



The SpaceX Crew Dragon Endeavour spacecraft is lifted onto the SpaceX GO Navigator recovery ship shortly after it landed with NASA astronauts Robert Behnken and Douglas Hurley onboard in the Gulf of Mexico off the coast of Pensacola, Fla on Aug 2. (Inset): NASA astronaut Robert Behnken gives a thumbs up to onlookers as he boards a plane at Naval Air Station Pensacola to return him and NASA astronaut Douglas Hurley home to Houston a few hours after the duo landed in their SpaceX Crew Dragon Endeavour spacecraft off the coast of Pensacola, Fla on Aug 2. (AP)

Environment

'Threats ignored'

US seeks habitat limits for 'imperiled species'

BILLINGS, Mont, Aug 3, (AP): The Trump administration is moving to restrict what land and water areas can be declared as "habitat" for imperiled plants and animals – potentially excluding locations that species could use in the future as climate change upends ecosystems.

An administration proposal obtained in advance by The Associated Press and publicly released Friday would for the first time define "habitat" for purposes of enforcing the Endangered Species Act, the landmark law that has dictated species protections efforts in the US since 1973.

A final decision is expected by year's end, with broad implications for how lands are managed and how far the government must go in protecting plants and animals that could be sliding toward extinction.

Democratic lawmakers and wildlife advocates said the proposal ignores shifting threats to wildlife and plants due to climate change and habitat loss.

It follows other steps under Trump to scale back or alter endangered species rules, including lifting blanket protections for animals newly listed as threatened and setting cost estimates for saving species.

Legal observers said the Republican administration's two-sentence definition of habitat would limit what areas the government can designate as critical to a species' survival.

Its declaration that habitat includes areas with "existing attributes" appears to rule out land or water needing restoration work or sites that could become suitable in the future as climate change forces species to relocate, said J.B. Ruhl with Vanderbilt University Law School.

"To me, they are clearly trying to rule out restoration and climate change," Ruhl said.

He added that a court would likely agree that the government's definition was reasonable, even though he does not think it is good policy for dealing with climate change.

Jonathan Wood with the Pacific Legal Foundation, which represents landowners opposed to having species protections forced upon them, said the government's proposal would rightly restrict what areas could be designated as habitat.

He said that would force the government to concentrate on sites more suitable for conservation work, instead of infringing on private property rights.

Others warned that it would seriously hobble restoration efforts, by confining struggling species to small patches of pristine land and blocking restoration work that could expand their range.

Forests

The northern spotted owl of the Pacific Northwest, which depends on old growth forests, offers a prime example, said Noah Greenwald with the Center for Biological Diversity.

Much of the bird's historic habitat was logged. "But it will become old growth forest again one day if we protect it. So does that not count as habitat?" Greenwald asked.

"If we want to recover species, we have to restore them to more larger portions of their historic range," he said.

Friday's proposal from the US Fish and Wildlife Service and National Marine Fisheries Service comes in response to a 2018 US Supreme Court ruling involving a highly endangered Southern frog – the dusky gopher frog.

Trump administration officials said the proposal would apply to relatively few cases and provide "more consistency" and "more transparency" for private landowners, companies and states.

They would not specify what types of land or how much could be excluded under the definition, or give immediate details on which species could be impacted.

"The Supreme Court recently held that an area must be 'habitat' in order to be designated as 'critical habitat', and we are now seeking public comment on how best to define that overarching term," said wildlife service assistant director Gary Frazer.

In the gopher frog case, a unanimous court said the government had to decide what constitutes suitable habitat for the 3 1/2-inch-long (8.9-centimeter-long) frogs before it could designate some of those areas as "critical habitat" for the species, which survives in just a few ponds in Mississippi.

The dispute arose after the Fish and Wildlife Service designated 1,500-acres (607-hectares) of land and ponds in neighboring Louisiana as critical habitat for the frog even though none lived there.



A rabbit runs away from the Apple Fire in Banning, Calif on Aug 2. (AP)

Discovery

Boy digs up big mollusk: An 11-year-old Rhode Island boy clamming with his grandfather found a giant quahog that is thought to be one of the largest ever harvested in state waters.

Cooper Monaco, of Wakefield, found the massive mollusk Monday in the Weekapaug section of Westerly, and donated it to the University of Rhode Island's Marine Science Research Facility in Narragansett, the university has said in a statement.

The clam is 5.75 inches (14.5 centimeters) across and weighs nearly 2-1/2 pounds (1.3 kilograms). The state Department of Environmental Management does not keep quahog records, but a typical quahog grows to about 4 inches (10 centimeters) across, the university said.

"I was down on my hands and knees in the water looking for clams, and I touched this huge rock thing," Cooper said in the statement. "I always pull out rocks and throw them to the side and look under them. And then I felt the edge of it and I thought, 'holy moly, this is a clam.' So I pulled it out. It was amazing." (AP)

Mexico cave closes: Tourists or locals visiting a cave in north-central Mexico could endanger what is purported to be some of the earliest evidence of human presence in North America, archaeological authorities has said.

Mexico's National Institute of Anthropology and History said the remote Chiquihuite cave in Zacatecas state has been declared off-limits to visitors.

Scientists "are looking for the DNA of ancient humans in the sediments (of the cave floor), thus human presence could contaminate strata that has been preserved intact for thousands of years," the institute said.

The cave is located on a hilltop near the town of Concepción del Oro, Zacatecas. Unlike some other famous ice-age caves, there are no clearly visible signs of human habitation like rock paintings, hearths or butchered animal bones at Chiquihuite.

According to an article published earlier this month in the journal Nature, stone tools found in the cave suggest that people were living in North America as early as about 26,500 years ago, about 10,000 years earlier than most scientists accept.

Ciprian Ardelean of the Autonomous University of Zacatecas and others say they found stone tools and debris from tool-making, and said he believed people probably used the cave as a winter shelter for short periods of time. (AP)

'Amazon up 28pc': Fires in the

Space

SpaceX makes history with the mission

Astronauts make dramatic splashdown

CAPE CANAVERAL, Fla, Aug 3, (AP): Two NASA astronauts returned to Earth on Sunday in a dramatic, retro-style splashdown, their capsule parachuting into the Gulf of Mexico to close out an unprecedented test flight by Elon Musk's SpaceX company.

It was the first splashdown by US astronauts in 45 years, with the first commercially built and operated spacecraft to carry people to and from orbit. The return clears the way for another SpaceX crew launch as early as next month and possible tourist flights next year.

Test pilots Doug Hurley and Bob Behnken arrived back on Earth in their SpaceX Dragon capsule named Endeavour, less than a day after departing the International Space Station and two months after blasting off from Florida. The capsule parachuted into the calm gulf waters about 40 miles off the coast of Pensacola, hundreds of miles from Tropical Storm Isaias pounding Florida's Atlantic coast.

"Welcome back to planet Earth and thanks for flying SpaceX," said Mission Control from SpaceX headquarters.

"It's a little bit overwhelming to see everybody here considering the things that have gone on in the last few months since we've been off planet," Hurley said after arriving back home in Houston Sunday evening where they were greeted by a small masked-gathering of family and officials, including Musk.

Musk had rushed to Houston from SpaceX headquarters in Hawthorne, California, to welcome them. He was clearly moved – and relieved – while addressing the group.

Bumpy

"I'm not very religious, but I prayed for this one," he said.

The astronauts' ride back to Earth was fast, bumpy and hot, at least on the outside.

The spacecraft went from a screaming orbital speed of 17,500 mph (28,000 kph) to 350 mph (560 kph) during atmospheric reentry, and finally to 15 mph (24 kph) at splashdown. Peak heating during descent was 3,500°F (1,900°C). The anticipated top G forces felt by the crew: four to five times the force of Earth's gravity.

Within a half-hour of splashdown, the scorched and blistered 16-foot capsule was hoisted aboard a SpaceX recovery ship with a staff of more than 40, including doctors and nurses. To keep the returning astronauts safe in the pandemic, the recovery crew quarantined for two weeks and were

tested for the coronavirus.

The opening of the hatch was held up briefly by extra checks for toxic rocket fumes outside the capsule. After medical checkups, the astronauts were flown by helicopter to Pensacola and then to Houston.

There was one unexpected problem that could have endangered the operation: Once the capsule was in the water, private boats "just made a beeline for it," and got too close, said NASA Administrator Jim Bridenstine, promising to do better next time at keeping sightseers on pleasure boats safely away. NASA video showed one vessel flying a large campaign flag for President Donald Trump.

The Coast Guard in Pensacola said it had deployed two vessels to keep the public at least 10 miles away from the capsule. Trump and Vice President Mike Pence, who both attended the launch, congratulated the SpaceX and NASA teams.

"Great to have NASA Astronauts return to Earth after very successful two month mission. Thank you to all!" Trump tweeted.

Impressed

The last time NASA astronauts returned from space to water was on July 24, 1975, in the Pacific, the scene of most splashdowns, to end a joint US-Soviet mission known as Apollo-Soyuz. The Mercury and Gemini crews in the early to mid-1960s parachuted into the Atlantic, while most of the later Apollo capsules hit the Pacific. The lone Russian "splashdown" was in 1976 on a partially frozen lake amid a blizzard following an aborted mission; the harrowing recovery took hours.

Gemini and Apollo astronaut Thomas Stafford – the commander of the last crew to splash down – watched the reentry on TV from his Florida home. While pleased with the crew's safe return, he wasn't overly impressed. "It's what we did over 50 years ago," he said.

Its throwback splashdown aside, SpaceX made history with the mission, which launched May 30 from NASA's Kennedy Space Center. It was the first time a private company launched people into orbit and also the first launch of NASA astronauts from home turf in nearly a decade. Hurley was the pilot of NASA's last space shuttle flight in 2011 and the commander of this SpaceX flight.

NASA turned to SpaceX and also Boeing to build capsules and ferry astronauts to and from the space station, following the retirement of the shuttles. Until Hurley and Behnken

rocketed into orbit, NASA astronauts relied on Russian rockets. SpaceX already had experience hauling cargo to the space station, bringing those capsules back to a Pacific splashdown.

"We are entering a new era of human spaceflight where NASA is no longer the purchaser, owner and operator of all the hardware. We're going to be a customer, one customer of many," Bridenstine said from Johnson Space Center in Houston. "I would love to see a fleet of crew Dragons servicing not just the International Space Station but also commercial space stations."

SpaceX President Gwynne Shotwell called the mission a springboard to "doing even harder things," like collaborating on astronaut flights to the moon and then Mars.

Anxiety

"There's no question, it was an enormous relief after months of anxiety making sure we could bring Bob and Doug back home safely," Shotwell said.

SpaceX needs six weeks to inspect the capsule before launching the next crew around the end of September. This next mission of four astronauts will spend a full six months aboard the space station. Hurley and Behnken's capsule will be refurbished for another flight next spring. A Houston company run by a former NASA official, meanwhile, has partnered with SpaceX to send three customers to the space station in fall 2021.

"It took years to get here, we brought the capability back to America, and we came home safely to our families, and it took a lot of people a lot of time to make that happen," Behnken said back in Houston.

Boeing doesn't expect to launch its first crew until next year. The company encountered significant software problems in the debut of its Starliner capsule, with no one aboard, last year. Its capsules will touch down in the US Southwest desert.

By beating Boeing, SpaceX laid claim to a small US flag left at the space station by Hurley and the rest of the last shuttle crew. Minutes after splashdown, Musk tweeted a flag emoji followed by "returned."

Also on board: a toy dinosaur named Tremor, sent into space by the astronauts' young sons. The two boys recorded a wake-up call for their fathers Sunday morning.

"Don't worry, you can sleep in tomorrow," said Behnken's 6-year-old son Theo, who was promised a puppy after the flight. "Hurry home so we can go get my dog."



Trump



Nobre



Ardelean

Brazilian Amazon increased 28% in July from a year ago, a state agency reported Saturday.

The National Institute for Space Research, which is responsible for monitoring Brazil, said it recorded 6,803 fires in the Amazon rain-forest last month, compared to 5,318 in the same month of 2019.

Environmentalists expressed concern at the rise because August traditionally

marks the beginning of the fire season in the region. They fear Brazil could repeat the surge seen in fires last August, when 30,900 fires were recorded by the institute.

Carlos Nobre, a researcher at the Advanced Studies Institute in the State University of Sao Paulo, said the deforestation index also has remained high this year until July, compared to the last couple of years. (Agencies)