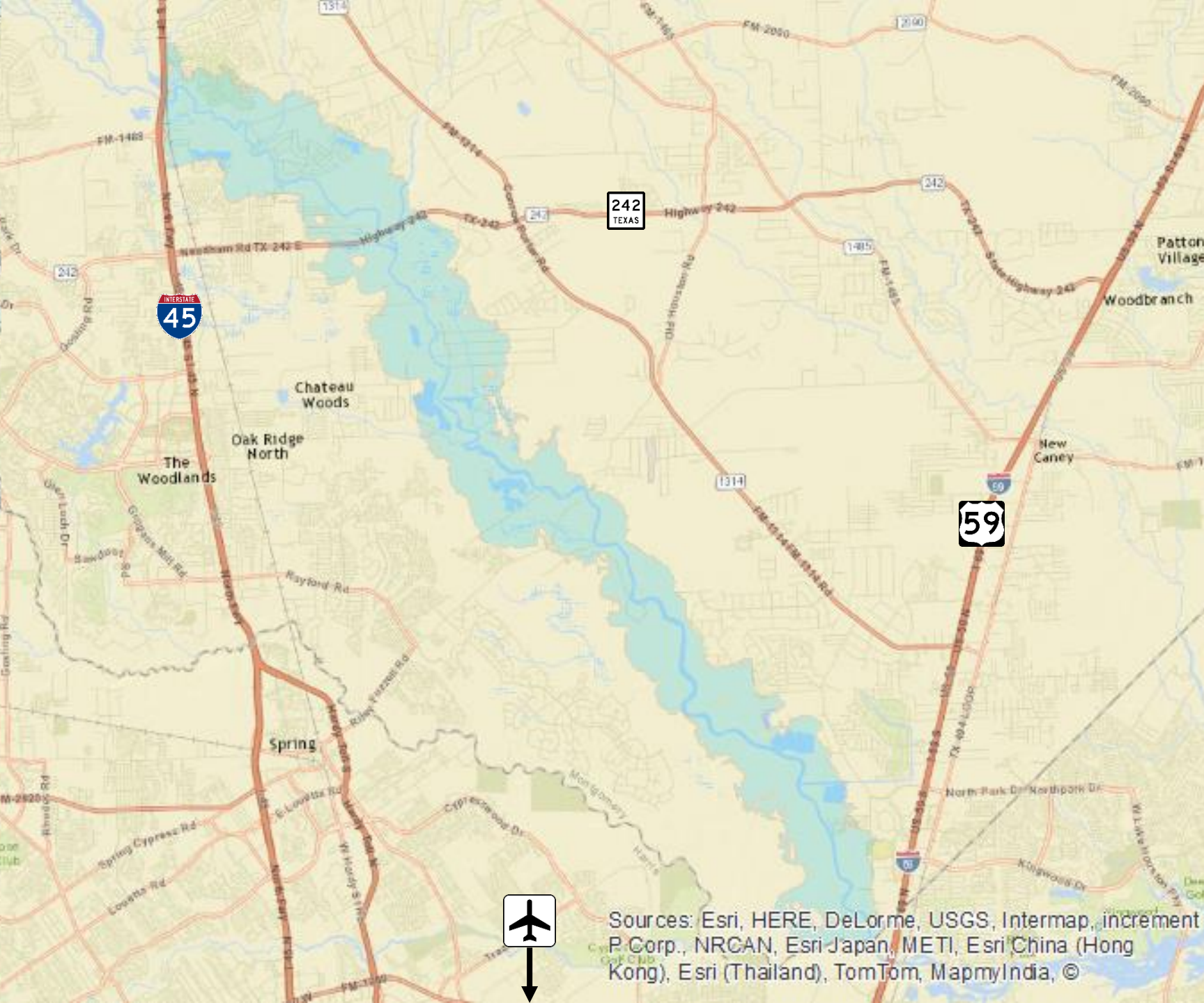
SAND AND GRAVEL IMPACT ANALYSIS

WEST FORK OF THE SAN JACINTO RIVER

1995 - 2017

BAYOU LAND CONSERVANCY
REPORT DATE: JULY 26, 2018

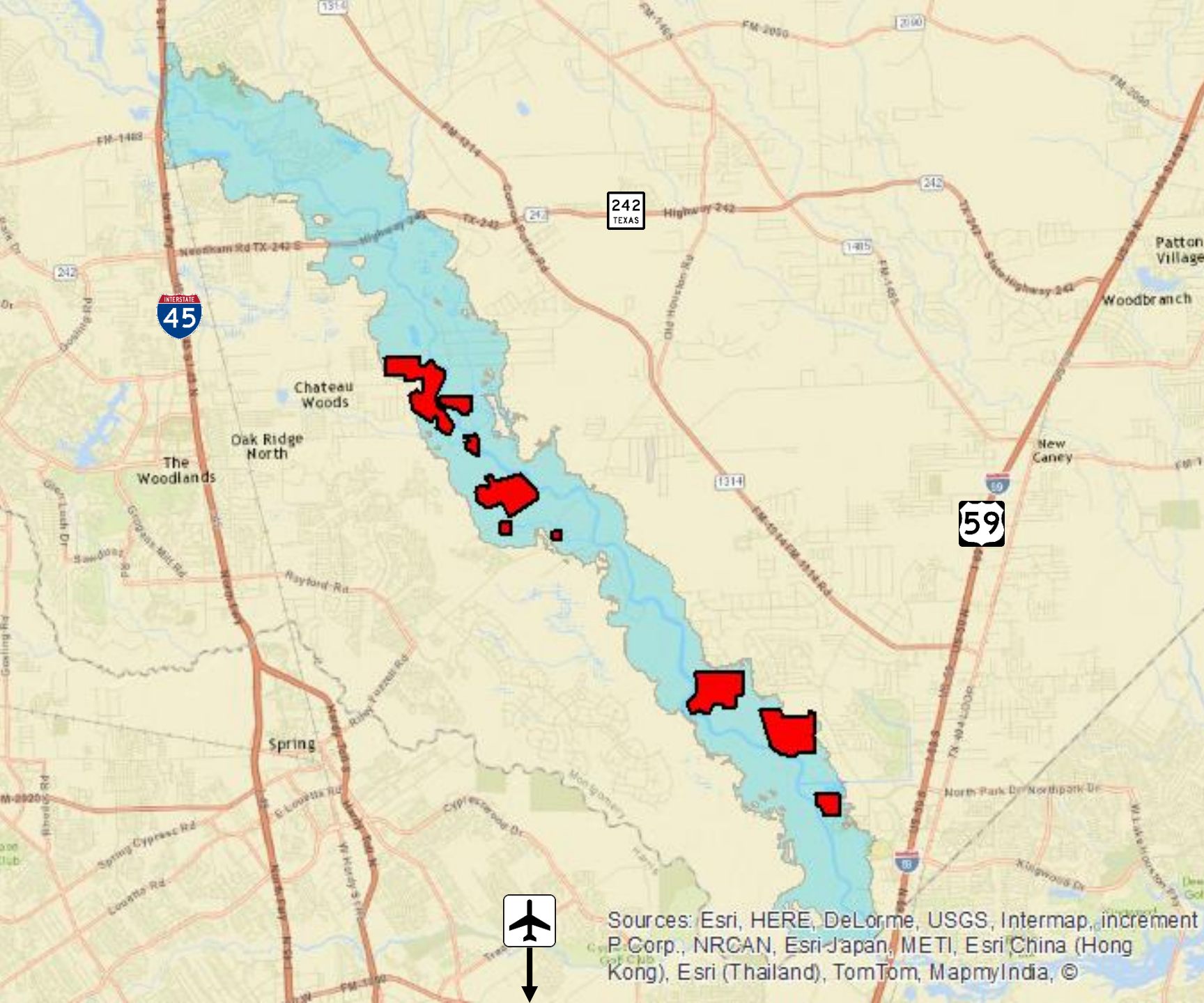




Area of Floodplain Examined:
17,742 acres

Sources: Esri, HERE, DeLorme, USGS, Intermap, increment P Corp., NRCAN, Esri Japan, METI, Esri China (Hong Kong), Esri (Thailand), TomTom, MapmyIndia, ©





1995

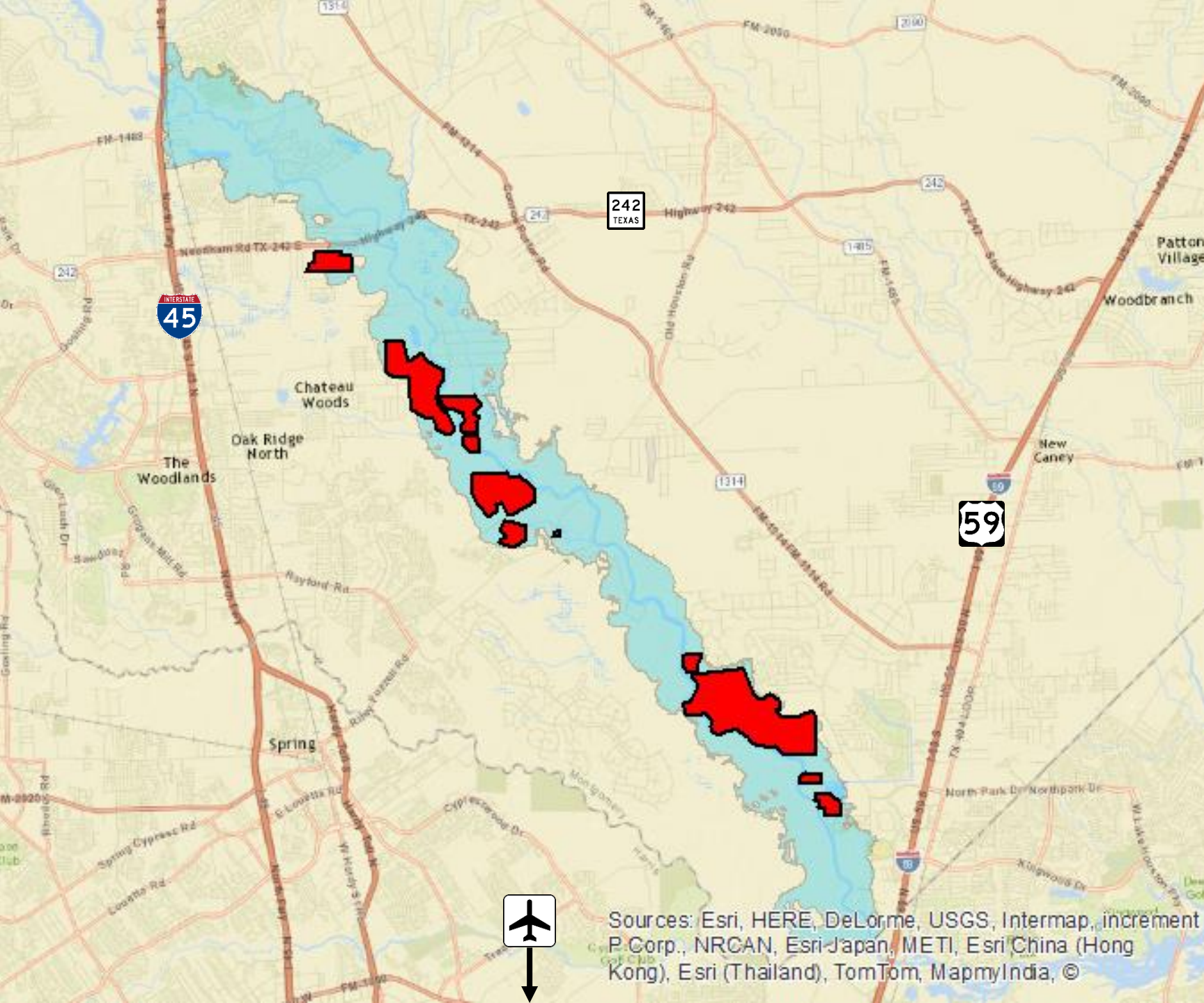
Impact:

7.38%

1,308 acres

Sources: Esri, HERE, DeLorme, USGS, Intermap, increment P Corp., NRCAN, Esri Japan, METI, Esri China (Hong Kong), Esri (Thailand), TomTom, MapmyIndia, ©





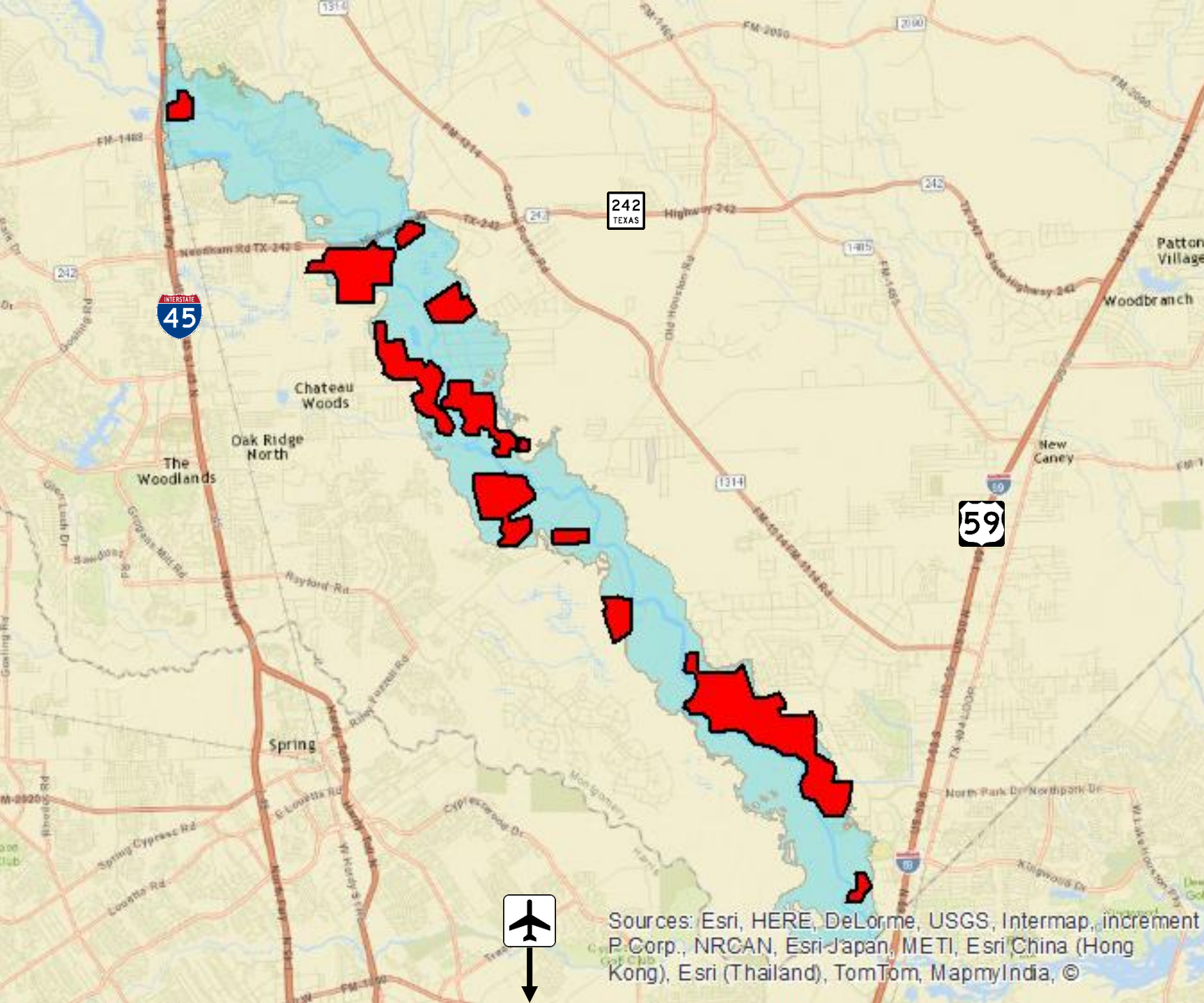
2000

Impact:
12.68%

2,249 acres

Sources: Esri, HERE, DeLorme, USGS, Intermap, increment P Corp., NRCAN, Esri-Japan, METI, Esri China (Hong Kong), Esri (Thailand), TomTom, MapmyIndia, ©



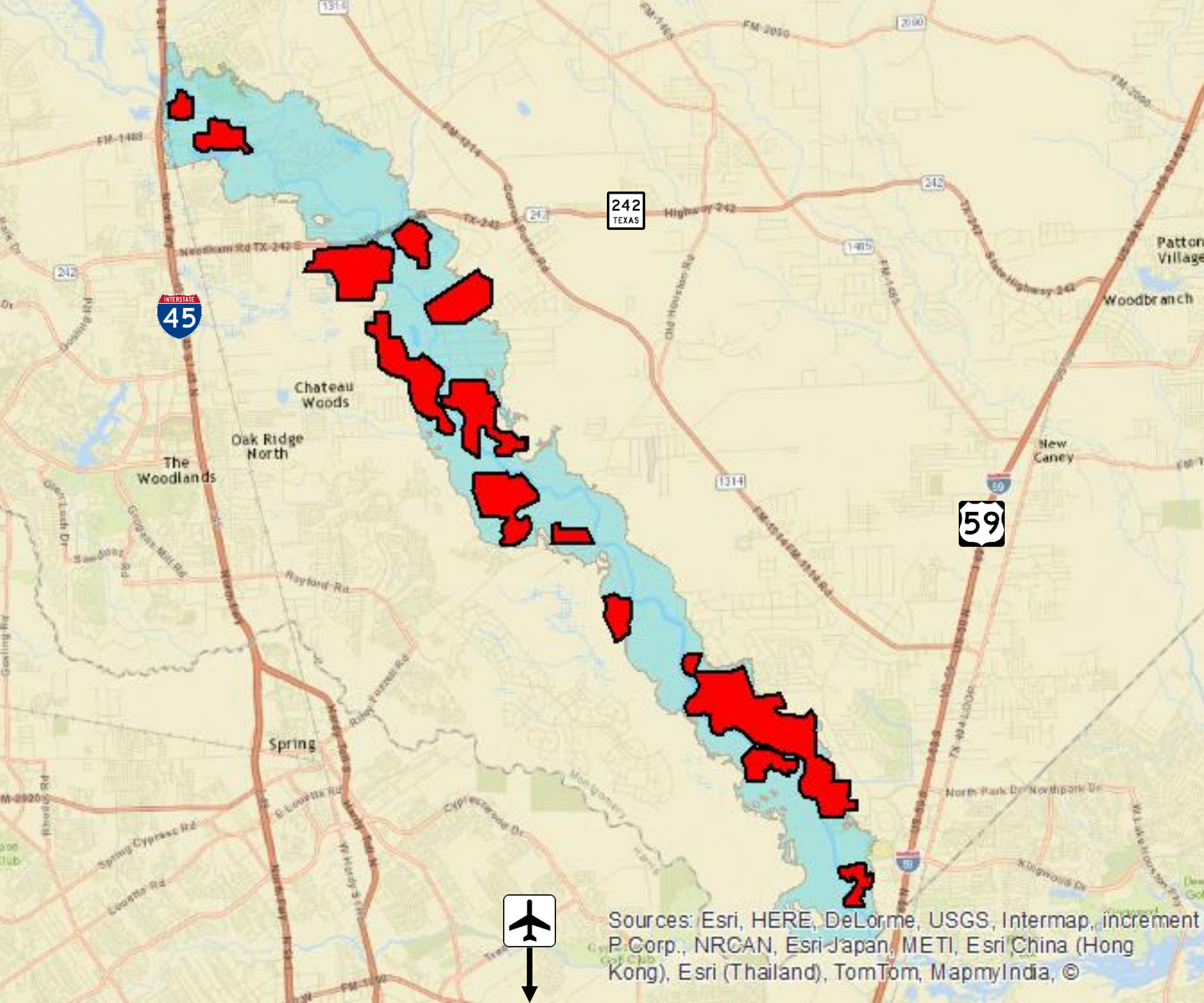


2010

Impact:
19.67%
3,489 acres

Sources: Esri, HERE, DeLorme, USGS, Intermap, increment P Corp., NRCAN, Esri-Japan, METI, Esri China (Hong Kong), Esri (Thailand), TomTom, MapmyIndia, ©



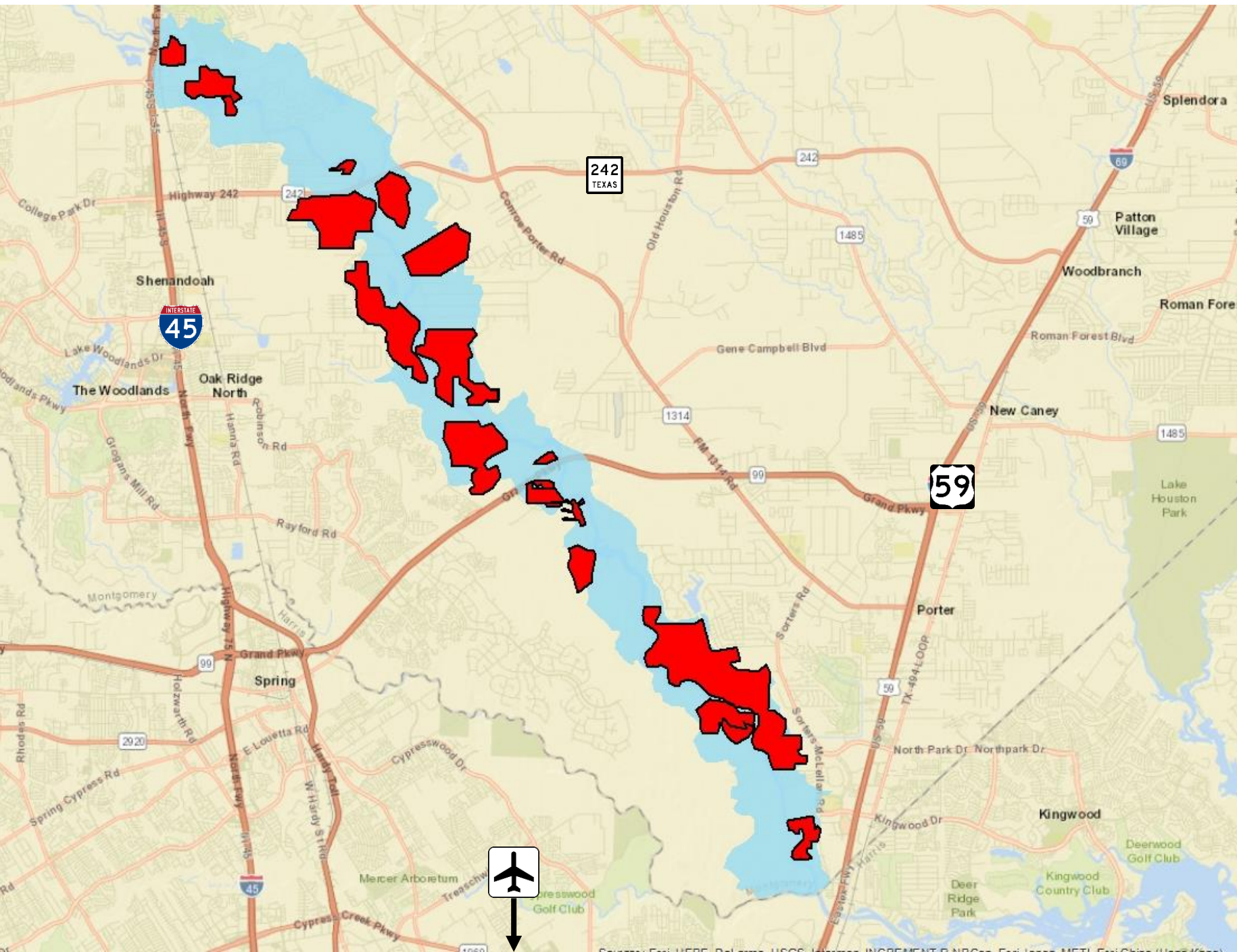


2014

Impact:
25.36%
4,499 acres

Sources: Esri, HERE, DeLorme, USGS, Intermap, increment P Corp., NRCAN, Esri Japan, METI, Esri China (Hong Kong), Esri (Thailand), TomTom, MapmyIndia, ©





2017

Impact:
30.98%
5,496 acres





Posted on April 24, 2006 by Webmaster

SAN JACINTO RIVER MAKES MOST ENDANGERED LIST

By Ella Tyler

American Rivers, a national non-profit organization dedicated to protecting and restoring healthy natural rivers, has named the San Jacinto River as one of America's Most Endangered Rivers of 2006. It is ninth on a list of ten rivers.



TEXAS

#9 San Jacinto River

THREAT: UNREGULATED SAND MINING

Summary

Unregulated sand mining operations threaten the San Jacinto River and its adjacent forest and wetlands. Unless decisionmakers establish and enforce sand mining regulations and acquire critical lands in the San Jacinto River watershed, Texas could lose the last remnants of this ecological and recreational gem.

The River

With headwaters near Huntsville, Texas, the East and West Forks of the San Jacinto River wind their way through bottomland hardwood forests, and converge at Lake Houston before continuing on to deposit freshwater into Galveston Bay. The San Jacinto is the westernmost boundary of the historic Big Thicket, a heavily-forested area renowned for its stunning tree diversity. The area is home to several rare, threatened, and endangered species, and is a stopover for neotropical migratory birds crossing the Gulf of Mexico.

The San Jacinto River is also historically significant. The Texas Revolutionary War ended on the banks of the river in 1836, as General Sam Houston's troops defeated the Mexican Army. In the same year, brothers James and Augustus Allen founded the city of Houston along a San Jacinto tributary, named in honor of the victorious general, now the nation's fourth largest city.

IN THE BOTTOMLAND HARDWOOD FOREST PROVIDE A HOME TO MANY THREATENED AND ENDANGERED SPECIES ALONG THE SAN JACINTO.



The Threat

The San Jacinto River system is threatened by sedimentation and bank erosion due to sand mining operations. Sand mining involves cutting down and excavating of forests and wetlands to access adjacent sandy riverbanks. When intact, these forests and wetlands provide natural filtration and flood protection benefits by absorbing, filtering, and then gradually releasing stormwater into the river.

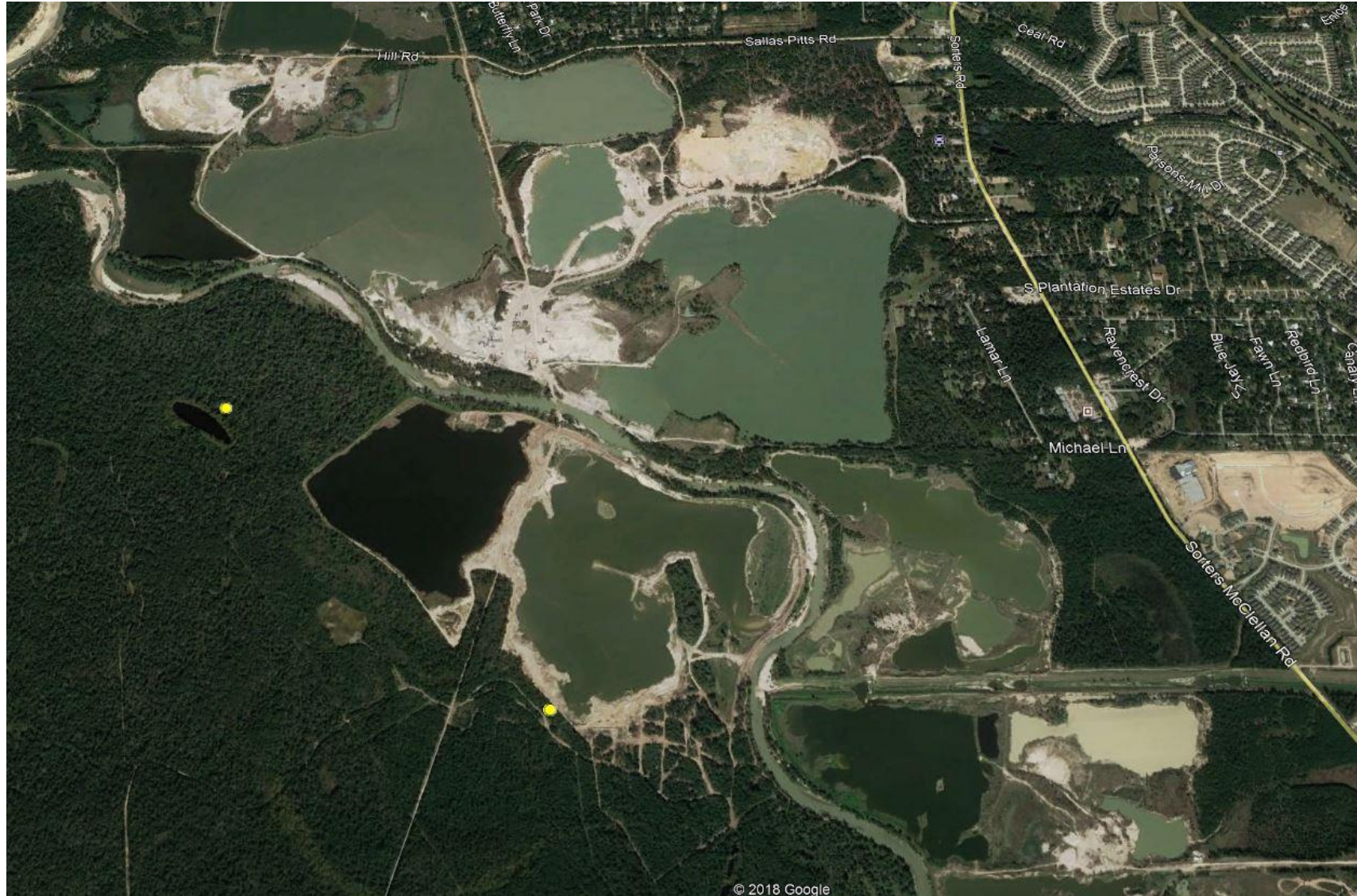
Unfortunately, sand mining is unregulated in Texas, and companies can deforest and dig as long as the sediment does not enter the river or fill wetlands. Sediment discharge into the river requires a stormwater permit from the Texas Commission on Environmental Quality (TCEQ). The placement of sediments in the river or adjacent wetlands requires a permit from the U.S. Army Corps of Engineers. However, recent aerial footage shows evidence of non-permitted spills into the river.

Additionally, in the absence of state regulations, sand mining operations are not required at the end of mining operations to restore the sites to a more natural state. The topsoil is seldom replaced, leaving the land unable to support reforestation. If restored, it would prevent further erosion and recoup some of the natural floodwater controls and clean water benefits.

What's At Stake

Sand mining threatens to permanently damage the San Jacinto watershed, and the last remnants of the ecological Big Thicket habitat. A 2004 TCEQ study found that 47 percent of construction sand and gravel mining operations investigated ran facilities without a stormwater permit. According to the Texas Parks and Wildlife Department, increased sedimentation in the San Jacinto River has caused severe bank erosion, filling in the Lake Houston Reservoir — which provides drinking water to the Houston metropolitan area — by as much as 20 percent. As sediment fills the reservoir, it reduces the amount of water available to surrounding areas. Sedimentation also causes...





Without
remediation
this is what the
community is
left with



CALIFORNIA
WESTERN DIVISION

RESTORING LAND

QUARRY RECLAMATION KEEPS ANIMALS SAFE

Vulcan
Materials Company

CALIFORNIA
WESTERN DIVISION

VULCAN CONSERVATION BANKS

PARTNERSHIPS HELP PROTECT LAND AND WILDLIFE

PLEASANTON
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WILDLIFE THRIVES

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