# 2011 Combined Annual Meeting Marriott Chicago Downtown, Chicago, Illinois April 14–15, 2011

Date Time	Session Name	Presenter/Location
Thursday April 14, 2011		
12:00pm-1:00pm	Editorial Board Meeting and Luncheon	Cook Room
2:00pm-8:00pm	Registration Open	State Room
2:00pm-4:00pm	CSCR Council Meeting	DuPage Room
2:00pm-5:00pm	AFMR Career Development Workshop	Cook Room
2:00pm	Introduction to Workshop Goals and Objectives	Abraham Thomas, MD, MPH Division Head, Endocrinology, Diabetes, Bone and Mineral Disorders Whitehouse Chair in Endocrinology Program Director, Endocrinology and Metabolism Fellowship, Henry Ford Hospital Chair, Midwestern Region, American Federation for Medical Research
2:00pm	An Investigative Career in Academic Medicine; Understanding the Roadmap to Success, An Administrator's Perspective	<b>Mr. Joe Doty</b> Vice Chair, Administration Department of Medicine Duke University School of Medicine
2:50pm	Question & Answer Session	
3:00pm-3:20pm	Break	
3:20pm	Creating Mentoring Networks to Optimize Career Development Presented with an interactive component	Ellen Wells Seely, MD Vice Chair, Faculty Development Department of Medicine Brigham and Women's Hospital
4:50pm	Question & Answer Session	
2:00pm-5:00pm	Poster Set-up	Avenue Ballroom
5:00pm-7:00pm	Welcome Reception & Poster Session	Avenue Ballroom/Halstead
6:00pm–10:00pm	CSCR Sugar Club/Midwest Metabolism Dinner	Addison Room (Marriott Ballroom) Joseph Bass, MD Associate Professor of Medicine at the Northwestern University Feinberg School of Medicine
7:00pm-9:00pm	Past Presidents Reception	Halstead
Friday, April 15, 2011		
7:30am-8:00am	Continental Breakfast	Marriott Ballroom
8:00am–8:15am	Welcome Remarks & CSCR Business Meeting	Marriott Ballroom Bradley Britigan, MD Chair, CSCR Abraham Thomas, MD, MPH Chair, MWAFMR Jordan Metcalf, MD Treasurer, CSCR
8:15am–9:15am	AFMR Key Note Presentation	Marriott Ballroom Kenneth S. Polonsky, MD Dean of the Division of the Biological Sciences and the Pritzker School of Medicine
9:15am-9:40am	Break	Halstead

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9:40am-1:00pm	Poster Author Set-up	Avenue Ballroom
9:40am-10:40am	Department Chair Session I	Clark (Marriott Ballroom)
		John M. Carethers, MD John G. Searle Professor and Chair Department of Internal Medicine University of Michigan Jennifer Meddings, MD Assistant Professor, Internal Medicine (General Medicine) Andrew Tai, MD Assistant Professor, Internal Medicine (Gastroenterology) Tae-Hwa Chun, MD
9:40am-10:40am	Derestment Chair Service II	Addison Room (Aminist Pallyson)
9:40am-10:40am	Department Chair Session II	Addison Room (Marriott Ballroom)         Mark E. Anderson, MD, PhD         Professor of Medicine and Physiology         Head, Department of Internal Medicine         Associate Director, Cardiovascular         Research Center         University of Iowa College of Medicine         Thomas J. Hund, PhD         Assistant Professor of Medicine         and Biomedical Engineering         Fayyaz Sutterwala, MD, PhD         Assistant Professor         Lakshmi Durairaj, MBBS, MS         Assistant Professor
10:45am-12:05pm	Oral Abstract Presentation I	Clark (Marriott Ballroom)
10:45am–11:05am	Cardiovascular Award winner	The Metabolic Syndrome and Advanced Subclinical Atherosclerosis as Assessed by Coronary Calcium <i>Muddassir Mehmood, MBBS</i> <i>Wright State University</i>
11:05am–11:20am		Two functional promoter variants of sphingosine-1-phosphate receptor 3 gene decrease human susceptibility to severe sepsis-associated acute lung injury <i>XiaoGuang Sun, MD, PhD</i> <i>University of Illinois at Chicago</i>
11:20am–11:40am		Rac1 interaction with Cytochrome C mediates mitochondrial H <sub>2</sub> O <sub>2</sub> production in asbestos-exposed macrophages. <i>Heather Osborn, MD</i> <i>University of Iowa Hospitals and Clinics</i>
11:40am–12:00pm	Outstanding Young Investigator Award winner	Mitochondria-Targeted Antioxidant Mito-TEMPO Prevents Angiotensin II Mediated Connexin 43 Remodeling and Sudden Cardiac Death <i>Ali Sovari, MD</i> <i>University of Illinois at Chicago</i>
10:45am-12:05pm	Oral Abstract Presentation II	Addison Room (Marriott Ballroom)
10:45am–11:05am		Regulation of islet beta cell SERCA2 expression and calcium homeostasis in type 2 diabetes mellitus <i>Carmella Evans-Molina, MD, PhD</i> <i>Indiana University</i>
11:05am–11:20am		Ghrelin Suppresses Insulin Secretion and Compromises Beta-cell Function in Healthy Humans Jenny Tong, MD, PhD University of Cincinnati

11:20am–11:40am		REG3? is a Biomarker of Graft Versus Host Disease of the Gastrointestinal Tract Andrew Harris, MD University of Michigan
11:40am–12:00pm		TAZ as a regulator of mesenchymal transformation and clinical aggressiveness in gliomas <i>Katrina Salazar</i> <i>University of Texas Health Science Center</i> <i>Houston/MD Anderson Cancer Center</i>
12:10pm–12:40	Conflict of Interest Session Ethics in Clinical Research	Dr. Walter StadlerFred C. Buffett Professor of Medicine & SurgeryAssociate Dean for Clinical Research Director, Genitourinary Program University of Chicago Medical Center Carol ZuichesAssociate Vice President for Research, and Director, University Research Administration University of Chicago Research
12:40pm-1:10pm	Lunch	
1:10pm-2:10pm	Hickam lecture	Joe G. N. Garcia, MD Vice Chancellor Research University of Illinois at Chicago
2:20pm-3:50pm	Poster Session w/refreshments	Avenue Ballroom
4:00pm-7:00pm	MWAFMR Scholars Program	McHenry Room (3rd Floor)

All sessions jointly presented by

# CENTRAL SOCIETY FOR CLINICAL RESEARCH MIDWESTERN SECTION AMERICAN FEDERATION FOR MEDICAL RESEARCH

# Thursday, April 15, 2011 12:00pm – 1:00pm CSCR Editorial Board Meeting & Luncheon Cook Room

# 2:00pm – 4:00pm CSCR Council Meeting Dupage Room

# 2:00pm – 5:00pm AFMR Career Development Workshop Cook Room

*Abraham Thomas, MD, MPH, presiding* Division Head, Endocrinology, Diabetes, Bone and Mineral Disorders Whitehouse Chair in Endocrinology, Program Director, Endocrinology and Metabolism Fellowship, Henry Ford Hospital Chair, Midwestern Region, American Federation for Medical Research

2:00pm Introduction to Workshop Goals and Objectives Abraham Thomas, MD

2:00pm	An Investigative Career in Academic Medicine; Understanding the Roadmap to Success, an Administrator's Perspective
	Mr. Joe Doty
	Vice Chair, Administration
	Department of Medicine
	Duke University School of Medicine
2:50pm	Question & Answer session
3:00pm	Break
3:20pm	Creating Mentoring Networks to Optimize Career Development
-	Presented with an interactive component
	Ellen Wells Seely, MD
	Vice Chair, Faculty Development, Department of Medicine
	Brigham and Women's Hospital
4:50pm	Question & Answer session

# 5:00pm – 7:00pm Welcome Reception & Poster Session Avenue Ballroom

6:00pm – 10:00pm CSCR Sugar Club/Midwest Metabolism Dinner & Max Miller Lecture in the Diabetes Research *Guest Lecture by* Joseph Bass, MD Associate Professor of Medicine Northwestern University Feinberg School of Medicine

All sessions jointly presented by

# CENTRAL SOCIETY FOR CLINICAL RESEARCH MIDWESTERN SECTION AMERICAN FEDERATION FOR MEDICAL RESEARCH

# Friday, April 15, 2011 8:00 am – 9:15 am

# **Marriott Ballroom**

8:00	Welcome Remarks and CSCR Business Meeting
8:15	MWAFMR Keynote Presentation
	Kenneth S. Polonsky, MD
	Dean of the Division of the Biological Sciences and the Pritzker School of Medicine
9:15	Break
	Halstead foyer

# 9:40 am – 10:40 am Department Chair Session I

# **Clark Ballroom**

 9:40 John M. Carethers, MD, presiding, John G. Searle Professor and Chair, Department of Internal Medicine University of Michigan
 9:45 Presentation TBD Jennifer Meddings, MD, Assistant Professor, Internal Medicine

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 10:05 Presentation TBD Andrew Tai, MD, Assistant Professor, Internal Medicine
 10:25 Presentation TBD

Tae-Hwa Chun, MD, Assistant Professor, Internal Medicine

# 9:40 am – 10:40 am Department Chair Session II

#### **Addison Ballroom**

9:40	Mark E. Anderson, MD, PhD, presiding,		
	Professor of Medicine and Physiology		
	Head, Department of Internal Medicine, Associate Director, Cardiovascular Research Center		
	University of Iowa College of Medicine		
9:45	Presentation TBD		
	Thomas J. Hund, PhD, Assistant Professor of Medicine and Biomedical Engineering		
10:05	Presentation TBD		
	Fayyaz Sutterwala, MD, PhD, Assistant Professor		
10:25	Presentation TBD		
	Lakshmi Durairaj, MBBS, MS, Assistant Professor		

# 10:45 am – 12:05 pm Oral Abstract Presentation I

### **Clark Ballroom**

- **10:45** The Metabolic Syndrome and Advanced Subclinical Atherosclerosis as Assessed by Coronary Calcium Muddassir Mehmood, MBBS, Wright State University, Cardiovascular Award Winner
- 11:05 Two Functional Promoter Variants of Sphingosine-1-Phosphate Receptor 3 Gene Decrease Human Susceptibility to Severe Sepsis-Associated Acute Lung Injury XiaoGuang Sun, MD, PhD, University of Illinois at Chicago
- 11:20 Rac1 Interaction With Cytochrome C Mediates Mitochondrial H<sub>2</sub>O<sub>2</sub> Production in Asbestos-Exposed Macrophages
- Heather Osborn, MD, University of Iowa Hospitals and Clinics
   11:40 Mitochondria-Targeted Antioxidant Mito-TEMPO Prevents Angiotensin II Mediated Connexin
   43 Remodeling and Sudden Cardiac Death Ali Sovari, MD, University of Illinois at Chicago, Outstanding Young Investigator Award Winner

# 10:45 am – 12:05 pm Oral Abstract Presentation II

## **Addison Ballroom**

- **10:45** Regulation of Islet Beta Cell SERCA2 Expression and Calcium Homeostasis in Type 2 Diabetes Mellitus Carmella Evans-Molina, MD, PhD, Indiana University
- **11:05** C Ghrelin Suppresses Insulin Secretion and Ompromises Beta-Cell Function in Healthy Humans Jenny Tong, MD, PhD, University of Cincinnati
- 11:20 **REG3?** is a Biomarker of Graft Versus Host Disease of the Gastrointestinal Tract Andrew Harris, MD, University of Michigan
- **11:40 TAZ as a Regulator of Mesenchymal Transformation and Clinical Aggressiveness in Gliomas** Katrina Salazar, University of Texas Health Science Center Houston/MD Anderson Cancer Center

# 12:05 pm – 12:40 pm Conflict of Interest Session

## Room-TBD

 Roy Weiss presiding,

 12:05
 Ethics in Clinical Research

 Dr. Walter Stadler

 Fred C. Buffett Professor of Medicine & Surgery

 Associate Dean for Clinical Research

 Director, Genitourinary Program, University of Chicago Medical Center

 Carol Zuiches

 Associate Vice President for Research, and Director, University Research Administration

 University of Chicago Research

# 12:40 pm – 1:10 pm Lunch

# 1:10 pm – 2:10 pm CSCR Hickam Lecture

## **Marriott Ballroom**

 Bradley Britigan presiding,

 1:10
 CSCR Hickam Lecture

 Joe G.N. Garcia, MD

 Vice Chancellor Research, University of Illinois at Chicago

2:20 pm – 3:50 pm Poster Session with Refreshments

**Avenue Ballroom** 

# 4:00 pm – 7:00 pm MWAFMR Scholars Program

# McHenry Room (3rd floor)

# Welcome Reception and Poster Session

Jointly presented by

# CENTRAL SOCIETY FOR CLINICAL RESEARCH MIDWESTEN SECTION AMERICAN FEDERATION FOR MEDICAL RESEARCH

# Thursday, April 14, 2011 5:00 pm - 7:00 pm

## **Avenue Ballroom**

Cardiology/Cardiovascular Disease

The Metabolic Syndrome and Advanced Subclinical Atherosclerosis as Assessed by Coronary Calcium

M. Mehmood, R.J. Markert, M.S. Chandra, Medicine, Wright State University, Dayton, OH; B. Bodenmiller, Miami Valley Hospital, Dayton, OH; (Cardiovascular Award winner, Trainee Travel Award winner)

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Mitochondria-Targeted Antioxidant, Mito-TEMPO, Prevents Angiotensin II Mediated Connexin 43 Remodeling and Sudden Cardiac Death

A.A. Sovari, L. Gu, D. Mitchell, E. Jeong, M.G. Bonini, S.C. Dudley, Cardiology, UIC, Chicago, IL; S. Iravanian, Cardiology, Emory University, Atlanta, GA; (Outstanding Young Investigator Award winner, Trainee Travel Award winner)

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Myocardial Late Gadolinium Enhancement is a Novel Finding in Sickle Cell Disease: A Cardiac Magnetic Resonance and Genomic Study

A.A. Desai, S. Trevino, T. Zhou, M. Wade, R.F. Machado, J. Garcia, Medicine, University of Illinois at Chicago, Chicago, IL; H. Ahmad, T. Thiruvoipati, R.M. Lang, A.R. Patel, Medicine, University of Chicago, Chicago, IL; K. Turner, N. Artz, Medicine, Loyola University, Maywood, IL; (Trainee Travel Award winner)

# Race-Based Disparities in Post Percutaneous Coronary Intervention (PCI) Outcomes Persist Independent of Socioeconomic Status (SES) and Access to Healthcare

A.W. Appis, A. Mithani, S. Attanasio, RUSH University Medical Center, Chicago, IL; S. Dontarajus, M. Ravilla, L. Lee, R. Kelly, John Stroger Hospital of Cook County, Chicago, IL; S. Nathan, The University of Chicago Hospitals, Chicago, IL; A. Amin, Mid-America Heart Institute, Kansas City, MO.

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Right Ventricular Contractility Predicts Functional Response to Resynchronization

M.V. Burri, R.M. Weiss, J.B. Martins, University of Iowa Hospitals and Clinics, Iowa City, IA; (Trainee Travel Award)

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A Tissue Stem Cell Niche Regulates Oxidative-Mechanical Lrp5 Aortic Valve Osteoblastogenesis

N.M. Rajamannan, Cardiology, Northwestern University Feinberg School of Medicine, Chicago, IL.

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### Probenecid Increases Myocardial Contractility Without Worsening Ischemic Damage in an Infarct Model

S. Koch, A. Anjak, M. Jiang, J. Rubinstein, Cardiology, University of Cincinnati, Cincinnati, OH; L. Haar, X. Ren, Y. Liu, H. Wang, W. Jones, Pharmacology and Cell Biophysics, University of Cincinnati, Cincinnati, OH.

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## Vasodilator-Stimulated Phosphoprotein Deficiency Potentiates PAR-1-Induced Increase in Endothelial Permeability in Mouse Lungs

J. Profirovic, J. Han, A.V. Andreeva, R.F. Neamu, T.A. Voyno-Yasenetskaya, University of Illinois, Chicago, IL; U. Walter, University of Würzburg, Würzburg, Germany.

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## Supernormal Ejection Fraction and Left Ventricular Diastolic Dysfunction

M. Garg, Guthrie Clinic, Sayre, PA; J.A. Goeke, A.N. Magalski, Mid America Heart Institute, University of Missouri Kansas City, Kansas City, MO.

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## Atherothrombosis: Atherosclerosis, Thrombophilia, Hypofibrinolysis and Progressive Coronary Artery Disease

A. Gal, C. Abuchaibe, C. Glueck, P. Wang, I.M., Jewish Hospital Cincinnati, Blue Ashe, OH.

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## Gender Differences in Cardiac Repolarization Following Intravenous Sotalol Administration

J.C. Somberg, Department of Medicine and Pharmacology, Rush University, Chicago, IL; R.A. Preston, Department of Clinical Pharmacology, University of Miami, Miller School of Medicine, Miami, FL; V.V. Ranade, Department of Chemistry, Academic Pharmaceuticals, Lake Bluff, IL; J. Molnar, Department of Clinical Research, Academic Pharmaceuticals, Lake Bluff, IL; I. Cvetanovic, Department of Pharmacology, Rush University, Chicago, IL.

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Validation of Velocity Vector Imaging Echocardiography With Magnetic Resonance Imaging in Mouse Models of Cardiomyopathy S.M. Azam, A. Liner, B.D. Hoit, Division of Cardiovascular Medicine, University Hospitals Case Medical Center, Cleveland, OH; J. Stelzer, Department of Physiology and Biophysics, Case Western Reserve University, Cleveland, OH; C.L. Desjardin (Trainee Travel Award), X. Yu, Department of Biomedical Engineering, Case Western Reserve University, Cleveland, OH.

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# Thromboelastogram-Platelet Mapping is Useful is Determining Platelet Inhibition Preoperatively in Patients Receiing Dual Antiplatelet Therapy

E. Kaynak, A. Denktas, Cardiology, University of Texas at Houston, Houston, TX; A. Altamirano, E. Pivalizza, D. Cattano, Anesthesiology, University of Texas at Houston, Houston, TX.

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## Pegloticase Does Not Cause QT Interval Prolongation

J.C. Somberg, Department of Medicine and Pharmacology, Rush University, Chicago, IL; I. Cvetanovic, Department of Pharmacology, Rush University, Chicago, IL; T. Rosario-Jansen, Savient Pharmaceuticals, East Brunswick, NJ; J. Molnar, American Institute of Therapeutics, Lake Bluff, IL.

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## Liver-Specific Expression of Phospholipids Transfer Protein (PLTP) Increases Atherogenic Lipoproteins Production

A. Yazdanyar, X. Jiang, Cell Biology, SUNY Downstate Medical center, Brooklyn, NY; (Trainee Travel Award)

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## Limited Correlation of Cardiac Output and Device Flows in the Heart Mate II LVAD

A.Y. Kim, J. Gelow, F. McNeil, J. Mudd, E. Adler, H. Song, Medicine, Oregon Health and Science University, Portland, OR; (Trainee Travel Award, K Award winner)

## Dermatology

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Dynamic Interplay of Tumor and Microenvironmental Contributions of the  $\alpha 2\beta 1$  Integrin in Squamous Cell Carcinoma

T. Tran, B. Barlow, L. O'Rear, B. Jarvis, Z. Li, M. Zutter, Pathology, Vanderbilt University, Nashville, TN; W. Dupont, Biostatistics, Vanderbilt University, Nashville, TN; (Trainee Travel Award)

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Hdac1 and Hdac2 Act Redundantly to Control p63 and p53 Functions in Epidermal Progenitor Cells

M. LeBoeuf, A. Terrell, S. Trivedi, S. Millar, Dermatology, University of Pennsylvania School of Medicine, Philadelphia, PA; E. Olson, Department of Molecular Biology, UT Southwestern, Dallas, TX; S. Sinha, Biochemistry, State University of New York at Buffalo, Buffalo, NY; J. Epstein, E. Morrisey, Cardiology, University of Pennsylvania School of Medicine, Philadelphia, PA.

## **Disease Modulation/Intervention**

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Clinical Predictors of Treatment Response to Divalrpoex and Risperidone Among Youth With Pediatric Bipolar Disorder (PBD) A.E. West, S. Weinstein, M. Pavuluri, Psychiatry, University of Illinois at Chicago, Chicago, IL; (K-Award winner)

## Endocrinology/Metabolism

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# Ghrelin Suppresses Insulin Secretion and Compromises Beta-Cell Function in Healthy Humans

J. Tong, H.W. Davis, M.H. Tscheop, D. D'Alessio, Medicine, university of Cincinnati, Cincinnati, OH; R.L. Prigeon, Medicine, University of Maryland, Baltimore, MD; (K-Award winner)

## Testosterone Treatment for Hypogonadism Leading to Clinically Significant High Estradiol

M. Gowda, J. Zacharias, M. Kammineni, A. Ahmad, Internal medicine, Jewish Hospital, Cincinnati, OH; V.M. Reddy, S. Rawal, P. Wang, C.J. Glueck, Cholesterol Center, Jewish Hospital, Cincinnati, OH; (Trainee Travel Award winner)

## Gastroenterology/Clinical Nutrition

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# An Essential Role for a Phosphatidylinositol 4-Kinase in Hepatitis C Virus Replication Complex Assembly

A. Tai, S. Salloum, Internal Medicine, University of Michigan, Ann Arbor, MI; R.T. Chung, Medicine, Massachusetts General Hospital, Boston, MA.

## **Geriatrics**

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#### A Meta-Analysis of Interventions to Reduce Loneliness

C.M. Masi, Medicine, University of Chicago, Chicago, IL; H. Chen, L.C. Hawkley, J.T. Cacioppo, Psychology, University of Chicago, Chicago, IL; (K-Award winner)

## Health Care Research/Clinical Epidemiology/Quality Improvement

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#### Hospital-Acquired Conditions and Pay-for-Performance: The Impact of Risk Adjustment J. Meddings, L.F. McMahon, Internal Medicine, University of Michigan, Ann Arbor, MI.

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Impact of Medicare-Specialized Nurse Case Management: Favorable Hospital and Emergency Utilization Outcomes for a Medicare Advantage Population Compared to Unmanaged Traditional Medicare Experience

M.J. Wade, R. Kunkel, C. Spettell, J. Stock, R. Falk, R. Krakauer, Medicare Medical Management, Aetna, Inc., Princeton, NJ.

## Hematology and Oncology

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Piracy of COX-2/PGE2/EP Receptor Pathway by Kaposi's Sarcoma Associated Herpesvirus (KSHV): A Potential Achilles Heel of **KSHV** Related Diseases

A.G. Paul, Microbiology and Immunology, Rosalind Franklin University of Medicine and Science, Chicago, IL; N. Sharma-Walia, Microbiology and Immunology, Rosalind Franklin University of Medicine and Science, Chicago, IL; B. Chandran, Microbiology and Immunology, Rosalind Franklin University of Medicine and Science, Chicago, IL.

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## **Regulation of Tumor Immune Microenvironments by EphrinB2**

X. Luo, K.S. Cohen, Internal Medicine, University of Chicago, Chicago, IL.

# Infectious Disease

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# Human Alveolar Epithelial Cells are a Target for Bacillus Anthracis Lethal Toxin

J. Metcalf, M. Langer, J. Booth, E. Duggan, V. Patel, Pulmonary and Critical Care Division, Department of Medicine, University of Oklahoma Health Sciences Center, Oklahoma City, OK; T. Veres, F. Prenzler, K. Sewald, A. Braun, Immunology, Allergology and Immunotoxicology, Fraunhofer Institute for Toxicology and Experimental Medicine, Hannover, GERMANY; K. Coggeshall, Program in Immunology and Cancer, Oklahoma Medical Research Foundation, Oklahoma City, OK.

## Mechanisms of Disease

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NOD2 Expression Upregulated by Organic Dust via NF-KB Negatively Regulates Organic Dust-Induced Inflammatory Responses J.A. Poole, T. Kielian, T.A. Wyatt, A. Gleason, W. West, R.J. Debra, Medicine, University of Nebraska Medical Center, Omaha, NE.

# Transactivation of the EphA2 Receptor is Required for Hyaluronan/CD44-Mediated Human Pulmonary Angiogenesis

F. Lennon, T. Mirzapoiazova, N. Mambetsariev, B. Mambetsariev, G. Cervantes, S. Ravi, S.A. Patrick, University of Chicago, Chicago, IL; (Trainee Travel Award)

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Advanced Glycation Endproduts in Diabetic Sensory Neuropathy: A Role for Glyoxalase I in Population-Specific Sensory Neurons M.M. Jack, J.M. Ryals, D.E. Wright, Anatomy and Cell Biology, The University of Kansas Medical Center, Kansas City, KS; (Trainee Travel Award)

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## Activation of Carbohydrate Response Element Binding Protein (ChREBP) by Ethanol

S. Liangpunsakul, M. Sozio, R. Harris, R. Ross, D. Crabb, Division of Gastroenterology/Hepatology, Indiana University School of Medicine, Indianapolis, IN; (K-Award winner)

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## RAG-1 Mutant Dahl Salt Sensitive Rats are Resistant to NaCl-Induced Hypertension

M.A. Saleh, C. Guo, L. Hayley, D. Satarupa, G.M. Aron, M.L. David, Physiology, Medical College of Wisconsin, Milwaukee, WI; (Trainee Travel Award)

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## Marinobufagenin and Angiogenic Imbalance are the Indicators of Cerebral Vascular Leak Syndrome in Preeclampsia

M.N. Uddin, D.C. Zawieja, Systems Biology and Translational Medicine, Texas A&M Health Science Center College of Medicine/ Scott&White, Temple, TX; R.O. Jones, S.R. Allen, T.J. Kuehl, Obstetrics & Gynecology, Texas A&M Health Science Center College of Medicine/Scott&White, Temple, TX; (Trainee Travel Award winner)

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### The Effect of B-Complex Vitamins Upon the Prolongation of Prothrombin Time by Acetaldehyde

A.S. Brecher, J. Catazaro, Chemistry, Bowling Green State University, Bowling Green, OH.

## Molecular Medicine and Bioinformatics

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# The Spindle Assembly Checkpoint is Composed of Two Independent and Conserved Branches: One That Requires Aurora B Kinase Activity and Another That Requires CENP-H and CENP-I

D. Matson, P. Demirel, D. Burke, T. Stukenberg, Biochemistry and Molecular Genetics, University of Virginia, Charlottesville, VA.

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# Balancing Medical Informatics and Medical 'Ignoramics': Curriculum, Assessment, and the Virtual Clinical Research Center/Questionarium

M.H. Witte, P.D. Crown, M.J. Bernas, S.K. Daley, Surgery, University of Arizona College of Medicine, Tucson, AZ; J.R. Hall, Biomedical Communications, Arizona Health Sciences Center, Tucson, AZ; F.A. Garcia, Obstetrics & Gynecology, University of Arizona College of Public Health, Tucson, AZ.

## Nephrology

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# Loss of Activator of G Protein Signaling 3 Impairs Renal Tubular Regeneration Following Acute Kidney Injury in Rodents K.R. Regner, F. Park, Medicine, Medical College of Wisconsin, Milwaukee, WI.

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#### Granulation Tissue Derived Stem Cells A Novel Source of Adult Stem Cells for Repair of Acute Kidney Injury

J. Patel, N. Pancholi, G. Dunea, Hektoen Institute of Medicine, Chicago, IL; K.P. Gudehithlu, A.K. Singh, John H. Stroger, Jr. Hospital of Cook County, Chicago, IL; J.A. Arruda, University of Illinois at Chicago and the Chicago VAMC, Chicago, IL.

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# Primary Language in Hispanics With Chronic Kidney Disease and Medical Management of Diabetes, Hypertension, and Hyperlipidemia

C.M. Lora, E. Carmona, J.P. Lash, Medicine, University of Illinois at Chicago, Chicago, IL; B.S. Gerber, Jesse Brown VA Medical Center, Chicago, IL; L.M. Ackerson, A.S. Go, Divison of Research, Kaiser Permanent, Oakland, CA; (K-Award winner)

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#### Ethanol Alters Expression of Cytochrome P450 (CYP) Isoforms in Podocytes

E. McCarthy, R. Eckert, S. Wang, Kidney Institute, University of Kansas Medical Center, Kansas City, KS; J. Zhou, R. Sharma, V. Savin, M. Sharma, Kansas City VA Medical Center, Kansas City, MO; T. Srivastava, Nephrology, Children's Mercy Hospital, Kansas City, MO.

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#### Dynamic Podocyte and Arteriolar Wall APOL1 Expression Patterns in Non-Diabetic Kidney Disease

S.M. Madhavan, J.F. O'Toole, M. Konieczkowski, L.A. Bruggeman, J.R. Sedor, Neprhology, Case Western Reserve University, Cleveland, OH.

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#### Association of Social Support and Mortality in African Americans With Chronic Kidney Disease

Porter, D. Brooks, M. Bruce, J. Charleston, W. Cleveland, D. Dowie, M. Faulkner, J. Gassman, T. Greene, L. Hiremath, C. Kendrick, J.W. Kusek, D. Thornley-Brown, X. Wang, K. Norris, M. Fischer, J. Lash, University of Illinois at Chicago, Chicago, IL.

## Pulmonary/Critical Care

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Rac1 Interaction With Cytochrome C Mediates Mitochondrial H<sub>2</sub>O<sub>2</sub> Production in Asbestos-Exposed Macrophages

H.L. Osborn, A.J. Ryan, A. Racila, S. Murthy, B. Carter, Pulmonary and Critical Care, University of Iowa Hospitals and Clinics, Iowa City, IA; (Trainee Travel Award winner)

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Differential Roles of Sphingosine Kinase 1 and S1P Lyase Deficiency in Hyperoxia Induced ROS Generation and Lung Injury

S. Pendyala, I. Gorshkova, P. Usatyuk, H. Anantha, D. He, V. Natarajan, Pharmacology, University of Illinois at Chicago, Chicago, IL; Y. Zhao, Medicine, University Of Pittsburgh, Pittsburgh, PA; J.G. Garcia, Medicine, University Of Illinois at Chicago, Chicago, IL; (Trainee Travel Award)

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Nitrated Sphingosine 1-Phosphate Receptor 3 in Circulating Microparticles is a Novel Biomarker for Acute Lung Injury X. Sun, P.A. Singleton, J. Zhao, S. Sammani, E.T. Chiang, L. Moreno-Vinasco, S.M. Dudek, V. Natarajan, J.R. Jacobson, R. Machado, J.G. Garcia, Medicine, University of Illinois at Chicago, Chicago, IL; H. Ischiropoulos, Department of Pediatrics, Children's Hospital of Philadelphia, Philadelphia, IL; (Trainee Travel Award, K Award winner)

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## Ezrin/Radixin/Moesin Proteins Differentially Regulate S1P-Induced Pulmonary Endothelial Cell Barrier Enhancement

D. Adyshev, N. Moldobaeva, V. Ramamoorthi Elangovan, J.G. Garcia, S.M. Dudek, Medicine, The University of Illinois at Chicago, Chicago, IL; (Trainee Travel Award winner)

## Cortactin Modulates Allergic Airway Responses in a Murine Model of Asthma

T. Wang, S. Sammani, L. Moreno-Vinasco, B. Mathew, S.M. Dudek, J. Garcia, Medicine, University of Illinois at Chicago, Chicago, IL; (Trainee Travel Award winner)

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#### Hyaluronidase-1 is a Novel Regulator of Human Pulmonary Endothelial Barrier Disruption

T. Mirzapoiazova, N. Mambetsariev, B. Mambetsariev, F.E. Lennon, P.A. Singleton, Medicine, University of Chicago, Chicago, IL.

#### FTY720 S-Phosphonate Exhibits Superior Barrier Promoting Properties to S1P and FTY720 In Vitro and In Vivo

L. Wang, S. Sammani, L. Moreno-Vinasco, S. Camp, J. Garcia, S. Dudek, Department of Medicine, University of Illinois at Chicago, Chicago, IL; R. Bittman, Queens College of The City University of New York, New York, NY; (Trainee Travel Award)

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# hsa-miR-374a and hsa-miR-568 Attenuate LPS- and Cyclic Stretch-Induced PBEF Gene Expression in Human Lung Endothelium

V. Ramamoorthi Elangovan, D. Adyshev, S. Siddiqui, N. Moldobaeva, S. Dudek, J. Garcia, Institute for Personalized Respiratory Medicine, Pulmonary, Critical Care, Sleep and Allergy, University of Illinois at Chicago, Chicago, IL; (Trainee Travel Award winner)

## 100

# GADD45a Mediates Akt Signaling in Mechanical Stress-Induced Lung Injury: Role of TRAF6 and UCHL1

S. Mitra, S. Sammani, S.M. Dudek, L. Moreno-Vinasco, J.G. Garcia, J.R. Jacobson, Institute for Personalized Respiratory Medicine, Department of Medicine, Section of Pulmonary Critical Care, Sleep and Allergy, University of Illinois at Chicago, Chicago, IL; D. Boone, Department of Medicine, Section of Gastroenterology, University of Chicago, Chicago, IL.

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## Mitochondrial SOD Protects Hyperoxia-Induced Dysfunction of Lung Endothelium

P.V. Usatyuk, V. Natarajan, Medicine, University of Illinois at Chicago, Chicago, IL.

#### 110

## Sphingosine Kinase 1 Deficiency Protects Bleomycin Induced Mouse Lung Fibrosis

L. Huang, P. Fu, W. Ma, D. He, V. Natarajan, Department of Pharmacology, The University of Illinois at Chicago, Chicago, IL; J. Garcia, College of Medicine, The University of Illinois at Chicago, Chicago, IL; B. Mathew, Institute for Personalized Respiratory Medicine, The University of Illinois at Chicago, Chicago, IL.

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# Transcription Factor STAT3 is Involved in the Regulation of Lipopolysaccharide-Induced Sphingosine-1-Phosphate Lyase Expression in Lung Endothelium

W. Ma, D. He, S. Pendyala, L. Moreno-Vinasco, J.G. Garcia, V. Natarajan, Institute for Personalized Respiratory Medicine, University of Illinois at Chicago, Chicago, IL; Y. Zhao, Department of Medicine, University of Pittsburgh, Pittsburgh, PA; B. Oskouian, J. Saba, Children's Hospital Oakland Research Institute for Cancer Center, Oakland, CA; (Travel Trainee Award, K Award winner)

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## Nuclear Localization of TGF Beta Receptors in Mesenchymal Derived Cells From the Lung

E. Karrar, K. Jenkins, A. Mosley-Brown, A. Morel, R. Espinosa, A. Kapila, B. Camoretti-Mercado, Department of Medicine, University of Chicago, Chicago, IL.

## Rheumatology/Immunology/Allergy

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# Soluble CD14 in Synovial Fluid From Patients With Osteoarthritis (OA) and Meniscal Injury Modulates LPS Activation of Fibroblast-Like Synoviocytes

C.R. Scanzello, A. Nair, V. Kanda, A. Finnegan, Internal Medicine/Rheumatology, Rush University Medical Center, Chicago, IL; C. Bush-Joseph, N. Verma, K. Mikecz, Orthopedics, Rush University Medical Center, Chicago, IL; G.T. Spear, Immunology/Microbiology, Rush University Medical Center, Chicago, IL; M.K. Crow, Medicine/Rheumatology, Hospital for Special Surgery, New York, NY.

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## TULA-2, a Novel Tyrosine-Phosphatase, Regulates Syk Phosphorylation in Osteoclast Signaling Pathways

S. Back, N. Adapala, D. Holland, T.N. Newman, M.F. Barbe, A.Y. Tsygankov, A. Sanjay, Temple University, Philadelphia, PA; N. Carpino, Stony Brook University, Stony Brook, NY.

## 40

**IFIH1 rs1990760 SNP is Associated With Differential Interferon Alpha Response and dsDNA Autoantibodies in Lupus Patients** T. Robinson, S.N. Kariuki, B.S. Franek, A.A. Kumar, M. Badaracco, T.O. Utset, T.B. Niewold, Rheumatology, University of Chicago, Chicago, IL; R.A. Mikolaitis, M. Jolly, Rheumatology, Rush University, Chicago, IL.

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# IRF8 Allele Associated With Susceptibility to Multiple Sclerosis is Associated with Serum Interferon Alpha and Serologic Profile in Systemic Lupus Erythematosus

B.S. Franek, S.N. Kariuki, J. Arrington, T.O. Utset, T.B. Niewold, Rheumatology, University of Chicago, Chicago, IL; R.A. Mikolaitis, M. Jolly, Rheumatology, Rush University, Chicago, IL; M. Zervou, D.T. Boumpas, G. Goulielmos, Internal Medicine and Rheumatology, Clinical Immunology and Allergy, University of Crete, Heraklion, Greece; (K-Award winner)

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## Serum Cytokines in Sarcoidosis

K. Patterson, B.S. Franek, N. Sweiss, T.B. Niewold, University of Chicago, Chicago, IL.

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## Histone Deacetylase 11 as a Novel Regulator of T-Cell Reactivity

K.V. Woan, University of Florida, Gainesville, FL; D. Wang, F. Cheng, H. Wang, J. Rock-Klotz, Z. Wang, Y. Yu, E. Seto, N. Luetteke, A. Villagra, X. Yu, E. Sotomayor, Moffitt Cancer Center, Tampa, FL.

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# Serum Free Light Chains, Interferon α and Interleukins as Biomarkers of Disease Activity in Systemic Lupus Erythematosus

S. Francis, R.A. Mikolaitis, S. Chubinskaya, J.A. Block, W. Sequeira, M. Jolly, Medicine/Rheumatology, Rush University, Chicago, IL; T.B. Niewold, Medicine/Rheumatology, University of Chicago, Chicago, IL; R. Aggarwal, University of Pittsburgh Medical Center, Pittsburgh, PA.

## Afternoon Break and Poster Session

Jointly presented by

# Central Society for Clinical Research Midwestern Section American Federation for Clinical Research

# Friday, April 15, 2011 2:20 pm – 3:30 pm

# **Avenue Ballroom**

## Cardiology/Cardiovascular Disease

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Endothelial Cell Barrier Regulation by Simvastatin is Mediated by Claudin-5

W. Chen, J. Jacobson, J.G. Garcia, Medicine, University of Illinois at Chicago, Chicago, IL; (Travel Trainee award)

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Arterial Calcification and Vascular Remodeling in Chronic Kidney Disease is Directly Mediated by S100A12 (EN-RAGE) J. Gawdzik, L. Mathew, T.S. Puri, M.A. Hofmann Bowman, Medicine, University of Chicago Medical Center, Chicago, IL.

#### 25

Normalization of Serum Vitamin D in Hypercholesterolemic, Vitamin D Deficient Patients, Previously Statin Intolerant Because of Myositis-Myalgia, Restores Statin Tolerance Without Myositis-Myalgia

N.A. Khan, W. Ahmed, A. Ahmed, C.J. Glueck, P. Wang, Internal Medicine, Jewish hospital, Cincinnati, OH; (Trainee Travel Award winner) 39

## Cardiac Troponin Elevation in Critically III Patients With No Coronary Disease: Significance and Treatment

F. Rothenberg, University of Cincinnati, Cincinnati, OH; N. Ibrahim, A. Ejaz, R. Vandivier, Cardiology, Veterans Administration Medical Center, Cincinnati, OH.

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### High Prevalence of Ischemic Heart Disease in Patients With Hyperuricemia and Chronic Gout

J.C. Somberg, Department of Medicine and Pharmacology, Rush University, Chicago, IL; I. Cvetanovic, Department of Pharmacology, Rush University, Chicago, IL; J. Molnar, American Institute of Therapeutics, Lake Bluff, IL.

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Chronic Kidney Disease as a Risk Factor for Acute Coronary Syndromes in Patients Presenting to the Emergency Room With Chest Pain

S. Khambatta, R. Wright, G.S. Reeder, P.A. Smars, P.J. Best, Department of Medicine, Divisions of Cardiovascular Diseases and Emergency Medicine, Mayo Clinic, Rochester, MN; M. Farkouh, Clinical Trials Unit, Mount Sinai Heart, New York, NY; P.A. McCullough, Department of Medicine, Division of Cardiology, William Beaumont Hospital, Royal Oak, MI.

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The Short Term Effects of Omega-3 Polyunsaturated Fatty Acids on Heart Rate Variability in a Control Population J. Moore, P. Binkley, Internal Medicine, The Ohio State University, Columbus, OH.

Disease Modulation/Intervention

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The Child is Father of the Man: Associations of Risk Factors at Age 12 and the Development of Cardiovascular Disease, Type 2 Diabetes Mellitus, and High Blood Pressure at Age 40: The Princeton Lipid Research Clinics Follow-Up Study

A.A. Khan, C.J. Glueck, P. Wang, Cholesterol and Metabolism Center, The Jewish Hospital, Cincinnati, OH; A. Cusmano, Internal Medicine, The Jewish Hospital, Cincinnati, OH; J.A. Morrison, Pediatrics, Children's Hospital, Cincinnati, OH.

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M1 "Classically Activated" Pro-Inflammatory Micrornas Collectively Inhibit the M2 "Alternatively Activated" Phenotypic Function of Phagocytosis in Mouse Primary Microglia

*R.W.* Freilich, K. Ingraham, T. Ikezu, Department of Pharmacology & Experimental Therapeutics, Boston University School of Medicine, Boston, MA.

## Critical Role of Sphingolipid Pathway Components in Murine Radiation-Induced Lung Injury: Protection by Sphingosine 1 Phosphate Analogues

B. Mathew, J.R. Jacobson, E. Berdyshev, X. Sun, J. Siegler, C. Evanovski I, T. Wang, T. Zhou, L. Moreno-Vinasco, R. Zaidi, R. Bittman, S. Sammani, S.M. Dudek, V. Natarajan, J. Garcia, Medicine, University Of Illinois at Chicago, Chicago, IL; Y. Huang, Y. Zhao, L. Gerhold, Y.A. Lussier, C.T. Chen, P.J. LaRiviere, R.R. Weishelbaum, Radiation Oncology, University Of Chicago, Chicago, IL.

## Endocrinology/Metabolism

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# Regulation of Islet Beta Cell SERCA2 Expression and Calcium Homeostasis in Type 2 Diabetes Mellitus

T. Kono, D. Moss, C. Evans-Molina, Medicine, Indiana University, Indianapolis, IN; G. Ahn, L. Gann, P. Fueger, T. Ogihara, Wells Center for Pediatric Research, Indiana University, Indianapolis, IN; A. Zarain-Herzberg, Dept. de Bioquímica, Facultad de Medicina, Universidad Nacional Autónoma de México, México Distrito Federal, MEXICO; (Trainee Travel Award, K Award winner)

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# Adolescent Oligomenorrhea in a Healthy, Bi-Racial Schoolgirl Cohort: A Simple Clinical Parameter Predicting Young Adult Insulin, Glucose, and Homa Insulin Resistance From Age 19 to 25

J.A. Zacharias, M.K. Gowda, A. Ahmed, Internal Medicine, Jewish Hospital Cincinnati, Cincinnati, OH; C.J. Glueck, P. Wang, M. Kammineni, S. Rawal, V. Reddy, Cholesterol Center, Jewish Hospital, Cincinnati, OH; (Trainee Travel Award winner)

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# Normalization of Serum Vitamin D in 125 Hypercholesterolemic, Vitamin D Deficient Patients, Previously Statin Intolerant Because of Myositis-Myalgia, Restores Statin Tolerance Without Myositis-Myalgia

C. Abuchaibe, C.J. Glueck, S.B. Budhani, M. Kammineni, N. Khan, A. Khan, P. Wang, N. Goldenberg, Internal Medicine, The Jewish Hospital of Cincinnati, Cincinnati, OH; (Trainee Travel Award winner)

## 31

Adolescent Oligomenorrhea in a Biracial Schoolgirl Cohort: A Simple Clinical Parameter Predicting Impaired Fasting Glucose Plus Type 2 Diabetes, Insulin, Glucose, Insulin Resistance, and Centripetal Obesity From Age 19 to 25

A. Gal, C. Abuchaibe, C. Glueck, P. Wang, Internal Medicine, The Jewish Hospital, Cincinnati, OH; J. Morrison, Cardiology, Cincinnati Childrens Hospital, Cincinnati, OH; D. Stroop, Hematology, Cincinnati Childrens Hospital, Cincinnati, OH; S. Daniels, Pediatrics, Childrens Hospital, Denver, CO; (Trainee Travel Award winner)

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The Development of G4 Polyamidoamine (PAMAM) Dendrimer as an Ideal Nanoscale Delivery System for Islet Transplant

D. Gutierrez, Department of Bioengineering, University of Illinois at Chicago, Chicago, IL; Y. Wang, T. Harvat, J. Oberholzer, Department of Surgery, University of Illinois at Chicago, Chicago, IL; Y. Yang, S. Hong, Department of Biopharmaceutical Sciences, University of Illinois at Chicago, IL; Y. Yang, S. Hong, Department of Biopharmaceutical Sciences, University of Illinois at Chicago, IL; Y. Yang, S. Hong, Department of Biopharmaceutical Sciences, University of Illinois at Chicago, IL; Y. Yang, S. Hong, Department of Biopharmaceutical Sciences, University of Illinois at Chicago, IL; Y. Yang, S. Hong, Department of Biopharmaceutical Sciences, University of Illinois at Chicago, IL; Y. Yang, S. Hong, Department of Biopharmaceutical Sciences, University of Illinois at Chicago, IL; Y. Yang, S. Hong, Department of Biopharmaceutical Sciences, University of Illinois at Chicago, IL; Y. Yang, S. Hong, Department of Biopharmaceutical Sciences, University of Illinois at Chicago, IL; Y. Yang, S. Hong, Department of Biopharmaceutical Sciences, University of Illinois at Chicago, IL; Y. Yang, S. Hong, Department of Biopharmaceutical Sciences, University of Illinois at Chicago, IL; Y. Yang, S. Hong, Department of Biopharmaceutical Sciences, University of Illinois at Chicago, IL; Y. Yang, S. Hong, Department of Biopharmaceutical Sciences, University of Illinois at Chicago, IL; Y. Yang, S. Hong, Department of Biopharmaceutical Sciences, University of Illinois at Chicago, IL; Y. Yang, S. Hong, Department of Biopharmaceutical Sciences, University of Illinois at Chicago, IL; Y. Yang, S. Hong, Department of Biopharmaceutical Sciences, University of Illinois at Chicago, IL; Y. Yang, S. Hong, Department of Biopharmaceutical Sciences, University of Illinois at Chicago, IL; Y. Yang, S. Hong, Y. Yang, S. Hong, Department of Biopharmaceutical Sciences, University of Illinois at Chicago, IL; Y. Yang, S. Hong, Department of Biopharmaceutical Sciences, University of Illinois at Chicago, IL; Y. Yang, S. Hong, S. Hong, Department of Biophar

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# Age 14 Sex Hormone Binding Globulin, Oligomenorrhea, and Childhood Insulin Predict Metabolic Syndrome and Class III Obesity at Age 24

A. Ahmad, M.K. Gowda, J. Zacharias, N. Khan, Jewish Hospital, Cincinnati, OH; S. Rawal, M. Kammineni, C. Glueck, P. Wang, J. Morrison, Cholesterol Center, Jewish Hospital, Cincinnati, OH; (Trainee Travel Award)

## 75

# Normalization of Serum Vitamin D in Hypercholesterolemic, Vitamin D Deficient Patients, Previously Statin Intolerant Because of Myositis-Myalgia, Restores Statin Tolerance Without Myositis-Myalgia

A. Gal, C. Abuchaibe, C. Glueck, P. Wang, I.M., Jewish Hospital Cincinnati, Blue Ashe, OH; (Trainee Travel Award winner)

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# Exogenous Testosterone or Arimidex and Osteonecrosis of Hips-Jaw, Pulmonary Embolism, and Amaurosis Fugax in Men With Previously Undiagnosed Familial Thrombophilia

M. Gowda, J. Zacharias, A. Ahmad, D. Lotner, Internal medicine, Jewish Hospital, Cincinnati, OH; V. Reddy, M. Kammineni, P. Wang, C.J. Glueck, Cholesterol Center, Jewish Hospital, Cincinnati, OH.

## Gastroenterology/Clinical Nutrition

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# $REG3\alpha$ is a Biomarker of Graft Versus Host Disease of the Gastrointestinal Tract

A.C. Harris, J.L. Ferrara, J.E. Levine, T. Braun, J. Crawford, J. Granger, M. Vander Lugt, C. Byersdorfer, J. Magenau, A. Gomez, S. Choi, C. Kitko, G. Yanik, E. Peres, A. Pawarode, S. Mineishi, P. Reddy, D.R. Couriel, S. Paczesny, Blood and Marrow Transplant Program, University of Michigan, Ann Arbor, MI; J. Hogan, S. Pitteri, H. Wang, A. Chin, Q. Zhang, S. Hanash, Molecular Diagnostics Laboratory, Fred Hutchinson Cancer Research Center, Seattle, WA; (Trainee Travel Award winner)

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# Lymphangiogenesis in Water Avoidance Induced Stress and Citrobacter Rodentium Induced Gut Inflammation

A. Aravantagi, S. Shekar, Med-Peds, LSUHSC, Shreveport, LA; W. Cromer, V. Ganta, S. Alexander, Molecular and Cellular Physiology, LSUHSC, Shreveport, LA; P. Jordan, K. Manas, A. Sheth, Gastroenterology, LSUHSC, Shreveport, LA; M. Gareau, P. Sherman, Gastroenterology, The Hospital for Sick Children, Toronto, Ontario, Canada.

## Genetic Medicine

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## Sleep Duration Modifies the Heritability of Body Mass Index

N. Watson, Neurology, University of Washington, Seattle, WA; D. Buchwald, Medicine, University of Washington, Seattle, WA; J. Goldberg, Epidemiology, University of Washington, Seattle, WA; P. Harden, Psychology, University of Washington, Seattle, WA; (Trainee Travel Award, K Award winner)

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# Health Care Research/Clinical Epidemiology/Quality Improvement 41

# Mortality Among Patients With Communication Disabilities; Post-Hospitalization

A. Sokolovsky, P.S. Heckerling, B.S. Gerber, Medicine, University of Illinois at Chicago, Chicago, IL; D.A. Ebert, Access Community Health network, Chicago, IL.

## Hematology and Oncology

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## TAZ as a Regulator of Mesenchymal Transformation and Clinical Aggressiveness in Gliomas

K. Salazar, B. Vaillant, K. Wani, F. Hollingsworth, K. Diefes, T. Doucette, J. Gumin, D. Patel, F. Lang, G. Rao, K. Bhat, K. Aldape, MD Anderson Cancer Center, Houston, TX; V. Balasubramaniyan, J. Mooij, University Medical Center Groningen, Groningen, Netherlands; S. Kim, Yonsei University, Seoul, Republic of Korea; (Trainee Travel Award)

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## CD30/CD30L Signaling in Treg Mediated Suppression of T Cell Function

N. Tiwari, V. Nguyen, University of Chicago, Chicago, IL.

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## Antagonizing Repair-Mediated Resistance in Breast and Ovarian Cancer

S.R. Stecklein, E. Kumaraswamy, W. Wang, Pathology & Laboratory Medicine, University of Kansas Medical Center, Kansas City, KS; L.M. Harlan-Williams, Anatomy & Cell Biology, University of Kansas Medical Center, Kansas City, KS; V. Chaguturu, R.A. Jensen, The University of Kansas Cancer Center, University of Kansas Medical Center, Kansas City, KS; (Trainee Travel Award)

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DEK Oncogene Expression is Important for Head and Neck Squamous Cell Carcinoma Development

T. Wise-Draper, G. Hallenbeck, A. Varner, M. Morrison, S. Wells, Division of Hematology and Oncology, Cincinnati Children's Medical Center, Cincinnati, OH; P. Lambert, Division of Oncology, University of Wisconsin School of Medicine and Public Health, Madison, WI; K. Casper, Y. Patil, K. Wilson, Department of Otolaryngology, University of Cincinnati, Cincinnati, OH; K. Wikenheiser-Brokamp, Division of Pathology, Cincinnati Children's Medical Center, Cincinnati, OH; (Trainee Travel Award)

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## Identifying Genetic Variants Contributing to Celleular Sensitivity to Tamoxifen Using a Genome-Wide Cell-Based Model

D. Ziliak, E. Gamazon, H. Im, N. Cox, M. Dolan, R. Huang, University of Chicago, Chicago, IL; Z. Desta, D. Flockhart, Indiana University, Indianapolis, IN; (Trainee Travel Award, K Award winner)

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## A Molecular Network Reveals the Exquisite Sensitivity of Dividing Cancer Cells to Microtubule Perturbation

S.F. Bakhoum, Medicine, Biochemistry, Norris Cotton Cancer Center, Dartmouth Medical School, Hanover, NH; A.L. Manning, D.A. Compton, Biochemistry, Norris Cotton Cancer Center, Dartmouth Medical School, Hanover, NH; S. Maffini, C. Correia-Melo, H. Maiato, 3IBMC-Instituto de Biologia Molecular e Celular, Universidade de Porto, Porto, Portugal; (Trainee Travel Award)

## 103

## Outcomes After Transhiatal and Transthoracic Esophagectomy for Esophageal Cancer

C.S. Davis, K.E. Brownson, E.A. Bock, C. Weber, P.M. Fisichella, M. Shoup, G.V. Aranha, Department of Surgery, Loyola University Medical Center, Stritch School of Medicine, Maywood, IL.

## Infectious Disease

1Š

# CD4+ T-Cell Response Against Human Papillomavirus Type 16 E6 Protein is Associated With a Favorable Clinical Trend

K.H. Kim, W.W. Greenfield, M.J. Cannon, H.N. Coleman, H.J. Spencer, M. Nakagawa, University of Arkansas for Medical Sciences, Little Rock, AR; (Trainee Travel Award)

## 53

Is Repeat Stool Testing Needed for Diagnosis of Clostridium Difficile Infection Using Toxin (A and B) Enzyme Immuno Assay? A. Deshpande, V. Pasupuleti, P. Patel, G. Ajani, G. Hall, B. Hu, A. Jain, Cleveland Clinic, Cleveland, OH; D.D. Rolston, Geisinger Medical Center, Danville, PA; (Trainee Travel Award)

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## Microbiological Evaluation of Immunotherapy Agents in Clinical Practice

V. Sundareshan, N.M. Khardori, Infectious Diseases, Internal Medicine, Southern Illinois University School of Medicine, Springfield, IL; K. Gilbert, R. Bass, Otolaryngology, Southern Illinois University School of Medicine, Springfield, IL.

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## Epidemiology of Infections Caused by Streptococcus Anginosus Group at a Tertiary Care Hospital in Springfield, Illinois

O. Mansuri, Internal Medicine, Southern Illinois University School of Medicine, Springfield, IL; V. Sundareshan, N.M. Khardori, Internal Medicine, Infectious Diseases, Southern Illinois University, Springfield, IL; (Trainee Travel Award)

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## Iron-Containing Particles Induce Growth of P. aeruginosa

J. Borcherding, J.C. Caraballo, A.A. Pezzulo, J. Zabner, A.P. Comellas, Internal Medicine, University of Iowa, Iowa City, IA; H. Chen, L. Stebounova, V.H. Grassian, Department of Chemistry and Biochemical Engineering, University of Iowa, Iowa City, IA.

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Comparative Effects of Glycosaminoglycans on Activity of Coagulation Factors Toward Antithrombin

A.S. Brecher, B.M. Larrick, L. Spaho, D. Beck, Chemistry, Bowling Green State University, Bowling Green, OH.

## Mechanisms of Disease

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## Fusion of Agonist-Induced Endosomes With Intracellular Vesicles to Create Nox1 Redox-Endosomes

J. Streeter, F. Miller, University of Iowa, Iowa City, IA.

#### 35

## Caloric Restriction and Autophagy Activation Suppress Tau Toxicity in a Drosophila Model of Tauopathy

G.R. Jackson, Neurology, University Of Texas Medical Branch, Galveston, TX; M. Bakhoum, Neuroscience and Cell Biology, University Of Texas Medical Branch, Galveston, TX; (Trainee Travel Award)

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## A Link Between HIV Protease Inhibitor-Induced ER Stress and Autophagy in Adipocytes and Hepatocytes

B.S. Zha, M. Liang, P.B. Hylemon, H. Zhou, Microbiology/Immunology, Virginia Commonwealth University, Richmond, VA; S.E. Holt, Pathology, Virginia Commonwealth University, Richmond, VA; (Trainee Travel Award)

#### 57

## Lysocardiolipin Acyltransferase (Lycat) is a Novel Candidate Gene in Radiation-Induced Pulmonary Fibrosis

I. Noth, S. Ma, Medicine, The University of Chicago, Chicago, IL; B. Mathew, E. Berdyshev1, M. Wade, J. Siegler, J.R. Jacobson, J. Garcia, Medicine, University of Illinois at Chicago, Chicago, IL; L. Huang, V. Natarajan, Pharmacology, University of Illinois at Chicago, Chicago, IL; N. Kaminski, Y. Zhao, Medicine, University of Pittsburg, Pittsburgh, PA; R.R. Weishelbaum, Radiation Oncology, University of Chicago, Chicago, IL; (Trainee Travel Award winner)

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# Human Umbilical Cord Blood-Derived Mesenchymal Stem Cells in the Cultured Rabbit Intervertebral Disc - A Cell Therapy Approach

Y. Zhang, Orthopedics and Physical Medicine & Rehabilitation, Rush University Medical Center, Chicago, IL; (K-Award winner) 95

#### Leptin Signaling and Oxalate Homeostasis: Relevance to Calcium Oxalate Kidney Stone Disease

Z. Wang, D. Arvans, M. Cheng, H. Ayash, H. Hassan, Medicine, The University of Chicago, Chicago, IL; (K-Award winner)

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# Release of Mast Cell Mediators Contributes to Enhanced Sensory Mechanisms in the Urinary Bladder After TNBS Colitis J.J. Fitzgerald, M.A. Pezzone, E. Ustinova, W.C. de Groat, School of Medicine, University of Pittsburgh, Pittsburgh, PA.

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# Gain of Expression of Aldo-Keto Reductase Family 1 B10 (AKR1B10) Protein in Pancreatic Adenocarcinoma: An Early Event Involved in Pancreatic Carcinogenesis and a Potential Therapeutic Target

K.A. Matkowskyj, Y.T. Chung, J. Liao, H. Li, H. Bai, W. Zhang, G. Yang, Department of Pathology, Northwestern University, Feinberg School of Medicine, Chicago, IL.

## Molecular Medicine and Bioinformatics

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## Regulation of Stress-Induced Changes in PFC Synaptic Function by HDAC6

J.B. Lee, Z. Yan, SUNY Buffalo, Amherst, NY.

#### Nephrology

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#### A Pathogenic Missense LAMB2 Mutation Causes Congenital Nephrotic Syndrome by Impairing Laminin Secretion

Y.M. Chen, J.H. Miner, Renal Division, Washington University School of Medicine, St. Louis, MO; Y. Kikkawa, Laboratory of Clinical Biochemistry, Tokyo University of Pharmacy and Life Sciences, Tokyo, Japan; (K-Award winner)

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### Activated Omentum Attenuates Progression of Chronic Kidney Disease in a Rat Remnant Kidney Model

N. Pancholi, J. Patel, G. Dunea, Hektoen Institute of Medicine, Chicago, IL; K.P. Gudehithlu, A.K. Singh, John H. Stroger, Jr. Hospital of Cook County, Chicago, IL; J.A. Arruda, University of Illinois at Chicago and the Chicago VAMC, Chicago, IL.

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## Acute Aldosterone Treatment Enhances SPAK and NCC Phosphorylation

B. Ko, L. Moddes, Medicine, University of Chicago, Chicago, IL; R. Hoover, Medicine, Emory University, Atlanta, GA; (K-Award winner)

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#### Mouse Model of Prematurity Induced Reduction in Nephron Number and Hypertension

C. Stelloh, K. Allen, Medicine, Medical College of Wisconsin, Milwaukee, WI; A. El-Meanawy, Medicine, Milwaukee VA Medical Center, Miwlaukee, WI.

## Pulmonary/Critical Care

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# Two Functional Promoter Variants of Sphingosine-1-Phosphate Receptor 3 Gene Decrease Human Susceptibility to Severe Sepsisassociated Acute Lung Injury

X. Sun, S. Ma, M.S. Wade, J. Moitra, J.G. Garcia, Medicine, University of Illinois at Chicago, Chicago, IL.

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# Novel Candidate Genes Associated With the Protective Effects of SEW-2871 on Brain Death-Induced Acute Lung Injury

S. Sammani, R. Zaidi, . Mathew, T. Wang, T. Zhou, L. Moreno-Vinasco, J. Garcia, Dept of Medicine, UIC, Chicago, IL; K. Park, W. Vigneswaran, Department of Surgery, U of Chicago, Chicago, IL; A. Husain, Department of Pathology, U of Chicago, Chicago, IL; Y. Huang, Y. Lussier, medicine, U of Chicago, Chicago, IL; (Trainee Travel Award)

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Diodinase2 (Dio2) is a Novel Candidate Gene Linking Thyroid Metabolism to Protective Responses to Acute Inflammatory Lung Injury L. Xie, L. Moreno-Vinasco, M.S. Wade, S. Sammani, I. Noth, R. Kittles, M. Pino-Yanes, G. Infusino, W. Zhang, J.R. Jacobson, S.M. Dudek,

*J.G. Garcia, University of Illinois at Chicago, Chicago, IL; S. Ma, University of Chicago, Chicago, IL; C. Flores, CIBER de Enfermedades Respiratorias, Instituto de Salud Carlos III, Madrid, Spain; (Trainee Travel Award)* 

# 91

# Genomic Evaluation of Pulmonary Hypertension in Sickle Cell Disease

A.A. Desai, S. Trevino, T. Zhou, M. Wade, J. Garcia, R.F. Machado, Medicine, University of Illinois at Chicago, Chicago, IL; H. Ahmad, T. Thiruvoipati, A.R. Patel, R.M. Lang, Medicine, University of Chicago, Chicago, IL; K. Turner, N. Artz, Medicine, Loyola University, Maywood, IL.

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## HGF-Mediated Lung Endothelial Barrier Regulation: Role of S1PR1 Transactivation, Integrin Beta 4 and Gab-1

Y. Epshtein, P. Singleton, J. Jacobson, W. Chen, S. Dudek, J. Garcia, Medicine, UIC, Chicago, IL.

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## Pseudomonas aeruginosa Up-Regulates Expression of Nox Proteins In Vivo and In Vitro

P. Fu, V. Natarajan, Pharmacology, University of Illinois at Chicago, Chicago, IL; S. Mansoor, R. Sadikot, Section of Pulmonary, Critical Care, Sleep and Allergy, University of Illinois at Chicago, Chicago, IL.

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# Sphingosine Kinase 1 Deficiency Protects Bleomycin Induced Mouse Lung Fibrosis

L. Huang, P. Fu, W. Ma, D. He, V. Natarajan, Department of Pharmacology, The University of Illinois at Chicago, Chicago, IL; J. Garcia, College of Medicine, The University of Illinois at Chicago, Chicago, IL; B. Mathew, Institute for Personalized Respiratory Medicine, The University of Illinois at Chicago, Chicago, IL.

# Rheumatology/Immunology/Allergy

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# Familial Aggregation of High Tumor Necrosis Factor Alpha Levels in Systemic Lupus Erythematosus

D. Imbuka, S.N. Kariuki, B.S. Franek, T.B. Niewold, Rheumatology, University of Chicago, Chicago, IL.

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## T Cell Co-Stimulatory Molecule OX40 Enhances Intravascular Leukocyte Trafficking and Adhesion

Z. Zhang, X. Wu, Pediatrics, Oregon Health & Science University, Portland, OR; J.T. Rosenbaum, Casey Eye Institute, Oregon Health & Science University, Portland, OR; (K-Award winner)

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# Efficacy of Canakinumab (ACZ885), a Fully Human Anti-Interleukin (IL)-1beta Monoclonal Antibody, in the Prevention of Flares in Gout Patients Initiating Allopurinol Therapy

N. Schlesinger, UMDNJ-Robert Wood Johnson Medical School, New Brunswick, NJ; L. Rudolph, New Mexico Clinical Research & Osteoporosis Center, Albuquerque, NM; H. Lin, Taipei Veterans General Hospital, Taipei, Taiwan; M. De Meulemeester, Private Practice, Gozée, Belgium; E.L. Nasonov, Institute of Rheumatology RAMS, Moscow, Russian Federation; J. Rovensky, NURCH, Piestany, Slovakia; E.F. Mysler, OMI Organizacion Medica de Investigacion, Buenos Aires, Argentina; U. Arulmani, G. Krammer, A. Balfour, D. Richard, P. Sallstig, Novartis Pharma AG, Basel, Switzerland; A.K. So, CHU Vaudois, Lausanne, Switzerland.

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## Evaluation of the Autoimmune Disease Risk Allele of UBE2L3 in African-American Lupus Patients

S. Agik, B.S. Franek, A.A. Kumar, M. Kumabe, T.O. Utset, T.B. Niewold, Rheumatology, University of Chicago, Chicago, IL; R.A. Mikolaitis, M. Jolly, Rheumatology, Rush University, Chicago, IL.

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# Gene-Expression Guided Selection of Candidate Loci and Molecular Phenotype Analyses Enhance Genetic Discovery in Systemic Lupus Erythematosus

Y. Koldobskaya, A.A. Kumar, S. Agik, J. Arrington, B.S. Franek, M. Kumabe, T.O. Utset, T.B. Niewold, Rheumatology, University of Chicago, Chicago, IL; R.A. Mikolaitis, M. Jolly, Rheumatology, Rush University, Chicago, IL; A.D. Skol, Genetic Medicine, University of Chicago, Chicago, IL.

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# Validation of the Cutaneous Lupus Disease Area and Severity Index (CLASI) for Lupus

M. Jolly, N. Kazmi, R.A. Mikolaitis, J.A. Block, Section of Rheumatology, Rush University Medical Center, Chicago, IL.

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## Health Effects due to Acute Exposure of Dust Samples Collected From Nellis Dunes Recreational Area

S. Proper, J.R. Harkema, Biochemistry and Molecular Biology, Michigan State University, East Lansing, MI; M. Peden-Adams, N. Ayala, J. Berger-Ritchie, S. Labahn, S. Young, B. Buck, R. Sudowe, Y. Teng, D. Baron, University of Nevada, Las Vegas, Las Vegas, NV; D. Goossens, Katholieke Universiteit, Leuven, BELGIUM; D. Soukup, California State University, Bakersfield, CA; D.E. Keil, University of Utah, Salt Lake City, UT.

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# Can Telangiectasias be Used as a Marker for Pulmonary Gas Exchange in Patients With Scleroderma?

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