## Teen-Designed "Lightest" Satellite To Be Launched by NASA

Zoe McAlister May 22, 2017



Rifath Shaarook and his satellite CREDIT: Rifath Shaarook

Although satellites have many similarities, a device made of 3D printed carbon fiber, to be launched by NASA soon, may change the industry.

(Newswire.net -- May 22, 2017) -- A teenager from India has designed and built what's believed to be the world's smallest and lightest fully operational satellite, the

## Telegraph reports.

Rifath Shaarook has always been attracted to cosmos. He was only 15 when he constructed his first weather balloon and released it into the stratosphere. His latest design, a 3D printed satellite-cube, brought him the attention of the world's media.

Made from 3D printed carbon fiber, the 64-gram cube shaped satellite is packed with electronic and scheduled for launch in space.

The satellite was the winning design concept at a contest for young inventors organized by education company idoodle, with the backing from NASA and the Colorado Space Grant Consortium. It is to hit the space next month.

Named KalamSat after former Indian president Abdul Kalam, the creation will be launched from NASA's Wallops Island facility in the US next month. The mission is to establish a connection during a four-hour sub-orbital flight.

"We designed it completely from scratch," Rifath, who is lead scientist at Chennai-based science education organization Space Kidz India, said. He added that the space version of KalmSat would have "a new kind of on-board computer and eight indigenous built-in sensors to measure acceleration, rotation and the magnetosphere of the earth."

Devices that can measure and send data are no brainer, but packing four cubic meters of equipment in a case that weighs less than a few pounds sure is.

Exploring 3D printers use, the Telegraph gave the top five examples of what it can do:

A 3D ultrasound baby scan for a blind mum-to-be to enable her to "see" her unborn child.

A "Big Delta" huge 3D printer that can print houses, technology for fast building homes in disaster or war zones is here. The printer uses dirt or clay to print walls and build structures.

It can print prosthetic parts that can add customizable design and larger functionality to artificial limbs.

Organic 3D printers (bio-printers) can build organs by layering cells. Although this sounds like a Sci-fi movie, bioprinters actually exist, but are still in the experimental phase.

Source: http://newswire.net/newsroom/news/00096409-teen-designed-lightest-satellite-to-be-launched-by-nasa.html