

Welcome to space.1337arts.com — Project Icarus, home of the original \$150 near-space launch!

UPDATE: 12/17/09: More successful launches! Check out [Doug Clarkin and his 6-year old!](#)

UPDATE: 10/30/09: Want to do it yourself? Visit [GUIDE](#), a compilation of detailed information regarding what we did for our launch.

Please check out our other projects including [Webrover](#) and [Transatlantic Balloon Flight!](#)

Please help support [Project Lindbergh!](#) If we succeed, we will have set the distance traveled and time afloat amateur balloon record!

Click [Here](#) for archive of updates



*****CAUTION/DISCLAIMER:** Launching things into the stratosphere can be DANGEROUS! Please contact the FAA before trying any launches (even if they are under 4 lbs.) to make sure your vehicle won't be entering restricted airspace and PLEASE check the University of Wyoming's [Balloon Trajectory Predictor](#) (or a similar website) to make sure your balloon won't be landing in the city/a populated area where it might cause significant damage. Also, be sure to test your balloon's terminal velocity for descent before launching. We tested our parachute by putting eggs inside of our styrofoam box and tossing the box off of a 5 story building. We were not satisfied with the landing speed of our box until the eggs did not break upon the box's impact.

About Project Icarus

We are a group of MIT students seeking to share the artistic aspects of science with others. On Sept. 2, 2009, we launched a digital camera into near-space to take photographs of the earth from high up above. (see "Flight")

Several groups have accomplished similar feats (see "Other Launches"), but as far we know, we are the first group ever to:

(1) Complete such a launch on a budget of \$150 total. All of our supplies (including camera, GPS tracking, weather balloon, and helium) were purchased for less than a grand total of \$150.

****Note:** For readers who are curious about how our flight costs stacked up against the group of [Spanish high school students](#) that have been mentioned in many of the website

comments, here is a quote about their costs from NewScientist:

"If we count the balloon itself, plus the helium, antennas, sensors and so on, we spent about €1000 (\$1357)."

(Source: <http://www.newscientist.com/article/dn16805>)

So they spent about \$1350 for their project. I would like to reiterate that high-altitude balloon photography has been around for a LONG time. (decades, probably) What is special about what we've done is our low budget and ease of assembly/creation.

(2) Create a launch vehicle without the use of any electronic hacking. We used off-the-shelf items exclusively (i.e., no electronic chips or soldering) to create our launch vehicle.

The results were fantastic. Our ultra low-budget balloon went 17.5 miles high into the uppermost parts of the stratosphere and

returned 5 hours later. We tracked the device with GPS and found it some 20 miles away from the launch site.

**Many people have commented on the legality of the balloon launch with respect to FAA regulations. FAA regulations only apply to balloons with payloads over four pounds. Please check the [FAA regulations](#) for further information.

Check us out on CNN, FOX, ABC! Click [here](#) to watch the Fox video, Click [here](#) to watch the CNN video. Click [here](#) to watch the ABC video

Project Icarus Details:

Who	Oliver Yeh , Justin Lee , Eric Newton
Launch Date/Time	September 2nd, 2009, 11:45 EST
Launch Location	Sturbridge, MA - 42.12074 , -72.06233
Impact Location	Worcester, MA - 42.25504 , -71.71943
Distance Traveled	~20 miles
Altitude Achieved	98,000 feet, 17.5 miles
Helium Used	~65 cubic feet
Weight	~800g, 28oz
Camera	Canon A470 /w chdk open source firmware
Batteries	4 Energizer Ultimate Lithium AA Batteries
GPS Reciever	Motorola i290 Prepaid Cellphone ("Boost Mobile")
Tracking Software	Accutracking , Instamapper
Flight path	Google Earth kmf
FAA regulation	Legal as long as payload is under 4 pounds

**Below is a video for people who cannot access Youtube (e.g., people in China)



[Timelapse on Vimeo.](#)

1,486 comments to Project Icarus

« [Older Comments](#) [1](#) ... [63](#) [64](#) [65](#)



lightsaberninja
February 23rd, 2010 at 2:53 am · Reply

Dude...you guys are awesome. That is so cool. Great job!



gamze

[March 2nd, 2010 at 8:10 pm](#) · Reply

I am from Turkey.I like this site very much.I congratulate you...



tinyoner2

[September 30th, 2009 at 1:06 pm](#) · Reply

No rush! school work takes priority.

[« Older Comments](#) [1](#) [...](#) [63](#) [64](#) [65](#)