



**Phenotyping Mouse Models of Human Lung Disease  
September 14 - 18, 2008**

**TENTATIVE COURSE SCHEDULE  
(Subject to change)**

*Unless noted otherwise, all sessions are in the  
Highseas Conference Room or GRB Training Laboratory*

For more information, please contact [Nancy.Place@jax.org](mailto:Nancy.Place@jax.org)

**Sunday, September 14**

Arrival at Highseas Conference Center anytime after 12:30 PM for registration/check in.

**4:00 PM Reception and Registration at Highseas**

**6:00 PM Dinner at Highseas**

**Monday, September 15 - The Mouse and How We Use It**

**8:00 AM Overview of Course Evaluations**  
Suzanne Hart, University of Maine

**8:10 AM Introduction and Orientation**

**8:30 AM Animal Models of Lung Disease**  
Charles Irvin, Ph.D., The University of Vermont

**9:15 AM History, Genetics, and Nomenclature**  
John Macauley, Ph.D., The Jackson Laboratory

**10:00 AM Husbandry, Caging and Breeding**  
Dorcas Corrow, B.S., L.A.T.G., The Jackson Laboratory (retired)

**10:45 AM Break**

- 11:00 AM    Anesthesia of the Mouse**  
Anthony Nicholson, B.V.Sc., , Ph.D., The Jackson Laboratory
- 12:00 PM    Lunch, Highseas Dining Room**
- 1:00 PM    Normal Mouse Lung Anatomy**  
Wayne Mitzner, Ph.D., Johns Hopkins Bloomberg School of Public Health
- 1:30 PM    Normal CT Lung Anatomy**  
Jacqueline Thiesse, Ph.D., University of Iowa
- 2:15 PM    Transportation to GRB Training Lab**
- 2:30 PM    Lab: Biomethods #1**  
Bonnie Lyons, D.V.M., The Jackson Laboratory
- 3:30 PM    Break**
- 3:45 PM    Lab: Biomethods #2 (including an introduction to the flexiVent)**  
Bonnie Lyons, D.V.M., The Jackson Laboratory  
Charles Irvin, Ph.D., The University of Vermont
- 5:15 PM    Transportation to Highseas**
- 6:00 PM    Dinner, Highseas Dining Room**

**Tuesday, September 16 - Assessment of Mouse Lung Function**

- 8:00 AM    Foundations of Lung Function**  
Charles Irvin, Ph.D., The University of Vermont
- 9:00 AM    Lung Mechanics/Forced Oscillation**  
Charles Irvin, Ph.D., The University of Vermont
- 9:45 AM    Break**
- 10:00 AM    Lung Volumes, PV Curves**  
Wayne Mitzner, Ph.D., Johns Hopkins Bloomberg School of Public Health
- 11:00 AM    Lunch, Highseas Dining Room**
- 12:15 PM    Transportation to GRB Training Lab**
- 12:30 PM    Lab: Lung Mechanics**  
Faculty

- 1:30 PM**      **Airway Responsiveness**  
Charles Irvin, Ph.D., The University of Vermont
- 2:30 PM**      **Break**
- 2:45 PM**      **Lab: AHR**  
Faculty
- 4:00 PM**      *Transportation to Highseas*
- 6:00**            **Dinner, Highseas Dining Room**
- 7:00 – 9:00**    **“An Evening With The Classics”**  
**A contemporary discussion of pulmonary physiology**  
*Highseas Living Room*

**Wednesday, September 17 - Assessment of Pulmonary Pathology**

- 8:00 AM**      **Microscopy and the Lung**  
Doug Taatjes, Ph.D., The University of Vermont
- 8:45 AM**      **Pathology of the Mouse Lung**  
Charles Irvin, Ph.D., The University of Vermont
- 9:15 AM**      **Break**
- 9:30 AM**      **Lung Pathology and Measurement with CT**  
Eman Namati, Ph.D., University of Iowa
- 10:30 AM**    **Harvest & Fixation Techniques**  
Wayne Mitzner, Ph.D., Johns Hopkins Bloomberg School of Public Health
- 11:00 AM**    **Normal Mouse Cytology**  
James J. Lee, Ph.D., Mayo Clinic Arizona
- 11:30 AM**    **Lunch, Highseas Dining Room**
- 12:30 PM**    *Transportation to GRB Training Lab*
- 12:45 PM**    **Lung Harvest & Fixation**  
Faculty
- 1:45 PM**      **Sampling Techniques: Blood, Lavage**  
Faculty
- 2:45 PM**      **Break**

**3:00 PM**      **Mouse Lung Pathology Rounds**  
Faculty

**3:45 PM**      **Mouse Lung/Blood Cytology**  
Faculty

**4:15 PM**      *Transportation to Highseas*

**6:00 PM**      **Lobster Dinner at Highseas**

**Thursday, September 18 - Quantitative Lung Imaging and Pathology**

**8:00 AM**      **How Many Animals? Power Calculations, Statistical Considerations and Summary**  
Dallas Hyde, Ph.D., University of California at Davis & Charles Irvin, Ph.D., The University of Vermont

**9:00 AM**      **Confocal Microscopy**  
Douglas Taatjes, Ph.D., The University of Vermont

**9:50 AM**      **Semi Quantitative Pathology**  
Dallas Hyde, Ph.D., University of California at Davis

**10:20 AM**      **Break**

**10:30 AM**      **Introduction to Morphometry/Stereology and Sampling**  
Dallas Hyde, Ph.D., University of California at Davis

**11:20 AM**      **Smooth Fractionator Exercise**  
Dallas Hyde, Ph.D., University of California at Davis

**12:00 PM**      *Lunch, Highseas Dining Room*

**1:30 PM**      **Basic Measures: Volume., Number, Surface and Length**  
Dallas Hyde, Ph.D., University of California at Davis

**2:20 PM**      **Cavalieri Volume Exercise**  
Dallas Hyde, Ph.D., University of California at Davis

**3:30 – 6:00**      **Free Time**

**6:00**              *Dinner, Highseas Dining Room*

*End of Workshop*