

CURRICULUM VITAE
CHRISTIAN P. NIXON, MD, PhD

Center for International Health Research
Rhode Island Hospital
Brown University School of Medicine
55 Claverick Street, Rm 101I
Providence, RI 02903
Phones: 401-444-8180
Fax: 401-444-7854
Email: cnixon@lifespan.org

EDUCATION

- Undergraduate **University of California at Santa Barbara**, Santa Barbara, CA
Degree: Bachelor of Science – Microbiology
Emphasis: Genetic Engineering
Year Degree Conferred: 1995 (1990-1995)
- Medical School **Warren Alpert Medical School of Brown University**, Providence, RI
Degree: Medical Doctorate
Year Degree Conferred: 2008 (1999-2001, 2005-2008)
Honors: Al Senft Prize for Excellence in International Health
- Graduate School **Brown University**, Providence, RI
Degree: Doctor of Philosophy – Biology
Department: Pathobiology
Year Degree Conferred: 2005 (2001-2005)
Thesis Project: Identification of novel vaccine candidate antigen for falciparum malaria. Utilized the paradigm of naturally acquired immunity to Plasmodium falciparum to identify novel malaria vaccine candidate antigens. Screened a P. falciparum cDNA expression library with pooled resistant and susceptible adult sera chosen from a longitudinal treatment-reinfection observational study conducted previously in western Kenya. Analyzed the associations between isotype specific antibody levels to identified antigens and indices of reinfection with multivariate models.

POSTGRADUATE TRAINING

- Residency **University of California at San Francisco**, San Francisco, CA

Resident: Department of Clinical Pathology
Dates of Training: 2008-2011
Chief Resident: 2009-2010

Yale Medical School, New Haven, CT
Resident: Department of Anatomic Pathology
Dates of Training: 2012-2014

Post-Doctorate Fellow

Eijkman Institute of Molecular Biology, Jakarta, Indonesia
Dates of Training: 2010-2011
Served as parasitology field team leader of Gates Foundation funded treatment-reinfection study designed to measure the efficacy of spatial repellents in meso-endemic West Sumba, East Nusa Tenggara, Indonesia. Performed socio-demographic, geo-spatial and cross-sectional parasitological surveys. Analyzed the associations between inherited blood disorders, fever, anemia and age on likelihood of parasitemia and parasite density in low prevalence setting, and performed geo-spatial analysis of impact of distance to *Anopheles sundaicus* breeding sites on risk of parasitemia.

Fellowship

Harvard Medical School, Boston, MA
Fellow: Joint Program of Transfusion Medicine
Dates of Training: 2011-2012

POSTGRADUATE HONORS AND AWARDS

Laurence J. Marton Excellence in Research Award, UCSF, 2009
Paul E. Strandjord Young Investigator Award, ACLPS, 2009
1st Place: Clinical Science Research Award, 22nd Annual Lifespan
Hospitals Research Symposium, 2014
1st Place: Translational Science Research Award, 23rd Annual Lifespan
Hospitals Research Symposium, 2015

MILITARY SERVICE

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PROFESSIONAL LICENSES AND BOARD CERTIFICATION

State of Rhode Island – Full Medical License
Date Awarded: May, 2014

AP/CP Board Certification:
Date Awarded: August 2014

ACADEMIC APPOINTMENTS

Assistant Professor

Institution: Warren Alpert Medical School of Brown University
Start Date: July 1st, 2014

HOSPITAL APPOINTMENTS

Assistant Director, Transfusion Medicine and Coagulation Service
Institution: Rhode Island & Miriam Hospital
Start Date: July 1st, 2014

OTHER APPOINTMENTS

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Baxalta/Shire North American Acquired Hemophilia Expert Panelist
Location: Orlando, FL
Date: 2016

SCIENTIFIC REVIEW APPOINTMENTS

Peer Reviewer for following journals:

Human Vaccines and Immunotherapeutics (n=1)
Infectious Diseases of Poverty (n=1)

Peer Reviewer for following funding agencies

Sir Henry Wellcome Postdoctoral Fellowship (n=1)

HOSPITAL COMMITTEES

Clinical Pathology Representative, Resident and Fellows Council, UCSF
Term: 2009-2010
Clinical Chemistry Faculty Search Committee, 2015

UNIVERSITY COMMITTEES

MD/PhD Representative, Medical Student Senate, Brown University
Term: 2006-2007

MEMBERSHIP IN SOCIETIES

Academy of Clinical Physicians and Scientists
Sigma Xi Scientific Research Society
American Society of Tropical Medicine and Hygiene
American Association of Blood Banks

PUBLICATIONS LIST

ORIGINAL PUBLICATIONS IN PEER-REVIEWED JOURNALS

1. Wyatt R, Desjardin E, Olshevsky U, **Nixon C**, Binley J, Olshevsky V, Sodroski J. Analysis of the interaction of the human immunodeficiency virus type 1 gp120 envelope glycoprotein with the gp41 transmembrane glycoprotein. *J Virol* 1997;71(12):9722-31. PMID: 9371638
2. Montano MA, **Nixon CP**, Essex M. Dysregulation through the NF-kappaB enhancer and TATA box of the human immunodeficiency virus type 1 subtype E promoter. *J Virol* 1998;72(10):8446-52. PMID: 9733900
3. Montano MA, **Nixon CP**, Ndung'u T, Bussmann H, Novitsky VA, Dickman D, Essex M. Elevated tumor necrosis factor-alpha activation of human immunodeficiency virus type 1 subtype C in Southern Africa is associated with an NF-kappaB enhancer gain-of function. *J Infect Dis* 2000 181(1):76-81. PMID: 10608753
4. Leenstra T, ter Kuile FO, Kariuki SK, **Nixon CP**, Oloo AJ, Kager PA, and Kurtis JD. Dehydroepiandrosterone sulfate levels associated with decreased malaria parasite density and increased hemoglobin concentration in pubertal girls from western Kenya. *J Infect Dis* 2003, 188(2): 297-304. PMID: 12854087
5. Solomon JS, **Nixon CP**, McGarvey ST, Acosta LP, Manalo D, and Kurtis JD. Expression, purification, and human antibody response to a 67 kDa vaccine candidate for schistosomiasis japonica. *Prot Expr Purif* 2004, 36(2): 226-31. PMID: 15249044
6. **Nixon CP**, Friedman J, Treanor K, Knopf P, Duffy PE, and Kurtis JD. Antibodies to rhoptry-associated membrane antigen predict resistance to Plasmodium falciparum. *J Infect Dis* 2005, 192(5): 861-69. PMID: 16088836
7. **Nixon CP**, Friedman J, Treanor K, Knopf PM, Duffy PE, and Kurtis JD. Protective human immunity as a vaccine discovery tool for human falciparum malaria. *Transfusion* 2005, 36(2): 226-31. PMID: 16086793
8. Raj DK, **Nixon CP**, Nixon CE, Dvorin JD, DiPetrillo CG, Pond-tor S, Wu H, Jolly G, Pischel L, Lu A, Michelow I, Cheng L, Conteh S, McDonald EA, Absalon S, Holte SE, Friedman JF, Fried M, Duffy PE, Kurtis JD. Antibodies to PfSEA-1 block parasite egress from RBCs and protect against malaria infection. *Science* 2014, 344(6186): 871-877. PMID: 24855263
9. Wimberly H, Brown JR, Schalper K, Haack H, Silver MR, **Nixon C**, Bossuyt V, Pusztai L, Lannin DR, Rimm DL. PD-L1 expression correlates with tumor-infiltrating lymphocytes and response to neoadjuvant chemotherapy in breast cancer. *Cancer Immunol Res* 2015;3:326-32. PMID: 25527356
10. Brown JR, Wimberly H, Lannin DR, **Nixon C**, Rimm DL, Bossuyt V. Multiplexed quantitative analysis of CD3, CD8, and CD20 predicts response to neoadjuvant chemotherapy in breast cancer. *Clin Cancer Res* 2014;20(23):5995-6005. PMID: 25255793

11. **Nixon CP**, Nixon CE, Arsyad DS, Chand K, Bogh C, Wahid I, Asih ,P Marantina S, Han G, Friedman J, Syafruddin D, Baird JK. Distance to Anopheles sundaicus larval habitats dominant among risk factors for parasitemia in meso-endemic Southwest Sumba, Indonesia. *Pathog Glob Health* 2014;108(8):369-80. PMID: 25495283

12. Syafruddin D, Bangs MJ, Sidik D, Elyazar I, Asih PBS, Krisin, Nurlela S, Hendarto J, Wahid I, Ishak H, **Nixon CP**, Bøgh C, Grieco JP, Achee N, Baird JK. Impact of the spatial repellent on malaria incidence in two villages in Sumba, Indonesia. *Am J Trop Med Hyg* 2014;91(6):1079-87. PMID: 25311699

13. **Nixon CP**, Sweeney JD. Discriminating different causes of transfusion associated pulmonary edema. *Transfusion* 2015; 55(8):1825-8. PMID: 26264120

14. **Nixon CP**, Cheves TA, Sweeney JD. Sulfamethoxazole induced thrombocytopenia masquerading as post transfusion purpura: a case report. *Transfusion* 2015;doi:10.1111/trf.13197.[epub ahead of print]. PMID: 26098194

15. Fine AB, Sweeney JD, **Nixon CP**, Knoll BM. Transfusion-transmitted anaplasmosis from a leukoreduced platelet pool. *Transfusion* 2016;56(3): 699-704. PMID: 26645855.

16. **Nixon CP**. Plasmodium falciparum gametocyte transit through the cutaneous microvasculature: A new target for malaria transmission blocking vaccines? *Hum Vaccin Immunother* 2016;16:1-7 [Epub ahead of print]. PMID: 27184760.

17. **Nixon CP**, Sweeney JD. Autoimmune Cytopenias; Diagnosis & Management. *RI Med J* 2016 (October edition).

OTHER PEER-REVIEWED PUBLICATIONS -

BOOKS AND BOOK CHAPTERS -

OTHER NON-PEER REVIEWED PUBLICATIONS -

CORPORATE AUTHORSHIP OR MULTICENTER TRIALS -

PUBLICATIONS SUBMITTED OR IN PREPARATION

Nixon CP, Sweeney JD. Molecular Modeling of Linear and Conformational Epitopes of RhD variant DVII. (manuscript in preparation).

Nixon CP, Sweeney JD. Acquired Factor XIII Inhibitor Associated with Mantle Cell Lymphoma. (manuscript under revision, *Transfusion*).

ABSTRACTS

1. Identification of novel malaria vaccine candidates for *P. falciparum* by differential cDNA library screening using resistant and susceptible human sera (ASTMH, Brown University Pathobiology Program retreat 2003)
2. Antibodies to Rhoptry-Associated membrane antigen predict resistance to *Plasmodium falciparum* (ASTMH 2004)
3. Expression and Purification of novel malaria vaccine candidate antigens (National MD/PhD Conference 2004, Keystone, CO)
4. Sweeney JD, Nixon CP. Platelet Refractoriness – cause and management. *Vox Sang* 2016 (suppl). 111:7.
5. Sweeney JD, Nixon CP. Comparison of Whole Blood and Apheresis Platelets. *Vox Sang* 2016 (Suppl) 111:10.

SCHOLARLY WORK PUBLISHED IN OTHER MEDIA -

INVITED PRESENTATIONS

1. Invited Speaker at the Annual Meeting of American Association of Blood Banks, Orlando, FL, 2002. (national)
2. Invited Speaker at the 51st Annual Meeting of the American Society of Tropical Medicine and Hygiene (ASTMH), Denver, CO, 2002. (national)
3. Invited Speaker at the Rhode Island Department of Health, 2007. (regional)
4. Invited Speaker at the 46th Annual Meeting of the Academy of Clinical Physicians and Scientists, St. Louis, MO, 2011. (national)
5. Invited Speaker at the 60th Annual Meeting of the American Society of Tropical Medicine and Hygiene, Philadelphia, PA, 2011. (national)
6. Invited Speaker at the Northeast Branch of the American Society of Microbiology, 2015. (regional)
7. Invited Speaker at the 68th Annual Clinical Laboratory Science Convention, ASCLS-CNE, 2016. (regional)

GRANTS

1. KL2 Mentored Career Development Award, UCSF
Term: 2008-2010
Award: \$2,000
Principal Investigator
2. Research Microgrant, Brigham and Women's Hospital
Term: 2011-2012
Award: \$2,000
Principal Investigator
3. Centers of Biomedical Research Excellence Grant, National Institute of Health
Term: 2014-2017
Award: \$276, 918/yr
Co-Investigator

4. Rhode Island Foundation Medical Research Grant

Term: 2015-2016

Award: \$15,000

Principal Investigator

UNIVERSITY TEACHING ROLES

Instructor, Immunology Intersession, Brown University, 2004

Introduced first year medical students to the basic principles of immunology. Designed and taught 12 immunology lectures covering topics from lymph node architecture to the induction of an adaptive immune response. Created and administered a final exam. Class size approximately 80 students.

Teaching Assistant, Medical Microbiology, Brown University, 2004

Assisted first year medical students in understanding basic concepts in immunology, virology, bacteriology and parasitology. Helped students prepare group presentations on research topics pertaining to infectious disease encountered in clinical settings. Class size approximately 80 students.

Visiting Lecturer, Mechanisms of Disease, Brown University, 2015 & 2016

HOSPITAL TEACHING ROLES

Resident and Hematology-Oncology Fellow Instructor