

## [The New York Times](#)

# A Second Act for Biosphere 2

By [MICHAEL WINERIP](#)

[NYT Video Report \(http://nyti.ms/1TZxugm\)](http://nyti.ms/1TZxugm) **Retro Report:** *With dreams of colonizing space, eight people sealed themselves in a glass biosphere in 1991. But some eventually “suffocated, starved and went mad.”*

### ***Biosphere 2: An American Space Odyssey***

Retro Report: With dreams of colonizing space, eight people sealed themselves in a glass biosphere in 1991. But some eventually “suffocated, starved and went mad.”

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In the fall of 1991, eight men and women marched into a glass and steel complex that covered three acres in the Arizona desert and was known as Biosphere 2. Their mission: to test whether they could be self-sustaining in this sealed-off environment, with hope that the model would someday be replicated to colonize outer space.

They wore “Star Trek”-style jump suits, which, depending on your view of the grand experiment, either made them look very scientific or like inmates at the county jail.

Either way, there was serious intent and money behind the project, \$150 million, underwritten by Edward Bass, environmentalist heir to a Texas oil fortune.

This Retro Report video looks back to the ideas behind the ambitious experiment, sorting out what was worthwhile science and what was hucksterism, and what happened once the rest of the world moved on.

The original idea was that the inhabitants would grow all their own food, and that the wilderness areas would naturally recycle their air and water. In **Discover** magazine the project was called the most exciting science venture since man landed on the moon.

Early on, there were problems. One Biospherian accidentally cut off the tip of her finger and left for medical care. When she returned, she carried in two duffle bags of supplies to the supposedly self-sustaining environment (which presumably would not have been feasible on, say, Mars).

But the [most damaging discovery](#) was that a carbon dioxide scrubber had been secretly installed to protect the occupants from dangerous levels of the gas.

By the end, as one of the Biospherians put it, they had been suffocated, starved and gone mad.

Clearly, Biosphere 2 was not ready to sustain life on Mars or even a vacant lot in Phoenix. **Time** magazine called it one of the 100 worst ideas of the century.

But if Discover magazine had overstated the project's importance, Time magazine missed the mark, too.

Columbia University, then the University of Arizona, eventually took over the mammoth space to conduct earth science research, and nearly 150 papers have been published. In 2006, [The New Yorker reported](#), "much of what is known about coral reefs and ocean acidification was originally discovered, improbably enough in Arizona, in the self-enclosed, supposedly self-sufficient world known as Biosphere 2."

The report is the sixth in a weekly series that re-examines leading stories of decades past. The videos are typically 10 to 12 minutes long and are part of a collaboration between The New York Times and **Retro Report**, a documentary news organization formed last year.

*The online project was started with a grant from Christopher Buck. Retro Report, which has a staff of 12 journalists and six contributors, is a nonprofit video news organization that aims to provide a thoughtful counterweight to today's 24/7 news cycle.*

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