

## מרכז ד'אק לוב להיסטוריה ופילוסופיה של מדעי החיים

### Jacques Loeb Centre for the History and Philosophy of the Life Sciences

in collaboration with the Einstein Center and the Sidney M. Edelstein Center for the History and Philosophy of Science, Technology and Medicine at The Hebrew University of Jerusalem

International Workshop

## Darwinism and Functional Biology, Other Sciences and the Humanities

Celebrating the bicentenary of Charles Darwin's birth, and the 150th anniversaries of his *Origin of Species* and Jacques Loeb's birth

**March 30 – April 1, 2009**

at Ben-Gurion University of the Negev and The Hebrew University of Jerusalem



אוניברסיטת בן-גוריון בנגב  
Ben-Gurion University of the Negev

#### Monday, March 30, 2009

Sara Tadmor Auditorium, Marcus Family Campus  
Ben-Gurion University

**9:50 – 10:15 a.m.**

##### Welcoming Remarks and Introduction

Jimmy Weinblatt, Rector, Ben-Gurion University

Ute Deichmann, Ben-Gurion University and  
University of Cologne

*Jacques Loeb's Experimental Biology and Darwinian  
Evolution*

##### Evolution and Genetics

**10:15 a.m. – 12:30 p.m.**

Michel Morange, Ecole normale supérieure, Paris  
*How Evolutionary Biology Presently Pervades Cell and  
Molecular Biology*

Dan Mishmar, Ben-Gurion University

*Genetic Aspects of Evolutionary Processes: The  
"Power-Plant of the Cell" (Mitochondria) as a Model*

Ute Deichmann, Ben-Gurion University and  
University of Cologne

*"Gemmules" and "Elements": On Darwin's and  
Mendel's Conceptions and Practices in Heredity*

**2:00 – 4:00 p.m.**

##### Greetings

Rivka Carmi, President, Ben-Gurion University

##### Introduction to Keynote Lecture

Michel Morange, Ecole normale supérieure, Paris

##### Keynote Lecture

Eric Davidson, Caltech, Pasadena

*A New and Powerful Way of Rationalizing Genomic  
Control Systems: Gene Regulatory Networks in  
Development and Evolution*

##### Commentator

Siegfried Roth, University of Cologne

**4:30 – 6:00 p.m.**

Alan Templeton, Washington University, St. Louis  
*Using Evolutionary Principles to Identify Genes  
Associated with Common Diseases in Humans*

Nadav Davidovitch, Ben-Gurion University  
*Evolutionary Medicine: A Missed Potential?*

#### Tuesday, March 31, 2009

Sara Tadmor Auditorium, Marcus Family Campus  
Ben-Gurion University

##### Darwinism 1: Philosophical and Scientific Aspects

**9:00 – 11:15 a.m.**

Yaron Ramati, London School of Economics,  
and Giora Hon, University of Haifa  
*The Case for Emergence in Evolution*

Siegfried Roth, University of Cologne

*How Much Has Evolutionary Developmental (EvoDevo)  
Research Contributed to the Understanding of the  
Mechanisms of Evolution? Historical and Philosophical  
Comments on a Current Controversy*

Jeff Dodick, Hebrew University of Jerusalem, and

Nir Orion, Weizmann Institute of Science

*Perceptions of Geology within Science and the  
Education System*

**11:30 a.m. – 1:00 p.m.**

Ulrich Charpa, Ruhr University, Bochum and  
Leo Baeck Institute, London  
*Whewell and Schleiden on Development and  
Evolution: A Comparison*

Helmut Pulte, Ruhr University, Bochum

*Darwin and the Exact Sciences*

**2:00 – 4:00 p.m.**

Doron Lancet, Weizmann Institute of Science

Susie Fisher, Open University of Israel

*Are RNA Viruses Vestiges of an RNA World? Historical  
Perspectives and Current Views*

Haim Gilon, Hebrew University of Jerusalem

*Combinatorial Chemistry: A Darwinian Concept?*

**4:15 – 5:30 p.m.**

Haim Marantz, Ben-Gurion University  
*Herbert Spencer's On Education: A Critical  
Re-examination*

Frank J. (Yeruham) Leavitt, Ben-Gurion University

*Bertrand Russell on Darwin and Aristotle*

#### Wednesday, April 1, 2009

Sidney M. Edelstein Center, Levy Building, Givat Ram  
Hebrew University of Jerusalem

##### Darwinism 2: Knowledge and Evolution

**9:00 – 11:00 a.m.**

Raphael Falk, Hebrew University of Jerusalem

*On the Shoulders of a Giant: From Lamarck to Darwin*

Jeff Dodick, Hebrew University of Jerusalem, and

Shlomo Argamon and Paul Chase, Illinois Institute of  
Technology, Chicago

*Methodological Differences between the Historical and  
Experimental Sciences*

Sara Schwartz, Open University of Israel

*How Darwinian Motifs Migrate to the Wider Culture:  
Illustrated Covers of the Origin of Species*

**11:15 a.m. – 12:30 p.m.**

Tony Travis, Ben-Gurion University

*Raphael Meldola, Field Naturalist, and "Several  
professors, a great many butterfly fanciers and  
gentlemen who visited the forest in pursuit of the  
insect tribe!"*

Rony Armon, Ben-Gurion University

*Joseph Needham's Theory of Evolution: Biochemical  
Recapitulation, Spencerian Emergence and Functional  
Evolution in the 1920s*

**2:00 – 3:30 p.m.**

Alan Templeton, Washington University, St. Louis  
*Evolutionary Biology and Conservation Biology: Using  
Evolutionary Principles to Save Endangered Species*

Ayelet Shavit, Tel Hai College, Upper Galilee

*A Tale of Two Databases: Do Different Evolutionary  
Perspectives Shape a Different Species' "Locality"?*

**4:00 – 5:30 p.m.**

Ruth Lorand, University of Haifa

*Darwin's Theory of Beauty*

Simcha Rozen, Hebrew University of Jerusalem

*Darwin's Quest: Naturalizing God and Deifying Nature*

Further details are available from [travist@bgu.ac.il](mailto:travist@bgu.ac.il)