

Curriculum Vitae

Name: Pettigrew, Melinda M.
Term: Assistant Professor July 1, 2002-
School Assignment: Medical School and Graduate School

Education:

8/1988-5/1992 B.A. Biology, Grinnell College
Grinnell, Iowa

9/1992-5/1999 Ph.D. Microbiology/Epidemiology, Yale University
New Haven, Connecticut

8/1999-2/ 2002 Post-doc Epidemiology/Infectious Diseases, University of
Michigan, Ann Arbor, Michigan

Career:

1998-1999 Visiting Instructor and Dissertation Fellowship, Haverford College,
Department of Biology

1999-2002 Postdoctoral Fellow, University of Michigan, School of Public Health,
Ann Arbor, MI

2002 Instructor, Yale University School of Medicine, Department of
Epidemiology and Public Health

2002-present Assistant Professor, Yale University School of Medicine, Department of
Epidemiology and Public Health

Grant History:

Active

DF03-040 Niccolai, L. (PI)
Risk in partnerships for repeat sexually transmitted infections
5% Effort
1/1/05-12/31/07

Complete

NIDCD R21 DC006260 Pettigrew, M. M., (PI)
Gene discovery for pneumococcal otitis media
25% Effort
7/1/03-6/30/06

NIEHS Supplement to ES07456-08, Leaderer, B. P. (PI)
Identification of environmental risk factors for otitis media
37% Effort

7/01/02-6/30/06

Deafness Research Foundation

01/01/01-02/28/02

Pettigrew, M. M., (PI)

Identification of virulence factors associated with *Haemophilus influenzae*

R01-AI2530, Gilsdorf, J.R., (PI)

09/01/99-02/28/02

NIAID

C036919 Supplement to Pettigrew, M. M.

To develop an RT-PCR assay to detect *Haemophilus influenzae* pili expression *in vivo*.

C.S. Mott Children's Hospital Fund for Research

07/01/00-06/30/01

Gilsdorf, J.R., (PI)

Identification of virulence factors associated with otitis media caused by *Haemophilus influenzae*.

Invited Lectures:

6/9/05 Galveston, Texas, Pediatric Grand Rounds "Otitis media: contributions of the host and environment" University of Texas Medical Branch.

6/9/05 Galveston, Texas, Microbiology Seminar "Pneumococcal otitis media: are all strains created equal?" University of Texas Medical Branch.

9/14/05 Ann Arbor, Michigan, Molecular and Clinical Epidemiology of Infectious Diseases Seminar Series "Otitis media in infants: contributions of the host and pathogen." University of Michigan School of Public Health.

10/26/05 Boston, Massachusetts, Pediatric Infectious Disease Group Seminar "Pneumococcal otitis media: are all strains created equal?" Boston University Medical School.

Courses:

1998-99

Haverford College, Department of Biology, Haverford, PA

Main Instructor: Introduction to Epidemiology and Public Health, Topics in Molecular Parasitology and Introduction to Biology: What is life?

2003 Fall

Yale University, Department of Epidemiology and Public Health

EMD 543A Molecular Epidemiology of Prokaryotic Pathogens

2004 Fall

Yale University, Department of Epidemiology and Public Health

EMD 543A Molecular Epidemiology of Prokaryotic Pathogens

2006 Spring

Yale University, Department of Epidemiology and Public Health

EMD 542B Biology of Infectious Agents

Professional Service:

- 2004- Elected to Governing Council, Epidemiology Section, American Public Health Association.
- 2005- Ad hoc grant reviewer for the NIH/NRSA Predoctoral Fellowships for Minority Students and Students with Disabilities (Study Section ZRG1 GGG-G (29) L)
- 2005- Ad hoc grant reviewer for the Thrasher Research Fund

Ad hoc reviewer for *American Journal of Epidemiology*, *Annals of Epidemiology*, *Clinical Infectious Diseases*, *Pediatric and Perinatal Epidemiology*, *International Journal of Infectious Diseases*

University Service:

- 2005- present Liaison committee, Yale University 5 year BA/MPH program
- 2004- 2006 Medical School Admissions Committee
- 2003- present Education Committee
- 2003- present EMD Divisional Education Committee (Chair)
- 2001- present Minority Affairs Committee

Bibliography:

Original Articles:

1. O'Neill, S.L., **Pettigrew, M.M.**, Sinkins, S.L., Braig, H.R., Andreadis, T.G., Tesh, R.B. In vitro cultivation of *Wolbachia pipientis* in an *Aedes albopictus* cell line. *Insect Molecular Biology* 1999; 8:409-414.
2. **Pettigrew, M.M.**, O'Neill, S.L. Semliki Forest virus as an expression vector in insect cell lines. *Insect Molecular Biology* 1999; 8:409-414.
3. Bourtzis, K., **Pettigrew, M.M.**, O'Neill, S.L., *Wolbachia pipientis* neither induces or suppresses the insect immune system. *Insect Molecular Biology* 2000; 9:635-639.
4. **Pettigrew, M.M.**, Foxman, B., Marrs, C.F., Gilsdorf, J. Comparison of ribotyping, pulsed-field gel electrophoresis and enterobacterial repetitive PCR as methods to assess the genetic diversity of non-typeable *Haemophilus influenzae* strains. *Journal of Clinical Microbiology* 2002; 40:660-662.
5. **Pettigrew, M.M.**, Foxman, B., Marrs, C.F., Gilsdorf, J.R. Identification of the LOS biosynthesis gene *lic2B* as a putative virulence factor in strains of non-typeable *Haemophilus influenzae*. *Infection and Immunity*. 2002;70:3551-3556.
6. **Pettigrew, M. M.**, Khodae, M., Gillespie, B., and Foxman, B. Relationship between breastfeeding, daycare, and physician visits in children six months and younger. *Annals of Epidemiology*. 2003; 13:431-435.
7. Farjo, R.S., Foxman B., Patel, M. J., Zhang, L., **Pettigrew, M.M.**, McCoy, S. I., Marrs, C. F., Gilsdorf, J. R. Diversity and sharing of *Haemophilus influenzae* strains colonizing healthy children attending daycare centers. *Pediatric Infectious Diseases Journal*. 2004; 23:41-46.
8. **Pettigrew, M. M.**, Gent, J., Triche, E. W., Belanger, K.D., Bracken, M.B. and Leaderer, B.P. Infant otitis media and the use of secondary heating sources. *Epidemiology*. 2004; 15:13-20.
9. Ecevit, Z. I., McCrea, K. W., **Pettigrew, M. M.**, Marrs, C. F. and Gilsdorf, J. R. Prevalence of *hifB-C*, *hmw1A*, *hmw2A*, *hmwC* and *hia* genes in *Haemophilus influenzae* isolates. *Journal of Clinical Microbiology*. 2004; 42: 3065-3072.

10. **Pettigrew, M. M.**, Gent, J., Triche, E. W., Belanger, K.D., Bracken, M.B. and Leaderer, B.P. Association of early-onset otitis media in infants and exposure to household mold. *Paediatric and Perinatal Epidemiology*. 2004; 18:441-447.
11. **Pettigrew, M. M.** and Fennie, K. P. Genomic subtraction followed by dot blot screening of *Streptococcus pneumoniae* clinical and carriage isolates identifies genetic differences associated with strains that cause otitis media. *Infection and Immunity*. 2005; 73:2805-2811.
12. Barbosa-Cesnik, C., Farjo, R., Patel, M., Gilsdorf, J.R., McCoy, S. I., **Pettigrew, M. M.**, Marrs, C. F., and Foxman, B. Predictors for *Haemophilus influenzae* colonization, antibiotic resistance, and for sharing an identical isolate among children attending 16 licensed Day Care Centers in Michigan. *Pediatric Infectious Diseases Journal*. 2006; 25: 219-223.
13. **Pettigrew, M. M.**, Fennie, K. P., York, M. P., Daniels, J., Ghaffar, F. Variation in the presence of neuraminidase genes among *Streptococcus pneumoniae* isolates of identical sequence type. *Infection and Immunity*. 2006; 74:3360-3365.

Review:

1. **Pettigrew, M.M.**, O'Neill, S.L., Control of vector-borne disease by the genetic manipulation of insect populations: technological requirements and research priorities. *Australian Journal of Entomology* 1997; 36:309-317.
2. McCoy, S. and **Pettigrew, M.M.** Molecular epidemiology of *Streptococcus pneumoniae* mediated otitis media. *Frontiers in Bioscience* 2003; 8:E87-93.
3. **Pettigrew, M.M.** A diverse array of microbial genomes. *Trends in Biotechnology*. 2004; 22:491-493.