

### Mayo Clinic News Network

**Title: Hyperbaric healing for Skyler** / Date: Dec. 2017

Intro: "To collaborate with the hyperbaric oxygen team, was just a really fantastic resource to have," said Dr. Shelagh Cofer, after finding an innovative way to heal a difficult wound for a young cleft palate patient named Skyler.

"Skyler's was an interesting case, because her condition isn't necessarily on the list of things that we treat typically," said Dr. Paul Claus, medical director for Mayo Clinic's Hyperbaric & Altitude Medicine Program.

Born out of a need to decompress divers who had been too deep too long, and had absorbed too much nitrogen into their bloodstream, the therapy is now often used to treat carbon monoxide poisoning and chronic diabetic wounds that refuse to heal.

For Dr. Cofer, a pediatric ear, nose and throat specialist, and a surgeon, using it was a first. "For me, it was overwhelming to hear what her mom was saying and how [positively] it had impacted Skyler's life," she says. Dennis Douda reports for the Mayo Clinic News Network.

Video	Audio
<b>Total running time [2:06]</b>	<b>/// VIDEO</b>
<b>Dennis Douda speaking</b>	Six-year-old Skyler is now enjoying the freedom of a normal childhood, thanks to a series of complicated surgeries to repair her cleft palate and jaw.
<b>Title: Dr. Shelagh Cofer Pediatric Otorhinolaryngology Mayo Clinic</b>	<b>"I mean she was eating normally. She was breathing normally. She could go swimming."</b>
<b>Dennis Douda speaking</b>	Unfortunately, on the roof of Skyler's mouth, where Dr. Shelagh Cofer had surgically closed the tissues between the soft palate and nasal passages, a fistula or opening developed. And after another surgery to close it, it was still refusing to heal.
<b>Dr. Shelagh Cofer speaking</b>	<b>"There's a lot of scarring from the previous surgery. The blood supply is often poor or compromised."</b>
<b>Dennis Douda speaking</b>	Yet another small surgery would be needed. But there was a concern about whether it would heal any better. The solution: restore the area's blood supply. Skyler received a series of hyperbaric oxygen therapy treatments, in which patients breath pure oxygen in a room pressurized two to three times the normal atmosphere at sea level.

<b>Dr. Paul Claus speaking</b>	<b>"When you increase the pressure, you dissolve more molecules of oxygen in a fluid state. It triggers the body's response to produce new structure, new blood vessels, new connective tissue and to promote healing."</b>
<b>Dennis Douda speaking</b>	Dr. Paul Claus says the therapy has many applications. Helping to heal diabetes-related chronic wounds even allows some patients avoid limb amputations.
<b>TITLE: Dr. Paul Claus Hyperbaric and Altitude Medicine Mayo Clinic</b>	<b>"It helps the white blood cells work more efficiently in those areas that are without adequate circulation, and, so, it helps fight infection."</b>
<b>Dennis Douda speaking</b>	Dr. Claus and Dr. Cofer are collaborating on research to better understand – at a molecular and physiologic level – the reasons hyperbaric oxygen therapy may be beneficial. As for Skyler ...
<b>Dr. Shelagh Cofer speaking</b>	<b>"After her treatment, it continued to fill in and heal."</b>
<b>Dennis Douda speaking</b>	She sat through about a dozen and a half two-hour sessions. Her mother Elizabeth was overjoyed with the result.
<b>Skyler's mother speaking</b>	<b>"And I looked up there, and the whole things was healed over. It was great."</b>
<b>Dennis Douda speaking</b>	For the Mayo Clinic News Network, I'm Dennis Douda.

Anchor tag: Dr. Claus (closs) says another frequent application for hyperbaric oxygen therapy is treating deep tissue damage from radiation therapy used on cancer patients, which can appear years after a patient has successfully beaten their cancer.