

PERSONAL INFORMATION

Date and Place of Birth: July 7, 1972: Winston-Salem NC, USA

EDUCATION

- 8/94 - 8/97 The University of North Carolina School of Public Health, Chapel Hill, NC - Ph.D. (Epidemiology, minor in microbiology and immunology)
- 8/94 - 5/97 The University of North Carolina School of Public Health, Chapel Hill, NC - MSPH (Epidemiology).
- 1/94 - 5/94 The Johns Hopkins University School of Hygiene and Public Health, Baltimore, MD - M.H.S. (Immunology and Infectious Disease)
- 9/90 - 1/94 The Johns Hopkins University, Baltimore, MD, - BA (Natural Science & Public Health)

PROFESSIONAL/RESEARCH TRAINING

- 2/08 - Present Chief Viral Therapeutics- Virology Division, U.S. Army Research Institute of Infectious Diseases, Ft. Detrick Frederick MD
- 11/00 – 2/08 Research Microbiologist – Virology Division, U.S. Army Research Institute of Infectious Diseases, Ft. Detrick Frederick MD
- 9/98 - 11/00 Research Associate – Pathology Division, U.S. Army Research Institute of Infectious Diseases, Ft. Detrick Frederick MD. Investigator Peter Jahrling
- 9/97-9/98 Staff Fellow - NIDDK. NIH. Bethesda, MD - Principle Investigator Dr. Jeffrey Kopp M.D.
- 8/95 - 5/97 Teaching Assistant, University of North Carolina, Chapel Hill- Supervisor: Dr. Lorraine Alexander Ph.D. Course Instructor: Dr. Carl Shy Ph.D.
- 10/94 - 8/97 Research Assistant, University of North Carolina, Chapel Hill, NC - Preceptor: Dr. Ralph Baric, Ph.D. Project: Mechanism of mouse hepatitis virus interspecies spread
- 9/96 - 7/97 Graduate Assistant, University of North Carolina, Chapel Hill, NC - Supervisor: Dr. Larry Crum, Ph.D. Principle Investigator - Dr. Lloyd Edwards Ph.D.
- 9/94 - 10/96 Research Assistant, Duke University Medical Center, Department of Occupational medicine, Division of community

Lisa E. Hensley, Ph.D.

and family medicine. Durham, NC - Preceptor: Dr. John Dement, Ph.D
9/94 - 1/95 Graduate Research Assistant - University of North Carolina, Chapel Hill, NC - Supervisor: Dr. Christine Moe Ph.D.
6/92 - 12/94 Research Intern, (for credit towards BA) Johns Hopkins School of Hygiene and Public Health, Baltimore, MD - Preceptor: Dr. John Beier Sc.D.

IN SERVICE TRAINING

05/04 Introduction to Good Laboratory Practice (GLP) Regulations
09/04 GLP training for principal investigators
08/06 Acquisitions Training for Commanders and Managers

AWARDS, Appointments, Consultation and Other Activities

1993 All Conference Women's Lacrosse
1994 All Conference Women's Lacrosse
1994 All Regional Women's Lacrosse
1994 2nd Team All-American Women's Lacrosse (DIII)
1994 North / South Selection Women's Lacrosse (DI – DIII)
1997 Travel Awards, University of North Carolina and Corona and Arterivirus groups
2003 Participant and collaborator, Cooperative Threat Reduction
2003 Postdoctoral Fellowship Advisor, National Research Council
2003 Observer, World Health Organization Advisory Committee on Variola Virus Research
2004 Participant, Center for International and Security Studies at Maryland
2005 Observer, World Health Organization Advisory Committee on Variola Virus Research
2006 COR(Contracting Officer's Representative) on three Congressional Research Plans
2006 External reviewer animal care protocols Health Canada
2007 DTRA review panel
2007 Scientific advisory panel for Orthopox drug development
2007 Guest Instructor Georgetown University
2007 Moderator ASM Biodefense Conference
2007 Selected as "10 Outstanding Young Americans"
2007 Reviewer Journal of Virology
2007 Reviewer Archives of Virology
2007 Reviewer Journal of Infectious Diseases
2007 Mr. Sinai School of Medicine, Thesis Committee Member
2007 Subject matter expert Orthopoxviruses NBACC
2008 Session chair 2008 ASM Biodefense conference

Lisa E. Hensley, Ph.D.

2008 Guest Lecturer American University
2008 Organizing Committee 2009 ASM Biodefense Meeting
2008 Review panel CDC Dissertation Grant Committee
2008 Selected as one of Ten Outstanding Young Persons (TOYP)
2008 World Health Organization – Laboratory network for high
consequence pathogens

INVITED SPEAKER

The Interspecies Spread of MHV: An example of viral emergence in vitro. NIH, Bethesda MD, February 6, 1997.
Apoptosis during Ebola Virus Infection Johns Hopkins University, Baltimore MD. December, 2000
Apoptosis and Ebola Virus Infection, Chesapeake area Biosafety Meeting, June 2000
Plenary Session, Pediatric Immunization Conference, Atlanta GA 2003
Pox Virus Pathogenesis, Biodefense Workshop, Bethesda Maryland, June 2004
Filovirus Pathogenesis, Pathogenesis and Early Events in Viral Infection Meeting, Banbury Center, Cold Spring Harbor Laboratory, 25-28 September 2005.
Orthopoxvirus Pathogenesis NIH Bethesda MD, 2006
Orthopox diseases in NHP models – Uniformed Services University 2006
The role of Activated Protein C in Ebola virus infections – Filoviruses: Recent Advances and Future Challenges, Winnipeg Canada
Activated Protein C in Ebola virus infections, Eli Lilly, Indianapolis Indiana, 2007
Marburg and Ebola, The Deadly New Viremia, New and Re-emerging Diseases, Populations and Climate, CosmoCaixa, Barcelona Spain, November 2006
The role of Protein C in development of filovirus disease, Gordon Conference, Ventura CA, February 2007
Cytokine Storms and filovirus infections, Clinical Virology Symposium, Clearwater FL, April 2007
Can a basic understanding of Ebola Virus pathogenesis provide new insights into clinical interventions, Mt. Sinai School of Medicine, NY NY, June 2007
Can a basic understanding of Ebola Virus pathogenesis provide new insights into clinical interventions, UTMB, Galveston TX. October 2007
Therapeutic Strategies Identified from a Basic Understanding of the Pathogenesis of Ebola Virus 2007 Biodefense Research Conference DTRA Philadelphia PA November 5-7 2007
The pathogenesis of orthopoxviruses International Conference on Emerging Zoonosis. Limassol Cyprus November 2007
The utility of Xigris as a therapeutic for 1918 Influenza – USPACOM Pandemic and Avian Influenza workshop Bangkok Thailand November 2007
Therapeutic strategies identified from a basic understanding of the pathogenesis of Ebola Virus February 2008 American University Washington DC
The role of type I Interferon during filovirus infections: potential for therapies 2008 Filovirus global symposium. Gabon Africa. March 2008

Ebola Virus: An update on pathogenesis, therapeutics and vaccines 2nd US –
Japan Medical Biodefense Research and Bioterrorism Symposium
September 2008 Honolulu HI

Progress in the development of animal models for Monkeypox and Variola virus
Institute of Medicine, October 2008 Washington DC

PUBLICATIONS

1. Vaughan, J.A, Hensley, L.E., and Beier, J.C. 1994. Sporogonic Development of *Plasmodium yoelii* in Five Anopheline Species. *J. Parasitology*. 80(5): 674-81, 1994
2. Dement, J, Hensley L., Gitelman, A. Carcinogenicity of Gasoline: A Review of Epidemiological Evidence. 1997. *Annals New York Academy of Sciences*. 837:53-56
3. Baric, R S., Yount, B., Hensley, L., Peel, S., Chen W. 1997. Episodic Evolution and Interspecies Transfer of a Murine Coronavirus –*J. Virology*. 71(3): 1946-55
4. Dement, J., Hensley, L., Mortality Among Oil Refinery Workers at Three Texas Refineries. 1998. *Am. J. Indust Med*. 33(4):327-340
5. Hensley L., Baric, R.1998. Human Biliary Glycoproteins Function as Receptors for Interspecies Transfer of Mouse Hepatitis Virus. *Adv Exp Med Biol*. 440:743-50
6. Hensley L., Holmes K.V., Beauchemin N., Baric R.S., Virus-Receptor interactions and Interspecies Transfer of a Mouse Hepatitis Virus. *Adv Exp Med Biol* 1998;440:743-50
7. Chen, W., Yount B., Hensley, L., Baric, R.S., 1998. Receptor homologue scanning functions in the maintenance of MHV-A59 persistence in vitro. *AdvExp Med Biol*. 440:743-50
8. Baric, R.S., Sullivan, E., Hensley, L.E., Yount, B., Chen, W. Persistent Infection Promotes Cross Species Transmission of Mouse Hepatitis Virus. *J. Virology* 1999 Jan;73(1):638-49
9. Geisbert, TW, Hensley, LE, Gibb, TR, Steele, KE, Jaax, NK, and Jahrling, PB. 2000. Apoptosis induced in vitro and in vivo during infection by Ebola and Marburg viruses. *Lab. Invest*. Feb. 80(2): 171-186
10. Zaucha GM, Jahrling PB, Geisbert TW, Swearngen JR, Hensley L. The pathology of aerosolized monkeypox virus infection in cynomolgous monkeys (*Macaca fascicularis*) *Lab. Inves*. 2001 Dec; 81(12) :171-86
11. Bray M, Hatfill S, Hensley L, Huggins JE. Hematological, biochemical and coagulation changes in mice, guinea pigs and monkeys infected with a mouse adapted variant of ebola Zaire. *J Comp. Path* 2001 Nov; 125(4):243-53
12. Hensley LE, Young Ham Jahrling PB, Geisbert TW. Pro inflammatory response during Ebola Virus infection of primate models: possible involvement of the tumor necrosis factor receptor subfamily. *Immunol Lett*. 2002 Mar 1; 80(3) 169-79

13. Geisbert TW, Hensley LE, Geisbert JB, Jahrling PB. Evidence against an Important Role for Infectivity-Enhancing Antibodies in Ebola Virus Infections. *Virology*. 2002 Feb 1;293(1):15-9
14. Markotic A, Hensley L, Geisbert T, Spik K, Schmaljohn C. Induction of cytokine and chemokine responses and apoptosis by hantaviruses in continuous human embryonic kidney cells. *J Gen Virol*. 2003 Aug;84(Pt 8):2197-202
15. Geisbert TW, Young HA, Jahrling PB, Davis KJ, Kagan E, Hensley LE. Mechanisms Underlying Coagulation Abnormalities in Ebola Hemorrhagic Fever: Overexpression of Tissue Factor in Primate Monocytes/Macrophages is a Key Event. *J Infect Dis*. 2003 Dec 1;188(11):1618-29
16. Geisbert TW, Hensley LE, Larsen T, Young HA, Reed DS, Geisbert JB, Scott DP, Kagan E, Jahrling PB, Davis KJ. Pathogenesis of Ebola Hemorrhagic Fever in Cynomolgus Macaques: Evidence that Dendritic Cells Are Early and Sustained Targets of Infection. *Am J Pathol*. 2003 Dec;163(6):2347-70
17. Geisbert TW, Young HA, Jahrling PB, Davis KJ, Larsen T, Kagan E, Hensley LE. Pathogenesis of Ebola Hemorrhagic Fever in Primate Models: Evidence that Hemorrhage Is Not a Direct Effect of Virus-Induced Cytolysis of Endothelial Cells. *Am J Pathol*. 2003 Dec;163(6):2371-82
18. Hensley LE, Fritz EA, Jahrling PB, Geisbert TW. Interferon-beta 1a potently inhibits SARS coronavirus replication in Vero E-6 cells. *EID*, 2004 Jan 10(2): 317-319
19. Schoepp RJ, Morin MD, Martinez MJ, Kulesh DA, Hensley LE, Geisbert TW, Brady DR, Jahrling PB. Detection and Identification of Variola Virus in Fixed Human Tissue After Prolonged Archival Storage. *Lab Invest*. 2004 Jan;84(1):41-8
20. Yount B, Curtis KM, Fritz EA, Hensley LE, Jahrling PB, Prentice E, Denison MR, Geisbert TW, Baric RS. Reverse Genetics with a Full-Length Infectious cDNA of the SARS Coronavirus. *Proc Natl Acad Sci U S A*. 2003 Oct 28;100(22):12995-3000
21. Geisbert TW, Hensley LE, Jahrling PB, Larsen T, Geisbert JB, Paragas J, Young HA, Fredeking TM, Rote WE, Vlasuk GP. A recombinant inhibitor of factor VIIa/tissue factor reduces mortality and coagulopathy in the rhesus monkey model of Ebola hemorrhagic fever. *Lancet*. 2003 Dec 13;362(9400):1953-8
22. Reed DS, Hensley LE, Geisbert JB, Jahrling PB, Geisbert TW. Depletion of peripheral blood T lymphocytes and NK cells during the course of Ebola hemorrhagic fever in cynomolgus macaques. *Viral Immunol., Viral Immunol*. 2004;17(3):390-400
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25. Geisbert TW, Hensley LE. Ebola virus: new insights into disease aetiopathology and possible therapeutic interventions. *Expert Rev Mol Med.* 2004 Sep 21;2004:1-24
26. Jones SM, Feldmann H, Ströher U, Geisbert JB, Fernando L, Grolla A, Klenk H-D, Sullivan NJ, Volchkov VE, Fritz EA, Daddario KM, Hensley LE, Jahrling PB, Geisbert TW. Live attenuated recombinant vaccine platform protects non-human primates against lethal challenge with either Ebola virus or Marburg virus. *Nat. Med.* 2005. 11, Published online. doi:10.1038/nm1258.
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28. Hensley LE, and Geisbert TW. The contribution of the endothelium to the development of coagulation disorders that characterize Ebola hemorrhagic fever in primates. *Thromb Haemost.* 2005 Aug;94(2):254-61. Review. PMID: 16113813
29. Jahrling PB, Fritz EA, Hensley LE. Countermeasures to the Bioterrorist Threat of Smallpox. *Curr Molec Med*, 2005 (5), 817-826.
30. Hensley LE, Jones S, Feldmann H. Jahrling PB, Geisbert TW Ebola and Marburg Viruses: Pathogenesis and Development of Countermeasures. *Curr Molec Med*, 2005 (5), 761-772.
31. Lawler JV, Endy TP, Hensley LE, Garrison A, Fritz EA, Lesar M, Baric RS, Kulesh DA, Norwood DA, Wasieloski LP, Ulrich MP, Slezak TR, Vitalis E, Huggins JW, Jahrling PB, Paragas J. Cynomolgus macaque as an animal model for severe acute respiratory syndrome. *PLoS Med.* 2006 May;3(5):e149. Epub 2006 Apr 18.
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35. Feldmann H, Jones SM, Daddario-Dicaprio KM, Geisbert JB, Stroher U, Grolla A, Bray M, Fritz EA, Fernando L, Feldmann F, Hensley LE, Geisbert TW. Effective Post-Exposure Treatment of Ebola Infection PLoS Pathog. 2007 Jan 19;3(1):e2 [Epub ahead of print]
36. Zhu Z, Chakraborti S, He Y, Roberts A, Sheahan T, Xiao Z, Hensley LE, Prabakaran P, Rock B, Sidorov IA, Corti D, Vogel , Feng Y, Kim JO, Wang L, Baric R, Lanzavecchia A, Curtis KM, Nabel GJ, Subbarao K, Jiang S, and Dimitrov DS. Potent Cross-Reactive Neutralization of SARS Coronavirus Isolates by Human Monoclonal Antibodies. Proc Natl Acad Sci U S A. 2007 Jul 17;104(29):12123-8. Epub 2007 Jul 9.
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38. Ebihara H, Theriault S, Neumann G, Alimonti J, Geisbert JB, Hensley LE, Groseth A, Jones SM, Geisbert TW, Kawaoka Y, and Feldmanne H. GFP Expressing Zaire ebolavirus: A Powerful Tool for In Vitro and In Vivo Studies. J Infect Dis. 2007 Nov 15;196 Suppl 2:S313-22
39. Larsen T, Stevens EL, Davis KJ, Geisbert JB, Daddario-DiCaprio KM, Jahrling PB, Hensley LE, and Geisbert TW. Pathology Associated with Delayed Mortality in Nonhuman Primates Experimentally Infected with Zaire ebolavirus. J Infect Dis. 2007 Nov 15;196 Suppl 2:S323-8.
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41. Hensley LE, Stevens EL, Yan SB, Geisbert JB, Macias WL, Larsen T, Daddario-DiCaprio KM, Cassell GH, Jahrling PB, and Geisbert TW. Recombinant Human Activated Protein C for the Postexposure Treatment of Ebola Hemorrhagic Fever. JID J Infect Dis. 2007 Nov 15;196 Suppl 2:S390-9.
42. Rubins KH, Hensley LE, Wahl-Jensen V, Daddario Dicaprio KM, Young H, Reed DS, Jahrling PB, Brown PO, Relman DA, Geisbert TW. The temporal program of peripheral blood gene expression in the response of non-human primates to Ebola hemorrhagic fever. Genome Biol. 2007 Aug 28;8(8):R174 [Epub ahead of print] PMID: 17725815 [PubMed - as supplied by publisher]
43. Markotić A, Hensley L, Daddario K, Spik K, Anderson K, Schmaljohn C. Pathogenic hantaviruses elicit different immunoreactions in THP-1 cells and primary monocytes and induce differentiation of human monocytes to dendritic-like cells. Coll Antropol. 2007 Dec;31(4):1159-67.
44. Rubins KH, Hensley LE, Bell G, Wang C, Lefkowitz EJ, Brown PO and Relman DA. Comparative Analysis of Viral Gene Expression Programs During Poxvirus Infection: A Transcriptional Map of the Vaccinia and Monkeypox Genomes. PLoS ONE. 2008 Jul 9;3(7):e2628.

45. Fritz EA, Geisbert JB, Geisbert TW, Hensley LE, and Reed DR. Cellular Immune Response to Marburg Virus Infection in Cynomolgus Macaques *Viral Immunol.* 2008 Sep;21(3):355-63.
46. Geisbert TW, Daddario-Dicaprio KM, Geisbert JB, Reed DS, Feldmann F, Grolla A, Stroher U, Fritz EA, Hensley LE, Jones SM, Feldmann H. Vesicular stomatitis virus-based vaccines protect nonhuman primates against aerosol challenge with Ebola and Marburg viruses. *Vaccine.* 2008 Oct 16. [Epub ahead of print]
47. Geisbert TW, Daddario-DiCaprio KM, Williams KJ, Geisbert JB, Leung A, Feldmann F, Hensley LE, Feldmann H, Jones SM. Recombinant vesicular stomatitis virus vector mediates postexposure protection against Sudan Ebola hemorrhagic fever in nonhuman primates. *J Virol.* 2008 Jun;82(11):5664-8. Epub 2008 Apr 2.
48. James W. Le Duc, ☒Kevin Anderson, Marshall E. Bloom, James E. Estep, Heinz Feldmann, Joan B. Geisbert, Thomas W. Geisbert, Lisa Hensley, Michael Holbrook, Peter B. Jahrling, Thomas G. Ksiazek, George Korch, Jean Patterson, John P. Skvorak, and Hana Weingartl Framework for Leadership and Training of Biosafety Level 4 Laboratory Workers. *EID.* Volume 14, Number 11–November 2008
49. Thomas W. Geisbert, Kathleen M. Daddario-DiCaprio, Mark G. Lewis, Joan B. Geisbert, Allen Grolla, Anders Leung, Jason Paragas, Lennox Matthias, Mark A. Smith, Steven M. Jones, Lisa E. Hensley, Heinz Feldmann, Peter B. Jahrling Vesicular stomatitis virus-based Ebola vaccine is well tolerated and affords partial protection to immunocompromised nonhuman primates

BOOK CHAPTERS

- Geisbert TW, Jahrling PB, Larsen T, Davis KJ, Hensley LE. Filovirus Pathogenesis in Nonhuman Primates. In: Klenk H-D, Feldmann H, eds. *Molecular and Cellular Biology of Marburg and Ebola Viruses.* Horizon Scientific Press, Norfolk, UK, 2003
- Geisbert TW, Hensley LE. Ebola virus: new insights into disease etiopathology and possible therapeutic interventions. *Exp. Rev. Mol. Med.*
- Olinger G, TW and Hensley LE, Marburg and Ebola Virus, *Encyclopedia of Virology, In press*

PATENTS

- U.S. Patent Application Number 11/584,341 filed 20 October 2006, "siRNA Silencing of Filovirus Gene Expression," by Ian MacLachlan, et al.