

Officials: Rodents likely destroyed rare plants at mine

December 5 2020, by Scott Sonner

DNA evidence suggests rodents destroyed part of an area of an extremely rare desert wildflower being considered for endangered species protection at a contentious mine site in Nevada, the U.S. Fish and Wildlife Service said Friday.

James Calaway, executive director of the Australian mining company Ioneer that wants to dig for lithium about 200 miles (320 kilometers) southeast of Reno, said as much as half of the Tiehm's [buckwheat](#) population was lost in the unprecedented fall attack at the only place the plant is known to exist.

"There was a substantial percentage of the [plants](#) that were harmed," Calaway told reporters during a conference call Friday. He said an estimate of up to 50% was reasonable.

Environmentalists who are suing to force a federal listing of the flower had asserted the destruction of the plants in August or September was human-caused. The Center for Biological Diversity said Friday the new findings reinforce the need to declare the buckwheat endangered.

Ioneer opposes a listing under the Endangered Species Act and argues the only way to save the plant is through its propagation plan to transplant and grow more Tiehm's buckwheat at the site with some of the largest untapped lithium deposits in the world.

Calaway said an investigation into the claim by the Center for Biological

Diversity that someone intentionally dug up the flower wasted resources and time that could have been devoted to helping keep it from going extinct.

"One can only conclude they were peddling bad science and bad judgment with the malicious intent to take advantage of nature's destruction and use the situation as an excuse to point fingers and assertions that a crime had been perpetrated," Calaway said.

"Toneer will continue to work to ensure the protection and propagation of this species and provide critical minerals like lithium and boron that are essential to electric vehicle adoption and sustainable future for the United States more broadly," he said.

The species is found on just 10 acres (4 hectares) of land spread across 2 square miles (5 square kilometers) in the remote Silver Peak Range of Esmerelda County. The Fish and Wildlife Service concluded in July there was enough evidence of potential threats to the plant to warrant a full 12-month review of its status.

The agency said Friday the environmental DNA analysis of damaged buckwheat roots, nearby soils and rodent scat conducted by a scientist at Southern Utah University "strongly links mammal herbivory to the widespread damage."

Buckwheat DNA detected in the scat carried genetic signatures matching ground squirrels with a confidence level of 96.9% to 99.8%, according to Jacqueline Grant, an associate biology professor and director of the Museum of Natural History at the university in Cedar City, Utah.

The Fish and Wildlife Service said rodent bite marks on plant roots strongly support the hypothesis that ground squirrels were responsible for the damage. It said current drought conditions likely motivated the

rodents to seek moisture by consuming the plant's shallow taproots.

"This is the first time herbivory was documented on Tiehm's buckwheat and its significance depends not only on its frequency and intensity, but whether damaged plants can recover and survive," the service said.

The conservation group alleged in a lawsuit filed in federal court in Las Vegas in September that somebody dug up the flowers—as many as 17,000, or 40% of the remaining population. But the lawsuit argued that what, or who, was to blame was irrelevant.

"We argue that a greater than 50% loss in population, essentially overnight, clearly indicates the need for an emergency Endangered Species Act listing," Patrick Donnelly, Nevada state director at the Center for Biological Diversity, said Friday. "Whether it was rodents or humans, Tiehm's buckwheat obviously is in dire need of protection, and we feel confident a judge will agree with that assessment."

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