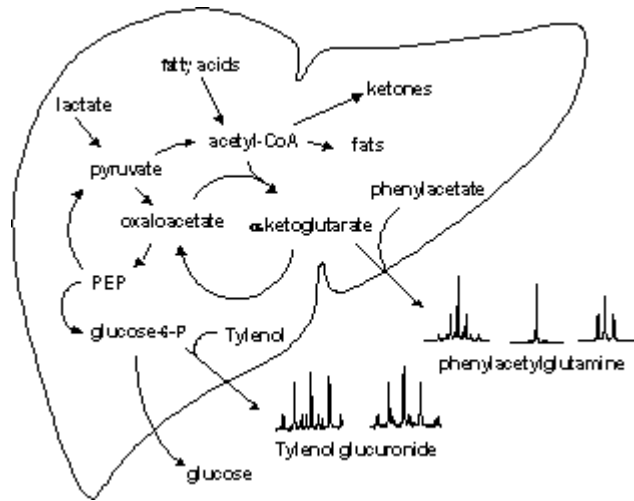


Symposium and Training IX: **Hepatic Gluconeogenesis**



Thursday, May 10, 2001

Presented by

**The Mary Nell and Ralph B. Rogers
Magnetic Resonance Center**

and

The National Center for Research Resources in association with

**UT SOUTHWESTERN
MEDICAL CENTER**

Program Objective

This program is aimed at faculty, fellows and students with an interest in measuring fluxes in complex metabolic networks. In the morning session, physicians and biochemists from UT Southwestern Medical Center will provide an introduction to ^2H and ^{13}C NMR as well as other tracer methods for analysis of metabolic problems. Examples from biological systems ranging from cell culture to patients will be presented. The afternoon session will involve guest faculty and will be devoted to current concepts in regulation of hepatic gluconeogenesis and hepatic glucose output.

Guest Speakers

Alan D. Cherrington, PhD, Professor and Chairman, Molecular Physiology and Biophysics, Vanderbilt University Medical Center, Nashville, Tennessee.

Bernard R. Landau, MD, PhD Professor of Medicine, Biochemistry and Nutrition, Case Western Reserve University, Cleveland, Ohio.

Mark A. Magnuson, PhD, Assistant Vice-Chancellor for Research, Professor of Molecular Physiology, Biophysics and Medicine, Vanderbilt University Medical Center, Nashville, Tennessee.

UT Southwestern Speakers

Abhimanyu Garg, MD, Professor of Medicine, Chief, Division of Nutrition and Metabolic Diseases.

Craig R. Malloy, MD, Professor of Radiology and Internal Medicine and Director of the Southwestern Biomedical Magnetic Resonance Facility.

Christopher B. Newgard, PhD, Professor of Biochemistry and Internal Medicine and Center for Diabetes Research.

A. Dean Sherry, PhD, Professor of Radiology, UT Southwestern Medical Center at Dallas and Professor of Chemistry, The University of Texas at Dallas.

Kosaku Uyeda, PhD, Professor of Biochemistry.

Brian C. Weis, MD, PhD Senior Research Associate, Department of Radiology

Program Schedule

8:00 a.m.	On-Site Registration - North Campus Continental Breakfast
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ISOTOPE ANALYSIS OF COMPLEX METABOLIC NETWORKS

8:30 a.m.	^2H and ^{13}C NMR: Principles and Potential Clinical Applications Craig Malloy, MD
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9:15 a.m.	The Clinical Spectrum of Insulin Resistance: From Lipodystrophy to Obesity Abhimanyu Garg, MD
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10:00 a.m.	Break
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10:30 a.m.	Analysis of Intermediary Metabolism in Patients with Liver Disease Brian C. Weis, MD, PhD
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11:15 a.m.	Metabolic Regulatory Mechanisms Revealed by Genetic Engineering and Metabolic Profiling Christopher B. Newgard, PhD
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12:00 a.m.	Catered Lunch
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HEPATIC GLUCONEOGENESIS

1:00 p.m.	Insulin, Glucagon and Gluconeogenesis <i>in Vivo</i> Alan D. Cherrington, PhD
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2:00 p.m. **A Glucose-Responsive Transcription Factor that Regulates Carbohydrate Metabolism in the Liver**
Kosaku Uyeda, PhD

3:00 p.m. **Discussion & Break**

3:15 p.m. **Integration of Hepatic Energetics and Gluconeogenesis: Insights from Murine Models**
Mark A. Magnuson, PhD

4:15 p.m. **Gluconeogenesis and Glycogen Cycling**
Bernard Landau, MD, PhD

Evening Session - South Campus

5:30 p.m. **Reception - A.W. Harris Faculty Club**

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