

Proline Metabolism and Human Diseases
September 10-11, 2007
Holiday Inn-Fort Detrick, Frederick, MD

Program

Monday – September 10, 2007. NCI- Frederick Conference Center, Auditorium

7:30 – 8:00	Registration	
7:50 7:55	Welcome	
7:55 8:00	Introduction	James Phang

Features of Proline Metabolism in Animals and Plants

8:00 8:30	Functional Switching in Proline Metabolism	Donald Becker
8:30 9:00	Structural Biology of Proline Catabolism	John J. Tanner
9:00 9:30	Proline Transporter ProP of <i>E. coli</i> : Osmosensor and Osmoregulator	Janet Wood
9:30 10:00	Proline Accumulation in Plants: A Review	Nathalie Verbruggen

BREAK

10:15 10:45	Functional Food Design via Proline-linked Redox Pathways to Counter Diet-linked Chronic Disease Challenges	Kalidas Shetty
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Collagen and Proline Metabolism

10:45 11:15	Collagen Structure and Metabolism: Prolines and Hydroxyprolines	Stephen Krane
11:15 11:45	Prolidase-dependent Regulation of Collagen Biosynthesis	Jerzy Palka
11:45 12:15	Prolidase and Prolidase Deficiency: An Overview On the Characterization of the Enzyme Involved in Proline Recycling and on the Effects of its Mutations	Antonella Forlino

LUNCH

12:15 1:00	Conference Center Cafeteria	
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POSTER SESSION

12:15 1:30	Atrium, Conference Room B	
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Metabolism in Health and Disease

1:30	2:00	Inborn Errors of Proline and Ornithine Metabolism	David Valle
2:00	2:30	Proline Metabolism in the Conceptus: Implications For Fetal Growth and Development	Guoyao Wu
2:30	3:00	MTOR Signaling	Alan Kimmel
3:00	3:30	MYC: Oncogenic Alterations of Intermediary Metabolism	Chi Van Dang

BREAK

Proline Metabolism and Cancer

3:45	4:15	Role of Human P5C Synthase in Cancer Cell Death	C.A. Andy Hu
4:15	4:45	Proline Oxidase Plays A Tumor Suppressor Role in Human Cancers	Yongmin Liu
4:45	5:15	The Metabolism of Proline, a Stress Substrate, Modulates Carcinogenic Pathways	James Phang
5:15	5:30	Comments	Chi Van Dang
6:00	7:00	Reception – Holiday Inn – Ft. Detrick	
7:00	9:30	Dinner – Holiday Inn – Ft. Detrick	
		Keynote Address – New Ideas: Lost and Found	Jesse Roth

Tuesday - September 11, 2007. NCI- Frederick Conference Center, Auditorium

Neuropsychiatric Disorders and Proline Metabolism

8:30	9:00	The Role of Glutamate in the Pathophysiology of Schizophrenia	Joseph Coyle
9:00	9:30	Proline and PRODH in Schizophrenia	David Valle
9:30	10:00	POX Imaging Genetics: Proline Oxidase's Impact on Brain Structure and Function	Lucas Kempf
10:00	10:15	Comments	Joseph Coyle

BREAK

10:30	10:45	Structures of the DNA-Binding Domain on the Multifunctional Escherichia Coli PutA Flavoprotein	John Larson
10:45	11:00	Interactive Role of POX and P66SHC in Oxidative Stress-Induced Cell Death in Cancer Cells	Xiaobo Sun
11:00	11:15	Deletion of v7-3 (SLC6A15) Transporter Improves	Jana Drgonova

		Motor Performance in Aging Female Mice	
11:15	11:30	Rhodiola Crenulata-Induced Cell Death in Breast Cancer Cell Line Involves Dysfunctional Mitochondrial Oxidative Phosphorylation Associated with Proline-Linked Pentose Phosphate Pathway	Young-In Kwon
11:30	12:00	Summary and roundup	Participants