

# 2013 AAAS SCIENCE AND ENGINEERING MASS MEDIA FELLOW

## DANIEL BLUSTEIN

**DEGREE:** 6<sup>TH</sup> YEAR PHD STUDENT, BIOLOGY  
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MARINE SCIENCE CENTER  
**SPONSOR:** IEEE-USA  
**MEDIA SITE:** RALEIGH NEWS & OBSERVER

**Research Focus:** Simulation of nervous systems on robots

**Translation:** I build robots that are designed to mimic real animals, like lobsters, jellyfish and honeybees. One reason to do this is to create robots that can adapt their behavior to their surroundings, like animals do in the wild. I also use the animal robots to expand our understanding of how nervous systems work. By running a simulated nervous system on the robot, I can compare its behavior to the animal's to figure out what we know and don't know about how a brain works. Understanding basic neuroscience principles may help us in the future to treat neurological problems resulting from strokes and traumatic brain injuries.

### What are your goals for the summer?

My goal this summer is to work hard to make my writing more accessible to



the general public. A lot of my writing is geared towards an academic audience and this summer will allow me to practice breaking out of that mold.

### What are you most excited about?

I'm most excited to learn about science outside of my field and share what I learn with the public. I'm looking forward to exercising my scientific curiosity with topics besides neuroscience and robotics.

### Why are you passionate about science communication?

Science communication is the important last step in the scientific process. Scientists must share their findings with the public in order to maximize impact on society and to educate and inspire future scientists. Increasing the public's scientific awareness can only help when it comes to making rational decisions regarding medical, environmental and technological choices.

### Who is your favorite science communicator?

Neil deGrasse Tyson, an astrophysicist with the Hayden Planetarium and the American Museum of Natural History, is my favorite science communicator. He's passionate about astrophysics and it shows

when he talks about the science. His witty humor spices up his science talk too, as you can see when he banters with Jon Stewart during regular visits to The Daily Show.

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### Do you have a link to an article you'd like to share?

Here's a blog post I wrote about why I build robot animals: <http://cosresearch.wordpress.com/2013/04/22/why-do-we-build-robot-animals/>.

### Describe your dream job.

A director/producer for science documentary films like Planet Earth.

### Tell us about some things you do outside of the lab.

When not working on my scientific pursuits, I enjoy playing volleyball, visiting strange tourist attractions, exploring new restaurants, practicing the piano, SCUBA diving, and making short films.

### Anything else you'd like to share?

Banana peppers are my favorite pizza topping. They go well with many other toppings but they're so flavorful that they work well as a single topping too.

During a hiatus from my science studies I worked for a film production company in Los Angeles making romantic comedies.