



Alan Baxter

Address: Comparative Genomics Centre
James Cook University

Country: Australia

Academic Qualifications

Degree	Year	Institution
Ph.D.	1992	University of Melbourne
M.B., B.S.	1986	University of Melbourne

Administering Institution

James Cook University, Townsville, QLD 4811

Actual Institution and Department

Department of Molecular & Cell Biology, College of Public Health, Medical & Veterinary, Sciences, Place, Building 142, James Cook University, Townsville QLD 4811

Current Appointment

Professor of Molecular Cell Biology, James Cook University.

Appointment type: Continuing

Previous appointments within JCU:

Head of Molecular & Cell Biology. 2014-2018

Director, Comparative Genomics Centre 2003-2017

Honours

Honorary Professor by the Presidium of the Scientific Board of Pirogov Russian National Research Medical University (2/12/2013-31/12/2016).

President Australasian Society for Immunology 2007 -2008

Vice-president (President elect) 2005 -2006

Ex-Officio 2008- 2009

Representative to the Federation of Immunological Societies Asia 2012-2015

Member of Council Federation of Immunological Societies Asia 2012-2015

Member of Council, International Union of Immunological Societies 2013-2016

Member, MS Research Australia Research Management Council 2010 -

Member, Board of the Australian Institute of Tropical Medicine 2006 - 2018

Member, Senior Editorial Board, American J Clinical and Experimental Immunology, 2012-

Member, Editorial Board, Autoimmunity, 1997 – 2002

Associate Editor, Journal of Immunology, 2004 - 2008

Associate Editor, The Review of Diabetic Studies, 2004 -

Member, Professional Advisory Panel, Juvenile Diabetes Research Foundation Australia 1999-2003

Member, Professional Review Panel, Juvenile Diabetes Research Foundation 2004 - 2007

Previous Appointments

1991-1992: Postdoctoral Research Fellow

Supervised by Dr Denise Faustman, Director, Immunobiology Laboratories.
 Massachusetts General Hospital, Harvard University, Boston, Massachusetts,
 USA.

1992-1994: NHMRC CJ Martin Training Fellow

Supervised by Dr Anne Cooke
 Department of Pathology, Cambridge University, UK.

1994-1995: CJ Martin Postdoctoral Research Officer

Supervised by Dr R Scollay and Professor A Basten
 Centenary Institute of Cancer Medicine and Cell Biology,
 Sydney, Australia.

1996-2003: Senior Research Fellow & Research Group Head

Centenary Institute of Cancer Medicine and Cell Biology,
 Sydney, Australia.

Areas of Research

Broad Research Area:

Basic Science

Fields of Research:

Immunogenetics,

Autoimmunity

Socio-economic Objectives:

Immune System and Allergy

Nervous system and disorders

Endocrine organs and diseases (incl. diabetes)

Inherited diseases (incl. gene therapy)

Digestive system and disorders

Key words:

Multiple Sclerosis

Type 1 diabetes

Autoimmune (type A) Gastritis

Systemic lupus erythematosus

Aetiology

SECTION B – RESEARCH SUPPORT

Current Support

Code	Title	Chief Investigator	Period of Support	Funds for each year
MSRA 15-025	An immune transcriptional regulatory network approach to multiple sclerosis	Baxter	2016	\$80,000
		Butzkueven	2017	\$80,000
			2018	\$80,000

Code	Title	Chief Investigator	Period of Support	Funds for each year
QGHA	Genomics of lung cancer in Queensland	Brown O'Byrne Fong Yang Fox Desai Elston Sabesan Baxter Leo Graves Callander	2017 2018	\$450,000 \$150,000
Townsville Hospital & Health Service	Submission to New Technology Appraisal Committee: Whole-exome sequencing	Baxter Elston Jordan Cooke Field Callander Sabesan Joshi Otty Varma Ryan Porter Wilhelm Brown Graves White	2018 2019	\$40,000 \$40,000

SECTION C – RECENT PUBLICATIONS

Refereed journal articles

M53 Field J, Fox A, Ehrich M, Jordan MA, Baxter AG, Spelman T, Gresle T, Butzkueven H, Kilpatrick TJ, Rubio JP. (2017) Interleukin 2 receptor alpha proximal promoter hypomethylation is associated with Multiple Sclerosis. *Genes Immun.* 18: 59-66.

M54 Mariño E, Richards JL, McLeod KH, Stanley D, Kranich J, Yap YA, Goh HY, Oliveira AC, Moore RJ, Nefzger C, Rosello F, Macia L, Thorburn A, Roberts R, Lockett TJ, Baxter AG, Polo JM, Clarke JM, Topping DL, Harrison L and Mackay CR. (2017) Gut microbial short chain fatty acids promote islet tolerance and protect against diabetes in the NOD mouse. *Nat Immunol.* 18: 552-562.

M55 Modhiran N, Watterson D, Blumenthal A, Baxter AG, Young PR, Stacey KJ. (2017) Dengue virus NS1 protein activates immune cells via TLR4 but not TLR2 or 6. *Immunol Cell Biol.* 95: 491-495.

M56 Schultz T, Wiesmüller K-H, Lucas M, Dobos K, Baxter AG, Blumenthal A. (2017) The N-terminal peptide moiety of the Mycobacterium tuberculosis 19 kDa lipoprotein harbors RP105-agonistic properties. *J Leukocyte Biol.* 103:311-319.

M57 Zeng B, Middelberg AP, Gemiarto A, MacDonald K, Baxter AG, Talekar M, Moi D, Tullett KM, Caminschi I, Lahoud MH, Mazzieri R, Dolcetti R, Thomas R. (2018) Self-adjuvanting nanoemulsion targeting dendritic cell receptor Clec9A enables antigen-specific immunotherapy. *J Clin Invest.* doi: 10.1172/JCI96791. [Epub ahead of print]

M58 Kling JC, Jordan MA, Pitt LA, Meiners J, Thanh-Tran T, Tran LS, Nguyen TTK, Mittal D, Villani R, Steptoe RJ, Khosrotehrani K, Berzins SP, Baxter AG, Godfrey DI, Blumenthal A. (2018) Temporal Regulation of Natural Killer T Cell Interferon Gamma Responses by β -Catenin-Dependent and -Independent Wnt Signaling. *Front Immunol.* 9:483.

Chapters

C6 Jordan MA, Baxter AG. (2018) Genetic Predisposition – Humans, in Mackay IR, Rose N (ed), *The Autoimmune Diseases, 6th Edition*. pp ***. Elsevier. Boston. ISBN: **. (*In press*)