#### Masthead Logo

Latham Science Communication Project

4-1-2017

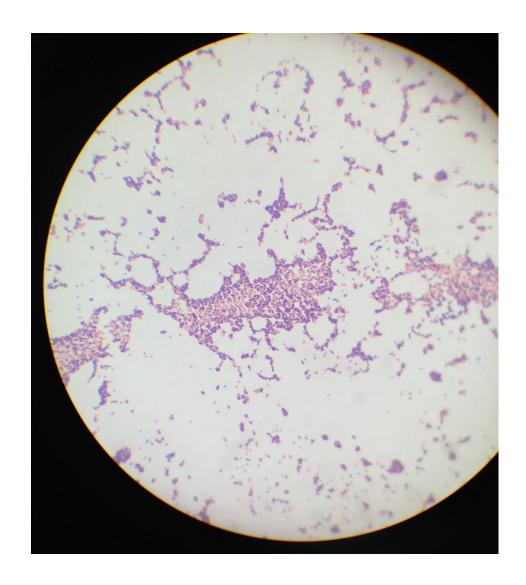
## The Art of Science

Evan Lamb *University of Iowa* 

Copyright © 2017 Evan Lamb

 $Hosted\ by\ Iowa\ Research\ Online.\ For\ more\ information\ please\ contact: lib-ir@uiowa.edu.$ 

# The Art of Science



Evan Lamb

Latham Science Engagement Initiative

LATH:3001:0001

#### **Abstract:**

The Art of Science focuses on the truly beautiful nature of science. The research being conducted on the University of Iowa campus is astounding and highly relevant to many aspects of society. However, the community lacks information on the science being conducted, and is generally not aware of how awe-inspiring science can be. To help remedy this lack of interaction and knowledge, The Art of Science campaign set out to disseminate eye-catching and vibrant images from scientific research to the Eastern Iowa community. Research figures and journal covers were curated from a number of departments at the University of Iowa with the goal of showcasing the natural beauty of scientific work. These images were annotated in easily-accessible language which described the importance and impact of the findings which were being depicted. Posters were printed with the pictures and displayed in multiple locations in Iowa City/Coralville and Cedar Rapids, Iowa. Additionally, social media sites were founded and operated to extend the reach and impact of the project. The Art of Science campaign was conducted with the assistance of the Latham Science Engagement Initiative and is slated to continue through to the Fall of 2017.

#### **Inspiration:**

I fell in love with science at a very young age. The breath-taking views in a forest with all the foliage, insects and mushrooms; peering down a microscope to see protozoans and bacteria swimming around; the final frontier of space as seen through telescopes and stargazing; the world around me was simply stunning. I found these views to be beautiful and magnetic. Not only that, I learned that all of these aspects were critical to our knowledge of the world and that people dedicated their lives to studying it. It was this sense of wonder and intrigue which I wanted to showcase to the community, and highlight the fascinating research being conducted by our professors at the University.

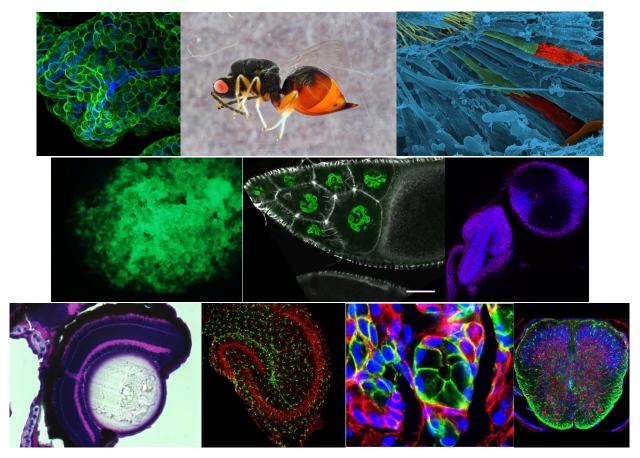
Despite being highly incorporated with campus, the Iowa City community doesn't seem to know much about the research being conducted right next door. I wanted to not only educate the public on the critical issues being tackled in our labs, but also show them that science isn't just sterile rooms and white lab coats: It is so much more and so much more wonderful.

#### **Goals:**

- Acquire images from multiple labs on campus
- Print the images onto posters for display in the community
- Publish and operate social media sites to enhance reach of campaign

#### **Image Acquisition:**

I reached out to more than 100 professors and received images from about 30 labs. The majority of images were biomedical oriented but I have plans to reach out to other science departments soon! Check out a sample of the images below!



Citation in acknowledgements: Top left photo labeled as image #1, progressing images left to right are cited accordingly.

#### **Poster Development:**

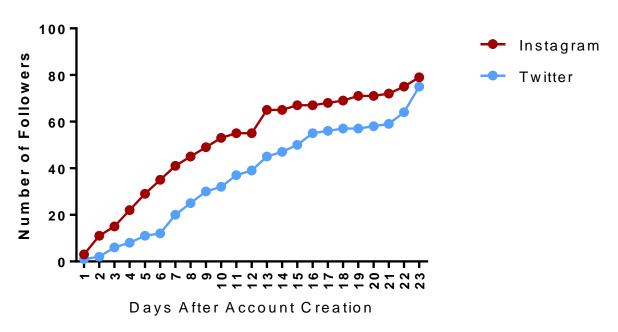
After attaining the photos, I selected a number of them to be used for public displays. These amazing images were chosen for their relevance to society, impact, visuals, and my personal attachment and interest. The posters emphasized the image, its description, Latham and *The Art of Science* logos, the authors and a QR code for scanning to direct viewers to Latham's Stem-O-Sphere blog.

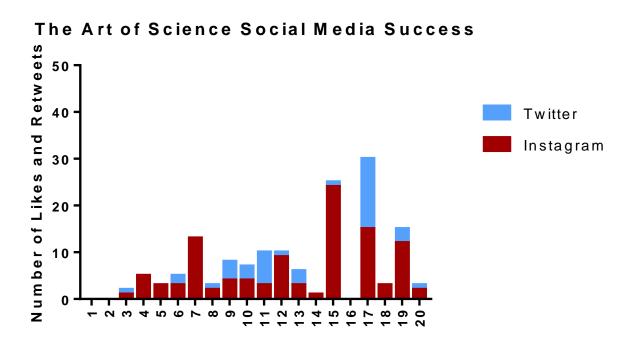


### **Social Media Operation:**

I founded Twitter and Instagram accounts to help disseminate the project to more people. I kept track of followers over the first few weeks and was astounded at the interest!

The Art of Science Social Media Followers

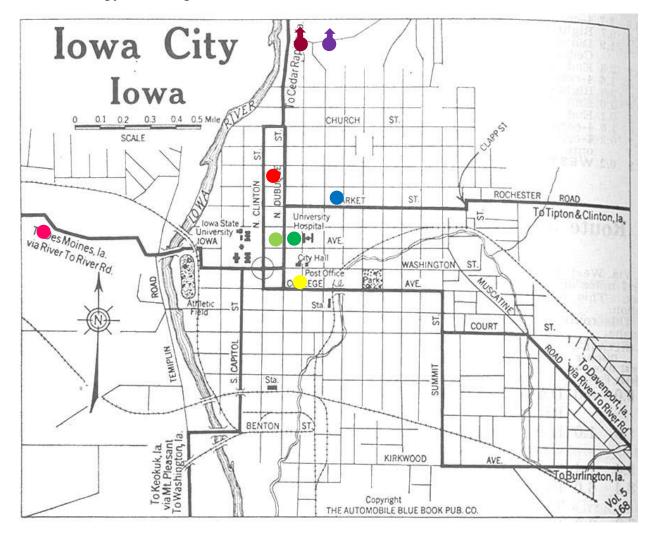




#### **Display Implementation:**

The following locations were chosen to reach out to the public and to con tact other science nerds like me who would be fascinated by the images.

- Iowa City Public Library •
- Sciences Library •
- Hardin Health Sciences Library •
- St. Luke's Hospital •
- Mercy Hospital (Iowa City) •
- Sister Mary Lawrence Community Center (Cedar Rapids)
- Blank Honors Center •
- Biology Buildings •



#### **Community Impact:**

Measuring impact has been difficult. Most locations have responded favorably and stated that the public have been stopping to observe and read the posters in respectable numbers. Analytics are coming in on the QR code scans and on followers, likes, views and retweets for the social media sites.

#### **Continuing Efforts:**

I am to continue this project through to the Fall of 2017 by displaying the images in more locations. The social media sites will be operated indefinitely. Possible small scale pictures may be printed to showcase or sell for fundraising for the labs and for Latham.

#### **Personal Impact:**

I have learned **SO** much from this experience. I loved nerding out to all sorts of research on campus. I also got to learn more about Adobe PhotoShop, InDesign and other design software programs. Of course, I networked with so many amazing people who are just as passionate about science and the Eastern Iowa Community as I am.

#### **Acknowledgements:**

Special thanks to the amazing labs and host sites and mentors that made this project possible!!

**Dr. Joshua Weiner** – Biology – Weiner Lab – Image #1

Choroid plexus of a mouse brain, responsible for producing spinal fluid.

**Dr. Andrew Forbes** – Biology – Forbes Lab – Image #2

Eurytoma wasp which infects other insects.

**Dr. Daniel Eberl** – Biology – Eberl Lab – Image #3

Hearing organ of fruit flies, correlations to human hearing disorders.

Evan Lamb – Coe College Physics – Affatigato Lab – Image #4

Antibacterial glass, produces acidic conditions which kill bacteria.

**Dr. Tina Tootle** – Anatomy and Cell Biology – Tootle Lab – Image #5

Localization of prostaglandins, immune and pain response molecules.

**Autumn Marsden** – Biology – Slusarski Lab – Image #6

Developing zebrafish embryo, showcases cilia used in left-right asymmetry.

Evan Lamb – Biology – Slusarski Lab – Image #7

Zebrafish retina, used to model eye disorders in humans.

**Dr. Michael Dailey** – Biology – Dailey Lab – Image #8

Hippocampus showing neurons and support glial cells.

**Preston Anderson** – Anatomy and Cell Biology – Image #9

Trachea epithelium used in Cystic Fibrosis research.

Dr. Joshua Weiner – Biology – Weiner Lab – Image #10

Mouse spinal chord, models neuron development and disease.

Evan Lamb – Poster displays at St. Luke's Hospital Cedar Rapids – Image #11

Evan Lamb – Graph of Followers of the first 22 days of the campaign – Image #12

Evan Lamb – Graph of 'likes' & 'retweets' on social media accounts – Image #13

Evan Lamb – Map of *The Art of Science* host locations 2017 – Image #14

**Kolbie Creger** – St. Luke's Hospital Cedar Rapids

**Barbara Berns** – St. Luke's Hospital Cedar Rapids

**Leo Clougherty** – Sciences Library

Sara Scheib – Sciences Library

**Stacey McKim** – Iowa City Public Library

**Linda Walton** – Hardin Health Sciences Library

Steven Drake – Mercy Hospital Cedar Rapids

**Norah Hammond** – Gems of Hope/Sister Mary Lawrence Community Center

**Steve Kehoe** – Biology Department

**Dr. Lori Adams** – Biology Department

**Brinda Shetty** – Biology Department

**Dr. Diane Slusarski** – Biology Department

**Dr. Linda McCarter** – Microbiology Department

**Cynthia Hernandez** – Microbiology Department

**Dr. Maurine Neiman** – Biology Department

**Dr. Bryan Phillips** – Biology Department

**Dr. Chun-Fang Wu** – Biology Department

Trudi Westfall – Biology Department

**Dr. Atulya Iyengar** – Biology Department

**Setu Vora** – Biology Department

**Dr. Hank Qi** – Anatomy and Cell Biology Department

**Dr. John Engelhardt** – Anatomy and Cell Biology Department

**Dr. Cornelia Lang** – Physics and Astronomy Department

**Adam Skibbe** – Geography Department

Extreme Thanks to **Robert J. and Sue. B. Latham** for funding the Latham Science Engagement Initiative to provide the fellows, current, former, and future with an opportunity to explore science and share their fascination with others.