This information is current as of June 3, 2017.
7499 IN THIS ISSUE

LETTERS TO THE EDITOR

7501 Comment on “A Novel Pathway that Regulates Inflammatory Disease in the Respiratory Tract”
Chris L. Van Hove, Tania Maes, Guy F. Joos, and Kurt G. Tournoy

7501 Response to Comment on “A Novel Pathway That Regulates Inflammatory Disease in the Respiratory Tract”
Naiqian Niu and Lauren Cohn

BRIEF REVIEWS

7503 The Innate Immune System in Allograft Rejection and Tolerance
David F. LaRosa, Adeeb H. Rahman, and Laurence A. Turka

CUTTING EDGE

7511 Cutting Edge: Transitional T3 B Cells Do Not Give Rise to Mature B Cells, Have Undergone Selection, and Are Reduced in Murine Lupus
Brittany N. Teague, Yujun Pan, Philip A. Mudd, Britt Nakken, Qingzhao Zhang, Peter Szodoray, Xana Kim-Howard, Patrick C. Wilson, and A. Darise Farris

7516 Cutting Edge: Essential Role of Hypoxia Inducible Factor-1α in Development of Lipopolysaccharide-Induced Sepsis
Carole Peyssonnaux, Pilar Cejudo-Martin, Andrew Doedens, Annelies S. Zinkernagel, Randall S. Johnson, and Victor Nizet

7520 Cutting Edge: A Common Polymorphism Impairs Cell Surface Trafficking and Functional Responses of TLR1 but Protects against Leprosy
Christopher M. Johnson, Elizabeth A. Lyle, Katherine O. Omueti, Vitaly A. Stepensky, Olcay Yegin, Erkan Alpsoy, Lutz Hamann, Ralf Schumann, and Richard I. Tapping

7525 Cutting Edge: Human Th17 Cells Are Identified as Bearing CCR2+CCR5− Phenotype
Wakiro Sato, Toshimasa Aranami, and Takashi Yamamura

TLR Stimulation Modifies BLyS Receptor Expression in Follicular and Marginal Zone B Cells
Laura S. Trendl, Gianluca Carlesso, Kristen L. Hoek, Jason E. Stadanlick, Taku Kambayashi, Richard J. Bram, Michael P. Cancro, and Wasif N. Khan

Type I IFN Contributes to NK Cell Homeostasis, Activation, and Antitumor Function
Jeremy B. Swann, Yoshihiro Hayakawa, Nadeen Zerafa, Kathleen C. F. Sheehan, Bernadette Scott, Robert D. Schreiber, Paul Hertzog, and Mark J. Smyth

Agonist-Driven Development of CD4+CD25+Foxp3+ Regulatory T Cells Requires a Second Signal Mediated by Stat6
Vanessa Sanchez-Guajardo, Corinne Tanchot, John T. O'Malley, Mark H. Kaplan, Sylvie Garcia, and Antonio A. Freitas

Rates of Processing Determine the Immunogenicity of Immunoproteasome-Generated Epitopes
Parampal Deol, Dietmar M. W. Zais, John J. Monaco, and Alice J. A. M. Sijts

Persistent Depots of Influenza Antigen Fail To Induce a Cytotoxic CD8 T Cell Response
Dawn M. Jelley-Gibbs, John P. Dibble, Deborah M. Brown, Tara M. Strutt, K. Kai McKinstry, and Susan L. Swain

Systemic Administration of IL-23 Induces Potent Antitumor Immunity Primarily Mediated through Th1-Type Response in Association with the Endogenously Expressed IL-12
Teruo Kaiga, Maritomo Sato, Hide Kaneda, Yoichiro Iwakura, Tadatoshi Takayama, and Hideaki Tahara

A Novel Role of Complement Factor C1q in Augmenting the Presentation of Antigen Captured in Immune Complexes to CD8+ T Lymphocytes

Uptake of Human Papillomavirus Virus-Like Particles by Dendritic Cells Is Mediated by Fcγ Receptors and Contributes to Acquisition of T Cell Immunity
Diane M. Da Silva, Steven C. Fausch, J. Sjef Verbeek, and W. Martin Kast

Impaired Accumulation of Antigen-Specific CD8 Lymphocytes in Chemokine CCL25-Deficient Intestinal Epithelium and Lamina Propria
Marc-André Wurbel, Marie Malissen, Delphine Guy-Grand, Bernard Malissen, and James J. Campbell

IL-27 Synthesis Induced by TLR Ligation Critically Depends on IFN Regulatory Factor 3
Céline Molle, Muriel Nguyen, Véronique Flamand, Joelle Renneson, François Trottein, Dominique De Wit, Fabienne Willems, Michel Goldman, and Stanislas Gorily

Disregulated Influenza A Virus-Specific CD8+ T Cell Homeostasis in the Absence of IFN-γ Signaling
Stephen J. Turner, Elvia Olivas, Astrid Gutierrez, Gabriela Diaz, and Peter C. Doherty

Immunomodulatory Mediators from Pollen Enhance the Migratory Capacity of Dendritic Cells and License Them for Th2 Attraction
Valentina Mariani, Stefanie Gilles, Thilo Jakob, Martina Thiel, Martin J. Mueller, Johannes Ring, Heidrun Behrendt, and Claudia Traidl-Hoffmann

Krüppel-Like Factor 2 Controls T Cells Trafficking by Activating L-Selectin (CD62L) and Sphingosine-1-Phosphate Receptor 1 Transcription
Ailin Bai, Hui Hu, Mandy Yeung, and Jianzhu Chen

IL-21 Promotes Differentiation of Naive CD8 T Cells to a Unique Effector Phenotype
Kerry A. Casey and Matthew P. Mescher

CD8+ T Cell-Mediated Suppression of Autoimmunity in a Murine Lupus Model of Peptide-Induced Immune Tolerance Depends on Foxp3 Expression
Ram Pyare Singh, Antonio La Cava, Matida Wong, Fanny Ebling, and Bevra H. Hahn

Single-Stranded RNA Derived from HIV-1 Serves as a Potent Activator of NK Cells
Galit Alter, Todd J. Suscovich, Nickolas Teigen, Angela Meier, Hendrik Streeck, Christian Brander, and Marcus Altfeld

A Kinetic and Dynamic Analysis of Foxp3 Induced in T Cells by TGF-β
Ramesh K. Selvaraj and Terrence L. Geiger
Down-Regulation of E-Cadherin in Human Bronchial Epithelial Cells Leads to Epidermal Growth Factor Receptor-Dependent Th2 Cell-Promoting Activity
Irene H. Heijink, P. Marcel Kies, Henk F. Kauffman, Dirkje S. Postma, Antoon J. M. van Oosterhout, and Edo Vellenga

Acute Alcohol Exposure Exerts Anti-Inflammatory Effects by Inhibiting IkB Kinase Activity and p65 Phosphorylation in Human Monocytes
Pranoti Mandrekar, Valentina Jeliazkova, Donna Catalano, and Gyongyi Szabo

OX40-Mediated Differentiation to Effector Function Requires IL-2 Receptor Signaling but Not CD28, CD40, IL-12Rβ2, or T-bet
Coryn A. Williams, Susan E. Murray, Andrew D. Weinberg, and David C. Parker

Tumor-Reactive CD4+ T Cell Responses to the Melanoma-Associated Chondroitin Sulphate Proteoglycan in Melanoma Patients and Healthy Individuals in the Absence of Autoimmunity
Cornelia Erfurt, Zhaojun Sun, Ina Haendle, Beatrice Schuler-Thurner, Carlo Heirman, Kris Thielemans, Pierre van der Bruggen, Gerold Schuler, and Erwin S. Schultz

The Loss of Telomerase Activity in Highly Differentiated CD8+ CD28− CD27− T Cells Is Associated with Decreased Akt (Ser473) Phosphorylation
Fiona J. Plunkett, Ornella Franzese, Helene M. Finney, Jean M. Fletcher, Lavina L. Belaramani, Mike Salmon, Inderjeet Dokal, David Webster, Alastair D. G. Lawton, and Arne N. Akbar

CD4+ T Cells from Simian Immunodeficiency Virus Disease-Resistant Sooty Mangabeys Produce More IL-2 Than Cells from Disease-Susceptible Species: Involvement of p300 and CREB at the Proximal IL-2 Promoter in IL-2 Up-Regulation
Pavel Bostik, Erika S. Noble, Susan T. Stephenson, Francois Villinger, and Aftab A. Ansari

Phenotypic and Functional Effects of Heat Shock Protein 90 Inhibition on Dendritic Cell
Jooeun Bae, Constantine Mitsiades, Yu-Tzu Tai, Robert Bertheau, Masood Shammas, Ramesh Babu Batchu, Cheng Li, Lawrence Catley, Rao Prabhala, Kenneth C. Anderson, and Nikhil C. Munshi

Transcriptional Targeting of B Cells for Induction of Peripheral CD8 T Cell Tolerance
Melanie Werner-Klein, Christiane Dresch, Peggy Marconi, and Thomas Brocker

Requirements for T Lymphocyte Migration in Explanted Lymph Nodes

Availability of a Diversely Avid CD8+ T Cell Repertoire Specific for the Subdominant HLA-A2-Restricted HIV-1 Gag p24_{19-27} Epitope

Negative Regulation of TCR Signaling by NF-κB2/p100
Diana Legarda-Addison and Adrian T. Ting

TLR Agonists Selectively Promote Terminal Plasma Cell Differentiation of B Cell Subsets Specialized in Thymus-Independent Responses
Laurent Genestier, Morgan Taillardès, Paul Montieere, Hanane Gheiti, Chantal Bella, and Thierry Defrance

Small Rho GTPases Mediate Tumor-Induced Inhibition of Endocytic Activity of Dendritic Cells
Irina L. Tourkova, Galina V. Shurin, Sheng Wei, and Michael R. Shurin

Exposure of Myeloid Dendritic Cells to Exogenous or Endogenous IL-10 during Maturation Determines Their Longevity
W. L. William Chang, Nicole Baumgarth, Meghan K. Eberhards, C. Y. Daniel Lee, Colin A. Baron, Jeff P. Gregg, and Peter A. Barry

Immunomodulatory Effects of Viral TLR Ligands on Experimental Asthma Depend on the Additive Effects of IL-12 and IL-10
Serdar Sel, Michael Wegmann, Serpar Sel, Stefan Bauer, Holger Garn, Gottfried Alber, and Harald Renz
Protein Kinase Cα Regulates Antigen Receptor-Induced Lytic Granule Polarization in Mouse CD8+ CTL

Expression of the Voltage-Gated Sodium Channel NaV1.5 in the Macrophage Late Endosome Regulates Endosomal Acidification

Identification and Characterization of Novel Bone Marrow Myeloid DEC205+Gr-1+ Cell Subsets That Differentially Express Chemokine and TLRs

IgG Opsonization of HIV Impedes Provirus Formation in and Infection of Dendritic Cells and Subsequent Long-Term Transfer to T Cells
Doris Wilflingseder, Zoltan Banki, Eduardo Garcia, Monika Pruenster, Gerald Pfister, Brigitte Muellauer, Danjan S. Nikolic, Christoph Gassner, Christoph G. Ammann, Manfred P. Dierich, Vincent Piguet, and Heribert Stoiber

Low-Dose Peptide Tolerance Therapy of Lupus Generates Plasmacytoid Dendritic Cells That Cause Expansion of Autoantigen-Specific Regulatory T Cells and Contraction of Inflammatory Th17 Cells
Hee-Kap Kang, Michael Liu, and Syamal K. Datta

Follicular Dendritic Cell Secreted Protein (FDC-SP) Regulates Germinal Center and Antibody Responses
Monther Al-Alwan, Qinjiang Du, Sen Hou, Baber Nashed, Yijun Fan, Xi Yang, and Aaron J. Marshall

Novel Suppressive Function of Transitional 2 B Cells in Experimental Arthritis
Jamie G. Evans, Karina A. Chavez-Rueda, Ayad Eddassoudi, Almut Meyer-Bahlburg, David J. Rawlings, Michael R. Ehrenstein, and Claudia Mauri

Coexpression of IL-5 and Eotaxin-2 in Mice Creates an Eosinophil-Dependent Model of Respiratory Inflammation with Characteristics of Severe Asthma

A Quantitative Analysis of the Variables Affecting the Repertoire of T Cell Specificities Recognized after Vaccinia Virus Infection
Erika Assarsson, John Sidney, Carla Oseroff, Valerie Pasquetto, Huynh-Hoa Bui, Nicole Frahm, Christian Brandner, Bjoern Peters, Howard Grey, and Alessandro Sette

C5a-Blockade Improves Burn-Induced Cardiac Dysfunction
Laszlo M. Hoesel, Andreas D. Niederbichler, Julia Schaefler, Kyros R. Ipatktchi, Hongwei Gao, Daniel Rittirsch, Matthew J. Pianko, Peter M. Vogt, J. Vegta Sarm, Grace L. Su, Saman Arhabi, Margaret V. Westfall, Stewart C. Wang, Mark R. Hemmila, and Peter A. Ward

Molecular and Structural Immunology

RNA Interference Elucidates the Role of Focal Adhesion Kinase in HLA Class I-Mediated Focal Adhesion Complex Formation and Proliferation in Human Endothelial Cells
Yi-Ping Jin, Yael Korin, Xiaohai Zhang, Peter T. Jindra, Enrique Rozengurt, and Elaine F. Reed

Paratope Plasticity in Diverse Modes Facilitates Molecular Mimicry in Antibody Response
Lavanya Krishnan, Swinden Lomash, Beena Patricia Jeewan Raj, Kanwal J. Kaur, and Dinakar M. Salunke

A Transporter Associated with Antigen-Processing Independent Vacuolar Pathway for the MHC Class I-Mediated Presentation of Endogenous Transmembrane Proteins
Neeraj Tiwari, Natalio Garbi, Thomas Reinheckel, Gerhard Moldenhauer, Günter J. Hämerling, and Frank Momburg

Immunogenetics

Episodes of Natural Selection Shaped the Interactions of IgA-Fc with FcαRI and Bacterial Decoy Proteins
Laurent Ahir-Rached, Kristel Dorighi, Paul J. Norman, Makoto Yawata, and Peter Parham
Early Diversification of the TNF Superfamily in Teleosts: Genomic Characterization and Expression Analysis
Gavin W. Glenney and Gregory D. Wiens

HOST DEFENSE

IL-10 Regulates Movement of Intestinally Derived CD4+ T Cells to the Liver
Susan K. Bliss, Stuart P. Bliss, Daniel P. Beiting, Ana Alcaraz, and Judith A. Appleton

Dendritic Cells Derived from Murine Colonic Mucosa Have Unique Functional and Phenotypic Characteristics
Shunsuke Takenaka, Ekaterina Safroneeva, Zhou Xing, and Jack Gauldie

Lung Dendritic Cells Rapidly Mediate Anthrax Spore Entry through the Pulmonary Route
Aurélie Cleret, Anne Quesnel-Hellmann, Alexandra Vallon-Eberhard, Bernard Verrier, Steffen Jung, Dominique Vidal, Jacques Mathieu, and Jean-Nicolas Tournier

Depletion of CD8+ Cells in Sooty Mangabey Monkeys Naturally Infected with Simian Immunodeficiency Virus Reveals Limited Role for Immune Control of Virus Replication in a Natural Host Species
Ashley P. Barry, Guido Silvestri, Jeffrey T. Safrit, Beth Sumpter, Natalia Kozyr, Harold M. McClure, Silvioja I. Staprans, and Mark B. Feinberg

Macrophage-Inflammatory Protein-3α Mediates Epidermal Growth Factor Receptor Transactivation and ERK1/2 MAPK Signaling in Caco-2 Colonic Epithelial Cells via Metalloproteinase-Dependent Release of Amphiregulin
Sarah Keates, Xinbing Han, Ciaran P. Kelly, and Andrew C. Keates

The Nod-Like Receptor Family Member Naip5/Birc1e Restricts Legionella pneumophila Growth Independently of Caspase-1 Activation
Mohamed Lamkanfi, Anam Amer, Thirumala-Devi Kanneganti, Raúl Muñoz-Planillo, Grace Chen, Peter Vandenabeele, Anne Fortier, Philippe Gros, and Gabriel Núñez

IL-10 Underlies Distinct Susceptibility of BALB/c and C57BL/6 Mice to Mycobacterium avium Infection and Influences Efficacy of Antibiotic Therapy
Susana Roque, Claudia Nobrega, Rui Appelberg, and Margarida Correia-Neves

Leukotriene B4 Triggers the In Vitro and In Vivo Release of Potent Antimicrobial Agents
Louis Flamand, Michel J. Tremblay, and Pierre Borgeat

Human Neutrophil Defensins Increase Neutrophil Uptake of Influenza A Virus and Bacteria and Modify Virus-Induced Respiratory Burst Responses
Tesfaldet Tecle, Mitchell R. White, Don Gantz, Erika C. Crouch, and Kevan L. Hartshorn

INFLAMMATION

Expression and Regulation of the Metalloproteinase ADAM-8 during Human Neutrophil Pathophysiological Activation and Its Catalytic Activity on L-Selectin Shedding
Maria Gómez-Gavirio, María Domínguez-Luis, Javier Canchado, Jero Calafats, Hans Jansen, Enrique Lara-Peazzi, Anne Fourie, Antonio Tugores, Agustín Valenzuela-Fernández, Faustino Mollinedo, Francisco Sánchez-Madrid, and Federico Díaz-González

Regulated Shedding of Transmembrane Chemokines by the Disintegrin and Metalloproteinase 10 Facilitates Detachment of Adherent Leukocytes

Long-Term Commitment to Inflammation-Seeking Homing in CD4+ Effector Cells
Silke Jennrich, Boris A. Ratsch, Alf Hamann, and Uta Syrbe
Histamine 4 Receptor Activation Induces Recruitment of FoxP3⁺ T Cells and Inhibits Allergic Asthma in a Murine Model
Ross K. Morgan, Brian McAllister, Lillian Crou, Daniel S. Green, Hardy Kornfeld, David M. Center, and William W. Cruikshank

CD8⁺ T Cells Are Required for Inflammation and Destruction in Cigarette Smoke-Induced Emphysema in Mice
Toshitaka Maeno, A. McGarry Houghton, Pablo A. Quintero, Sandra Grunelli, Caroline A. Owen, and Steven D. Shapiro

Monocyte Chemoattractant Protein-1 Production by Intestinal Myofibroblasts in Response to Staphylococcal Enterotoxins A: Relevance to Staphylococcal Enterotoxigenic Disease

STAT1 Activation Causes Translocation of Bax to the Endoplasmic Reticulum during the Resolution of Airway Mucous Cell Hyperplasia by IFN-γ
Barbara A. Stout, Karla Melendez, JeanClare Seagrave, Michael J. Holtzman, Bridget Wilson, Jialing Xiang, and Yohannes Tefaiga

TNF-α Inhibits Macrophage Clearance of Apoptotic Cells via Cytosolic Phospholipase A2 and Oxidant-Dependent Mechanisms
Kathleen McPhillips, William J. Jamieson, Mounita Ghosh, Aideen Byrne, Shyra Gardai, Linda Remigio, Donna L. Bratton, Jihee L. Kang, and Peter Henson

Identification of Ectonucleotidases CD39 and CD73 in Innate Protection during Acute Lung Injury
Tobias Eckle, Lars Füellbier, Manfred Wehrmann, Joseph Khoury, Michel Mittelbronner, Juan Ibla, Peter Rosenberger, and Holger K. Eltzschig

The Proinflammatory Effect of Prostaglandin E₂ in Experimental Inflammatory Bowel Disease Is Mediated through the IL-23→IL-17 Axis
Amir F. Sheibanie, Jui-Hung Yen, Tanziyla Khayrullina, Frances Emig, Ming Zhang, Ronald Tuma, and Doina Ganea

IFN-γ-Induced Chemokines Synergize with Pertussis Toxin to Promote T Cell Entry to the Central Nervous System
Jason M. Millward, Maria Caruso, Iain L. Campbell, Jack Gauldie, and Trevor Owens

Characterization of Reciprocal Lmb1−4 Interval MRL-Fas<sup>pr</sup> and C57BL/6-Fas<sup>pr</sup> Congenic Mice Reveals Significant Effects from Lmb3
Marie-Laure Santiago-Raber, M. Katarina Haraldson, Argyrios N. Theofilopoulos, and Dwight H. Kono