

Jellyfish Diapers? Not So Crazy...

An ocean filled with venomous jellyfish is hardly something to celebrate. However, for an innovative Israeli company, it's a crucial part of their solution to combat the overabundance of diapers winding up in landfills every year.

Why Jellyfish?

Thanks to the triple threat of climate change, increasing ocean acidity, and overfishing, jellyfish are steadily taking over the world's oceans. The decline of global fisheries means that jellyfish encounter fewer predators and competitors for food in their ocean habitat, and jellyfish populations have grown so quickly in recent years that many researchers believe the ocean will soon be dominated by them.

Not only is the rise of jellyfish a depressing threat to diversity in the ocean, they also pose a real problem in the modern world. Besides giving beachgoers painful stings, jellyfish are also capable of harming underwater infrastructure. In 2013, a cluster of jellyfish caused a Swedish nuclear reactor to shut down when they were sucked into the cooling pipe, and their threat is only growing worse. According to the National Science Foundation, colonies of jellyfish in the Gulf of Mexico already can stretch over 100 miles long,

Equally troubling is the increasing amount of diapers, sanitary pads and tampons winding up in landfills every year. These absorbent products are made from synthetic polymers that take hundreds of years to break down, and over 27 billion diapers are tossed in the trash in the United States every year, resulting in over 3.4 million tons of waste.

The Magic of Jellyfish Diapers

Hard as it may seem to see the connection between diapers and jellyfish, one company thinks that their combination can help solve the problems produced by both.

Cine'al Ltd., an Israeli nanotechnology company, has found a way to make biodegradable diapers from jellyfish. Inspired by research from Tel Aviv University about the potential of jellyfish for use as a durable, biodegradable fabric, these diapers are twice as absorbent as regular ones and decompose in less than a month, meaning that fewer diapers are left to rot in waste centers.

The key to the absorbency of these special diapers comes from a patented material called "hydromash". By breaking down jellyfish flesh and infusing it with antibiotic nanoparticles that remove the sting, hydromash creates a strong, flexible material that's completely biodegradable in a matter of weeks.

Now, Cine'al Ltd. is using hydromash to develop infant and adult diapers as well as sanitary pads and tampons. Because the global diaper market was worth an estimated \$52 billion in 2015, these jellyfish diapers have tremendous potential to make a positive difference for the planet.

Long-Term Benefits of Jellyfish Diapers

While the degradation hitting the world's oceans today is devastating to diversity, there might be a small silver lining if the increasing numbers of jellyfish can be converted into sustainable alternatives to synthetic plastics. If Cine'al diapers and sanitary products are a success, they might start a trend for using jellyfish in other ways that limit the impact of plastic pollution on the planet's surface.

Recommended Reading:

- *Galactagogues Foods, Herbs, and other Ways to Increase Breast Milk Production*
- *Shaken Baby Syndrome – Child Abuse or Vaccine Injury?*
- *Considering Home Birth*
- *10 Vaccination Myths and Lies Debunked*
- *Common Bad Parenting Advice You Should Ignore*

Sources:

- *Diapers Made From Jellyfish May Be The Next Big Thing In Green Parenting* – Huffpost
- *This Startup is Using Jellyfish to Make Eco-friendly Tampons, Diapers and Pads* – The Guardian
- *Eco-Friendly Diapers Made from Jellyfish* – Discover
- *Jellyfish, a Sustainable Source for Paper Towels and Diapers?* – Triple Pundit
- *Israeli Team Turns Jellyfish into Super-Absorbent Diapers* – Healthline