This information is current as of June 10, 2017.
Table of Contents

VOL. 190 | NO. 3 | February 1, 2013 | Pages 845–1386

845 IN THIS ISSUE

PILLARS OF IMMUNOLOGY

847 Converging Discoveries: The First Reports of IL-4
   Robert L. Coffman

   Peter C. Isakson, Ellen Puré, Ellen S. Vitetta, and Peter H. Krammer

   Maureen Howard, John Farrar, Mary Hilfiker, Barbara Johnson, Kiyoshi Takatsu, Toshiyuki Hamasoka, and William E. Paul

BRIEF REVIEWS

875 The Paradoxical Functions of B Cells and Antibodies in Transplantation
   Marilia I. Cascalho, Brian J. Chen, Mandy Kain, and Jeffrey L. Platt

CUTTING EDGE

881 Cutting Edge: IL-6–Dependent Autoimmune Disease: Dendritic Cells as a Sufficient, but Transient, Source

886 Cutting Edge: Type I IFN Drives Emergency Myelopoiesis and Peripheral Myeloid Expansion during Chronic TLR7 Signaling
   Matthew B. Buechler, Thomas H. Teal, Keith B. Elkon, and Jessica A. Hamerman


The Journal of Immunology (ISSN 0022-1767) is published twice each month by The American Association of Immunologists, Inc., 9650 Rockville Pike, Bethesda, MD 20814-3994, Phone: 301-634-7197, Fax: 301-634-7829. Subscription terms: New subscriptions and renewals begin January 1 and expire one year later (see http://www.jimmunol.org/subscriptions for prices and details). A special rate is available to members of The American Association of Immunologists, Inc. (see http://www.aai.org/membership). The American Association of Immunologists, Inc., is not responsible for undeliverable issues. Replacement issues can be obtained, if available, at the regular price of single issues (see http://www.jimmunol.org/pdf/single_issue_purchase.pdf). Reprints of individual articles are available only from authors. Periodicals postage paid at Bethesda, MD 20814-3994, and at additional mailing offices. Country of origin U.S.A. Printed on acid-free recyclable paper. Postmaster: Send address changes 60 days in advance to The Journal of Immunology, Subscription Department, 9650 Rockville Pike, Bethesda, MD 20814-3994. Copyright © 2013 by The American Association of Immunologists, Inc.
Aurintricarboxylic Acid Ameliorates Experimental Autoimmune Encephalomyelitis by Blocking Chemokine-Mediated Pathogenic Cell Migration and Infiltration
Feifei Zhang, Wei Wei, Hui Chai, and Xin Xie

Mnk1 and 2 Are Dispensable for T Cell Development and Activation but Important for the Pathogenesis of Experimental Autoimmune Encephalomyelitis
Balachandra K. Gorentla, Sruti Krishna, Jinwook Shin, Makoto Inoue, Mari L. Shinohara, Jason M. Grayson, Rikiro Fukunaga, and Xiaoping Zhong

Chronic Exposure to Plasmodium falciparum Is Associated with Phenotypic Evidence of B and T Cell Exhaustion
Joseph Illingworth, Noah S. Butler, Sophie Roetynck, Jedida Muwacharo, Susan K. Pierce, Philip Bejon, Peter D. Crompton, Kevin Marsh, and Francis M. Ndungu

Inflammatory Monocytes Are Critical for Induction of a Polysaccharide-Specific Antibody Response to an Intact Bacterium
Quanyi Chen and Clifford M. Snapper

Transcription Factors GATA-3 and RORγt Are Important for Determining the Phenotype of Allergic Airway Inflammation in a Murine Model of Asthma
Satoshi Ano, Yuki Morishima, Yukio Ishii, Keigyou Yoh, Yaichi Yageta, Shigeo Ohtsuka, Masashi Matsuyama, Mio Kawauchi, Satoru Takahashi, and Nobuyuki Hizawa

Intrinsic Role of FoxO3a in the Development of CD8+ T Cell Memory

TNFR2 Is Critical for the Stabilization of the CD4+Foxp3+ Regulatory T Cell Phenotype in the Inflammatory Environment
Xin Chen, Xueqiang Wu, Qiong Zhou, O. M. Zack Howard, Mihaia G. Netea, and Joost J. Oppenheim

An Organotypic Coculture Model Supporting Proliferation and Differentiation of Medullary Thymic Epithelial Cells and Promiscuous Gene Expression
Sheena Pinto, Katrin Schmidt, Stefanie Egge, Hans-Jürgen Stark, Petra Boukamp, and Bruno Kyewski

Focal Adhesion Kinase Regulates the Localization and Retention of Pro-B Cells in Bone Marrow Microenvironments
Shin-Young Park, Peter Wolfram, Kimberly Canty, Brendan Harley, Céar Nombela-Arrieta, Gregory Pivarnik, John Manis, Hilary E. Beggs, and Leslie E. Silberstein

Nck Recruitment to the TCR Required for ZAP70 Activation during Thymic Development
Aldo Borroto, Irene Arelano, Elaine P. Dupfer, Marek Prouza, Milošlav Suchánek, Manuel Fuentes, Alberto Orfao, Wolfgang W. Schamel, and Balbino Alarcón

A Synthetic Codon-Optimized Hepatitis C Virus Nonstructural 5A DNA Vaccine Primes Polyfunctional CD8+ T Cell Responses in Wild-Type and NS5A-Transgenic Mice
Fredrik Holmström, Anna Paetzel, Veronica Nähr, Anette Brass, Malte Krieg, Eberhard Hildt, Kate E. Broderick, Margaret Chen, Gustaf Ahlén, and Lars Frelin

Triggering of B7h by the ICOS Modulates Maturation and Migration of Monocyte-Derived Dendritic Cells
Sergio Occhipinti, Chiara Dianzani, Annalisa Chiocchetti, Elena Boggio, Nausicaa Clemente, Casimiro Luca Gigliotti, Maria Felicia Solari, Rosalba Minelli, Roberto Fantozzi, Jungi Yagi, José Maria Rojo, Daniele Sblattero, Mirella Giovarelli, and Umberto Dianzani

Assessment of Immune Interference, Antagonism, and Diversion following Human Immunization with Biallelic Blood-Stage Malaria Viral-Vectored Vaccines and Controlled Malaria Infection
Sean C. Elias, Katharine A. Collins, Fenella D. Halstead, Prateek Choudhary, Carly M. Bliss, Katie J. Ewer, Susanne H. Sheehy, Christopher J. A. Duncan, Sumi Biswas, Adrian V. S. Hill, and Simon J. Draper
Macrophage-Specific TLR2 Signaling Mediates Pathogen-Induced TNF-Dependent Inflammatory Oral Bone Loss
George Papadopoulos, Ellen O. Weinberg, Paola Masari, Frank C. Gibson, III, Lee M. Wetzler, Elise F. Morgan, and Caroline A. Genco

Regulatory B Cell (B10 Cell) Expansion during Listeria Infection Governs Innate and Cellular Immune Responses in Mice

CD70 Deficiency Impairs Effector CD8 T Cell Generation and Viral Clearance but Is Dispensable for the Recall Response to Lymphocytic Choriomeningitis Virus
Ivana Munitic, Mirela Kika, Atef Allam, Jonathan P. Sowille, and Jonathan D. Ashwell

Pro-Apoptotic Protein Noxa Regulates Memory T Cell Population Size and Protects against Lethal Immunopathology
Felix M. Wensveen, Paul L. Klarenbeek, Klaas P. J. M. van Gisbergen, Maria F. Pascuti, Ingrid A. M. Derks, Barbera D. C. van Schaik, Anja ten Brinke, Niek de Vries, Durdica Cekinovic, Stipan Jonjic, René A. W. van Lier, and Eric Elderong

Biphasic RLR–IFN-β Response Controls the Balance between Antiviral Immunity and Cell Damage
Sun-Young Hwang, Kye-Yeon Hur, Jeong-Rae Kim, Kwang-Hyun Cho, Seung-Hwan Kim, and Joo-Yeon Yoo

Salmonella Downregulates Nod-like Receptor Family CARD Domain Containing Protein 4 Expression To Promote Its Survival in B Cells by Preventing Inflammasome Activation and Cell Death
Araceli Perez-Lopez, Roberto Rosales-Reyes, Celia Mercedes Alpuche-Aranda, and Vianney Ortiz-Navarrete

Micro-RNA 155 Is Required for Optimal CD8+ T Cell Responses to Acute Viral and Intracellular Bacterial Challenges
Evan F. Lind, Alisha R. Elford, and Pamela S. Ohashi

Neutrophil Extracellular Trap–Associated Protein Activation of the NLRP3 Inflammasome Is Enhanced in Lupus Macrophages
J. Michelle Kahlenberg, Carmelo Carmona-Rivera, Carolyn K. Smith, and Mariana J. Kaplan

Rescue of Dysfunctional Autophagy Attenuates Hyperinflammatory Responses from Cystic Fibrosis Cells
Matthew L. Mayer, Christoph J. Blomke, Reza Falsafi, Chris D. Fjell, Laurence Madera, Stuart E. Turvey, and Robert E. W. Hancock

Inflammasome-Independent NLRP3 Augments TGF-β Signaling in Kidney Epithelium
Wenjie Wang, Xiangyu Wang, Justin Chun, Akousa Vilaysane, Sharon Clark, Gabrielle French, Nathan A. Bracey, Kiril Tripkov, Shirin Bonni, Henry J. Duff, Paul L. Beck, and Daniel A. Muruve

Regulation of TLR2-Mediated Tolerance and Cross-Tolerance through IRAK4 Modulation by miR-132 and miR-212
Md A. Nahid, Bing Yao, Paul R. Dominguez-Gutierrez, Lakshmya Keatvalu, Minoru Satoh, and Edward K. L. Chan

Endothelial MKK3 Is a Critical Mediator of Lethal Murine Endotoxemia and Acute Lung Injury
Praveen Mannam, Xuchen Zhang, Priying Shan, Yi Zhang, Amanda S. Shinn, Yitao Zhang, and Patty J. Lee

Flagellin Induces Myeloid-Derived Suppressor Cells: Implications for Pseudomonas aeruginosa Infection in Cystic Fibrosis Lung Disease
Nikolaus Rieber, Alina Brand, Andreas Hector, Ute Gieapler-Mainka, Michael Ost, Iris Schafer, Irene Wecker, Davide Neri, Andreas Wirth, Lauren Mays, Sabine Zundel, Jürg Fuchs, Rupert Handgretinger, Martin Stern, Michael Hogardt, Gerd Döring, Joachim Riethmüller, Michael Kormann, and Dominik Hartl

TLR4 Activation Under Lipotoxic Conditions Leads to Synergistic Macrophage Cell Death through a TRIF-Dependent Pathway
Joel D. Schilling, Heather M. Maczkovech, Li He, Abhinav Diwan, and Jean E. Schaffer
1297 Regulation of DNA Methylation in Rheumatoid Arthritis Synoviocytes
Kazubisa Nakano, David L. Boyle, and Gary S. Firestein

MOLECULAR AND STRUCTURAL IMMUNOLOGY

1304 The Crystal Structure of Human Soluble CD14 Reveals a Bent Solenoid with a Hydrophobic Amino-Terminal Pocket
Stacy L. Kelley, Tiit Lukk, Satish K. Nair, and Richard I. Tapping

1312 Dynine Light Chain LC8 Inhibits Osteoclast Differentiation and Prevents Bone Loss in Mice
Hyeryeon Kim, Seungha Hyeon, Hojin Kim, Yohee Yang, Ji Young Hub, Doo Ri Park, Hyojung Lee, Dong-Hyun Seo, Han-Sung Kim, Soo Young Lee, and Woojin Jeong

1319 Identification of SERPINB1 As a Physiological Inhibitor of Human Granzyme H
Li Wang, Qian Li, Lianfeng Wu, Shengguo Liu, Yong Zhang, Xuan Yang, Pingping Zhu, Honglian Zhang, Kai Zhang, Jizhong Lou, Pingheng Liu, Liang Tong, Fei Sun, and Zusen Fan

MUCOSAL IMMUNOLOGY

1331 Functional Characterization of T Cell Populations in a Mouse Model of Chronic Obstructive Pulmonary Disease
Bryan L. Eppert, Brian W. Wortham, Jennifer L. Flury, and Michael T. Borchers

TRANSPLANTATION

1341 Granzyme B–Mediated Damage of CD8+ T Cells Impairs Graft-versus-Tumor Effect
Guanglin Bian, Xilai Ding, Nicholas D. Leigh, Youzhou Tang, Maegan L. Capitano, Jingxin Qiu, Philip L. McCarthy, Hong Liu, and Xuefang Cao

1351 Graft-versus-Host Disease Impairs Vaccine Responses through Decreased CD4+ and CD8+ T Cell Proliferation and Increased Perforin-Mediated CD8+ T Cell Apoptosis
Christian M. Capitini, Nicole M. Nasholm, Brynn B. Duncan, Martin Guimond, and Terry J. Fry

TUMOR IMMUNOLOGY

1360 Heat Shock Protein 90 Is Critical for Regulation of Phenotype and Functional Activity of Human T Lymphocytes and NK Cells
Jooeun Bae, Aditya Munshi, Cheng Li, Mehmet Samur, Rao Prabhala, Constantine Mitsiades, Kenneth C. Anderson, and Nikhil C. Munshi

1372 The Receptor for Advanced Glycation End Products Promotes Pancreatic Carcinogenesis and Accumulation of Myeloid-Derived Suppressor Cells
Philip J. Vernon, Tara J. Loux, Nicole E. Schapiro, Rui Kang, Ravi Mudhusuamy, Pawel Kalinski, Daolin Tang, Michael T. Lotze, and Herbert J. Zeh, III

CORRECTIONS

1380 Correction: GPR105 Ablation Prevents Inflammation and Improves Insulin Sensitivity in Mice with Diet-Induced Obesity
Jianfeng Xu, Hidetaka Morinaga, Dayoung Oh, Pingping Li, Ai Chen, Satwata Talukdar, Eduardo Lazarowski, Jerrold M. Olefsky, and Jane J. Kim

1381 Correction: Cutting Edge: FcγRIII (CD16) and FcγRI (CD64) Are Responsible for Anti-Glycoprotein 75 Monoclonal Antibody T99 Therapy for Experimental Metastatic B16 Melanoma
Marcello Albanesi, David A. Mancardi, Lynn E. Macdonald, Bruno Iannacoli, Laurence Zitvogel, Andrew J. Murphy, Jeanette H. Leusen, and Pierre Bruhns

1382 Correction: Novel Role for Surfactant Protein A in Gastrointestinal Graft-versus-Host Disease
Kymberly M. Gonedz, Diana M. Cardona, Julia L. Nagent, Charles Giambardino, Joseph M. Thomas, Sambudho Mukherjee, Tereza Martinu, W. Michael Foster, Scott E. Pleva, Amy M. Pastva, Jo Rae Wright, and Scott M. Palmer
Correction: Antibody Repertoire Development in Fetal and Neonatal Piglets. XI. The Relationship of Variable Heavy Chain Gene Usage and the Genomic Organization of the Variable Heavy Chain Locus

Tomoko Eguchi-Ogawa, Nancy Wertz, Xiu-Zhu Sun, Francois Puimi, Hirohide Uenishi, Kevin Wells, Patrick Chardon, Gregory J. Tobin, and John E. Butler

AUTHOR INDEX