Mexican female scientist wins award for research on curing blindness



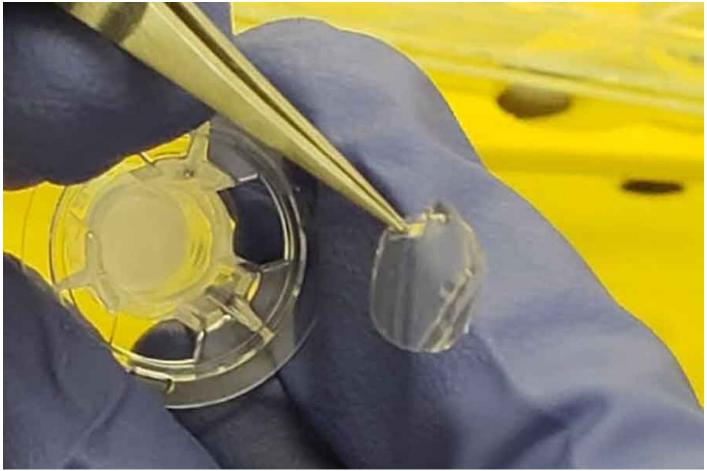
Dr. Judith Zavala has been recognized in the "25 Women in Science: Latin America" initiative from 3M, for her work on cell culture systems to cure corneal blindness.

The researcher's contribution to science stood out from among the nearly one thousand applications received by the initiative for having a positive impact on society.

"(This award) is a platform and a golden opportunity because we get recognition: **publicity for our work**. 3M is going to be a platform for us to talk about what our group and our institution is doing.

"And that's **invaluable**, **especially for us women** who are enthusiastic about showing what we're made of and promoting Mexico," she said.

Judith Zavala, along with **Dr. Jorge Valdez**, national Dean of the **School of Medicine and Health Sciences**, began the research project to find a solution to the **shortage of corneal tissue donors**.



width="900" loading="lazy">

"We started working on cell cultures and then we moved on to tissue engineering. We've already been able to create a biocompatible artificial tissue, i.e. a membrane that's made of vitrified collagen. This is specifically processed so it can be surgically manipulated.

"It's transparent and doesn't cause any reactions when we transplant it, so it has all the desirable features. We seed the cells on a scaffold, which then becomes artificial tissue, and we do tests to confirm that it's functional," she explained.

The professor from the **School of Medicine and Health Sciences** added that corneal clarity has been recovered in tests carried out on animal models.

A woman in science

Proud to be a **scientist and a mother**, Judith sees this award as an opportunity to represent the efforts that many women make, as well as to continue promoting **female empowerment**.

"I'm a scientist and the mother of four children. I've been working on my line of research for 10 years. In the early years, it was a lot of logistics; things that aren't always visible to others. We experience circumstances that are **not egalitarian**, due to cultural or other reasons.

"You see colleagues who don't have to go through what you do, and you have to make an even greater effort to reach the same level as them. This award is about removing that disadvantage:

putting yourself on an equitable platform where all of those participating are in the same situation.



width="900" loading="lazy">

The doctor of Regenerative Medicine explained that to be able to work as a researcher you need a lot of dedication and love for what you do, as well as inspirational women in your area.

"This is **my way of life**. It's what supports my family, but it's also my vocation and **my love for science** is something I want to share. In medicine, for example, there's a lack of female role models for girls.

"It's easier for girls to see themselves and aspire to make changes in people's lives, which they can do in many ways, but they need to have the complete picture of everything they can aspire to be, including in **STEM** areas," she said.

In her message to young people who are interested in science, technology, engineering, and mathematics, Zavala suggested they should be dedicated about making their dreams become a reality.

"You need to stop fighting and embrace who you are. If you really like what you're doing, then you can move forward. There's a vocation for everything. If this is your vocation, then you're going to do what makes you happy. You already know what's stopping you, so find a way to do it," she recommended.

"This is my way of life. It's what supports my family, but it's also my vocation and my love for science is something I want to share."



width="900" loading="lazy">

Judith Zavala is a mentor in the Women Leaders in STEM Network, part of the <u>US-Mexico</u> <u>Leaders Network</u>, in addition to being an entrepreneur in the Steminis Movement, which seeks to empower girls in science.

The scientific work of 5 Mexican women was recognized as well as 2 in Argentina, 6 in Brazil, 3 in Chile, 2 in Peru, 4 in Colombia, 2 in Panama, and 1 in Uruguay.

Dr. Itzel Montserrat Lara Mayorga, who also works at the Monterrey campus, was another scientist recognized by the **initiative from 3M**.

On the **International Day of Girls and Women in Science**, the **3M** company recognized 25 emerging scientists who have contributed to improving the lives of people throughout the region as a result of the social impact of their work, projects, and stories.

ALSO READ: https://tec.mx/en/news/national/research/mitnano-director-future-will-be-measured-nanometers