

DUKE UNIVERSITY ONLINE EDUCATION INITIATIVES 2014-2015 MIDYEAR REPORT

June through December 2014 Highlights:

- Faculty worked with Duke Online Education Initiatives staff to create diverse online education offerings, from large, open-access courses, to short modules that prepare students for on-campus courses to blended courses that use online and in-person activities to connect students at Duke's campus in Durham, NC, and at Duke Kunshan University in China.
- On campus, faculty used online materials to flip campus courses, co-teach with faculty from other schools and other countries and offer self-paced enrichment materials for Duke's international students.
- Duke became one of four American universities and a handful of other organizations providing free professional development courses to K-12 teachers through Coursera's partnership with the U.S. Department of Education. <http://bit.ly/1vvZSvh>
- Duke launched its second Coursera Specialization, *Perception, Action and the Brain*, a multi-series course track on the deeply puzzling question of how the human brain and the rest of the nervous system gather sense information that allows us to perceive the world and act successfully in it. <http://bit.ly/1LUr3EN>
- A Fall 2014 Call for Proposals for online education projects brought 19 submissions from 21 Duke schools, institutes and departments. Six new projects will start in Spring 2015. <http://bit.ly/1KxZ8qK>
- Over one and a half million learners from 217 countries have participated in Duke Massive Open Online Courses, earning 55,000 certificates of completion. Meet some of the students and hear their reactions to those courses in this short video: <http://bit.ly/1zFFm9Z>. Watch short introductions to Duke's courses in this playlist: <http://bit.ly/1DDjyfu>.
- Duke faculty and staff continue to study the impact of online educational modules and share their findings through publications and presentations. <http://bit.ly/1vw0bpZ>

New Projects June - December 2014:

Teaching Statistical Thinking: Part 1 Descriptive Statistics | Dalene Stangl, Kate Allman, and Mine Çetinkaya-Rundel | Statistical Science and the Duke Program in Education, a course to help high school teachers teach statistical concepts from the Common Core.

Copyright for Educators and Librarians | Kevin Smith | Duke University Libraries, co-developed and taught with copyright law experts from Emory University and the University of North Carolina at Chapel Hill.

Fundamentals of Global Health | Rukmini Balu | Duke Global Health Institute, a blended course using online materials and technologies to teach on site and remotely for a course at Duke Kunshan University.

Advertising and Society | William O'Barr | Cultural Anthropology, highlighting Special Collections from Duke University Libraries and developed in partnership with the Advertising Educational Foundation.

Visual Perception and the Brain | Dale Purves | Neurobiology, a look at the visual system drawn from neuroscience, psychology, science history and philosophy.

Responding to 9/11 | David Schanzer | Public Policy, a follow-up to *9/11 and Its Aftermath* examining the global impact of U.S. counterterrorism policy.

Introduction to Chemistry: Reactions and Ratios and *Introduction to Chemistry: Structures and Solutions* | Dorian Canelas | Chemistry, a set of modular materials supporting Duke campus students in Chem 99.

Additional Course Sessions:

Bioelectricity: A Quantitative Approach (3rd session) | Roger Barr | Biomedical Engineering

Think Again: How to Reason and Argue (4th session) | Walter Sinnott-Armstrong; Ram Neta (UNC-CH) | Philosophy

Data Analysis and Statistical Inference (2nd session) | Mine Çetinkaya-Rundel | Statistical Science

Introductory Human Physiology (4th session) | Emma Jakoi; Jennifer Carbrey | Cell Biology

Sports and Society (3rd session) | Orin Starn | Cultural Anthropology

English Composition I: Achieving Expertise (3rd session) | Denise Comer | Thompson Writing Program

The Brain and Space (2nd and 3rd sessions) | Jennifer Groh | Psychology & Neuroscience

Introduction to Astronomy (3rd session) | Ronen Plesser | Physics

Projects in Progress:

Capstone Project for Perception, Action and the Brain | Leonard White, Jennifer Groh, and Dale Purves | Brain Sciences, Community & Family Medicine, Neurobiology, Psychology & Neuroscience

Tropical Parasitology: Protozoa, Worms, Vectors and Human Disease | John Bartlett | Duke Global Health Institute, Duke's first course co-developed with an African university.

Capstone for the Reasoning, Data Analysis and Writing Specialization | Walter Sinnott-Armstrong, Ram Neta, Mine Çetinkaya-Rundel, and Denise Comer | Philosophy, Statistical Science, and the Thompson Writing Program, the conclusion to Duke's first Coursera Specialization.

Foundational Neuroscience for Perception and Action | Leonard White | School of Medicine and Duke Institute for Brain Sciences

The Challenges of Global Health | David Boyd | Duke Global Health Institute

Dog Emotion and Cognition | Brian Hare | Evolutionary Anthropology

Bioelectricity: Extracellular Potentials | Roger Barr, a modular approach to Bioelectricity.

Data, Statistical Inference, and Modeling | Mine Çetinkaya-Rundel | Statistical Science, a three-part course offering Duke Continuing Education Units.

Publications, Presentations, and Media Coverage:

Writing to learn and learning to write across the disciplines: Peer-to-peer writing in introductory-level MOOCs. Denise K. Comer, Charlotte R. Clark, Dorian A. Canelas. *The International Review of Research in Open and Distributed Learning* (Vol 15, No 5, 2014). -<http://bit.ly/1AAa4UU>

Duke to expand mix of in-person and online education - The Chronicle - <http://bit.ly/1EGEq9F>

Duke bridges gap between online and classroom, to mixed results - The Chronicle - <http://bit.ly/16AdSZN>

Duke seeks faculty ideas for digital initiatives - The Chronicle - <http://bit.ly/1uYneE4>

A second shot at that class that got away - Duke Today - <http://bit.ly/1I2oGjQ>

A Coursera Course on Visual Perception - Starts Jan. 7 - Illusion Chasers blog on Scientific American - <http://bit.ly/1F6BZdW>

For some research universities, flexibility and modularity influence long-term plans - Inside Higher Ed - <http://bit.ly/1zg9s4I>