

**UNIVERSITY OF MIAMI  
CURRICULUM VITAE**

**JOHN CARLTON BEIER, Sc.D.**

**1. Date:** December 26, 2020

**I. PERSONAL**

**2. Name:** John C. Beier  
**3. Office Phone:** 305-243-2977  
**4. Current Academic Rank:** Professor  
**5. Primary Department:** Public Health Sciences  
**6. Secondary or Joint Appointments:** N/A

**II. HIGHER EDUCATION**

**7. Institutional:**

University of Notre Dame, Notre Dame, IN	Post Doc, Vector Biology	<b>1980-82</b>
Johns Hopkins University, Baltimore, MD	Sc.D. in Pathobiology	<b>1976-80</b>
Hiram College, Hiram, Ohio	B.A. in Biology	<b>1972-76</b>

**8. Non-Institutional:** None

**9. Certification, licensure:** None

**III. EXPERIENCE**

**10. Academic:**

**Professor (with tenure).** Department of Public Health Sciences, University of Miami Miller School of Medicine. **2003-Present**

**Faculty Affiliated Position.** Leonard and Jayne Abess Center for Ecosystem Science and Policy, University of Miami. **2006-2014**

**Professor (with tenure).** Department of Tropical Medicine School of Public Health and Tropical Medicine, Tulane University. **1999-2002**

**Associate Professor (with tenure).** Department of Tropical Medicine, School of Public Health and Tropical Medicine, Tulane University. **1994-1999**

**Professor.** Payson Center for International Development and Technology Transfer, Tulane University. **2001-2002**

**Associate Professor.** Department of Immunology and Infectious Diseases Department of Molecular Microbiology and Immunology (1994),

School of Hygiene and Public Health, The Johns Hopkins University.

**Assistant Professor.** Department of Immunology and Infectious Diseases  
School of Hygiene and Public Health, The Johns Hopkins University. **1988-1991**

**11. Hospital appointments:** None

**12. Non-Academic:**

NIH Expert Appointment in Medical Entomology as Resident Consultant  
to the Ain Shams Research and Training Center for Vectors of Diseases,  
Ain Shams University, Cairo, Egypt. **1982-1985**

NIH Expert Appointment in Medical Entomology at the Laboratory of  
Parasitic Diseases, Malaria Division, National Institutes of Health,  
Bethesda, Maryland. **1982**

**13. Military:**

**Parasitologist.** U.S. Army (rank: Captain, Medical Service Corps),  
U.S. Army Medical Research Unit, Nairobi, Kenya **1986-1988**

**Parasitologist.** U.S. Army, Department of Immunology,  
Malaria Vaccine Program, Walter Reed Army Institute of Research,  
Washington, D.C. **1985-1986**

#### **IV. PUBLICATIONS**

##### **14. Books and monographs published:**

1. **Beier JC**, Wilke ABB, Benelli G. **2018**. Chapter 16: *Newer Approaches for Malaria Vector Control and Challenges of Outdoor Transmission*. In: *Towards Malaria Elimination - A Leap Forward*. <http://dx.doi.org/10.5772/intechopen.75513>
2. Moise IK, Zulu CL, Fuller DO and **Beier JC**. **2019**. Persistent Barriers to Implementing Efficacious Mosquito Control Activities in Continental United States: Insights from Vector Control Experts. In: *Current Topics in Neglected Tropical Diseases*. InTechOpen.
3. Qualls WA, Xue RD, **Beier JC**, and Debboun M. **2015**. Chapter 22: *Alterations of Blood-Feeding Behavior and Repellent Response of Pathogen-Infected Biting Flies*. In: *Handbook of Insect Repellents*, 2<sup>nd</sup> Edition. CRC Press.
4. Van Schayk IMCJ, Agwanda RO, Githure JI, **Beier JC**, Knols BGJ. **2003**. Chapter 17. El Nino causes dramatic outbreak of *Paederus* dermatitis in East Africa. In: *Climate Change for Africa: Science, Technology, Policy and Capacity Building*.
5. Spielman A, **Beier JC**, Kiszewski AE. **2002**. Ecological and community considerations in engineering arthropods to suppress vector-borne disease. Chapter 11, In: *Genetically Engineered Organisms: Assessing Environmental and Human Health Effects*. Eds. D.K. Letourneau and B.E. Burrows. CRC Press. Pages 315-329.
6. **Beier JC**. **2002**. Part I. Assessing risk of infection and severity of disease. Chapter 1. Vector Analysis and Entomological Inoculation Rates. In: *Malaria Methods and Protocols*. Editor: D. Doolan, *Methods in Molecular Medicine*, 3-11.
7. **Beier JC**. **2002**. Part III. Diagnosis and typing. Chapter 8. Vector Analysis. In: *Malaria Methods and Protocols*. Editor: D. Doolan, *Methods in Molecular Medicine*. 95-101.
8. **Beier JC**, Vanderberg JP. **1998**. II. Development in the mosquito. B. Sporogonic development. In: "Malaria: Parasite Biology, Pathogenesis, Protection". Editor: I.W. Sherman. ASM Press. 49-61.
9. Hoffman SL, Oster CN, Mason C, **Beier JC**, Sherwood JA, Ballou WR, Mugambi M., Chulay JD. **1988**. Identification of a Potentially Protective T Cell Epitope on the *Plasmodium falciparum* CS Protein. In: *Technological Advances in Vaccine Development*. Alan R. Liss, Inc., New York, 625-639.
10. Oster CN, Perkins PV, Gargan TP, **Beier JC**, Kaseje DCO, Whitmire RE, Mugambi M. **1987**. Transmission of Malaria in Western Kenya. In: *Proceedings of the Conference on Malaria in Africa: Practical Considerations on Malaria Vaccines in Clinical Trials*. Ed: AA Buck. American Institute of Biological Sciences, Washington, D.C., 227-231.
11. **Beier JC**, Craig GB, Jr. Gregarine Parasites of Mosquitoes. **1985**. In: *Integrated Control of Medically Important Arthropods - Vol. 2*. Eds: M Laird, JW Miles. Academic Press (London).

##### **15. Juried or refereed journal articles and exhibitions:**

- a. Wilke ABB, Carvajal A, Vasquez C, Petrie WD, **Beier JC**. **2020**. Urban farms in Miami-Dade county, Florida have favorable environments for vector mosquitoes. *PLoS One*. 15:e0230825.

- b. Benelli G, Wilke ABB, Bloomquist JR, Desneux N, **Beier JC. 2020.** Overexposing mosquitoes to insecticides under global warming: A public health concern? *Sci Total Environ.* Oct 17:143069.
- c. Abdul-Ghani R, Fouque F, Mahdy MAK, Zhong Q, Al-Eryani SMA, Alkwri A, **Beier JC. 2020.** Multisectoral Approach to Address Chikungunya Outbreaks Driven by Human Mobility: A Systematic Review and Meta-Analysis. 2020. *J Infect Dis.* 2020 Oct 29;222(Supplement\_8):S709-S716.
- d. Wilke ABB, Vasquez C, Carvajal A, Medina J, Chase C, Cardenas G, Mutebi JP, Petrie WD, **Beier JC. 2020.** Proliferation of *Aedes aegypti* in urban environments mediated by the availability of key aquatic habitats. *Sci Rep.* Jul 31;10(1):12925.
- e. Wilke ABB, Vasquez C, Carvajal A, Moreno M, Diaz Y, Belledent T, Gibson L, Petrie WD, Fuller DO, **Beier JC. 2020.** Cemeteries in Miami-Dade County, Florida are important areas to be targeted in mosquito management and control efforts. *PLoS One.* 15:e0230748.
- f. Traore MM, Junnila A, Traore SF, Doumbia S, Revay EE, Kravchenko VD, Schlein Y, Arheart KL, Gergely P, Xue RD, Hausmann A, Beck R, Prozorov A, Diarra RA, Kone AS, Majambere S, Bradley J, Vontas J, **Beier JC, Müller GC. 2020.** Large-scale field trial of attractive toxic sugar baits (ATSB) for the control of malaria vector mosquitoes in Mali, West Africa. *Malar J.* 19:72.
- g. Benelli G, Wilke ABB, **Beier JC. 2020.** *Aedes albopictus* (Asian Tiger Mosquito). *Trends Parasitol.* Feb 6. pii: S1471-4922(20)30011-8.
- h. Moise IK, Xue Rui-De, Zulu LC, **Beier JC. 2020.** A Survey of Program Capacity and Skills of Florida Mosquito Control Districts to Conduct Arbovirus Surveillance and Control. *J Am Mosq Control Assoc* 36: 99–106.
- i. Wilke ABB, Benelli G, **Beier JC. 2020.** Beyond frontiers: On invasive alien mosquito species in America and Europe. *PLoS Negl Trop Dis.* 14(1):e0007864.
- j. Wilke ABB, Chase C, Vasquez C, Carvajal A, Medina J, Petrie WD, **Beier JC. 2019.** Urbanization creates diverse aquatic habitats for immature mosquitoes in urban areas. *Sci Rep.* 9(1):15335.
- k. Wilke A, Carvajal A, Medina J, Anderson M, Nieves VJ, Ramirez M, Vasquez C, Petrie W, Cardenas G, **Beier JC. 2019.** Assessment of the effectiveness of BG-Sentinel traps baited with CO<sub>2</sub> and BG-Lure for the surveillance of vector mosquitoes in Miami-Dade County, Florida. *PloS One*, 14(2), e0212688.
- l. Multini LC, Marrelli MT, **Beier JC, Wilke ABB. 2019.** Increasing Complexity Threatens the Elimination of Extra-Amazonian Malaria in Brazil. *Trends in Parasitology*, 35(6), 383–387. doi:10.1016/j.pt.2019.03.009
- m. Wilke ABB, **Beier JC, Benelli G. 2019.** Complexity of the relationship between global warming and urbanization – an obscure future for predicting increases in vector-borne infectious diseases. *Current Opinion in Insect Science*, 35, 1–9. doi:10.1016/j.cois.2019.06.002
- n. Wilke ABB, Caban-Martinez AJ, Ajelli M, Vasquez C, Petrie W, **Beier JC. 2019.** Mosquito Adaptation to the Extreme Habitats of Urban Construction Sites. *Trends in Parasitology*, 35(8), 607–614. doi:10.1016/j.pt.2019.05.009

- o. Abdul-Ghani R, Mahdy MAK, Al-Eryani SMA, Fouque F, Lenhart AE, Alkwri A, Al-Mikhlafi AM, Thabet AAQ, **Beier JC. 2019.** Impact of population displacement and forced movements on the transmission and outbreaks of *Aedes*-borne viral diseases: Dengue as a model. *Acta Tropica*, 197, 105066. doi:10.1016/j.actatropica.2019.105066
- p. Wilke ABB, Vasquez C, Medina J, Carvajal A, Petrie W, **Beier JC. 2019.** Community Composition and Year-round Abundance of Vector Species of Mosquitoes make Miami- Dade County, Florida a Receptive Gateway for Arbovirus entry to the United States. *Scientific Reports*, 9(1). doi:10.1038/s41598-019-45337-2
- q. Sissoko F, Junnila A, Traore MM, Traore SF, Doumbia S, Dembele SM, Schlein Y, Traore AS, Gergely P, Xue RD, Arheart KL, Revay EE, Kravchenko VD, **Beier JC, Müller GC. 2019.** Frequent sugar feeding behavior by *Aedes aegypti* in Bamako, Mali makes them ideal candidates for control with attractive toxic sugar baits (ATSB). *PLoS ONE* 14(6): e0214170. doi:10.1101/574095
- r. Rund SSC, Moise IK, **Beier JC**, Martinez ME. 2019. Rescuing Troves of Hidden Ecological Data to Tackle Emerging Mosquito-Borne Diseases. *J Am Mosq Control Assoc.* 35: 75-83.
  - s. Traore MM, Junnila A, Revay EE, Kravchenko VD, Lahti A, Fiorenzano JM, Qualls WA, Kline DI, Schlein Y, **Beier JC**, Xue R, Muller GC. **2019.** Control of adult and larval *Aedes albopictus* with attractive toxic sugar baits (active ingredient: cinnamon-sesame oil) in northeastern Florida. *Journal of the Florida Mosquito Control Association*, 66: 20-25.
- t. Wilke A, Vasquez C, Petrie W, **Beier JC. 2019.** Tire shops in Miami-Dade County, Florida are important producers of vector mosquitoes. *PLoS One*, 14(5), e0217177.
- u. Chen J, **Beier JC**, Cantrell RS, Cosner C, Fuller DO, Guan Y, Zhang G, Ruan S. **2018.** Modeling the importation and local transmission of vector-borne diseases in Florida: The case of Zika outbreak in 2016. *J Theor Biol.* 455:342-356.
- v. Wilke ABB, Vasquez C, Petrie W, Caban-Martinez AJ, **Beier JC. 2018.** Construction sites in Miami-Dade County, Florida are highly favorable environments for vector mosquitoes. *PLoS ONE* 13 (12): e0209625.
- w. Poltavsky AN, Kravchenko VD, Traore MM, Traore SF, Gergely P, Witt TJ, Sulak H, Beck RH, Junnila A, Revay EE, Doumbia S, **Beier JC**, Muller GC. **2018.** The Pyraloidea (Lepidoptera) fauna of the woody savannah belt in Mali, West Africa. *Zootaxa.* 4457:39-69.
- x. Fernandes, J. N., Santos, L. M., Chouin-Carneiro, T., Pavan, M. G., Garcia, G. A., David, M. R., **Beier, JC**, Dowell, F.E., Marciel-de-Freitas, R., Sikulu-Lord, M. T. **2018.** Rapid, noninvasive detection of Zika virus in *Aedes aegypti* mosquitoes by near-infrared spectroscopy. *Science Advances*, 4(5). doi:10.1126/sciadv.aat0496
- y. Wilke, A. B., Vasquez, C., Mauriello, P. J., & **Beier, JC. 2018.** Ornamental bromeliads of Miami-Dade County, Florida are important breeding sites for *Aedes aegypti* (Diptera: Culicidae). *Parasites & Vectors*, 11(1). doi:10.1186/s13071-018-2866-9
- z. Wilke, A. B., **Beier, JC.**, & Benelli, G. **2018.** Transgenic Mosquitoes – Fact or Fiction? *Trends in Parasitology*, 34(6), 456-465. doi:10.1016/j.pt.2018.02.003
- aa. Kenawy MA, Abdel-Hamid YM, **Beier JC. 2018.** Rift Valley Fever in Egypt and other African countries: Historical review, recent outbreaks and possibility of disease

- occurrence in Egypt. *Acta Tropica*, 181:40-49.
- bb. Fernandes J.N, Moise IK, Maranto GL, & **Beier JC. 2018.** Revamping Mosquito-borne Disease Control to Tackle Future Threats. *Trends in Parasitology*, 34(5), 359-368. doi:10.1016/j.pt.2018.01.005
  - cc. Kirschenhofer E, Egger M, Beck R, Kravchenko VD, Traore MM, Traore SF, Gergely P, Revay EE, Doumbia S, **Beier JC**, Muller GC. 2018. Bestandsaufnahme der Chlaeniini aus dem Südwesten von Mali – *Callistomimus* CHAUDOIR, 1872, *Chlaenius* BONELLI, 1810 und *Harpostomus* Chaldur, 1856. – Teil 2. (Coleoptera, Chlaeniini). *Entomofauna*, 0039: 615–621.
  - dd. Blore K, **Beier JC**, Xue R. **2018.** Impact of three species of aquatic plants on *Anopheles quadrimaculatus* and its effect on the efficacy of boric acid and sugar baits. *Journal of the American Mosquito Control Association*, 34(1): 50-52.
  - ee. Manrique PD, **Beier JC**, Johnson NF. **2017.** Simple visit behavior unifies complex Zika outbreaks. *Heliyon*, 3(12):e00482.
  - ff. Kassem HA, **Beier JC**, El Sawaf BM. **2017.** Historical overview of infantile visceral leishmaniasis in El Agamy, Alexandria, Egypt. *Acta Tropica*, 176:335-339
  - gg. Ajelli M, Moise IK, Hutchings TCSG, Brown SC, Kumar N, Johnson NF, **Beier JC. 2017.** Host outdoor exposure variability affects the transmission and spread of Zika virus: Insights for epidemic control. *PLoS Neglected Tropical Diseases*, 11(9):e0005851
  - hh. Benelli G, **Beier JC. 2017.** Current vector control challenges in the fight against malaria. *Acta Tropica*, 174:91-96
  - ii. Müller GC, Junnila A, Traore MM, Traore SF, Doumbia S, Sissoko F, Dembele SM, Schlein Y, Arheart KL, Revay EE, Kravchenko VD, Witt A, **Beier JC. 2017.** The invasive shrub *Prosopis juliflora* enhances the malaria parasite transmission capacity of *Anopheles* mosquitoes: a habitat manipulation experiment. *Malaria Journal*, 16(1):237
  - jj. Zhu L, Müller GC, Marshall JM, Arheart KL, Qualls WA, Hlaing WM, Schlein Y, Traore SF, Doumbia S, **Beier JC. 2017.** Is outdoor vector control needed for malaria elimination? An individual-based modelling system. *Malaria Journal*, 16(1):266
  - kk. Vasquez D, Palacio A, Nuñez J, Briones W, **Beier JC**, Pareja DC, Tamariz L. **2017.** Impact of the 2016 Ecuador Earthquake on Zika virus cases. *American Journal of Public Health*, 107(7):1137-1142
  - ll. Müller GC, Junnila A, Traore MM, Revay EE, Traore SF, Doumbia S, Schlein Y, Kravchenko VD, Xue RD, Tsabari O, **Beier JC. 2017.** A novel window entry/exit trap for the study of endophilic behavior of mosquitoes. *Acta Tropica*, 167:137-141
  - mm. Abdul-Ghani R, Mahdy MAK, **Beier JC**, Basco LK. **2017.** Hidden reservoir of resistant parasites: the missing link in the elimination of falciparum malaria. *Infectious Diseases of Poverty*, 6:12
  - nn. Qualls WA, Naranjo DP, Subía MA, Ramon G, Cevallos V, Grijalva I, Gómez E, Arheart KL, Fuller DO, **Beier JC. 2016.** Movement of *Aedes aegypti* following a sugar meal and its implication in the development of control strategies in Durán, Ecuador. *Journal of Vector Ecology*, 41(2):224-231
  - oo. Alyousefi TA, Abdul-Ghani R, Mahdy MA, Al-Eryani SM, Al-Mekhlafi AM, Raja YA, Shah

- SA, **Beier JC. 2016.** A household-based survey of knowledge, attitudes and practices towards dengue fever among local urban communities in Taiz Governorate, Yemen. *BMC Infectious Diseases*, 16(1):543
- pp. Dewald JR, Fuller DO, Müller GC, **Beier JC. 2016.** A novel method for mapping village- scale outdoor resting microhabitats of the primary African malaria vector, *Anopheles gambiae*. *Malaria Journal*, 15(1):489
- qq. Qualls WA, Scott-Fiorenzano J, Muller GC, Arheart KL, **Beier JC**, Xue RD. **2016.** Evaluation and adaptation of attractive toxic sugar baits for *Culex tarsalis* and *Culex quinquefasciatus* control in Coachella Valley, California. *J Am Mosq Control Assoc.* 32:292–299.
- rr. Chen J, Huang J, **Beier JC**, Cantrell RS, Cosner C, Fuller DO, Zhang G, Ruan S. **2016.** Modeling and control of local outbreaks of West Nile virus in the United States. *Discrete and Continuous Dynamical Systems Series B* 21: 2423-2449.
- ss. Ahumada ML, Orjuela LI, Pareja PX, Conde M, Cabarcas DM, Cubillos EF, Lopez JA, **Beier JC**, Herrera S, Quiñones ML. **2016.** Spatial distributions of *Anopheles* species in relation to malaria incidence at 70 localities in the highly endemic Northwest and South Pacific coast regions of Colombia. *Malaria Journal*, 15(1):407
- tt. Ulrich JN, **Beier JC**, Devine GJ, Hugo LE. **2016.** Heat Sensitivity of wMel *Wolbachia* during *Aedes aegypti* Development. *PLoS Neglected Tropical Diseases*, 10(7):e0004873
- uu. Müller GC, Tsabari O, Traore MM, Traore SF, Doumbia S, Kravchenko VD, Junnila A, **Beier JC. 2016.** First record of *Aedes albopictus* in inland Africa along the River Niger in Bamako and Mopti, Mali. *Acta Tropica*, 162:245-7
- vv. Frederick J, Saint Jean Y, Lemoine JF, Dotson EM, Mace KE, Chang M, Slutsker L, Le Menach A, **Beier JC**, Eisele TP, Okech BA, Beau de Rochars VM, Carter KH, Keating J, Impoinvil DE. **2016.** Malaria vector research and control in Haiti: a systematic review. *Malaria Journal*, 15(1):376
- ww. Abdul-Ghani R, Mahdy MA, **Beier JC. 2016.** Onchocerciasis in Yemen: Time to take action against a neglected tropical parasitic disease. *Acta Tropica*, 162:133-41
- xx. Dachraoui K, Fares W, Bichaud L, Barhoumi W, **Beier JC**, Derbali M, Cherni S, de Lamballerie X, Chelbi I, Charrel RN, Zhioua E. **2016.** Phleboviruses associated with sand flies in arid bio-geographical areas of Central Tunisia. *Acta Tropica*, 158:13-19.
- yy. Barhoumi W, Fares W, Cherni S, Derbali M, Dachraoui K, Chelbi I, Ramalho-Ortigao M, **Beier JC**, Zhioua, E. **2016.** Changes of sand fly populations and *Leishmania infantum* infection rates in an irrigated village located in Arid Central Tunisia. *International Journal of Environmental Research and Public Health*, 13(3):329.
- zz. Fuller DO, Alimi T, Herrera S, **Beier JC**, Quiñones ML. **2016.** Spatial association between malaria vector species richness and malaria in Colombia. *Acta Tropica*, 158:197-200.
- aaa. Alimi TO, Fuller DO, Herrera SV, Arevalo-Herrera M, Quinones ML, Stoler JB, **Beier JC. 2016.** A multi-criteria decision analysis approach to assessing malaria risk in northern South America. *BMC Public Health*, 16:221.

- bbb. Chamchod F, Cosner C, Cantrell RS, **Beier JC**, Ruan S. **2016**. Transmission dynamics of Rift Valley Fever Virus: effects of live and killed vaccines on epizootic outbreaks and enzootic maintenance. *Frontiers in Microbiology*, 6:1568.
- ccc. Naranjo DP, **Beier JC**, Gómez E, Jurado H, Arheart K, Qualls, WA. **2016**. Entomological impact and current perceptions of Novaluron and Temephos against the *Aedes aegypti* (Skuse) vector of dengue, chikungunya and Zika arboviruses in a Coastal Town in Ecuador. *Vector Biology Journal*, 1:1.
- ddd. Davidson CA, Scott JM, Hossain TH, **Beier JC**, Xue R. **2016**. Relationship between citizen knowledge, vegetation coverage, and frequency of requests for mosquito control service in St. Johns County, Florida. *Technical Bulletin of the Florida Mosquito Control Association*, 10:30.
- eee. Qualls WA, Müller GC, Khallaayoune K, Revay EE, Zhioua E, Kravchenko VD, Arheart KL, Xue D, Schlein Y, Hausmann A, Kline DL, **Beier JC**. **2015**. Control of sand flies with attractive toxic sugar baits (ATSB) and potential impact on non-target organisms in Morocco. *Parasites & Vectors*, 8:87.
- fff. Conde M, Pareja P, Orjuela L, Ahumada M, Durán S, Jara J, Cañon B, Pérez P, **Beier JC**, Herrera S, Quiñones M. **2015**. Larval habitat characteristics of the main malaria vectors in the most endemic regions of Colombia: potential implications for larval control. *Malaria Journal*, 14:476.
- ggg. Alimi T, Fuller DO, Quinones ML, Xue R, Herrera SV, Arevalo-Herrera M, Ulrich JN, Qualls WA, **Beier JC**. **2015**. Prospects and recommendations for risk mapping to improve strategies for effective malaria vector control interventions in Latin America. *Malaria Journal*, 14:519.
- hhh. Zhu L, Marshall JM, Qualls WA, Schlein Y, McManus JW, Arheart KL, Hlaing WM, Traore SF, Doumbia S, Müller GC, **Beier JC**. **2015**. Modelling optimum use of attractive toxic sugar bait stations for effective malaria vector control in Africa. *Malaria Journal*, 14:492.
- iii. Gil H, Qualls W, Cosner C, DeAngelis D, Hassan A, Gad A, Ruan S, Cantrell S, **Beier JC**. **2015**. A model for the coupling of the Greater Bairam and local environmental factors in promoting Rift-Valley Fever epizootics in Egypt. *Public Health*, 19:1-8.
- jjj. Abdul-Ghani R, Basco L, **Beier JC**, Mahdy M. **2015**. Inclusion of gametocyte parameters in anti-malarial drug efficacy studies: filling a neglected gap needed for malaria elimination. *Malaria Journal*, 14(1):413.
- kkk. Müller G, Hogsette J, Kline D, **Beier JC**, Revay E, Xue R. **2015**. Response of the sand fly *Phlebotomus papatasi* to visual, physical and chemical attraction features in the field. *Acta Tropica*, 141:32-36.
- lll. Junnila A, Revay E, Müller G, Kravchenko V, Qualls W, Xue R, Allen S, **Beier JC**, Schlein Y. **2015**. Efficacy of attractive toxic sugar baits (ATSB) against *Aedes albopictus* with garlic oil encapsulated in beta-cyclodextrin as the active ingredient. *Acta Tropica*, 152:195-200.
- mmm. Alimi TO, Fuller DO, Qualls WA, Herrera SV, Arevalo-Herrera M, Quinones ML, Lacerda MVG, **Beier JC**. **2015**. Predicting potential ranges of primary malaria vectors and malaria in northern South America based on projected changes in climate, land cover and human population. *Parasites & Vectors*. 8:431.



- nnn. Quinones M, Norris D, Conn J, Moreno M, Burkot T, Bugoro H, Keven J, Cooper R, Yan G, Rosas A, Palomino M, Donnelly M, Mawejje H, Eapen A, Montgomery J, Coulibaly M, **Beier JC**, Kumar A. **2015**. Insecticide Resistance in Areas Under Investigation by the International Centers of Excellence for Malaria Research: A Challenge for Malaria Control and Elimination. *American Journal of Tropical Medicine and Hygiene*, 93(3 Suppl):69-78.
- ooo. Qualls W, Müller G, Traore S, Traore M, Arheart K, Doumbia S, Schlein Y, Kravchenko V, Xue R, **Beier JC**. **2015**. Indoor use of attractive toxic sugar bait (ATSB) to effectively control malaria vectors in Mali, West Africa. *Malaria Journal*, 14:301.
- ppp. Revay E, Schlein Y, Tsabari O, Kravchenko V, Qualls WA, De-Xue R, **Beier JC**, Traore S, Doumbia S, Hausmann A, Müller G. **2015**. Formulation of attractive toxic sugar bait (ATSB) with safe EPA-exempt substance significantly diminishes the *Anopheles sergentii* population in a desert oasis. *Acta Tropica*, 150:29-34.
- qqq. Orjuela LI, Ahumada ML, Avila I, Herrera S, **Beier JC**, Quiñones ML. **2015**. Human biting activity, spatial-temporal distribution and malaria vector role of *Anopheles calderoni* in the southwest of Colombia. *Malaria Journal*, 14:256.
- rrr. Zhu L, Qualls W, Marshall J, Arheart K, DeAngelis D, McManus J, Traore S, Doumbia S, Schlein Y, Müller G, **Beier JC**. **2015**. A spatial individual-based model predicting a great impact of copious sugar sources and resting sites on survival of *Anopheles gambiae* and malaria parasite transmission. *Malaria Journal*, 14:59.
- sss. Hossain T, Fulcher A, Davidson C, **Beier JC**, Xue R. **2014**. Evaluation of Boric Acid Sugar Baits Sprayed on Plants against the Salt Marsh Mosquito, *Aedes taeniorhynchus* (Diptera: Culicidae). *Florida Entomologist*, 97(4):865-1868.
- ttt. Xiao Y, **Beier JC**, Cantrell RS, Cosner C, DeAngelis DL, Ruan S. **2014**. Modelling the effects of seasonality and socioeconomic impact on the transmission of rift valley Fever virus. *PLOS Neglected Tropical Diseases*, 9(1):e3388.
- uuu. Chang AY, Fuller DO, Carrasquillo O, **Beier JC**. **2014**. Social justice, climate change, and dengue. *Health and Human Rights Journal*, 16(1):93-104.
- vvv. Barhoumi W, Qualls WA, Archer RS, Fuller DO, Chelbi I, Cherni S, Derbali M, Arheart KL, Zhioua E, **Beier JC**. **2014**. Irrigation in the arid regions of Tunisia impacts the abundance and apparent density of sand fly vectors of *Leishmania infantum*. *Acta Tropica*, 141:73-78.
- www. Chamchod F, Cantrell RS, Cosner C, Hassan AN, **Beier JC**, Ruan S. **2014**. A modeling approach to investigate epizootic outbreaks and enzootic maintenance of rift valley fever virus. *Bulletin of Mathematical Biology*, 76(8):2052-2072.
- xxx. Abdul-Ghani R, **Beier JC**. **2014**. Strategic use of antimalarial drugs that block *falciparum* malaria parasite transmission to mosquitoes to achieve local malaria elimination. *Parasitology Research*, 113(10):3535-3546.
- yyy. Lizzi KM, Qualls WA, Brown SC, **Beier JC**. **2014**. Expanding Integrated Vector Management to Promote Healthy Environments. *Trends in Parasitology*, 30(8):394-400.
- zzz. Naranjo DP, Qualls WA, Jurado H, Perez JC, Xue R, Gomez E, **Beier JC**. **2014**. Vector Control Programs in Saint Johns County, Florida and Guayas, Ecuador: Successes and Barriers to Integrated Vector Management. *BMC Public Health*. 14(1):674.

- aaaa. Fuller D, Troyo A, Alimi T, **Beier JC. 2014.** Participatory Risk Mapping of Malaria Vector Exposure in Northern South America using Environmental and Population Data. *Applied Geography*, 48:1-7.
- bbbb. Müller GC, Hogsette JA, Kline DL, **Beier JC**, Revay EE, Xue RD. **2014.** Response of the sand fly *Phlebotomus papatasi* to visual, physical and chemical attraction features in the field. *Acta Tropica*, 141(A): 32–36.
- cccc. Conley AK, Fuller DO, Haddad N, Hassan AN, Gad AM, **Beier JC. 2014.** Modeling the distribution of the West Nile and Rift Valley Fever vector *Culex pipiens* in arid and semi- arid regions of the Middle East and North Africa. *Parasites & Vectors*, 7(1):289.
- dddd. Drake JM, **Beier JC. 2014.** Ecological niche and potential distribution of *Anopheles arabiensis* in Africa in 2050. *Malaria Journal*, 13(1):213-213.
- eeee. Zhu L, Fulcher A, Hossain T, Davidson C, **Beier JC**, Xue RD. **2014.** Body size, blood feeding activity, and fecundity of *psorophora howardii*, *psorophora ciliata*, and *psorophoraferox* (diptera: Culicidae). *Journal of Medical Entomology*, 51(2): 382-386.
- ffff. Qualls WA, Müller GC, Revay EE, Allan SA, Arheart KL, **Beier JC**, Smith ML, Scott JM, Kravchenko VD, Hausmann A, Yefremova ZA, Xue RD. 2014. Evaluation of attractive toxic sugar bait (ATSB)-Barrier for control of vector and nuisance mosquitoes and its effect on non-target organisms in sub-tropical environments in Florida. *Acta Tropica*. 131:104-110.
- gggg. Chamchod F, Cantrell RS, Cosner C, Hassan AN, **Beier JC**, Ruan S. **2014.** A Modeling Approach to Investigate Epizootic Outbreaks and Enzootic Maintenance of Rift Valley Fever Virus. *Bulletin of Mathematical Biology*.
- hhhh. Revay EE, Muller GC, Qualls WA, Kline DI, Naranjo DP, Arheart KL, Kravchenko VD, Yefremova Z, Hausmann A, **Beier JC**, Schlein Y, Xue R. **2014.** Control of *Aedes albopictus* with Attractive Toxic Sugar Baits (ATSB) and potential impact on non-target organisms in St. Augustine, Florida. *Parasitology Research*, 113:73-79.
- iiii. Khallaayoune K, Qualls WA, Revay EE, Allan SA, Arheart KL, Kravchenko VD, Xue RD, Schlein Y, **Beier JC**, Muller GC. **2013.** Attractive toxic sugar baits: Control of mosquitoes with the low risk active ingredient dinotefuran and potential impacts on non-target organisms in Morocco. *Environmental Entomology*, 42:1040-1045.
- jjjj. Samson DM, Qualls W, Roque D, Naranjo DP, Alimi T, Arheart KL, Muller GC, **Beier JC**, Xue R. **2013.** Resting and energy reserves of *Aedes albopictus* collected in common landscaping vegetation in St. Augustine, Florida. *Journal of the American Mosquito Control Association*, 29(3): 231-236.
- kkkk. Alimi TO, Qualls WA, Roque D, Naranjo DP, Samson D, **Beier JC**, Xue RD. **2013.** Evaluation of a new formulation of Permethrin applied by water based thermal fogger against *Aedes albopictus* in residential communities in St. Augustine, Florida. *Journal of the American Mosquito Control Association*, 29(1): 49-56.
- llll. Marshall JM, White MT, Ghani AC, Schlein Y, Muller GC, **Beier JC. 2013.** Quantifying the mosquito's sweet tooth: modelling the effectiveness of attractive toxic sugar baits (ATSB) for malaria vector control. *Malaria Journal*, 12(1):291.
- mmmm. Muiruri SK, Mwangangi JM, Carlson J, Kabiru EW, Kokwaro E, Githure J, Mbogo CM, **Beier JC. 2013.** Effect of predation on *Anopheles* larvae by five sympatric insect families in coastal Kenya. *Journal of Vector Borne Diseases*,

50(1):45-50.

- nnnn. Qualls W, Xue R, **Beier J**, Müller G. **2013**. Survivorship of adult *Aedes albopictus* (Diptera: Culicidae) feeding on indoor ornamental plants with no inflorescence. *Parasitology Research*, 112(6):2313-2318.
- oooo. Naranjo D, Qualls WA, Müller GC, Samson DM, Roque D, Alimi T, Arheart K, **Beier JC**, Xue R. **2013**. Evaluation of boric acid sugar baits against *Aedes albopictus* (Diptera: Culicidae) in tropical environments. *Parasitology Research*, 112(4):1583-1587.
- pppp. Ulrich JN, Naranjo DP, Alimi TO, Müller GC, **Beier JC**. **2013**. How much vector control is needed to achieve malaria elimination? *Trends in Parasitology*, 29:104-109.
- qqqq. Gao D, Cosner C, Cantrell R, Beier J, Ruan S. **2013**. Modeling the Spatial Spread of Rift Valley Fever in Egypt. *Bulletin of Mathematical Biology*, 75(3):523-542.
- rrrr. Drake J, Hassan A, Beier J. **2013**. A statistical model of Rift Valley fever activity in Egypt. *Journal of Vector Ecology*, 38(2):251-259.
- ssss. Naranjo DP, Qualls WA, Müller G, Samson D, Roque D, Alimi T, Arheart K, **Beier JC**, Xue R. **2013**. Evaluation of boric acid sugar baits against *Aedes albopictus* (Diptera: Culicidae) in tropical environments. *Parasitology Research*, 112(4):1583-1587.
- tttt. Mwangangi JM, Mbogo CM, Orindi BO, Muturi EJ, Midega JT, Nzovu J, Gatakaa H, Githure J, Borgemeister C, Keating J, **Beier JC**. **2013**. Shifts in malaria vector species composition and transmission dynamics along the Kenyan coast over the past 20 years. *Malaria Journal*, 12:13.
- uuuu. Chamchod F, **Beier JC**. **2013**. Modeling *Plasmodium vivax*: Relapses, treatment, seasonality, and G6PD deficiency. *Journal of Theoretical Biology*, 316:25-34.
- vvvv. Walker M, Winskill P, Basáñez M, Mwangangi JM, Mbogo C, **Beier JC**, Midega, JT. **2013**. Temporal and Micro-Spatial Heterogeneity in the Distribution of *Anopheles* Vectors of Malaria along the Kenyan Coast. *Parasites & Vectors*, 6(1):311.
- wwww. Muturi E, Mwangangi J, **Beier JC**, Blackshear M, Wauna J, Sang R, Mukabana W. **2013**. Ecology and Behavior of *Anopheles arabiensis* in Relation to Agricultural Practices in Central Kenya. *Journal of the American Mosquito Control Association*, 29(3):222-230.
- xxxx. Munoz-Price S, Safdar M, **Beier JC**, Doggett SL. **2012**. Bed Bugs in Healthcare Settings. *Infection Control and Hospital Epidemiology*, 33:1137-42.
- yyyy. Fuller DO, Parenti M, Hassan AN, **Beier JC**. **2012**. Linking land cover and species distribution models to project potential ranges of malaria vectors: an example using *Anopheles arabiensis* in Sudan and Upper Egypt. *Malaria Journal*, 11:264.
- zzzz. Müller GC, Xue RD, **Beier JC**. **2012**. Controlling and sampling adult sand flies with a fumigant containing permethrin and deltamethrin. *Journal of Vector Ecology*, 37:257-61.
- aaaaa. Fuller DO, Ahumada ML, Quiñones ML, Herrera S, **Beier JC**. **2012**. Near-present and future distribution of *Anopheles albimanus* in Mesoamerica and the Caribbean Basin modeled with climate and topographic data. *International Journal of Health Geographics*, 11:13.
- bbbbb. **Beier JC**, Müller GC, Gu W, Arheart KL, Schlein Y. **2012**. Attractive toxic sugar

- bait (ATSB) methods decimate populations of *Anopheles* malaria vectors in arid environments regardless of the local availability of favoured sugar-source blossoms. *Malaria Journal*, 11:31.
- cccc.** Müller GC, Revay EE, **Beier JC. 2012.** Simplified and improved monitoring traps for sampling sand flies. *Journal of Vector Ecology*. 36:454-7.
- dddd.** Müller GC, Hogsette JA, **Beier JC**, Traore SF, Toure MB, Traore MM, Bah S, Doumbia S, Schlein Y. **2012.** Attraction of *Stomoxys* sp. to various fruits and flowers in Mali. *Medical and Veterinary Entomology*, 26:178-87.
- eeee.** Arevalo-Herrera M., Quiñones M, Guerraj C, Cespedes N, Girond S, Ahumadae M, Piñerosf J, Padillag N, Terrientes Z, Rosasi A, Padillam JC, Escalantel A, **Beier JC**, Herrera S. **2012.** Malaria in selected non-Amazonian countries of Latin America. *Acta Tropica*, 12:303-14.
- ffff.** Herrera S, Quiñones M, Quintero JP, Corredor V, Fuller DO, Mateus JC, Calzada JE, Gutierrez JB, Llanos A, Soto E, Menendez C, Wu Y, Alonso P, Carrasquilla G, Galinski M, **Beier JC**, Arevalo-Herrera M. **2012.** Prospects for malaria elimination in non-Amazonian regions of Latin America. *Acta Tropica*. 121:315-23.
- gggg.** Mwangangi JM, Midega J, Kahindi S, Njoroge L, Nzovu J, Githure J, Mbogo CM, **Beier JC. 2012.** Mosquito species abundance and diversity in Malindi, Kenya and their potential implication in pathogen transmission. *Parasitology Research*, 110:61-71.
- hhhh.** Fuller DO, Parenti MS, Gad AM, **Beier JC. 2012.** Land cover in Upper Egypt assessed using regional and global land cover products derived from MODIS imagery. *Remote Sensing Letters*, 3:171-180.
- iiii.** Arévalo-Herrera M, Solarte Y, Marin C, Santos M, Castellanos J, **Beier JC**, Valencia S. **2011.** Malaria transmission blocking immunity and sexual stage vaccines for interrupting malaria transmission in Latin America. *Memórias do Instituto Oswaldo Cruz*, 106:202-211.
- jjjj.** Noden B, Vaughan J, Pumpuni C, **Beier JC. 2011.** Mosquito ingestion of antibodies against mosquito midgut microbiota improves conversion of ookinetes to oocysts for *Plasmodium falciparum*, but not *P. yoelii*. *Parasitology International*. 60(4):440-446.
- kkkk.** Le Comber SC, Rossmo DK, Hassan AN, Fuller DO, and **Beier JC. 2011.** Geographic profiling as a novel spatial tool for targeting infectious disease control. *International Journal of Health Geographics*, 10:35.
- llll.** Arévalo-Herrera M, Solarte Y, Rocha L, Alvarez D, **Beier JC**, Herrera S. **2011.** Characterization of *Plasmodium vivax* transmission blocking activity in low to moderate malaria transmission settings of the Colombian Pacific Coast. *The American Journal of Tropical Medicine and Hygiene*, 84(suppl 2):71-77.
- mmmm.** Gu W, Muller G, Schlein Y, Novak RJ, **Beier JC. 2011.** Natural plant sugar sources of *Anopheles* mosquitoes strongly impact malaria transmission potential. *PLoS One*, 20:e15996.
- nnnn.** Muller GC, Kravchenko VD, Rybalov L, **Beier JC**, Schlein Y. **2011.** Characteristics of resting habitats of adult *Phlebotomus papatasi* in Neot Hakikar, an oasis south of the Dead Sea. *Journal of Vector Ecology*, 36(Suppl. 1): 1-8.

- ooooo.** Muller GC, Revay EE, **Beier JC. 2011.** Simplified and improved monitoring traps for sampling sand flies. *Journal of Vector Ecology*, 36:454-457.
- ppppp.** Muller GC, **Beier JC**, Traore SF, Toure MB, Traore MM, Bah S, Doumbia S, Schlein Y. **2010.** Successful field trial of attractive toxic sugar bait (ATSB) plant-spraying methods against malaria vectors in the *Anopheles gambiae* complex in Mali, West Africa. *Malaria Journal*, 9:210.
- qqqqq.** Muller GC, **Beier JC**, Traore SF, Toure MB, Traore MM, Bah S, Doumbia S, Schlein Y. **2010.** Field experiments of *Anopheles gambiae* attraction to local fruits/seedpods and flowering plants in Mali to optimize strategies for malaria vector control in Africa using attractive toxic sugar bait methods. *Malaria Journal*, 9:262.
- rrrrr.** Fuller DO, Troyo A, Calderón-Arguedas O, **Beier JC. 2010.** Dengue vector (*Aedes aegypti*) larval habitats in an urban environment of Costa Rica analysed with ASTER and QuickBird imagery. *International Journal of Remote Sensing*, 31:3-11.
- sssss.** Mireji, PO, Keating J, Hassanali A, Mbogo CM, Muturi MN, Githure JI, **Beier JC. 2010.** Biological cost of tolerance to heavy metals in the mosquito *Anopheles gambiae*. *Medical and Veterinary Entomology*, 24:101-107.
- ttttt.** Midega JT, Muturic EJ, Balirained FN, Mbogo CM, Githure JI, **Beier JC**, Yan G. **2010.** Population structure of *Anopheles gambiae* along the Kenyan coast. *Acta Tropica* 114:103–108.
- uuuuu.** Mireji PO, Keating J, Hassanali A, Impoinvil DE, Mbogo CM, Muturi MN, Nyambaka H, Kenya EU, Githure JI, **Beier JC. 2010.** Expression of metallothionein and alpha-tubulin in heavy metal-tolerant *Anopheles gambiae* sensu stricto (Diptera: Culicidae). *Ecotoxicology and Environmental Safety*, 73:46-50.
- vvvvv.** Calderón-Arguedas O, Troyo A, Solano ME, Avendaño A, **Beier JC. 2009.** Urban mosquito species (Diptera: Culicidae) of dengue endemic communities in the Greater Puntarenas area, Costa Rica. *Revista de Biología Tropical*, 57:1223-34.
- wwwww.** Troyo A., Fuller DO, Calderon-Arguedas O, Solano ME, **Beier JC. 2009.** Urban structure and dengue incidence in Puntarenas, Costa Rica. *Singapore Journal of Tropical Geography*, 30:265–282.
- xxxxx.** Carlson JC, Dyer LA, Omlin FX, **Beier JC. 2009.** Diversity cascades and malariavectors. *Journal of Medical Entomology*, 46:460-64.
- yyyyy.** Fuller DO, Troyo A, **Beier JC. 2009.** ENSO and vegetation dynamics as predictors of dengue fever cases in Costa Rica. *Environmental Research Letters*, 4: 014011.
- zzzzz.** Cosner C, **Beier JC**, Cantrell RS, Impoinvil D, Kapitanski L, Potts MD, Troyo A, Ruan S. **2009.** The effects of human movement on the persistence of vector-borne diseases. *Journal of Theoretical Biology*, 258:550-560.
- aaaaa.** Diallo M, Toure AM, Traore SF, Niare O, Kassambara L, Konare A, Coulibaly M, Bagayoko M, **Beier JC**, Sakai RK, Toure YT, Doumbo OK. **2008.** Evaluation and optimization of membrane feeding compared to direct feeding as an assay for infectivity. *Malaria Journal*, 7:248.
- bbbbbb.** **Beier JC**, Keating J, Githure JI, Macdonald MB, Impoinvil DE, Novak RJ. **2008.** Integrated vector management for malaria control. *Malaria Journal*, 7:54.

- ccccc. **Beier JC. 2008.** Malaria control in the highlands of Burundi: an important success story. *The American Journal of Tropical Medicine and Hygiene*, 79:1-2.
- dddddd. Impoinvil DE, Keating J, Mbogo CM, Potts MD, Chowdhury RR, **Beier JC. 2008.** Abundance of immature *Anopheles* and culicines (Diptera: Culicidae) in different water body types in the urban environment of Malindi, Kenya. *Journal of Vector Ecology*. 33:107-16.
- eeeeee. Troyo A, Calderón-Arguedas O, Fuller DO, Solano ME, Avendaño A, Arheart KL, Chadee DD, **Beier JC. 2008.** Seasonal profiles of *Aedes aegypti* (Diptera: Culicidae) larval habitats in an urban area of Costa Rica with a history of mosquito control. *Journal of Vector Ecology*, 33:76-88.
- fffff. Magalhaes T, Brackney DE, **Beier JC**, Foy BD. **2008.** Silencing an *Anopheles gambiae* catalase and sulfhydryl oxidase increases mosquito mortality after a blood meal. *Archives of Insect Biochemistry and Physiology*. 68:134-43.
- ggggg. Impoinvil DE, Mbogo CM, Keating J, **Beier JC. 2008.** The role of unused swimming pools as a habitat for *Anopheles* immature stages in urban Malindi, Kenya. *Journal of the American Mosquito Control Association*, 24: 457-9.
- hhhhh. Troyo A, Fuller DO, Calderon-Arguedas O, **Beier, JC. 2008.** A geographical sampling method for surveys of mosquito larvae in an urban area using high-resolution satellite imagery. *Journal of Vector Ecology*, 33 (1).
- iiiiii. Mireji PO, Keating J, Hassanali A, Mbogo CM, Nyambaka H., Kahindi S. **Beier JC.2008.** Heavy metals in mosquito larval habitats in urban Kisumu and Malindi, Kenya, and their impact. *Ecotoxicology and Environmental Safety*, 70: 147-153.
- jjjjj. Ruan S, Xiao D, **Beier JC. 2008.** On the delayed Ross-Macdonald model for malaria transmission. *Bulletin of Mathematical Biology*, 70: 1098-114.
- kkkkk. Impoinvil DE, Keating J, Chowdhury RR, Duncan R, Cardenas GA, Ahmad S, Githure JI, Mbogo CM, **Beier JC. 2007.** The association between distance to water pipes and water bodies positive for anopheline mosquitoes (Diptera: Culicidae) in the urban community of Malindi, Kenya. *Journal of Vector Ecology*, 32: 319-327.
- lllll. Manda H, Gouagna LC, Foster WA, Jackson RR, **Beier JC**, Githure JI, Hassanali A. **2007.** Effect of discriminative plant-sugar feeding on the survival and fecundity of *Anopheles gambiae*. *Malaria Journal*, 6: 113.
- mmmmm. Midega JT, Mbogo CH, Mwambi H, Wilson MD, Ojwang G, Mwangangi JM, Yan G, **Beier JC. 2007.** Estimating dispersal and survival of *Anopheles gambiae* and *Anopheles funestus* along the Kenyan Coast by using mark-release-recapture methods. *Journal of Medical Entomology*, 44: 923-929.
- nnnnn. Ohaga SO, Ndiege IO, Kubasu SS, **Beier JC**, Mbogo CM. **2007.** Susceptibility of non-target aquatic macro-invertebrates and vertebrates to *Piper guineense* (Piperaceae) and *Spilanthes mauritiana* (Asteraceae) powder in Kilifi District, Kenya. *International Journal of Zoological Research*, 3: 86-93.
- ooooo. Impoinvil DE, Cardenas GA, Githure JI, Mbogo CM, **Beier JC. 2007.** Constant temperature and time period effects on *Anopheles gambiae* egg hatching. *Journal of the American Mosquito Control Association*, 23: 124-30.
- ppppp. Mwangangi JM, Mbogo CM, Muturi EJ, Nzovua JG, Kabiru EW, Githure JI, Novak R, **Beier JC. 2007.** Influence of biological and physiochemical characteristics of larval habitats on

- the body size of *Anopheles gambiae* mosquitoes (Diptera: Culicidae) along the Kenyan coast. *Journal of Vector Borne Diseases*, 44: 122-7.
- qqqqq. Impoinvil DE, Ahmad S, Troyo A, Keating J, Githeko AK, Mbogo CM, Kibe L, Githure JI, Gad AM, Hassan AN, Orshan L, Warburg A, Calderon-Arguedas O, Sanchez-Loria VM, Velit- Suarez R, Chadee DD, Novak RJ, **Beier JC. 2007.** Comparison of mosquito control programs in seven urban sites in Africa, the Middle East, and the Americas. *Health Policy*, 83:196-212.
- rrrrr. Okech BA, Gouagna LC, Yan G, Githure JI, **Beier JC. 2007.** Larval habitats of *Anopheles gambiae* s.s (Diptera: Culicidae) influences vector competence to *Plasmodium falciparum* parasites. *Malaria Journal*, 6:50.
- sssss. Mwangangi JM, Mbogo CM, Muturi EJ, Nzovua JG, Githure JI, Yan G, Minakawa N, Novak R, **Beier JC. 2007.** Spatial distribution and habitat characterization of *Anopheles* larvae along the Kenyan coast. *Journal of Vector Borne Diseases*. 44:44-51.
- ttttt. Manda H, Gouagna LC, Nyandat E, Kabiru EW, Jackson RR, Foster WA, Githure JI, **Beier JC, Hassanali A. 2007.** Discriminative feeding behavior of *Anopheles gambiae* s.s. on endemic plants in western Kenya. *Medical and Veterinary Entomology*, 21:103-11.
- uuuuu. Kibe LW, Mbogo CM, Keating J, Molyneux S, Githure JI, **Beier JC. 2006.** Community based vector control in Malindi, Kenya. *African Health Sciences*, 6:240-6.
- vvvvv. Troyo A, Porcelain SL, Calderon-Arguedas O, Chadee DD, **Beier JC. 2006.** Dengue in Costa Rica: the gap in local scientific research. *Revista Panamericana de Salud Pública*, 20: 350-60.
- wwwww. Mireji PO, Keating J, Kenya E, Mbogo CM, Nyambaka H, Osir E, Githure JI and **Beier JC. 2006.** Differential induction of proteins in *Anopheles gambiae sensu stricto* (Diptera: Culicidae) larvae in response to heavy metal selection. *International Journal of Tropical Insect Science*, 4:213-224.
- xxxxx. Gu W, Regens JL, **Beier JC, Novak RJ. 2006.** Source reduction of mosquito larval habitats has unexpected consequences on malaria transmission. *PNAS*, 103:17560-63.
- yyyyy. Muturi EJ, Mbogo CM, Ng'ang'a ZW, Kabiru EW, Mwandawiro Cand, **Beier JC. 2006.** Concomitant infections of *Plasmodium falciparum* and *Wuchereria bancrofti* on the Kenyan coast. *Filaria Journal*, 24:5-8.
- zzzzz. Muturi EJ, Mbogo CM, Ng'ang'a ZW, Kabiru EW, Mwandawiro C, Novak RJ, **Beier JC. 2006.** Relationship between malaria and *filariasis* transmission indices in an endemic area along the Kenyan Coast. *Journal of Vector Borne Diseases*, 43:77-83.
144. Zhong D, Temu EA, Guda T, Gouagna L, Menge D, Pai A, Githure J, **Beier JC, Yan G. 2006.** Dynamics of gene introgression in the African malaria vector *Anopheles gambiae*. *Genetics*, 172:2359-65.
145. Menge DM, Guda T, Zhong D, Pai A, Zhou G, **Beier JC, Gouagna L, Yan G. 2005.** Fitness consequences of *Anopheles gambiae* population hybridization. *Malaria Journal*, 4:44.
146. Ferguson HM, Gouagna LC, Obare P, Read AF, Babiker H, Githure JI, **Beier JC. 2005.** The presence of *Plasmodium falciparum* gametocytes in human blood increases the gravidity of *Anopheles gambiae* mosquitoes. *The American Journal of Tropical Medicine and Hygiene*, 73: 321-320.
147. Keating J, Mbogo CM, Mwangangi J, Nzovou JG, Gu W, Regens JL, Yan G, Githure JI, **Beier**



- JC. 2005.** *Anopheles gambiae* s.l. and *Anopheles funestus* mosquito distributions at thirty villages along the Kenyan coast. *Journal of Medical Entomology*, 42:241-6.
148. Sintasath DM, Ghebremeskel T, Lynch M, Kleinau E, Bretas G, Shililu J, Brantly E, Graves PM, **Beier JC. 2005.** Malaria prevalence and associated risk factors in Eritrea. *The American Journal of Tropical Medicine and Hygiene*, 72:682-7.
149. Jacob BG, Arheart KL, Griffith DA, Mbogo CM, Githeko AK, Regens JL, Githure JI, Novak R, **Beier JC. 2005.** Evaluation of environmental data for identification of *Anopheles* (Diptera: Culicidae) aquatic larval habitats in Kisumu and Malindi, Kenya. *Journal of Medical Entomology*, 42:751-5.
150. Mwangangi JM, Mbogo CM, Nzovu JG, Kabiru EW, Mwambi H, Githure JI, **Beier JC. 2004.** Relationships between body size of *Anopheles* mosquitoes and *Plasmodium Falciparum* sporozoite rates along the Kenya coast. *Journal of the American Mosquito Control Association*, 20:390-4.
151. Sumba LA, Okoth K, Deng AL, Githure J, Knols BGJ, **Beier JC**, Hassanali. **2004.** Daily oviposition patterns of the African malaria mosquito *Anopheles gambiae* Giles (Diptera: Culicidae) on different types of aqueous substrates. *Journal of Circadian Rhythms*, 13; 2: 6.
152. Keating J, Macintyre K, Mbogo CM, Githure JI, **Beier JC. 2004.** Self-reported malaria and mosquito avoidance in relation to human behavior in a Kenyan coastal city. *Journal of Biosocial Science*, 37:761-7.
153. Okech BA, Gouagna LC, Kabiru EW, Walczak E, **Beier JC**, Yan G, Githure JI. **2004.** Resistance of early midgut stages of natural *Plasmodium falciparum* parasites to high temperatures in experimentally infected *Anopheles gambiae* (Diptera: Culicidae). *Journal of Parasitic Diseases*, 90:764-768.
154. Okech BA, Gouagna LC, Knols BGJ, Kabiru EW, Killeen GF, **Beier JC**, Yan G, Githure JI. **2004.** Influence of indoor microclimate and diet on survival of *Anopheles gambiae* s.s. (Diptera: Culicidae) in village house conditions in western Kenya. *International Journal of Tropical Insect Science*, 24:207–212.
155. Keating J, Macintyre K, Mbogo CM, Githure JI, **Beier JC. 2004.** Characterization of potential larval habitats for *Anopheles* mosquitoes in relation to urban land-use in Malindi, Kenya. *International Journal of Health Geographics*, 4:3-9.
156. Impoinvil DE, Kongere JO, Foster WA, Njiru BN, Killeen GF, Githure JI, **Beier JC**, Hassanali A, Knols BGJ. **2004.** Feeding and survival of the malaria vector *Anopheles gambiae* on plants growing in Kenya. *Medical and Veterinary Entomology*, 18:108-15.
157. Okech BA, Gouagna LC, Kabiru EW, **Beier JC**, Yan G, Githure JI. **2004.** Influence of age and previous diet of *Anopheles gambiae* on the infectivity of natural *Plasmodium falciparum* gametocytes from human volunteers. *Journal of Insect Science*, 4:33.
158. Shililu J, Grueber WB, Mbogo CM, Riddiford LM, Githure JI, **Beier JC. 2004.** Development and Survival of *Anopheles gambiae* eggs in drying soil: Influence of the rate of drying, egg age, and soil type. *Journal of the American Mosquito Control Association*, 3:243-247.
159. Okech BA, Gouagna LC, Walczak E, Kabiru EW, **Beier JC**, Yan G, Githure JI. **2004.** The development of *Plasmodium falciparum* in experimentally infected *Anopheles gambiae* (Diptera: Culicidae) under ambient microhabitat temperature in western Kenya. *Acta Tropica*, 92:99-108.

160. Shililu J, Ghebremeskel T, Seulu F, Mengistu S, Fekadu H, Zerom M, Asmelash GE, Sintasath D, Mbogo C, Githure J, Brantly E, **Beier JC**, Novak RJ. **2004**. Seasonal abundance, vector behavior, and malaria parasite transmission in Eritrea. *Journal of the American Mosquito Control Association*, 20:155-64.
161. Bousema JT, Gouagna LC, Drakeley CJ, Meutstege AM, Okech BA, Akim IN, **Beier JC**, Githure JI, Sauerwein RW. **2004**. *Plasmodium falciparum* gametocyte carriage in asymptomatic children in western Kenya. *Malaria Journal*, 3:18.
162. Gouagna LC, Ferguson HM, Okech BA, Killeen GF, Kabiru EW, **Beier JC**, Githure JI, Yan G. **2004**. *Plasmodium falciparum* malaria disease manifestations in humans and transmission to *Anopheles gambiae*: a field study in Western Kenya. *Parasitology*, 128:235-43.
163. Carlson J, Keating J, Mbogo CM, Kahindi S, **Beier JC**. **2004**. Ecological limitations on aquatic mosquito predator colonization in the urban environment. *Journal of Vector Ecology*, 29:331-9.
164. Chen H, Minakawa N, **Beier JC**, Yan G. **2004**. Population genetic structure of *Anopheles gambiae* mosquitoes on Lake Victoria islands, West Kenya. *Malaria Journal*, 3:48.
165. Depinay JM, Mbogo CM, Killeen G, Knols B, **Beier JC**, Carlson J, Dushoff J, Billingsley P, Mwambi H, Githure JI, Toure AM, Mckenzie FE. **2004**. A simulation model of African *Anopheles* ecology and population dynamics for the analysis of malaria transmission. *Malaria Journal*, 3:29.
166. Sumba LA, Guda TO, Deng AL, Hassanali A, Beier JC, Knols BGJ. 2004. Mediation of oviposition site selection in the African malaria mosquito *Anopheles gambiae* (Diptera: Culicidae) by semiochemicals of microbial origin. *International Journal of Tropical Insect Science* 24: 260-265.
167. Mwangangi JM, Mbogo CM, Nzovu JG, Githure JI, Yan G, **Beier JC**. **2003**. Blood-meal analysis for *anopheline* mosquitoes sampled along the Kenyan coast. *Journal of the American Mosquito Control Association*, 19:371-5.
168. Gouagna LC, Okech BA, Kabiru EW, Killeen GF, Obare P, Ombonya S, **Beier JC**, Knols BG, Githure JI, Yan G. **2003**. Infectivity of *Plasmodium falciparum* gametocytes in patients attending rural health centres in western Kenya. *East African Medical Journal*, 80: 627-34.
169. Mbogo CM, Mwangangi JM, Nzovu J, Gu W, Yan G, Gunter JT, Swalm C, Keating J, Regens JL, Shililu JI, Githure JI, **Beier JC**. **2003**. Spatial and temporal heterogeneity of *Anopheles* mosquitoes and *Plasmodium falciparum* transmission along the Kenyan coast. *The American Journal of Tropical Medicine and Hygiene*, 68:734-42.
170. Shililu J, Ghebremeskel T, Seulu F, Mengistu S, Fekadu H, Zerom M, Ghebregziabihier A, Sintasath D, Bretas G, Mbogo C, Githure J, Brantly E, Novak R, **Beier JC**. **2003**. Larval habitat diversity and ecology of *anopheline* larvae in Eritrea. *Journal of Medical Entomology*, 40: 921-6.
171. Gu W, Killeen GF, Mbogo CM, Regens JL, Githure JI, **Beier JC**. **2003**. An individual-based model of *Plasmodium falciparum* malaria transmission on the coast of Kenya. *Transactions of the Royal Society of Tropical Medicine and Hygiene*, 97:43-50.
172. Morales ME, Wesson DM, Sutherland IW, Impoinvil DE, Mbogo CM, Githure JI, **Beier JC**. **2003**. Determination of *Anopheles gambiae* larval DNA in the gut of insectivorous dragonfly (Libellulidae) nymphs by polymerase chain reaction. *Journal of the American Mosquito Control Association*, 19:163-5.

173. Gu W, Mbogo CM, Githure JI, Regens JL, Killeen GF, Swalm CM, Yan G, **Beier JC. 2003.** Low recovery rates stabilize malaria endemicity in areas of low transmission in coastal Kenya. *Acta Tropica*, 86:71-81.
174. Nyanjom SR, Chen H, Gebre-Michael T, Bekele E, Shililu J, Githure J, **Beier JC**, Yan G. **2003.** Population Genetic Structure of *Anopheles arabiensis* Mosquitoes in Ethiopia and Eritrea. *Journal of Heredity*, 94:457-463.
175. Shililu J, Ghebremeskel T, Mengistu S, Fekadu H, Zerom M, Mbogo C, Githure J, Gu W, Novak R, **Beier JC. 2003.** Distribution of *anopheline* mosquitoes in Eritrea. *The American Journal of Tropical Medicine and Hygiene*, 69:295-302.
176. Okech BA, Gouagna LC, Killeen GF, Knols BG, Kabiru EW, **Beier JC**, Yan G, Githure JI. **2003.** Influence of sugar availability and indoor microclimate on survival of *Anopheles gambiae* (Diptera: Culicidae) under semifield conditions in western Kenya. *Journal of Medical Entomology*, 40:657-63.
177. Shililu JI, Tewolde GM, Brantly E, Githure JI, Mbogo CM, **Beier JC**, Fusco R, Novak RJ. **2003.** Efficacy of *Bacillus thuringiensis israelensis*, *Bacillus sphaericus* and temephos for managing *Anopheles* larvae in Eritrea. *Journal of the American Mosquito Control Association*, 19:251-8.
178. Jacob BG, Regens JL, Mbogo CM, Githeko AK, Keating J, Swalm CM, Gunter JT, Githure JI, **Beier JC. 2003.** Occurrence and distribution of *Anopheles* (Diptera: Culicidae) larval habitats on land cover change sites in urban Kisumu and urban Malindi, Kenya. *Journal of Medical Entomology*, 40:777-784.
179. Keating J, MacIntyre K, Mbogo C, Githeko A, Regens JL, Swalm C, Ndenga B, Steinberg LJ, Kibe L, Githure JI, **Beier JC. 2003.** A geographic sampling strategy for studying relationships between human activity and malaria vectors in urban Africa. *The American Journal of Tropical Medicine and Hygiene*, 68:357-65.
180. Robert V, Macintyre K, Keating J, Trape JF, Duchemin JB, Warren M, **Beier JC. 2003.** Malaria transmission in urban sub-Saharan Africa. *The American Journal of Tropical Medicine and Hygiene*, 68:169-176.
181. Foy BD, Magalhaes T, Injera WE, Sutherland I, Devenport M, Thanawastien A, Ripley D, Cardenas-Freytag L, **Beier JC. 2003.** Induction of mosquitocidal activity in mice immunized with *Anopheles gambiae* midgut cDNA. *Infection and Immunity*, 71:2032-40.
182. Shililu JI, Mbogo CM, Mutero CM, Gunter JT, Swalm C, Regens JL, Keating J, Yan G, Githure JI, **Beier JC. 2003.** Spatial distribution of *Anopheles gambiae* and *Anopheles funestus* and malaria transmission in Suba District, western Kenya. *Insect Science and its Application*, 23:187-196.
183. Eisele TP, Keating J, Swalm C, Mbogo CM, Githeko AK, Regens JL, Githure JI, Andrews L, **Beier JC. 2003.** Linking field-based ecological data with remotely sensed data using a geographic information system in two malaria endemic urban areas of Kenya. *Malaria Journal*, 2:44.
184. Killeen GF, Foy BD, Frohn RH, Impoinvil D, Williams A, **Beier JC. 2003.** Enrichment of a single clone from a high diversity library of phage-displayed antibodies by panning with *Anophele gambiae* (Diptera: Culicidae) midgut homogenate. *Bulletin of Entomological Research*, 93:31-7.
185. Bousema JT, Gouagna LC, Meutstege AM, Okech BE, Akim NIJ, Githure JI, **Beier JC**, Sauerwein RW. **2003.** Treatment failure of pyrimethamine-sulphadoxine and induction of *P.*

- falciparum* gametocytaemia in children in western Kenya. *Tropical Medicine and International Health*, 8:427-30.
186. Shillu J, Ghebremeskel T, Mengistu S, Fekadu H, Zerom M, Mbogo C, Githure J, Novak R, Brantly E, **Beier JC**. 2003. High seasonal variation in entomologic inoculation rates in Eritrea, a semi-arid region of unstable malaria in Africa. *The American Journal of Tropical Medicine and Hygiene*, 69: 607-13.
  187. Aultman K, Azad A, Beard B, Benedict M, **Beier JC** (and 14 others). 2003. Arthropod containment guidelines: A project of the American Committee of Medical Entomology and American Society of Tropical Medicine and Hygiene. *Vector Borne and Zoonotic Diseases*, 3: 61-98.
  188. Knols BG, Njiru BN, Mathenge EM, Mukabana WR, **Beier JC**, Killeen GF. 2002. MalariaSphere: A greenhouse-enclosed simulation of a natural *Anopheles gambiae* (Diptera: Culicidae) ecosystem in western Kenya. *Malaria Journal*, 1:19.
  189. McKenzie FE, Baird JK, **Beier JC**, Lal AA, Bossert WH. 2002. A biologic basis for integrated malaria control. *The American Journal of Tropical Medicine and Hygiene*, 67:571-577.
  190. Foy BD, Killeen GF, Magalhaes T, **Beier JC**. 2002. Injurious indigestion: immunological targeting of critical insect antigens. *American Entomologist*, 48:150-163.
  191. Killeen GF, Knols BG, Fillinger U, **Beier JC**, Gouagna LC. 2002. Interdisciplinary malaria vector research and training for Africa. *Trends in Parasitology*, 18:433-434.
  192. Okanda F, Dao A, Njiru B, Arija J, Akelo H, Toure Y, Odulaja A, **Beier J**, Githure J, Yan G, Gouagna L, Knols B, Killeen G. 2002. Behavioural determinants of gene flow in malaria vector populations: *Anopheles gambiae* males select large females as mates. *Malaria Journal*, 1:10.
  193. Macintyre K, Keating J, Sosler S, Kibe L, Mbogo CM, Githeko AK, **Beier JC**. 2002. Examining the determinants of mosquito-avoidance practices in two Kenyan cities. *Malaria Journal*, 1:14.
  194. Chadee DD, **Beier JC**, Mohammed RT. 2002. Fast and slow blood-feeding durations of *Aedes aegypti* mosquitoes in Trinidad. *Journal of Vector Ecology*, 27:172-177.
  195. Foy BD, Killeen GF, Frohn RH, Impoinvil D, Williams A, Roake W, **Beier JC**. 2002. Characterization of a unique human antibody fragment isolated through phage display selection on membrane-immobilized *Anopheles gambiae* midgut antigens. *Journal of Immunological Methods*, 261:73-83.
  196. **Beier JC**. 2002. Vector Analysis. *Methods in Molecular Medicine*, 72:95-101.
  197. **Beier JC**. 2002. Vector incrimination and entomological inoculation rates. *Methods in Molecular Medicine*, 72: 3-11.
  198. Minakawa N, Githure JI, **Beier JC**, Yan G. 2001. *Anopheline* mosquito survival strategies during the dry period in western Kenya. *Journal of Medical Entomology*, 38:388-392.
  199. Killeen GF, McKenzie FE, Foy BD, Bogh C, **Beier JC**. 2001. The availability of potential hosts as a determinant of feeding behaviours and malaria transmission by African mosquito populations. *Transactions of the Royal Society of Tropical Medicine and Hygiene*, 95:1-8.
  200. McKenzie FE, Killeen GF, **Beier JC**, Bossert WH. 2001. Seasonality, parasite diversity, and local extinctions in *Plasmodium falciparum* malaria. *Ecology*, 82:2673-81.

201. Ross SG, Thomson MC, Pultz T, Mbogo CM, Regens JL, Swalm C, Githure J, Yan G, Gu W, and **Beier JC. 2001.** On the Use of Radarsat-1 for Monitoring Malaria Risk in Kenya. In *Proceedings of the 3<sup>rd</sup> International Symposium on Retrieval of Bio- and Geophysical Parameters from SAR Data for Land Applications.*
202. Killeen, GF, Foy, BD, Shahbuddin, M, Roake, W, Williams, A, Vaughan, TJ, **Beier JC. 2000.** Tagging bloodmeals with phagemids allows feeding of multiple-sample arrays to single cages of mosquitoes (Diptera: Culicidae) and the recovery of single recombinant antibody fragment genes from individual insects. *Journal of Medical Entomology*, 37:528-533.
203. Toure AM, Mackay AJ, Wang ZX, **Beier JC. 2000.** Bactericidal effects of sugar-fed antibiotics on resident midgut bacteria of newly emerged anopheline mosquitoes (Diptera: Culicidae). *Journal of Medical Entomology*, 37:246-249.
204. Killeen, GF, McKenzie, FE, Foy, BD, Schieffelin C, Billingsley PF, **Beier JC. 2000.** A simplified model for predicting malaria entomological inoculation rates based on entomologic and parasitologic parameters relevant to control. *The American Journal of Tropical Medicine and Hygiene*, 62:535-544.
205. Killeen GF, McKenzie FE, Foy BD, Schieffelin C, Billingsley, PF, **Beier, JC. 2000.** The potential impact of integrated malaria transmission control on entomologic inoculation rate in highly endemic areas. *The American Journal of Tropical Medicine and Hygiene*, 62:545-551.
206. Chadee DD, **Beier JC**, Doon R. **1999.** Re-emergence of *Plasmodium malariae* in Trinidad, West Indies. *Annals of Tropical Medicine and Public Health*, 93:467-475.
207. Mbogo CNM, Kabiru EW, Glass GE, Forster D, Snow RW, Khamala CPM, Ouma JH, Githure JI, Marsh K, **Beier JC. 1999.** Vector-related case-control study of severe malaria in Kilifi District, Kenya. *The American Journal of Tropical Medicine and Hygiene*, 60:781-785.
208. **Beier, JC**, Killeen GF, Githure J. **1999.** Short report: Entomological inoculation rates and *Plasmodium falciparum* malaria prevalence in Africa. *The American Journal of Tropical Medicine and Hygiene*, 61:109-113.
209. Minakawa N, Mutero CM, Githure JI, **Beier JC**, Yan G. **1999.** Spatial distribution and habitat characterization of anopheline mosquito larvae in western Kenya. *The American Journal of Tropical Medicine and Hygiene*, 61:1010-1016.
210. **Beier JC. 1998.** Malaria parasite development in mosquitoes. *Annual Review of Entomology*, 43: 519-543.
211. Straif SC, Mbogo CNM, Toure AM, Walker ED, Kaufman M, Toure YT, **Beier JC. 1998.** Midgut bacteria in *Anopheles gambiae* and *An. funestus* (Diptera: Culicidae) from Kenya and Mali. *Journal of Medical Entomology*, 35:222-226.
212. Mazzacano CA, Vargas JC, Mackay AJ, **Beier JC. 1998.** *Plasmodium gallinaceum*: effect of insect cells on ookinete development in vitro. *Experimental Parasitology*, 88:210-216.
213. Chadee DD, **Beier JC**, Mohammed RT. **1998.** Laboratory studies of diel oviposition, fecundity, survival, and gonotrophic cycles in *Anopheles homunculus*. *American Mosquito Control Association*, 14:153-158.
214. Patz JA, Strzepek, K, Lele S, Hedden, M, Greene S, Noden B, Hay SI, Kalkstein L, **Beier JC. 1998.** Predicting key malaria transmission factors, biting and entomological inoculation rates, using modelled soil moisture in Kenya. *Tropical Medicine & International Health*, 3: 818-827.

215. Chege GMM, **Beier JC. 1998.** Blood acquisition and processing by three *Anopheles* (Diptera: Culicidae) species with different innate susceptibilities to *Plasmodium falciparum*. *Journal of Medical Entomology*, 35:319-323.
216. McElroy PD, **Beier JC**, Onyango FK, Oloo AJ, Beadle C, Hoffman SL. **1997.** Dose and time-dependent relationships between exposure to infective inoculation and *Plasmodium falciparum* infection among children in western Kenya. *American Journal of Epidemiology*, 145:945-956.
217. Jones TR, McElroy PD, Oster CN, **Beier JC**, Oloo AJ, Onyango FK, Chumo DK, Sherwood JA, Hoffman SL. **1997.** *Plasmodium falciparum* gametocytemia in Kenyan children: associations among age, intensity of exposure to transmission, and prevalence and density of subsequent gametocytemia. *The American Journal of Tropical Medicine and Hygiene*, 56:133-136.
218. Chadee DD and **Beier JC. 1997.** Factors influencing the duration of blood-feeding by laboratory-reared and wild *Aedes aegypti* (Diptera: Culicidae) from Trinidad, West Indies. *Annals of Tropical Medicine and Parasitology*, 91:199-207.
219. Pumpuni CB, Mendis C, **Beier JC. 1997.** *Plasmodium yoelii* sporozoite infectivity varies as a function of sporozoite loads in *Anopheles stephensi* mosquitoes. *Journal of Parasitology*, 83:652-655.
220. Kabiru EW, Mbogo CM, Muiruri SK, Marsh K, Snow RW, Ouma JH, Githure JI, **Beier JC. 1997.** Sporozoite loads of naturally infected *Anopheles* in Kilifi District, Kenya. *Journal of the American Mosquito Control*, 13:259-262.
221. Chadee DD, **Beier JC**, Martinez R. **1996.** The effect of the cibarial armature on blood meal haemolysis of four anopheline mosquitoes. *Bulletin of Entomological Research*, 86:351-354.
222. Straif SC, **Beier JC. 1996.** Effects of sugar availability on the blood-feeding behavior of *Anopheles gambiae* (Diptera: Culicidae). *Journal of Medical Entomology*, 33:608-612.
223. **Beier JC. 1996.** Frequent blood-feeding and restrictive sugar-feeding behavior enhance the malaria vector potential of *Anopheles gambiae* s.l. and *An. funestus* (Diptera: Culicidae) in western Kenya. *Journal of Medical Entomology*, 33:613-618.
224. Chege CMM, Pumpuni CB, **Beier JC. 1996.** Proteolytic enzyme activity relative to *Plasmodium falciparum* sporogonic development in three species of *Anopheles* mosquitoes. *Journal of Parasitology*, 82:11-16.
225. Pumpuni CB, DeMaio J, Kent M, Davis JR, **Beier JC. 1996.** Bacterial population dynamics in three anopheline species: The impact on *Plasmodium* sporogonic development. *The American Journal of Tropical Medicine and Hygiene*, 54:214-218.
226. DeMaio J, Pumpuni CB, Kent M, **Beier JC. 1996.** The midgut flora of wild *Aedes triseriatus*, *Culex pipiens*, and *Psorophora columbiae* mosquitoes. *The American Journal of Tropical Medicine and Hygiene*, 54:219-223.
227. Chadee DD, **Beier JC. 1996.** Diel oviposition and fecundity of *Anopheles oswaldoi* in Trinidad, West Indies. *Journal of the American Mosquito Control Association*, 12:402-405.
228. Chadee DD, **Beier JC. 1996.** Natural variation in blood-feeding kinetics of four *Anopheles* mosquito vectors. *Journal of Vector Ecology*, 21:150-155.
229. Mbogo CNM, Snow RW, Khamala P, Kabiru EW, Ouma JH, Githure JI, Marsh K, **Beier JC. 1995.** Relationships between *Plasmodium falciparum* transmission by vector populations and the

- incidence of severe disease at nine sites on the Kenyan coast. *The American Journal of Tropical Medicine and Hygiene*, 52:201-206.
230. Pumpuni CB, **Beier JC**. 1995. Long-term survival of *Plasmodium* sporozoites *in vitro*. *Parasitology Research*, 81:178-180.
  231. Noden BH, Vaughan JA, Ibrahim MS, **Beier JC**. 1995. An immunological factor that affects *Anopheles gambiae* survival. *Journal of the American Mosquito Control Association*, 11:45-49.
  232. Chadee DD, **Beier JC**. 1995. Blood-engorgement kinetics of four *anopheline* mosquitoes from Trinidad, West Indies. *Annals of Tropical Medicine and Public Health*, 89:55-62.
  233. Beadle C, McElroy PD, Oster CN, **Beier JC**, Oloo AJ, Onyango FK, Chumo DK, Bales JD, Sherwood JA, Hoffman SL. 1995. Impact of transmission intensity and age on *Plasmodium falciparum* density and associated fever: Implications for malaria vaccine trial design. *The Journal of Infectious Diseases*, 172:1047-54.
  234. Noden BH, Pumpuni CB, Vaughan JA, **Beier JC**. 1995. Non-infectious sporozoites in the salivary glands of a minimally susceptible anopheline mosquito. *Journal of Parasitology*, 81:912- 15.
  235. Noden BH, Kent MD, **Beier JC**. 1995. The impact of variations in temperature on early *Plasmodium falciparum* development in *Anopheles stephensi*. *Parasitology*, 111:539-545.
  236. Chadee DD, **Beier JC**. 1995. Blood digestion kinetics of four anopheline mosquitoes from Trinidad, West Indies. *Annals of Tropical Medicine and Public Health*, 89:531-540.
  237. **Beier JC**, Chadee DD, Charran A, Comiskey NM, Wesson DM. 1995. Country-wide prevalence of *Ascogregarina culicis* protozoan parasites of *Aedes aegypti* in Trinidad, West Indies. *Journal of the American Mosquito Control Association*, 11:419-423.
  238. Robson KJH, Frevert U, Reckmann I, Cowan G, **Beier J**, Scragg IG, Takehara K, Bishop DHL, Pradel G, Sinden R, Saccheo S, Muller H-M, Crisanti A. 1995. Thrombospondin-related adhesive protein (TRAP) of *Plasmodium falciparum*: expression during sporozoite ontogeny and binding to human hepatocytes. *EMBO*, 14:3883-3894.
  239. Gad AM, Farid HA, Soliman BA, Morsy ZS, **Beier JC**. 1995. Identification of endemic foci of filariasis by examination of mosquitoes for microfilariae. *Journal of the American Mosquito Control Association*, 11:434-437.
  240. **Beier JC**, Oster CN, Onyango FK, Bales JD, Sherwood JA, Perkins PV, Chumo DK, Koech DK, Whitmire RE, Roberts CR, Diggs CL, Hoffman SL. 1994. *Plasmodium falciparum* incidence relative to entomological inoculation rates at a site proposed for testing malaria vaccines in western Kenya. *The American Journal of Tropical Medicine and Hygiene*, 49:529-536.
  241. Beier, MS, Pumpuni CB, **Beier JC**, Davis Jr. 1994. Effects of para-aminobenzoic acid, insulin, and gentamicin on *Plasmodium falciparum* development in anopheline mosquitoes (Diptera: Culicidae). *Journal of Medical Entomology*, 31:561-565.
  242. Vaughan JA, Noden BH, **Beier JC**. 1994. Prior blood feeding on the susceptibility of *Anopheles gambiae* (Diptera: Culicidae) to infection with cultured *Plasmodium falciparum*. *Journal of Medical Entomology*, 31:445-449.
  243. Vaughan JA, Noden BH, **Beier JC**. 1994. Sporogonic development of *Plasmodium falciparum* in six species of laboratory-infected *Anopheles* mosquitoes. *The American Journal of Tropical Medicine and Hygiene*, 51:233-243.

244. Mendis, C, Noden BH, **Beier JC. 1994.** Exflagellation responses of *Plasmodium falciparum* gametocytes to human sera and midgut homogenates of mosquitoes. *Journal of Medical Entomology*, 31:767-769.
245. Chege GMM, **Beier JC. 1994.** Immunodetection of *Plasmodium falciparum* zygotes and ookinetes in *Anopheles* blood meals. *Journal of the American Mosquito Control Association*, 10:419-422.
246. Noden BH, Beadle PS, Vaughan JA, Pumpuni CB, Kent MD, **Beier JC. 1994.** *Plasmodium falciparum*: the population structure of mature gametocyte cultures has little effect on their innate fertility. *Acta Tropica*, 58:13-19.
247. McElroy PD, **Beier JC**, Oster CN, Beadle C, Sherwood JA, Oloo AJ, Hoffman SL. **1994.** Predicting outcome in malaria: correlation between rate of exposure to infected *Anopheles* mosquitoes and level of *Plasmodium falciparum* parasitemia. *The American Journal of Tropical Medicine and Hygiene*, 51:523-532.
248. Vaughan JA, Hensley L, **Beier JC. 1994.** Sporogonic development of *Plasmodium yoelii* in five species of laboratory-infected *Anopheles* mosquitoes. *Journal of Parasitology*, 80:674-681.
249. **Beier JC. 1993.** Malaria sporozoites: survival, transmission and disease control. *Parasitology Today*, 9:210-215.
250. Mbogo CNM, Kabiru EW, Muiruri SK, Nzovu JM, Ouma JH, Githure JI, **Beier JC. 1993.** Bloodfeeding behavior of *Anopheles gambiae* s.l. and *Anopheles funestus* in Kilifi District, Kenya. *Journal of the American Mosquito Control Association*, 9:225-227.
251. Mbogo CNM, Snow RW, Kabiru EW, Ouma JH, Githure JI, Marsh K, **Beier JC. 1993.** Low-level *Plasmodium falciparum* transmission and the incidence of severe malaria infections on the Kenyan coast. *The American Journal of Tropical Medicine and Hygiene*, 49:245-253.
252. Davis JR, Beier MS, **Beier JC**, Pumpuni CB, Edelman R, Herrington DA, Clyde DF. **1993.** Effects of ingested human anti-sporozoite sera on *Plasmodium falciparum* sporogony in *Anopheles stephensi*. *The American Journal of Tropical Medicine and Hygiene*, 49:166-173.
253. Mbogo CNM, Glass GE, Forster D, Kabiru EW, Githure JI, Ouma JH, **Beier JC. 1993.** Evaluation of light traps for sampling anopheline mosquitoes in Kilifi District. *Journal of the American Mosquito Control Association*, 9:260-263.
254. Chadee DD, Mendis C, **Beier JC. 1993.** Diel oviposition periodicity of anopheline mosquitoes (Diptera: Culicidae) from the Americas: *Anopheles albimanus* Wiedemann and *Anopheles freeborni* Aitken. *Annals of Tropical Medicine and Public Health*. 87:501-507.
255. Petrarca V, **Beier JC. 1992.** Intraspecific chromosomal polymorphism in the *Anopheles gambiae* complex as a factor affecting malaria transmission in the Kisumu area of Kenya. *The American Journal of Tropical Medicine and Hygiene*. 46:229-237.
256. **Beier JC**, Copeland RS, Mtalib R, Vaughan JA. **1992.** Ookinete rates in Afrotropical *Anopheles* mosquitoes as a measure of human malaria infectiousness. *The American Journal of Tropical Medicine and Hygiene*. 47:41-46.
257. Contreras CE, **Beier JC. 1992.** Detection of human antibodies against *Plasmodium falciparum* antigens in blood meals of anopheline mosquitoes. *Journal of the American Mosquito Control Association*, 8:252-255.



258. Beier, MS, Davis JR, Pumpuni C, Noden BH, **Beier JC. 1992.** Ingestion of *Plasmodium falciparum* sporozoites during transmission by anopheline mosquitoes. *The American Journal of Tropical Medicine and Hygiene*, 47:195-200.
259. Fries LF, Gordon DM, Schneider I, **Beier JC**, Long GW, Gross M, Que JU, Cryz SJ, Sadoff JC. **1992.** Safety, immunogenicity, and efficacy of a *Plasmodium falciparum* vaccine comprising a circumsporozoite protein repeat region peptide conjugated to *Pseudomonas aeruginosa* toxin A. *Infection and Immunity*, 60:1834-1939.
260. Vaughan JA, Noden BH, **Beier JC. 1992.** Population dynamics of *Plasmodium falciparum* sporogony in laboratory-infected *Anopheles gambiae*. *Journal of Parasitology*, 78:716-724.
261. **Beier JC**, Vaughan JA, Madani A, Noden BH. **1992.** *Plasmodium falciparum*: Release of circumsporozoite protein by sporozoites in the mosquito vector. *Experimental Parasitology*, 75:248-256.
262. **Beier JC**, Beier MS, Vaughan JA, Pumpuni CB, Davis JR, Noden BH. **1992.** Sporozoite transmission by *Anopheles freeborni* and *Anopheles gambiae* experimentally infected with *Plasmodium falciparum*. *Journal of the American Mosquito Control Association*, 8:404-408.
263. **Beier JC**, Copeland RS, Onyango FK, Asiago CM, Ramadhan M, Koech DK, Roberts CR. **1991.** *Plasmodium* species identification by ELISA for sporozoites removed from dried dissection slides. *Journal of Medical Entomology*, 28:533-536.
264. Sherwood JA, Oster CN, Adoyo-Adoyo M, **Beier JC**, Gachihi GS, Nyakundi PM, Ballou WR, Brandling-Bennett AD, Schwartz IK, Were JBO, Wirtz RA, Schneider I, Roberts CR, Young JF, Gross M, Chulay JD. **1991.** Safety and immunogenicity of a *Plasmodium falciparum* sporozoite vaccine: boosting of antibody response in a population with prior malaria experience. *Transactions of the Royal Society of Tropical Medicine and Hygiene*, 85:336-340.
265. **Beier JC**, Koros, JK. **1991.** Visual assessment of sporozoite and bloodmeal ELISA samples in malaria field studies. *Journal of Medical Entomology*, 28:805-808.
266. **Beier JC**, Onyango FK, Ramadhan M, Koros JK, Asiago CM, Wirtz RA, Koech DK, Roberts CR. **1991.** Quantitation of malaria sporozoites in the salivary glands of wild Afrotropical *Anopheles*. *Medical and Veterinary Entomology*, 5:63-70.
267. **Beier JC**, Onyango FK, Koros JK, Ramadhan M, Ogwang R, Wirtz RA, KoechDK, Roberts CR. **1991. 1991.** Quantitation of malaria sporozoites transmitted *in vitro* during salivation by wild Afrotropical *Anopheles*. *Medical and Veterinary Entomology*. 5:71-79.
268. **Beier JC**, Koros JK. **1991.** Anatomical dissemination of circumsporozoite protein in wild Afrotropical *Anopheles* affects malaria sporozoite rate determination by ELISA. *Medical and Veterinary Entomology*, 5:81-85.
269. Petrarca V, **Beier JC**, Onyango F, Koros J, Asiago C, Koech DK, Roberts CR. **1991.** Species composition of the *Anopheles gambiae* complex at two sites in western Kenya. *Journal of Medical Entomology*, 28:307-313, 19910.
270. **Beier JC**, Davis JR, Vaughan JA, Noden BH, Beier MS. **1991.** Quantitation of *Plasmodium falciparum* sporozoites transmitted *in vitro* by experimentally infected *Anopheles gambiae* and *Anopheles stephensi*. *The American Journal of Tropical Medicine and Hygiene*, 44:564-570.
271. Vaughan JA, Noden BH, **Beier JC. 1991.** Concentration of human erythrocytes by anopheline mosquitoes (Diptera: Culicidae) during feeding. *Journal of Medical Entomology*, 28:780-786.

272. **Beier JC**, Perkins PV, Koros JK, Onyango FK, Gargan TP, Wirtz RA, Koech DK, Roberts CR. **1990**. Malaria sporozoite detection by dissection and ELISA to assess infectivity of Afrotropical *Anopheles* (Diptera: Culicidae). *Journal of Medical Entomology*, 27:377-384.
273. **Beier JC**, Copeland R, Oyaro C, Masinya A, Odago WO, Oduor S, Koech DK, Roberts CR. **1990**. *Anopheles gambiae* complex egg-stage survival in dry soil from larval development sites in western Kenya. *Journal of the American Mosquito Control Association*, 6:105-109.
274. **Beier JC**, Odago WO, Onyango FK, Asiago CM, Koech DK, Roberts CR. **1990**. Relative abundance and blood feeding behavior of nocturnally active culicine mosquitoes in western Kenya. *Journal of the American Mosquito Control Association*, 6:207-212.
275. Chege GMM, **Beier JC**. **1990**. Effect of *Plasmodium falciparum* on the survival of naturally infected Afrotropical *Anopheles* (Diptera: Culicidae). *Journal of Medical Entomology*, 27:454-458.
276. Ma M, **Beier JC**, Petrarca V, Gwadz RW, Zhang J, Song Q, Koech DK. **1990**. Differentiation of *Anopheles gambiae* and *An. arabiensis* (Diptera: Culicidae) by ELISA using immunoaffinity-purified antibodies to vitellogenin. *Journal of Medical Entomology*, 27:564-569.
277. **Beier JC**, Perkins PV, Onyango FK, Gargan TP, Oster CN, Whitmire RE, Koech DK, Roberts CR. **1990**. Characterization of malaria transmission by (Diptera: Culicidae) in western Kenya in preparation for malaria vaccine trials. *Journal of Medical Entomology*, 27:570-577.
278. Kenawy MA, **Beier JC**, Asiago CM, El Said S, Roberts CR. **1990**. Interpretation of low-level *Plasmodium* infection rates determined by ELISA for anophelines (Diptera: Culicidae) from Egyptian oases. *Journal of Medical Entomology*, 27:681-685.
279. Ijumba JN, Mwangi RW, **Beier JC**. **1990**. Malaria transmission potential of mosquitoes in the irrigation scheme of Mwea-Tebera, Kenya. *Medical and Veterinary Entomology*, 4:425-432.
280. Kenawy MA, **Beier JC**, Asiago CM, El Said S. **1990**. Factors affecting the human-feeding behavior of anopheline mosquitoes in Egyptian oases. *Journal of the American Mosquito Control Association*, 6:446-451.
281. Hoffman SL, Oster CN, Mason C, **Beier JC**, Sherwood JA, Ballou WR, Mugambi M, Chulay JD. **1989**. Human lymphocyte proliferative response to a sporozoite T cell epitope correlates with resistance to falciparum malaria. *Journal of Immunology*, 142:1299-1303.
282. Shehata MG, Kenawy MA, El Said SM, **Beier JC**, Gwadz R, Shaaban M. **1989**. *Anopheles sergentii* (Theobald) a potential malaria vector in Egypt. *Annales de Parasitologie Humaine et Comparee*, 64:72-76.
283. **Beier JC**, Oster CN, Koros JK, Onyango FK, Githeko AK, Rowton E, Koech DK, Roberts CR. **1989**. Effect of human circumsporozoite antibodies in *Plasmodium*-infected *Anopheles* (Diptera: Culicidae). *Journal of Medical Entomology*, 27:547-553.
284. El Sawaf BM, Mansour NS, El Said SM, Daba S, Youssef FG, Kenawy MA, **Beier JC**. **1989**. Feeding patterns of *Phlebotomus papatasi* and *Phlebotomus langeroni* (Diptera: Phlebotomidae) in El Agamy, Egypt. *Journal of Medical Entomology*, 26:497-498.
285. **Beier JC**, Perkins PV, Wirtz RA, Koros J, Diggs D, Gargan TP, Koech DK. **1988**. Bloodmeal identification by direct enzyme-linked immunosorbent assay (ELISA), tested on *Anopheles* (Diptera: Culicidae) from Kenya. *Journal of Medical Entomology*, 25:9-16.

286. **Beier JC**, Asiago CM, Onyango FK, Koros JK. **1988**. ELISA absorbance cut-off method affects malaria sporozoite rate determination in wild Afrotropical *Anopheles*. *Medical and Veterinary Entomology*, 2:259-264.
287. Beier MS, Schwartz IK, **Beier JC**, Perkins PV, Onyango F, Koros JK, Campbell GH, Andrysiak PM, Brandling-Bennett AD. **1988**. Identification of malaria species by ELISA in sporozoite and oocyst-infected *Anopheles* from western Kenya. *The American Journal of Tropical Medicine and Hygiene*, 39:323-327.
288. Zimmerman JH, Abbassy MM, Hanafi HA, **Beier JC**, Dees WH. **1988**. Host-feeding patterns of mosquitoes (Diptera: Culicidae) in a rural village near Cairo, Egypt. *Journal of Medical Entomology*, 25:410-412.
289. Shehata MG, El Said SM, **Beier JC**, Kenawy MA, Gwadz R, Shaaban M. **1988**. Immunologic detection of *Plasmodium falciparum* circumsporozoite antigens in *Anopheles sergentii* from Egypt. *Annales de Parasitologie Humaine et Comparee*, 63:215-218.
290. **Beier JC**, Zimmerman JM, Kenawy MA, El Said S, Abbassy MM. **1987**. Host feeding patterns of the mosquito community (Diptera: Culicidae) in two Faiyum Governorate villages, Egypt. *Journal of Medical Entomology*, 24:34-40.
291. Kenawy MA, **Beier JC**, Zimmerman JH, El Said S, Abbassy MM. **1987**. Host-feeding patterns of the mosquito community (Diptera: Culicidae) in Aswan Governorate, Egypt. *Journal of Medical Entomology*, 24:41-45.
292. El Sawaf BM, Shoukry A, El Said S, Lane RP, Kenawy MA, **Beier JC**, Sattar SA. **1987**. A brief report on sandflies in Southern Sinai, Egypt. *Journal of the Egyptian Society of Parasitology*, 17:413-414.
293. **Beier JC**, Perkins PV, Wirtz RA, Whitmire RE, Mugambi M, Hockmeyer WT. **1987**. Field evaluation of an enzyme-linked immunosorbent assay (ELISA) for *Plasmodium falciparum* sporozoite detection in anopheline mosquitoes from Kenya. *The American Journal of Tropical Medicine and Hygiene*, 36:459-468.
294. Beier MS, **Beier JC**, Merdan AI, El Sawaf BM, Kadder MA. **1987**. Laboratory rearing techniques and adult life table parameters for *Anopheles sergentii* from Egypt. *Journal of the American Mosquito Control Association*, 3:266-270.
295. Baker EZ, **Beier JC**, Meek SR, Wirtz RA. **1987**. Detection and quantitation of *Plasmodium falciparum* and *P. vivax* infections in Thai-Kampuchean (Diptera: Culicidae) by enzyme-linked immunosorbent assay. *Journal of Medical Entomology*, 24:536-541.
296. El Sawaf BM, Shoukry A, El Said S, Lane RP, Kenawy MA, **Beier JC**, Abdel Sattar A. **1987**. Sandfly species composition along an altitudinal transect in southern Sinai. *Annales de Parasitologie Humaine et Comparee*, 62:467-473.
297. Hoffman SL, Oster CN, Plowe CV, Hollingdale MR, **Beier JC**, Wirtz RA, Woollett GR, Mugambi M. **1987**. Naturally acquired antibodies to sporozoites do not prevent malaria: implications for vaccine development. *Science*, 237:639-642.
298. **Beier JC**, Beier MS, El Kordy EA, El Said S, Kenawy MA. **1986**. Colonization of the oasis malaria vector, *Anopheles sergentii*, in Egypt. *Journal of the American Mosquito Control Association*, 2:104-105.
299. Kenawy MA, **Beier JC**, El Said S. **1986**. First record of malaria and associated in El Gara Oasis, Egypt. *Journal of the American Mosquito Control Association*, 2:101-103.

300. **Beier JC**, Kenawy MA, El Said S, Merdan AI. **1986**. Vector potential of culicine mosquitoes in Faiyum Governorate, Egypt. *Journal of the American Mosquito Control Association*, 2:164-167.
301. El Said S, **Beier JC**, Kenawy MA, Morsy ZS, Merdan AI. **1986**. *Anopheles* population dynamics in two malaria endemic villages in Faiyum Governorate, Egypt. *Journal of the American Mosquito Control Association*, 2:158-163.
302. Kenawy M, Zimmerman JH, **Beier JC**, El Said S, Abbassy MM. **1986**. Host-feeding patterns of *Anopheles sergentii* and *An. multicolor* (Diptera: Culicidae) in Siwa and El Gara Oases, Egypt. *Journal of Medical Entomology*, 23:576-577.
303. **Beier JC**, El Sawaf BM, Merdan AI, El Said S, Doha S. **1986**. Sand flies (Diptera: Psychodidae) associated with visceral leishmaniasis in El Agamy, Alexandria Governorate, Egypt. I. *Population ecology*. *Journal of Medical Entomology*, 23:600-608.
304. El Said S, **Beier JC**, El Sawaf BM, Doha S, El Kordy E. **1986**. Sand flies (Diptera: Psychodidae) associated with visceral leishmaniasis in El Agamy, Alexandria Governorate, Egypt. II. Field behavior. *Journal of Medical Entomology*, 23:609-615.
305. **Beier JC**, El Sawaf BM, Morsy TA, Merdan AI, Rifaat MM, El Said S. **1986**. Sand flies (Diptera: Psychodidae) associated with visceral leishmaniasis in El Agamy, Alexandria Governorate, Egypt. III. Experimental *Leishmania* infections and vector status. *Journal of Medical Entomology*, 23:616-621.
306. El Said S, Kenawy MA, El Sawaf BM, **Beier JC**, El Sawy FM. **1985**. Seasonal abundance and distribution of *Phlebotomus papatasi* (Diptera: Psychodidae) inside houses in Aswan Governorate, Egypt. *Journal of the Egyptian Society of Parasitology*, 15:371-380.
307. Freier JF, **Beier JC**. **1984**. Oral and transovarial transmission of LaCrosse virus by *Aedes atropalpus*. *The American Journal of Tropical Medicine and Hygiene*, 33:708-714.
308. El Sawaf BM, **Beier JC**, Hussein SM, Kassem H, Sattar SA. **1984**. *Phlebotomus langeroni*: A potential vector of kala-azar in the Arab Republic of Egypt. *Transactions of the Royal Society of Tropical Medicine and Hygiene*, 78:421.
309. **Beier JC**. **1983**. Effects of gregarine parasites on development of *Dirofilaria immitis* in *Aedes triseriatus* (Diptera: Culicidae). *Journal of Medical Entomology*, 20:70-75.
310. **Beier JC**, Harris C. **1983**. *Ascogregarina barretti* (Sporozoa: Diplocystidae) infections in natural populations of *Aedes triseriatus* (Diptera: Culicidae). *Journal of Parasitology*, 69:430-431.
311. Schuler TC, **Beier JC**. **1983**. Oviposition dynamics of two released species of *Toxorhynchites* (Diptera: Culicidae) and potential prey species. *Journal of Medical Entomology*, 20:371-376.
312. **Beier JC**, Patricoski C, Travis M, Kranzfelder J. **1983**. The influence of water chemical and environmental parameters on larval mosquitoes. *Environmental Entomology*, 12:434-438.
313. **Beier JC**, Berry WJ, Craig GB, Jr. **1983**. Horizontal distribution of adult *Aedes triseriatus* (Diptera: Culicidae) in relation to habitat structure, oviposition, and other mosquito species. *Journal of Medical Entomology*, 19:239-247.
314. Durso SL, DeMaio JD, **Beier JC**. **1982**. Ovipositional behavior of *Toxorhynchites amboinensis* in a tire yard. *Mosquito News*, 42:255-260.

315. Leiser LB, **Beier JC**, Craig GB, Jr. **1982**. The efficacy of malathion ULV spraying for urban *Culex* control. *Mosquito News*, 42:617-618.
316. Jacques PA, **Beier JC**. **1982**. Experimental infections of *Ascogregarina lanyuensis* (Apicomplexa, Lecudinidae) in *Aedes* (*Stegomyia*) sp. mosquitoes. *Mosquito News*, 42:438-439.
317. **Beier JC**, Travis M, Patricoski C, Kranzfelder J. **1982**. Habitat segregation among larval mosquitoes (Diptera: Culicidae) in tire yards in Indiana, USA. *Journal of Medical Entomology*, 20:76-80.
318. **Beier JC**, Craig GB. **1982**. Ecology and potential control of mosquito larvae in tires. *Indiana Vector Control Association*, 6:4-5.
319. Leiser LB, **Beier JC**. **1982**. A comparison of oviposition traps and New Jersey light traps for *Culex* population surveillance. *Mosquito News*, 42:391-395.
320. **Beier JC**, Trpis M. **1981**. Incrimination of natural culicine vectors which transmit *Plasmodium elongatum* to penguins at the Baltimore Zoo. *Canadian Journal of Zoology*, 59:470-475.
321. **Beier JC**, Strandberg J, Stoskopf MK, Craft C. **1981**. Mortality in robins (*Turdus migratorius*) due to avian malaria. *Wildlife Disease Association*, 17:247-250.
322. **Beier JC**, Trpis M. **1981**. Local distribution of *Aedes triseriatus* (Diptera: Culicidae) at the Baltimore Zoo. *Mosquito News*, 41:447-455.
323. DeMaio J, **Beier JC**, Durso S. **1981**. The effects of *Bacillus thuringiensis* var. *israelensis* on *Aedes triseriatus* in treehole and tire habitats. *Mosquito News*, 41:765-769.
324. **Beier JC**. **1981**. Larval ecology and potential control of *Aedes triseriatus* breeding in tires. *Ohio Mosquito Control Association*, 11:49-50.
325. **Beier JC**, Stoskopf MK. **1980**. The epidemiology of avian malaria in penguins. *Journal of Zoo and Wildlife Medicine*, 11:99-106.
326. **Beier JC**, Wartzok D. **1979**. Mating behaviour of captive spotted seals (*Phoca largha*). *Animal Behaviour*, 27:772-781.
327. Stoskopf MK, **Beier JC**. **1979**. Avian malaria in African blackfooted penguins. *Journal of the American Veterinary Medical Association*, 175:944-946.

#### 16. Other works, publications and abstracts:

1. Eisele, T., MacIntyre, K., Eckert, E., **Beier, J.** and G. Killeen. **2000**. Evaluating malaria interventions in Africa: A review and assessment of recent research. *MEASURE Evaluation Project*. Working paper sponsored by USAID; pp.36.
2. **Beier JC**. Book Review: *Guidelines for Cost-Effectiveness Analysis of Vector Control*, by M. Phillips, A. Mills, and C. Dye. **1995**. *Journal of the American Mosquito Control Association* 11:155.
3. **Beier JC**. **1993**. Book Review: *The Biology of Mosquitoes*, by A.N. Clements. *Science* 262:1081-1082.
4. **Beier JC**. **1992**. Book Review: *Malaria in Africa: A Cross-Sectorial Approach*. *Journal of the American Mosquito Control Association* 8:343.

5. Lobel HO, **Beier JC. 1989.** Plan of Action for Malaria Control in Ghana. Vector Biology and Control Publication CE-037-4. Washington D.C. 52 pp.
6. **Beier JC,** Onyango FK, Ramadhan M, Koech DK, Roberts CR. **1988.** Malaria Transmission Potential of Wild Afrotropical *Anopheles*: Sporozoite Loads and *In Vitro* Sporozoite Transmission. World Health Organization, TDR - Working Paper for Joint IMMAL/FIELDMAL Meeting, Geneva. 30 pp.

**17. Other works accepted for publication:**

Patents

Killeen GF, Foy BD, **Beier JC.** 1998. SIFTER screening to identify biologically active molecules. US Patent Office (USSN 60/094,036), superseded by a non-provisional application, submitted July 24, 1999; office action August 15, 2001, issued August 1, 2002.

**V. PROFESSIONAL**

**18. Funded Research:**

**Current Projects (annual direct costs given)**

SOUTHEAST REGIONAL CENTER OF EXCELLENCE IN VECTOR-BORNE DISEASE: THE GATEWAY PROGRAM

**Principal Investigator:** Beier (20% effort) (UM subcontract)

**Grant #:** U01CK000510-01

**Funding Source:** CDC

**Project Period:** 12/30/2016-12/29/2021

**Total Award:** \$200,000

POPULATION GENETICS OF *Aedes Aegypti* FROM ECUADOR - TRAINING AND TECHNICAL ASSISTANCE PROJECT (TTAP)

**Principal Investigators:** John Beier, Eduardo Gomez

**Funding Source:** Universidad Catolica de Santiago de Guayaquil

**Project Period:** 01/01/2019-12/30/2021

**Total Award:** \$345,901

MODELING THE SPATIAL AND TEMPORAL DYNAMICS OF VECTOR-BORNE DISEASES IN FLORIDA: THE CASE OF ZIKA OUTBREAK IN 2016

**Principal Investigators:** Shigui Ruan, John C. Beier

**Grant #:** 1853622

**Funding Source:** NSF

**Project Period:** 06/01/2019-05/31/2022

**Total Award:** \$94,189

ULINK Racial Equity Project: RACISM IN AMERICA: CONVERSATIONS BEYOND BLACK AND WHITE

**Principal Investigators:** Sanjeev Chatterjee

**Grant #:** U-LINK

**Funding Source:** University of Miami

**Project Period:** 09/01/2020-08/31/2021

**Total Award:** \$100,000

**Completed Projects (total direct costs given)**

UNIVERSITY OF MIAMI-MIAMI-DADE COUNTY COLLABORATION FOR OPERATIONAL MOSQUITO SURVEILLANCE AND CONTROL

**Principal Investigators:** John C. Beier  
**Funding Source:** Miami-Dade County  
**Project Period:** 01/01/2020-09/30/2020  
**Total Award:** \$196,693

OUTDOOR RESTING AND SUGAR FEEDING BEHAVIORS OF AFRICAN MALARIA VECTORS

**Principal Investigator:** John Beier (30% effort)  
**Grant #:** 1R01AI100968-05  
**Funding Agency:** National Institutes of Allergy and Infectious Diseases  
**Project Period:** 03/01/2013-02/28/2018 [now in no-cost extension for one year]  
**Total Award:** \$492,874

LATIN AMERICAN CENTER FOR MALARIA RESEARCH AND CONTROL - CLAIM

**Principal Investigator:** Beier (18.33% effort) (UM subcontract)  
**Grant #:** 1U19AI089702  
**Funding Source:** National Institutes of Allergy and Infectious Diseases  
**Project Period:** 07/01/10-06/30/17  
**Total Award:** \$42,449 (per year)

COMMUNITY-BASED PARTICIPATION FOR SUCCESSFUL DENGUE CONTROL IN ECUADOR

**Principal Investigators:** John Beier, Whitney Qualls, Eduardo Gomez  
**Funding Source:** Universidad Catolica de Santiago de Guayaquil  
**Project Period:** 10/01/2014-09/30/2016  
**Total Award:** \$330,953

SPECIFIC URBAN LOCATIONS OF TRANSMISSION RISK FOR THE EMERGING ZIKA VIRUS

**Principal Investigator:** John Beier  
**Funding Source:** Miami CTSI  
**Project Period:** 02/15/2016-05/31/2016  
**Total Award:** \$90,514

ENVIRONMENTAL CHANGES AND MOSQUITO-BORNE DISEASES IN ARID ENVIRONMENTS.

**Principal Investigator:** John Beier (25 % effort)  
**Grant #:** 1R01 GM093345-01  
**Funding Source:** National Institute of General Medical Sciences  
**Project Period:** 07/01/2010 – 06/30/14  
**Total Award:** \$2,062,788

DENGUE IN THE AMERICAS

**Principal Investigator:** John Beier  
**Grant #:** N/A  
**Funding Source:** Interdisciplinary Research Development Initiative (IRDI),  
University of Miami  
**Project Period:** 05/01/2009 - 04/30/2010  
**Total Award:** \$100,000

VECTOR-BORNE DISEASE CONTROL IN URBAN ENVIRONMENTS.

**Principal Investigator:** John Beier  
**Grant #:** 1 P20 RR020770-03  
**Funding Source:** NIH (NIH Director's Exploratory Centers for Interdisciplinary Research)  
**Project Period:** 09/28/2004 - 07/31/2008  
**Total Award:** \$1,593,037

AFRICAN MALARIA VECTORS.

**Principal Investigator:** John Beier  
**Grant #:** 1 U19 AI45511-06S1  
**Funding Source:** NIH/NIAID (ICIDR Program)  
**Project Period:** 09/01/99 - 08/31/06  
**Total Award:** \$4,055,631

AFRICAN MALARIA VECTORS (TRAINING GRANT).

**Principal Investigator:** John Beier  
**Grant #:** 1 D43 TW01142-04  
**Funding Source:** NIH Fogarty International Center, ABC Program  
**Project Period:** 06/01/99 - 05/31/06  
**Total Award:** \$653,500

VECTOR ECOLOGY OF URBAN MALARIA IN AFRICA.

**Principal Investigator:** John Beier  
**Grant #:** 1 F06 TW05588-01  
**Funding Source:** NIH Fogarty International Center, Senior Fellowship  
**Project Period:** 03/01/01-02/29/06  
**Total Award:** \$29,700

**19. Editorial responsibilities:**

**Editorial Boards**

Reviews Editor, Acta Tropica	<b>2011-Present</b>
Editor, Acta Tropica	<b>2009-Present</b>
Editorial Board, Current Research in Insect Science	<b>2020-present</b>
Reviews Editor, Frontiers in Medicine	<b>2020-Present</b>
Reviews Editor, Frontiers in Public Health	<b>2020-Present</b>
Editorial Board, Malaria Journal	<b>2006-2014</b>
Editorial Board, Insect Sciences and Its Application	<b>1998-2006</b>
Associate Editor, Journal of the American Mosquito Control Association	<b>1994-1997</b>

**Reviewing Services for Scientific Journals**

Reviewer for: American Journal of Tropical Medicine and Hygiene, Journal of Medical Entomology, Malaria Journal, Acta Tropica, Journal of the American Mosquito Control Association, Journal of Vector Ecology, Medical and Veterinary Entomology, Journal of Parasitology, Experimental Parasitology, Journal of Wildlife Diseases, Vaccine Research, Parasitology Today, Trends in Parasitology, Science, American Journal of Epidemiology, Insect Science and Its Application, Science, Annals of Tropical Medicine and Parasitology, Journal of Emerging Infectious Diseases, Proceedings of the National Academy of Sciences, Parasitology, Nature Protocols, PLoS ONE, PLoS NTD, Transactions of the Royal Society of Tropical Medicine and Parasitology, Journal of Insect Physiology, Journal of Applied Ecology, Journal of Infectious Diseases, Ethiopian Journal of Science, Current Research in Insect Science, Environment International, Pest Management Science, Scientific Reports, Science, and Nature.

**Reviewing Services for Scientific Proposals**

NIH Fogarty Global Infectious Disease Training Program	<b>2019, 2020</b>
United Arab Emirates University (UAEU)	<b>2019</b>
Member, NIH Vector Biology Study Section (Chair, 2014-2016)	<b>2012-2016</b>
American Association for the Advancement of Science, King Abdulaziz City for Science and Technology (KACST) (national science agency of Saudi Arabia)	<b>2012</b>
U.S. Department of Defense Military Infectious Diseases Research Program (MIDRP) Entomology Program (Chair, 2011-2014).	<b>1999-2014</b>
Review Panel, NIH Vector Biology Study Section	<b>2011</b>
NIH Director's Early Independence Award applications (DP5)	<b>2011</b>
NIH CRFS small business initiatives, study section panel member [ZRG1 IDM-R (10)]	<b>2011</b>



USAID President's Malaria Initiative Health Research Challenge for Delivery (HRCD)	2010
NIH Fogarty International Research Scientist Career Development	2010
Project NIH IRAP Study Section	2009 & 2010
NIH Challenge Grant review	2009
CDC Special Emphasis Panel CK09-004	2009
NSF, Division of Earth Sciences, Hydrologic Sciences	2008 & 2010
NIH NIAID Special Emphasis Panel, NIH SEP: ZRG1 IDM-H (03)	2008
NIH Roadmap, Facilitating Interdisciplinary Research via Methodological and Technical Innovation in the Behavioral and Social Sciences (R21)	2007
NIH/NIEHS/FIC, International Training and Research in Environmental and Occupational Health	2006
WHO TDR Molecular Entomology Program (3-4 proposals per year)	2002-2006
National Science Foundation	1999-2005
Wellcome Trust Programme in Infection and Immunity (2-4 proposals per year)	1996-2006
Israel National Science Foundation	1996
NIH/NIAID Reviewer for RFA/Special Program on Emerging Diseases	1995
NIH/NIAID Tropical Medicine and Parasitology, Entomology Study Section	1993-1997
FIELDMAL, TDR, World Health Organization	1993
NIH Minority Biomedical Research Program, National Institutes of Health	1993

## 20. Professional and Honorary Organizations:

### **Society Membership:**

American Society of Tropical Medicine and Hygiene	1982 – Present
Society of Vector Ecology	1987 – 2005, 2012
American Association for the Advancement of Science	1982 – 2005
Entomological Society of America	1981 – 2005
American Mosquito Control Association	1980 – 2005
American Society of Parasitologists	1979 – 2004
Ecological Society of America	1981–92/1999-2003
Royal Society of Tropical Medicine and Hygiene	1988 – 2001
Wildlife Disease Association	1982 - 1992

### **Society Offices:**

Member, American Committee on Medical Entomology (ACME), American Society of Tropical Medicine and Hygiene.	1992 – 2005
Member, Nominations Committee, American Society of Tropical Medicine and Hygiene.	1999 - 2000
Program Leader, Malaria Vector Program, International Center for Insect Physiology and Ecology (ICIPE), Nairobi, Kenya.	1996 - 1999
Member, Scientific Program Committee, American Society of Tropical Medicine and Hygiene.	1993 - 1999
Councilor, American Society of Tropical Medicine and Hygiene,	1994 – 1998
Nominated and Approved as a Faculty Member, Molecular and Cellular Biology Program, Tulane University	1995
Nominated and Approved as a Faculty Member, Graduate Program, Tulane University	1995
Chairman, American Committee on Medical Entomology (ACME), American Society of Tropical Medicine and Hygiene.	1994
Delta Omega (The Honorary Public Health Society)	1989-present

## 21. Honors and Awards: N/A

## 22. Post-Doctoral Fellowships:

Department of Biology, (Mentor: Dr. George B. Craig, Jr.);	1981 - 1982
NIH Individual Training Grant, University of Notre Dame,	1980 - 1981
NIH Training Grant in Vector Biology and Parasitology, University of Notre Dame,	1980 - 1981

### **23. Other Professional Activities:**

#### **Advisory Committees**

Board of Directors, Kuvim Center for the Study of Infectious and Tropical Diseases at the Hebrew University of Jerusalem	<b>2015-present</b>
Vector Control Advisory Group (VCAG), World Health Organization	<b>2013-2016</b>

#### **Biotechnology**

Board of Directors, HIATECH Biotechnology, Hialeah, FL	<b>2005-2009</b>
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#### **Consultantships**

Faculty Advisor for Medical Student Training, American Medical Student Association, International Health Committee sponsored "Introduction to Clinical Tropical Medicine in Burkina Faso, West Africa". [ <a href="http://www.amsa.org/global/burkina.cfm">www.amsa.org/global/burkina.cfm</a> ]	<b>2001-2003</b>
American Institute of Biological Sciences (AIBS), Reviewer for U.S. Department of Defense Infectious Diseases Program.	<b>1/2002</b>
American Institute of Biological Sciences (AIBS), Reviewer for U.S. Department of Defense Infectious Diseases Program.	<b>11-12/2000</b>
NIH/NIAID Trainer, Grant Writing Workshop for African Scientists, Houston, Texas.	<b>11/2000</b>
American Institute of Biological Sciences (AIBS), Reviewer for U.S. Department of Defense Infectious Diseases Program.	<b>1-2/2000</b>
Environmental Health Project of USAID, to direct a workshop on entomological and epidemiological measures for evaluating malaria control programs.	<b>11/2003– 1/2004</b>
Environmental Health Project of USAID, to assist with the development of National Malaria Control Programs in Eritrea and Mozambique.	<b>8/1999-2001</b>
American Institute of Biological Sciences (AIBS), Reviewer for U.S. Department of Defense programs in Infectious Diseases,.	<b>3-4/1999</b>
Environmental Health Project of USAID, to develop an entomology and malaria control training course in Eritrea. 77	<b>2-7/1998</b>
NIH/NIAID, Consultant to assist with project implementation at the Malaria Research and Training Center, Ecole Nationale de Medecine et de Pharmacie, Bamako, Mali.	<b>7/1996</b>
International Center for Insect Physiology and Ecology (ICIPE), Nairobi, Kenya, Consultant to develop a 5-year plan for the Malaria Vector Sub-programme.	<b>4-5/1996</b>
NIH/NIAID, Consultant to assist with project development at the Malaria Research and Training Center, Ecole Nationale de Medecine et de Pharmacie, Bamako, Mali.	<b>3/1996</b>
Labat-Anderson Incorporated, Washington D.C., Consultant to review proposals	<b>7/1995</b>

for the Department of Defense in the area of Infectious Diseases.

U.S. Agency for International Development, Consultant to review the Malaria Research and Training Center project at the Ecole Nationale de Medecine et de Pharmacie, Bamako, Mali.	<b>1/1995</b>
NIH/NIAID Office of International Research, Consultant for the NIAID Conference on the Impact of Global Warming on Tropical Diseases.	<b>8/1993</b>
NIH/NIAID Office of International Research, Consultant to the Ain Shams University Research and Training Center on Vectors of Diseases, Cairo, Egypt, to assist with studies of urban filariasis.	<b>5/1992</b>
NIH/NIAID Consultant, Ecole Nationale de Medecine et de Pharmacie, Bamako, Mali, to provide training in ELISA techniques for bloodmeal identification and sporozoite detection.	<b>3/1992</b>
Istituto de Parassitologia, University of Rome, Consultant to plan studies of the <i>Anopheles gambiae</i> complex in Kenya.	<b>2/1992</b>
U.S. Army, Walter Reed Army Institute of Research, Consultant on assignment in Kenya to evaluate entomological components of a malaria vaccine field trial.	<b>6/1990</b>
NIH/NIAID Office of International Research, Consultant to the Ain Shams University Research and Training Center on Vectors of Diseases, Cairo, Egypt, to participate in a meeting of the Egypt-Israel Regional Project in Tropical Medicine.	<b>4/1990</b>
U.S. Agency for International Development, Consultant, Vector Biology and Control Project, Assignment in Accra, Ghana, to prepare a Malaria Plan of Action for the USAID Mission.	<b>4/1989</b>
NIH/NIAID Office of International Research, Consultant to the Ain Shams University Research and Training Center on Vectors of Diseases, Cairo, Egypt, to plan studies on urban filariasis.	<b>2/1989</b>
NIH/NIAID Office of International Research, Consultant to the Ain Shams University Research and Training Center on Vectors of Diseases, Cairo, Egypt, to conduct a training course in ELISA techniques for vector bloodmeal identification.	<b>2/1988</b>
U.S. Army, Walter Reed Army Institute of Research, TDY in Nairobi, Kenya, to develop a malaria field program for vaccine trials	<b>9/10-1995</b>
NIH/NIAID Office of International Research, Assignment in Izmir and Adana, Turkey, to develop a malaria research and control program.	<b>10/1984</b>
NIH/NIAID Office of International Research, Medical Entomology Consultant, Haddassah Medical Center, Jerusalem, Israel.	<b>8/1984</b>
Baltimore Zoological Society, Consultant on avian malaria,	<b>1980-1994</b>
<b><u>National/International committees</u></b>	
Military Infectious Disease Review Panel (MIDRP)	<b>1999-2014</b>
World Health Organization Vector Control Working Group (VCWG)	<b>2010-Present</b>

World Health Organization Vector Control Vector Control Advisory Committee (VCAG)	<b>2015-2017</b>
Participant, CDC/USAID/PAHO Amazon Malaria Initiative, Working Group	<b>10/2010</b>
Meeting on Malaria Vector Control, at CDC in Atlanta, Georgia.	<b>9/2010</b>
Second USAID/RTI/WHO Integrated Vector Management Working Group Meeting on Capacity Building and Training, in Washington DC.	<b>10/2010</b>
Participant, Informal Consultation on Global Malaria Control and Elimination: A Technical Review, 17-18th January 2008, WHO, Geneva.	<b>1/2008</b>
Vector Control Consultation, Bill and Malinda Gates Foundation, Seattle, Washington.	<b>7/2008</b>
USAID Technical Advisory Committee on Malaria Research, Washington DC.	<b>1999-2001</b>
Executive Committee, NIH Collaborations in Infectious Diseases, Bethesda, Maryland	<b>1999-2004</b>
Chairman, NIH NIAID Pathogen Specific Group (PSG) for the ICIDR International Program, Entomology PSG, Bethesda, Maryland.	<b>1999-2004</b>
Member, ASTMH/ACME Committee to formulate Guidelines for the Containment of Vector Arthropods.	<b>2000-2002</b>
Member, PDU/TDR/WHO Malaria Transmission-Blocking Vaccine Task Force,	<b>1994-1998</b>
Member, Malaria Task Force, International Center for Insect Physiology and Ecology (ICIPE), Nairobi, Kenya.	<b>1996</b>
Member, External Review Committee, to review and advise on the Malaria Program at the Centers for Disease Control and Prevention, Atlanta, Georgia.	<b>1996</b>
Rapporteur, Entomology, International Conference on Malaria in Africa, Dakar, Senegal.	<b>1/1997.</b>
Member, Committee for the Study on Malaria Prevention and Control, Institute of Medicine, National Academy of Sciences.	<b>1989-1991</b>
<b><u>Invited presentations (since 1988)</u></b>	
"Environmental changes and vector-borne diseases" NIH/NIAID workshop on: Endemic and Emerging Infectious Diseases of Priority in the Middle East and North Africa Research Opportunities and Biosafety in a Changing Environment. Istanbul, Turkey	<b>6/2012</b>
"How much vector control is needed to achieve malaria elimination? The Ninth Arbovirus Surveillance & Mosquito Control Workshop Sponsored by AMCD, USDA/CMAVE and FMCA St. Augustine, Florida	<b>3/2012</b>
"Prospects for malaria elimination in non-Amazonian regions of Latin America". Symposium at the ASTMH meetings in Philadelphia,	<b>12/2011</b>
"Non-Amazonian Latin America ICEMR: Centro Latino Americano de Investigación en Malaria CLAIM". Annual NIH ICEMR Workshop, Livingstone, Zambia.	<b>9/2011</b>
"Entomological needs and challenges for the NIH ICEMR network". Caucaseco Research Center, Cali, Colombia.	<b>8/2011</b>

Non-Amazonian Latin America ICEMR: Centro Latino Americano de Investigación en Malaria CLAIM". Annual NIH ICEMR Workshop, Washington DC.	<b>8/2010</b>
"Malaria Epidemiology". Microbiology and Immunology Club "Microbiology Awareness Week", University of Miami.	<b>11/2009</b>
"H1N1 Swine Flu: Global Outbreak and Rapid Spread" University of Miami Sigma Xi Symposium on H1N1 Influenza.	<b>11/2009</b>
"Integrated Vector Management for Malaria Vector Control in Africa". University of Bamako, Bamako, Mali, June 2009.	<b>6/2009</b>
"Global outbreak and rapid spread" University of Miami, Department of Epidemiology and Public Health Symposium: Swine Flu (H1N1): Facts and Forecasts.	<b>5/2009</b>
"Sugar-Feeding in African Malaria Vectors" Vector Control Consultation, Bill and Malinda Gates Foundation, Seattle, Washington.	<b>7/2008</b>
"Vector-Borne Diseases and Global Public Health" Department of Epidemiology and Public Health, University of Miami.	<b>7/2008</b>
"Malaria, Dengue, and HIV: The Triple Global Health Threat" National Pediatric Conference, Punta Cana, Dominican Republic.	<b>6/2008</b>
"Climate Change and Malaria", Symposium on Climate Change and Health, University of Miami.	<b>4/2008</b>
"Increasing urban transmission of malaria and dengue in tropical environments" "Salud Publica y Ciudad" (Congress of Public Health), Cali, Colombia.	<b>4/2008</b>
"Vector Biology Program at University of Miami", Florida Working Group on Vector Borne Pathogens Meeting, Vero Beach, FL.	<b>1/2008</b>
"Vector-Borne Diseases in Urban Environments" Naval Medical Research Unit, Cairo, Egypt.	<b>2/2008</b>
"Malaria Advocacy Boot Camp - Nothing But Nets campaign, a grassroots campaign save lives by preventing malaria", University of Miami.	<b>5/2007</b>
"Control of Vector-Borne Diseases in Urban Environments", Abess Center for Ecosystem Science and Policy (ACESP), University of Miami.	<b>4/2007</b>
"Malaria parasite transmission and control in Africa". Department of Global Health, University of South Florida, Tampa, FL.	<b>9/2006</b>
"Malaria parasite transmission and control". Department of Biology, Florida International University, Miami, FL.	<b>4/2006</b>
" <i>Anopheles</i> Larvae in Urban Settings: Ecology and Habitats". American Society of Tropical Medicine and Hygiene annual meeting, Washington DC.	<b>12/2005</b>
"Malaria Parasite Transmission by Mosquitoes and the Burden of Malaria in Africa". Department of Molecular Parasitology and Immunology, New York University.	<b>9/2005</b>
"Malaria Parasite Transmission by Mosquitoes and the Burden of Malaria in Africa".	<b>9/2005</b>

Department of Biology, University of Miami.

"The Global Threat of AIDS, Tuberculosis and Malaria". University of Miami, Cosford Cinema, Coral Gables Campus.	<b>11/2004</b>
"Pathogens and their eco-systems". Institut Pasteur, 5 <sup>th</sup> Louis Pasteur Conference on Infectious Diseases.	<b>11/2004</b>
"University of Miami Global Public Health Research Group (GPHRG) the beginning". Instituto de Inmunologia, Centro Internacional de Vacunas, Cali Columbia.	<b>10/2004</b>
"Standard Indicators And Methods For Measuring And Reporting Malaria Transmission". 52 <sup>nd</sup> Annual Meeting of the American Society of Tropical Medicine and Hygiene.	<b>12/2003</b>
"Malaria parasite transmission and control". Department of Microbiology and Immunology, University of Miami.	<b>3/2003</b>
"Relationships between the force of malaria parasite transmission by mosquitoes and the public health burden of malaria in communities". Department of Epidemiology and Public Health, University of Miami.	<b>3/2002</b>
"Relationships between the force of malaria parasite transmission by mosquitoes and the public health burden of malaria in communities". Department of Tropical Medicine and Medical Microbiology, University of Hawaii.	<b>2/2002</b>
"Biological basis for the public health burden of malaria in African communities". Imperial College, London, UK.	<b>6/2001</b>
"Malaria public health problems in Africa: transmission dynamics and human infection/disease". School of Public Health, Harvard University, Boston, MA.	<b>5/2001</b>
"New strategies for malaria vector control". Louisiana Mosquito Control Association meetings. New Orleans, LA.	<b>11/2000</b>
" <i>Anopheles</i> mosquito adaptation to urban environments in Africa". Kilifi Research Unit, Kenya Medical Research Institute, Kilifi, Kenya.	<b>8/2000</b>
"Parameters of success: when malaria control will work". JFK Institute of Government, Harvard University, Boston, MA.	<b>6/2000</b>
"Beyond the bednets: the future of malaria vector control in Africa" USAID, Washington, DC.	<b>5/2000</b>
"Malaria transmission and human infection/disease". School of Public Health, Harvard University, Boston, MA..	<b>5/2000</b>
"Relationships between the force of malaria parasite transmission by mosquitoes and the public health burden of malaria in communities". NIH ICTDR meetings, Bethesda, Maryland, April 2000.	<b>4/2000</b>
"Overview of NIH-supported malaria vector research in Kenya". NIH Workshop on Malaria Vector Ecology, Mbita Point, Kenya.	<b>2/2000</b>
"Malaria vector research in Africa". Jomo Kenyatta University, Nairobi, Kenya,	<b>10/1999</b>

"Malaria transmission and human infection/disease". Kilifi Research Unit, Kenya Medical Research Institute, Kilifi, Kenya.	<b>10/1999</b>
"Establishing levels of control necessary to reduce malaria infection and disease". Symposium on Public Health Promise of Genetically Modified Vectors (Organizer, Andrew Spielman, Harvard University). Society of Vector Ecology meeting, Ashville, NC.	<b>10/1999</b>
"Malaria vector ecology and transmission control in Africa". Department of Entomology, University of California, Riverside, California.	<b>1/1999</b>
"Malaria vector research in Africa". Department of Biology, Ohio University, Athens, Ohio.	<b>11/1998</b>
"Malaria vector control in Africa". Ohio Mosquito Control Association meetings, Athens Ohio.	<b>12/1998</b>
"Malaria vector research in Kenya: Development of an NIH ICIDR grant". Department of Tropical Medicine, Tulane University Medical Center.	<b>8/1998</b>
"Sporozoite transmission by naturally infected mosquitoes". American Society of Tropical Medicine and Hygiene meeting, Orlando, Florida.	<b>12/1997</b>
"Importance of malaria transmission characteristics in malaria epidemiology". Society of Vector Ecology, Orlando, Florida.	<b>10/1997</b>
"Malaria Transmission-Blocking Vaccine Development: Current Status". Malaria Research and Training Center, National School of Medicine and Pharmacy, Bamako, Mali, West Africa.	<b>3/1997</b>
"Malaria Vector Research in Africa". Annual Meeting, Louisiana Mosquito Control Association, Covington, Louisiana.	<b>10/1996</b>
"Malaria Parasite Infections in Mosquitoes". Malaria Research and Training Center, National School of Medicine and Pharmacy, Bamako, Mali, West Africa.	<b>7/1996</b>
"Malaria Parasite Development in Mosquitoes". Department of Pathology, Tulane University Medical Center, New Orleans, Louisiana.	<b>3/1996</b>
"Bottlenecks to Malaria Parasite Development in Mosquitoes". Department of Pharmacology, Tulane University Medical Center, New Orleans, Louisiana.	<b>2/1996</b>
"Malaria Vector-Parasite Relationships". Department of Biology, Loyola University, New Orleans, Louisiana.	<b>2/1996</b>
"Advances in Malaria Epidemiology". Malaria Task Force Meeting, International Center for Insect Physiology and Ecology (ICIPE), Nairobi, Kenya.	<b>2/1996</b>
"Mosquitoes and Malaria: Challenges at Tulane". Department of Medicine, Tulane University, New Orleans, Louisiana.	<b>1/1996</b>
"Malaria Parasite Development in Mosquitoes". Molecular and Cellular Biology Program, Tulane University, New Orleans, Louisiana, December 1995.	<b>12/1995</b>
"The Effect of Environmental Temperature on the Transmission of Malaria Parasites". Invited presentation for the 1995 American Committee on Medical Entomology	<b>11/1995</b>

Symposium entitled: "The Effect of Environmental Temperature on the Transmission of Arthropod-Borne Diseases", San Antonio, Texas.

- "Malaria Epidemiology in Kenya". Department of Biostatistics and Epidemiology, Tulane University, New Orleans, Louisiana. **10/1995**
- "Malaria Vector-Parasite Relationships". Department of Tropical Medicine, Tulane University, New Orleans, Louisiana. **7/1994**
- "Malaria Parasite Transmission Relative to the Incidence of Severe Disease in Children". Department of Epidemiology and Department of Entomology, Michigan State University, East Lansing, Michigan. **3/1994**
- "Malaria Parasite Transmission in Africa vs. the Caribbean". Caribbean Epidemiologic Research Center and Insect Vector Control Division, MOH, Trinidad. **2/1994**
- "Malaria Parasite Transmission in Kenya: Ecological Relations between Transmission Intensity and the Incidence of Severe Disease". Tropical Medicine Dinner Club of Washington, NIH, Bethesda, Maryland. **11/1993**
- "Malaria Vector Research". Department of Immunology and Infectious Diseases, The Johns Hopkins University, Baltimore, Maryland. **10/1993**
- "New Developments in Malaria Sporozoite Biology". University of Rome, Rome, Italy. **2/1993**
- "Malaria Sporozoite Biology". Kenya Medical Research Institute, Kilifi Research Unit, Kilifi, Kenya. **2/1993**
- "Insect Repellants". The Johns Hopkins University, CCIH course: Topics in International Travel & Tropical Medicine, Baltimore, Maryland. **10/1992**
- "Malaria Sporozoite Biology". Department of Tropical Medicine, Tulane University, New Orleans, Louisiana. **8/1992**
- "Vector Field Research In Preparation for Malaria Vaccine Field Trials". Division of Disease Assessment, USAMRID, Ft. Detrick, Maryland. **7/1992**
- "Malaria Vector Field Programs: An Update". Tropical Medicine Society of Washington, NIH, Bethesda, Maryland. **3/1992**
- "Malaria Parasite Transmission and Severe Disease in Kilifi, Kenya". University of Rome, Rome, Italy. **2/1992**
- "Assessing the Malaria Transmission Potential of *Anopheles* Mosquitoes Used in Vaccine Challenge Studies". Malaria Section, Naval Medical Research Institute, Rockville, Maryland. **7/1990**
- "Vector-Related Methodology for Conducting Epidemiological Studies of Filariasis in Egypt". National Institutes of Health, Egypt-Israel Regional Project in Tropical Diseases: Eighth Joint Meeting held in Taba, Egypt. **4/1990**
- "Vector-Related Priorities for Urban Filariasis". National Institutes of Health, Egypt-Israel Regional Project in Tropical Diseases, Cairo, Egypt. **10/1989**
- "Factors Affecting Sporozoite Transmission by Malaria Vectors in Africa". **9/1989**



Atomic Energy Agency Workshop on the *Anopheles gambiae* Complex in Africa, Rome.

"Malaria Transmission in Africa". The Johns Hopkins University Corporate Council on International Health. Baltimore, Maryland. **10/1988**

"Malaria Transmission Potential of Wild Afrotropical *Anopheles*: Sporozoite Loads and *In Vitro* Sporozoite Transmission". **9/1988**  
World Health Organization IMMAL/FIELDMAL Meeting, Geneva, Switzerland.

## **VI. TEACHING**

### **24. Teaching Awards Received:**

Best Teacher Award (Department of Public Health Sciences) **2013**

### **25. Teaching Specialization:**

#### **Courses Taught University of Miami**

##### **Medical Campus:**

Ecology and Control of Vector-Borne Diseases EPH 639 **2012 to present**

Climate & Health EPH 646 **2017 to present**

Infectious Disease Epidemiology and Control EPH 622 **2004 to 2009**  
University of Miami; Primary Instructor

##### **Coral Gables Campus:**

Interdisciplinary Environmental Methods ECS503 **2011**

Special Topics in Ecosystem Science and Policy ECS572 **2011-2013**  
(Infectious Disease Ecology, Control, and Policy)

Introduction to the Earth's Ecosystem ECS111 **2009**  
University of Miami; Primary Instructor

Special Topics in Ecosystem Science and Policy ECS 372 **2008**  
(Foundations of Infectious Disease Ecology, Control, and Policy)

##### **Invited Lectures at University of Miami**

Jay Weiss Center Student Pathway in Social Medicine **2009-2011**

Foreign Policy and Infectious Disease INS US

Globalization and Health INS 370/570

Bridges over Babylon: Ethics, Culture, and International Bio-medical Research 360 HX

Seminar in Contemporary Environmental Issues ECS 201

##### **Courses Taught at Tulane University:**

Parasitology Seminar TRMD 702 rotating basis with 4 faculty **1995-2003**  
Primary Instructor; Tulane University

Bioinformatics BIOS 799 **2001-2003**  
co-taught with Dr. Fran Mather; Tulane University

Medical Parasitology for second-year Tulane Medical Students T2  
Primary Instructor; Tulane University 1996-2002

Parasitologic Methods TRMD 708  
Primary Instructor; Tulane University 1996-2002

Advanced Medical Entomology [new course developed] TRMD 780  
Primary Instructor; Tulane University 1996-2002

Special Studies and Research TRMD 799  
Primary Instructor; Tulane University 1995-2002

Bioinformatics in Entomology, Specialty Course:  
co-taught with Dr. Fran Mather with support from the NIH Fogarty,  
Tulane University 4-5/2002

**Guest Lectures at Tulane University**

Molecular and Cellular Biology Research Methods MCB 712 1995-2002

Molecular and Cellular Biology Seminar MCB 714 1995-2002

Preventive Tropical Medicine TRMD 632 1995-2002

Disease Control in Developing Countries TRMD 635 1995-2002

Introduction to Infectious Diseases EPID 609/610 1995-1996

**Courses Taught at Johns Hopkins University**

Field Studies in Ecology and Behavior 1991-1994  
Primary Instructor; Johns Hopkins University

Malariology [new course developed] 1991-1994  
Primary Instructor; Johns Hopkins University

Special Studies and Research 1989-1994  
Primary Instructor; Johns Hopkins University

Laboratory Rotations 1989-1994  
Primary Instructor; Johns Hopkins University

Vector Ecology [new course developed] 1990-1991  
Primary Instructor; Johns Hopkins University

Foundations of Tropical Public Health 1989-1991  
Primary Instructor; Johns Hopkins University

**Guest Lectures at Johns Hopkins University 1998-1994**

Tropical Medicine and International Health (JHU School of Medicine)

Issues and Careers in International Health (JHU School of Medicine)

Biological Basis of Public Health, (JHU Montgomery County Branch)

Ecology of Zoonotic Diseases

Ethics in Biomedical Research

**26. Thesis and Dissertation Advising/Post-doctoral student supervision:**

**Advisees: Research Associates/Postdoctoral Fellows:**

Andre Wilke, PhD, Postdoctoral Associate, University of Miami 2017-present

Whitney Qualls, PhD, Postdoctoral Associate, University of Miami 2012-2016

Amy Conley, PhD, Postdoctoral Associate, University of Miami 2013-2014

Reginald Archer, PhD, Postdoctoral Associate, University of Miami	2012-2014
Yanyu Xiao, PhD, Postdoctoral Associate, University of Miami	2013-2014
Farida Chamchod, PhD, Postdoctoral Fellow, University of Miami,	2011-2012
Daniel Impoinvil, Ph.D. Postdoctoral Fellow, University of Miami	2006-2007
Maria Alonso, Ph.D., Postdoctoral Fellow, University of Miami	2005-2006
Joseph Keating, PhD, Postdoctoral Fellow, University of Miami	2003-2005
Louis Gouagna, PhD, Research Associate, ICIPE, Nairobi, Kenya	1999-2004
Brian Foy, Ph.D., Postdoctoral Fellow, Tulane University	2001-2002
Weidong Gu, Ph.D., Postdoctoral Fellow, Tulane University	2000-2001
Gerard Killeen, PhD, Postdoctoral Fellow, Tulane University	1997-2000
Noboru Minakawa, PhD, Postdoctoral Fellow, ICIPE, Nairobi, Kenya	1998-1999
Yemane Mebrahtu, PhD, Postdoctoral Fellow, Tulane University	1997-1998
Celeste Mazzacano, PhD, Postdoctoral Fellow, Tulane University	1995-1997
Susanne Straif, PhD/MPH, Postdoctoral Fellow, Tulane University	1995-1997
Ji-Min Mei, MD/MS, Postdoctoral Fellow, Johns Hopkins University and Tulane	1994-1995
Seydou Doumbia, MD (Mali), IAEA Trainee, The Johns Hopkins University	1994
James DeMaio, MD/ID Fellow, The Johns Hopkins University	1994
Charles Pumpuni, PhD, Postdoctoral Fellow, The Johns Hopkins University	1992-1994
Chandana Mendis, PhD, Postdoctoral Fellow, The Johns Hopkins University	1992-1993
Jefferson Vaughan, PhD, Research Associate, The Johns Hopkins University	1990-1993

**Advisees: MSc and PhD Students:**

Jagger Alexamder, Masters of Science Climate & Health	2020-present
Lin Zhu, PhD Program, Department of Public Health Sciences	2012-2017
Diana Naranjo, PhD Program, Department of Public Health Sciences	2013-2016
Jill Ulrich, PhD Program, Ecosystem Science and Policy, University of Miami	2013-2016
Temitope Alimi, PhD Program, Ecosystem Science and Policy, University of Miami,	2011-2016
Tanjim Hossain, PhD Program, Ecosystem Science and Policy, University of Miami	2013-2014
Deborah Roque, PhD Program, Ecosystem Science and Policy, University of Miami	2112-2014
Diana Naranjo, MAIA A&S Program, University of Miami	2112
Harold Gil, MSPH Program, DEPH, University of Miami	2012-2014
Mike Parenti, PhD Program, Ecosystem Science and Policy, University of Miami	2010-2012
Gillian Stresman, PhD Program, DEPH, University of Miami	2010-2011
Eddy Perez, PhD Program, University of Miami	2005-2009
Adriana Troyo, PhD Program, University of Miami	2004-2007
Daniel Impoinvil, PhD Program, University of Miami	2002-2006
Maria Alonso, PhD Program, Capella Universit	2002-2005
John Carlson, MD/PhD Program, Tulane University	2002-2004
Paul Mireji, PhD Program, Kenyatta University and ICIPE	2001-2006
Joseph Odhiambo, PhD Program, Kenyatta University and ICIPE	2001-2005
Wilfred Emonyi, PhD Program, Kenyatta University and ICIPE	2001-2005
Ben Jacob, PhD program, University of Miami	2001-2004
Joseph Keating, PhD Program, Tulane University	2001-2003
Tereza Magalhaes, PhD program, University of Miami.	2000-2005
Bernard Okech, PhD program, Kenyatta University and ICIPE	1999-2003
Abdoulaye Toure, PhD Program (Parasitology), Tulane University	1995-2002
Brian Foy, PhD program (Molecular and Cellular Biology), Tulane University	1995-2001
Chansak Suwanchaichinda, PhD Program, Tulane University	1996
Ephantus W. Kabiru, PhD program, University of Nairobi	1991-1995
Charles M. Mbogo, PhD program, University of Nairobi	1991-1995
Bruce Noden, PhD program, The Johns Hopkins University	1991-1995
Ibrahim Azem, PhD program, The Johns Hopkins University	1991-1993
Geoffrey Chege, MSc program, The Johns Hopkins University	1991-1993

**Advisees: University of Miami Medical Students and Residents:**

Aileen Chang, MD, Resident, Jay Weiss Program,	2011-2012
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Yuliya Tipograf, 2 <sup>nd</sup> year Medical Student, Jay Weiss Program,	<b>2011</b>
Pooja Dharwadkar, 2 <sup>nd</sup> year Medical Student, Jay Weiss Program,	<b>2011</b>
Onome Ulukpo, 2 <sup>nd</sup> year Medical Student, Jay Weiss Program,	<b>2011</b>

**Undergraduate Minority Students:**

Kenechi Okany, Bridge to Baccalaureate Program at UM,	<b>2011</b>
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**VII. SERVICE**

**27. University Committee and Administrative Responsibilities:**

**Department of Department of Public Health Sciences UM 2003 to Present:**

Chief, Division of Environment & Public Health	<b>2013-present</b>
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Executive Committee	<b>2013-present</b>
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Graduate Programs Committee	<b>2013-present</b>
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MSCH Admissions Committee	<b>2020-present</b>
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MPH Admissions Committee	<b>2011-2014</b>
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University of Miami Miller School of Medicine Epidemiology and Public Health Grand Rounds Coordinator	<b>2008-2009</b>
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University of Miami Miller School of Medicine Epidemiology and Public Health Epidemiology Division Committee	<b>2008-2009</b>
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University of Miami Miller School of Medicine Epidemiology and Public Health Epidemiology PhD Admissions Committee	<b>2008-2009</b>
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University of Miami Miller School of Medicine Epidemiology and Public Health Faculty Advisory Committee	<b>2003-2005</b>
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**University of Miami – University-wide**

University of Miami – University-wide Abess Center for Ecosystem Science and Policy (CESP) Faculty Advisory Committee	<b>2006-2013</b>
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University of Miami – University-wide Scientific Misconduct Committee	<b>2006-2010</b>
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University of Miami- University-wide Research Council	<b>2008-2010</b>
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University of Miami - University-wide Organizer, Symposium on Swine Flu Update, University of Miami	<b>4/2009</b>
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University of Miami- University-wide Organizer, Symposium on Climate Change and Your Health,	<b>4/2008</b>
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**28. Community Activities:**

Grade School Volunteer: participated in Career Day at Gloria Floyd Elementary  
and Vineland Elementary, Miami, Florida. **2007-2010 and 2017-2019**