Chrystal A. S. Smith

Department of Anthropology University of Connecticut 354 Mansfield Road Storrs, Connecticut 06269 (860) 486-2811 (Work) chrystal.smith@uconn.edu

EDUCATION

2009	Ph.D., Applied Anthropology, University of South Florida, Tampa
2003	M.P.H., Epidemiology, University of South Florida, Tampa
1998	M.A.A., Applied Anthropology, University of Maryland, College Park
1991	B.A. , Anthropology, Howard University, Washington DC

FIELDS OF SPECIALIZATION

Underrepresentation of Women and Minorities in STEM Undergraduate Education; Isolation and Underrepresentation of STEM Women and Minority Faculty; Impact of STEM Program Culture and Social Networks on LGBTQIA Undergraduates; Ethnography and Qualitative Research Methods; Critical Medical Anthropology; Epidemiology; Mixed-Methods Research

EMPLOYMENT

2017	A ! - 4 4 D C	! D!.1
ZUT6-present	Assistant Profes	sor in Residence

Department of Anthropology, University of Connecticut

2017-present Courtesy Faculty

Department of Anthropology, University of Connecticut

2014-2017 Assistant Research Professor

Department of Anthropology, University of South Florida

2010-2014 **Postdoctoral Scholar**

Departments of Anthropology and Sociology, University of South Florida
Coordinated National Science Foundation mixed-methods research grants, Alliance for the Advancement of Florida's Academic Women in Chemistry and Engineering (#0930164) and Successful Academic and Employment Pathways in Advanced Technologies (#1104214) along with the Spencer Foundation Award, Dual Enrollment: Who is Served and Who Benefits? (#200900083) and the University of South Florida New Researcher Grant, Exploring the Cultural Beliefs about Type 2 Diabetes Management and Financial Barriers to Diabetes Care among Latino Farm Workers. Collaborated with interdisciplinary teams and stakeholders to design and implement grant activities and write grant proposals. Led qualitative research teams in designing interview/focus group protocols, conducting interviews and focus groups, and the analysis of qualitative data. Assisted

quantitative research team in designing, administering and analyzing surveys. Supervised the research teams in the field. Analyzed qualitative data. Mentored, supervised, and trained graduate students in qualitative methods and fieldwork techniques. Authored scholarly articles and book chapters for publication. Presented papers and posters at professional conferences.

2005-2009 Graduate Research Assistant

Department of Anthropology, University of South Florida

Managed NSF and other funded projects. Conducted qualitative research on STEM education and education policy/evaluation. Collaborated with interdisciplinary teams to develop mixed-methods research projects and write grant proposals. Coordinated a mixed-method evaluation study. Designed interview, focus group, observation, and survey instrumentation. Mentored, trained, and supervised undergraduate students. Supervised research team in the field. Analyzed qualitative and qualitative data. Authored annual evaluation report and book chapter. Presented papers and posters at professional conferences.

2001-2005 Graduate Research Assistant

Center for Urban Transportation Research, University of South Florida

Conducted anthropological research on the impact of housing and transportation policies on the social conditions and health status of the disabled, women, and low-income and ethnic minority communities. Coded and analyzed survey data. Co-authored federal annual reports. Presented at professional conferences

1998-1999 **Public Health Analyst**

Breast and Cervical Cancer Early Detection Program (DC BCCEDP),

District of Columbia Department of Health, Washington DC Coordinated a U.S. Centers for Disease Control free breast and cervical cancer

screening program for low income women with limited or no health insurance. Consulted with administrators and practitioners at partner hospitals and clinics to improve program implementation. Developed promotional materials. Engaged in community-based outreach and recruitment.

1997 Graduate Research Assistant

Johns Hopkins Bloomberg School of Public Health, Baltimore, MD

Conducted qualitative research (semi-structured interviews) on the parenting, decision-making, and social-problem solving skills of urban, low income, African American adolescent mothers and their mothers who share households.

1996 Research Intern/Ethnographer

Center of Minority Health Research, University of Maryland, Baltimore, MD Conducted qualitative research (semi-structured interviews and participant observation) on the friendships and play/social interactions of African American children.

RESEARCH ACTIVITIES

2017-2019 **Principal Investigator**

EAGER: Measuring the Effects of Academic Climate and Social Networks on Persistence of STEM Undergraduates

National Science Foundation grant #1747580

2014-2018 Co-Principal Investigator/Qualitative Lead/Project Manager

The Effects of Social Capital and Cultural Models on the Retention and Degree Attainment of Women and Minority Engineering Undergraduates

National Science Foundation grant #1432297

2016-2019 Qualitative Lead

The IT College and CAREERS Readiness Project: Career Academy Research on Educational Experiences and Related Successes

National Science Foundation grant #1614707

2015-2018 Qualitative Lead

PathTech LIFE: Constructing a National Survey of Engineering Technology Students through Regional and Statewide Testing

National Science Foundation grant #1501999

2016- Lead Researcher

University of South Florida Morsani College of Medicine, Office of Faculty and Academic Affairs

COMPLETED RESEARCH ACTIVITIES

2011-2015 **Project Manager/Qualitative Researcher**

Successful Academic and Employment Pathways in Advanced Technologies (PathTech)
National Science Foundation ATE #1104214 (\$1,196,790)
PI: William Tyson, Ph.D., Associate Professor, Sociology,
University of South Florida

2012-2014 **Co-Principal Investigator**

Exploring the Cultural Beliefs about Type 2 Diabetes Management and Financial Barriers to Diabetes Care among Latino Farm Workers

University of South Florida New Researcher Grant (\$19,547)

PI: Dinorah Martinez-Tyson, Ph.D., Assistant Professor, Community and Family Health, University of South Florida

2009-2013 Project Manager/Qualitative Lead

Alliance for the Advancement of Florida's Academic Women in Chemistry and Engineering National Science Foundation ADVANCE-PAID #0930164 (\$1,300,000) PI: Sylvia W. Thomas, Ph.D. Associate Professor, Electrical Engineering, University of South Florida

2008-2012 Qualitative Lead/Program Manager

Dual Enrollment: Who is Served and Who Benefits?

Spencer Foundation Award #200900083 (\$156,000)

PI: Kathryn M. Borman, Ph.D. (Retired), Professor, Anthropology,

PI: Kathryn M. Borman, Ph.D. (Retired), Professor, Anthropology, University of South Florida

2005-2010 Lead External Evaluator/Qualitative Researcher

Evaluation of Center for Inquiry Science Teaching and Learning National Science Foundation #0227619 (\$100,000)

PI: Kathryn M. Borman, Ph.D. (Retired), Professor, Anthropology,

University of South Florida

2005-2008 **Qualitative Researcher**

Effects of College Degree Program Culture on Female and Minority Student Science, Technology, Engineering, and Mathematics (STEP)

National Science Foundation #0525408 (\$1,328,311)

PI: Kathryn M. Borman, Ph.D. (Retired), Professor, Anthropology,

University of South Florida

PUBLICATIONS - PEER REVIEWED JOURNALS

2015 Hesborn O. Wao, Reginald S. Lee, Joel Ochieng, Georiadis Owuor Odondi, Emily Akoth Tenge, and **Chrystal A. S. Smith**. Predicting Degree Attainment in Engineering and Biological/Life Sciences: An Exploratory Study. *Journal of Women and Minorities in Science and Engineering* 21(4):347-362.

2012 **Smith, Chrystal A. S.** Living with Sugar: Influence of Cultural Beliefs on Type 2 Diabetes Self-Management of English-Speaking Afro-Caribbean Women. *Journal of Immigrant and Minority Health* 14(4):640-647.

2005 **Smith, Chrystal A. S.,** & Barnett, Elizabeth. Diabetes-related Mortality Among Mexican Americans, Puerto Ricans, and Cuban Americans in the United States. *Rev Panam Salud Publica/Pan Am J Public Health* 18(6):381-387.

PUBLICATIONS – CONFERENCE PROCEEDINGS

2015 **Smith, Chrystal A. S.,** Wao, Hesborn, Martin, Julie P., MacDonald, George, Lee, Reginald, & Kersaint, Gladis. Designing a Survey for Engineering Undergraduates using Free Listing - An Anthropological Structured Technique. Proceedings of the 122nd American Society for Engineering Education Annual Conference and Exposition, Seattle, WA.

PUBLICATIONS - BOOK CHAPTERS

Smith, Chrystal A. S. Community Colleges as a Pathway for Low-Income Women to Enter the Engineering Technology Workforce. In S.N. Davis, S. Winslow, & D. J. Maume (Eds), *Gender in the Twenty-First Century: The Stalled Revolution and the Road to Equality*. University of California Press.

- Smith, Chrystal A. S. Assessing Academic Women's Sense of Isolation in the STEM Disciplines (peer reviewed). In P. J. Gilmer, B. Tansel, & M. Hughes Miller (Eds.), *Alliances for Advancing Academic Women: Guidelines for Collaboration in STEM fields* (pp 97-113). Rotterdam: Sense Publishers.
- Smith, Chrystal A. S., & Thomas, Sylvia. Learning Through Collaboration: Lessons from AAFAWCE, a NSF ADVANCE-PAID Grant (peer reviewed). In P. J. Gilmer, B. Tansel, & M. Hughes Miller (Eds.), *Alliances for advancing academic women: Guidelines for collaboration in STEM fields* (pp. 193-204). Rotterdam: Sense Publishers.
- Tyson, William, **Smith, Chrystal A. S.**, & Nguema Ndong, Arland. To Stay or to Switch? Why Students Leave Engineering Programs. In K. M. Borman, W. Tyson, & R. H. Halperin (Eds.), *Becoming an Engineer in Public Universities* (pp. 53-80). New York: Palgrave Macmillan.

PUBLICATIONS - SELECTED REPORTS

Estacion, Angela, Cotner, Bridget A., D'Souza, Stephanie, **Smith, Chrystal A. S.**, & Borman, Kathryn M. Who Enrolls in Dual Enrollment and Other Acceleration Programs in Florida High Schools? (Issues & Answers Report, REL 2012–No. 119). Washington, DC: U.S. Department of Education, Institute of Education Sciences, National Center for Education Evaluation and Regional Assistance, Regional Educational Laboratory Southeast.

PRESENTATIONS - PAPERS

- 2015 **Smith, Chrystal A. S.,** Wao, Hesborn, Martin, Julie P., MacDonald, George, Lee, Reginald, & Kersaint, Gladis. Using Cultural Model and Social Capital Theories to Guide Research on the Retention and Degree Attainment of Women and Minority Engineering Undergraduates. 114th American Anthropological Association Annual Meeting, Colorado, Denver.
- 2015 **Smith, Chrystal A. S.,** Wao, Hesborn, Martin, Julie P., MacDonald, George, Lee, Reginald, & Kersaint, Gladis. Designing a Survey for Engineering Undergraduates using Free Listing An Anthropological Structured Technique. 122nd American Society for Engineering Education Annual Conference and Exposition, Seattle, WA.
- 2014 **Smith, Chrystal A. S.** Women Forging Ahead in Traditionally Male Dominated Engineering Technology Fields. 72th Annual Meeting, Society for Applied Anthropology, Albuquerque, NM.
- 2013 **Smith, Chrystal A. S.,** & Lovett, Marilyn D. When and Where I Enter: Dr. Aaronette White's Global Concern for International Women's Issues. Association for Women in Psychology Annual Meeting, Salt Lake City, Utah.
- 2012 **Smith, Chrystal A. S.,** Wilson, Tasha-Neisha, & Borman, Kathryn M. Dual Enrollment in Florida. 72th Annual Meeting, Society for Applied Anthropology, Baltimore, MD.

2011 Smith, Chrystal A. S., Borman, Kathryn M., Gilmer, Penny J., Donnelly, Anne, Tansel, Berrin, Hruda-Peterson, Simone, & Thomas, Sylvia W. Challenges of Implementing Recruitment Practices and Mentorship Programs to Support Chemistry and Engineering Women Faculty. 71th Annual Meeting, Society for Applied Anthropology Annual Meeting, Seattle, WA. 2010 Smith, Chrystal A. S., Spalding, Ashley, Eden, Aimee, Nguema Ndong, Arland, Wilson, Tasha-Neisha, Heppner, Rebekah, & Borman, Kathryn M. Factors that Influence Student Decision-making in Accelerated Programs. 109th Annual Meeting, American Anthropological Association, New Orleans, LA. 2009 Smith, Chrystal A. S. Living with Sugar: Socioeconomic Status and Cultural Beliefs about Type 2 Diabetes among Afro-Caribbean Women. 108th Annual Meeting, American Anthropological Association, Philadelphia, PA. 2009 Smith, Chrystal A. S., Borman, Kathryn M., Lee, Reginald S., & Cotner, Bridget A. Evaluation of the Science Education Professional Development Activities of a National Science Foundation Center for Learning and Teaching: A Mixed Methods Approach. 55th Annual Meeting, Florida Educational Research Association, Orlando, FL. 2008 Smith, Chrystal A. S., Borman, Kathryn M., Forde, Susan C., Cotner, Bridget A. Miller, Jason E., Nguema Ndong, Arland, & Workman Whaler, Cassandra L. Organizational Culture in Higher Education: Mixed Methods and Interdisciplinary Inquiry. 107th Annual Meeting, American Anthropology Association, San Francisco, CA. Smith, Chrystal A. S. Health and the English-Speaking Caribbean. 67th Annual 2007 Meeting, Society for Applied Anthropology Annual Meeting, Tampa, FL. 2007 Smith, Chrystal A. S., O'Connor, Danielle, Puccia, Ellen, & Trevor Purcell. Cultural Knowledge and Small Business Success: West Indian Small Businesses in Tampa, FL. 67th Annual Meeting, Society for Applied Anthropology Annual Meeting, Tampa, FL. 2005 Smith, Chrystal A. S. Diabetes-Related Mortality Among Mexican Americans, Puerto Ricans, and Cubans in the United States. 66th Annual Meeting, Society for Applied Anthropology Annual Meeting, Santa Fe, NM. Smith, Chrystal A. S., & Ward, Beverly. The Greening of Agencies: Impact 2003 Assessment Resurges in Public Transportation. 65th Annual Meeting, Society for Applied Anthropology Annual Meeting, Portland, OR.

Smith, **Chrystal A. S.** The Caribbean and the Epidemiological Transition. 64th Annual Meeting, Society for Applied Anthropology Annual Meeting, Atlanta, GA.

2001

PRESENTATIONS - POSTERS

- 2017 Kersaint, G., **Smith, Chrystal A. S.**, MacDonald, G., Lee, R., Wao, H., Skvoretz, J., Reeves, K., Martin, J., Campbell, R., Puccia, E., Ware, J. The Effects of Social Capital and Cultural Models on the Retention and Degree Attainment of Women and Minority Engineering Undergraduates. NSF ECR PI Meeting, Alexandria, VA.
- 2016 Kersaint, G., **Smith, Chrystal A. S**., Wao, H., MacDonald, G., Lee, R., Skvoretz, J., Reeves, K., Martin, J., Campbell, R., Puccia, E., Ware, J. Inclusion and Equity of Engineering Diversities: Social Capital, Cultural Models, and Success of Women and Minority Engineering Undergraduates. Southern Sociological Society Annual Meeting, Washington, D.C.
- 2015 Lynch, Catherine & **Smith, Chrystal A. S.** Women's Health Collaborative: Promoting the Retention and Advancement of Women Faculty at the University of South Florida Morsani College of Medicine. Learn Serve Lead, the Association of American Medical Colleges Annual Meeting, Baltimore, Maryland.
- Brickhouse Arriola, Nora, Medina-Ramirez, Patricia, **Smith, Chrystal A. S.**, & Martinez Tyson, Dinorah. Hay que echarle ganas y controlar a como dé lugar: Type 2 Diabetes in a Mexican Farmworker Community. 72th Annual Meeting, Society for Applied Anthropology, Albuquerque, NM.
- 2014 Medina-Ramirez, Patricia, Brickhouse Arriola, Nora, **Smith, Chrystal A. S.**, & Martinez Tyson, Dinorah. Exploring Type 2 Diabetes Management Beliefs and Practices in a Mexican Farmworker Community. 24th Annual USF Health Research Day, Tampa, FL.
- Smith, Chrystal A. S., Wilson, Tasha-Neisha, & Borman, Kathryn. Dual Enrollment in Florida. 110th Annual Meeting, American Anthropological Association, Montreal, Canada.
- Borman, Kathryn M., **Smith**, **Chrystal A. S.**, Gilmer, Penny J., Donnelly, Anne, Tansel, Berrin, Hruda-Peterson, Simone, & Thomas, Sylvia. Alliance for the Advancement of Florida's Academic Women in Chemistry and Engineering (AAFAWCE) ADVANCE-PAID. National Science Foundation 2010 Joint Annual Meeting, Washington, DC.
- 2008 **Smith, Chrystal A. S.**, Borman, Kathryn M., & Cotner, Bridget A. Building Capacity in Science: Evaluation of a Science Inquiry Center. 22nd Annual Conference, American Evaluation Association. Denver, CO.
- Smith, Chrystal A. S., Borman, Kathryn M., Lee, Reginald S., & Cotner, Bridget A. Using Anthropological Approaches to Evaluate a National Science Foundation Center for Learning and Teaching. 67th Annual Meeting, Society for Applied Anthropology, Tampa, FL.

INVITED PRESENTATIONS AND SESSIONS

2014	How to Become an Effective Mentor to STEM Undergraduate Researchers Engineering Research Mentor Training Seminar, Department of Civil & Environmental Engineering, University of South Florida, Tampa, FL.
2013	Strategies to Improve Mentorship of STEM Undergraduate Researchers Mentoring Novice Researchers, Department of Civil & Environmental Engineering, University of South Florida, Tampa, FL.
2012	Smith, Chrystal A. S., Gilmer, Penny J., & Donnelly, Anne. Isolation and STEM Women Faculty. National Science Foundation Joint Annual Meeting, Washington DC.
2011	Discussant: Critical Review of Master's Theses of Medical Anthropology Students Graduate Research Colloquium, Department of Anthropology, University of South Florida, Tampa, FL.
2007	Research Opportunities for Minority Graduate Students in Anthropology Network of Minority Research Investigators (NMRI). Annual South Region Conference, Atlanta, GA.

TEACHING INTERESTS

Cultural Anthropology; Anthropological Perspectives on Women's Global Health; Qualitative Research Methods; Gender and Ethnicity in STEM Higher Education; Political Economy and Culture in STEM Higher Education

TEACHING EXPERIENCE

2016-present Assistant Professor in Residence

Department of Anthropology, University of Connecticut

Other People's Worlds

Anthropological Perspectives on Women's Global Health

Spring 2013 **Adjunct Instructor**

College of Public Health, University of South Florida Women's Health: A Public Health Perspective

Critical Issues in Public Health

Fall 2012 **Adjunct Instructor**

College of Public Health, University of South Florida Women's Health: A Public Health Perspective

Critical Issues in Public Health

Graduate Teaching Assistant 2005-2006

Department of Anthropology, University of South Florida

Quantitative Research Methods for Applied Anthropology (doctoral level) Quantitative Research Methods for Applied Anthropology (master's level) 1999-2001 Graduate Teaching Assistant

Department of Anthropology, University of South Florida

Introduction to Anthropology (Primary instructor 2000-2001)

1995-1996 Graduate Teaching Assistant

Department of Anthropology, University of Maryland, College Park

Human Biodiversity

Introduction to Biological Anthropology

Introduction to Sociocultural Anthropology (Primary instructor)

MENTORING/STUDENT SUPERVISION

2015-present	Rebecca Campbell	Graduate/Ph.D.	Anthropology
2015-present	Simone Brookins	Graduate/Ph.D.	Education
2015	Gabriela Romero	Graduate/Masters	Medical Sciences
2013-present	Nora Brickhouse Arriola	Graduate/Masters	Anthropology
2012-present	Patricia Medina-Ramirez	Graduate/Masters	Epidemiology
2012-2014	Pangri Mehta	Graduate/Ph.D.	Sociology
2012-2014	David Zeller	Graduate/Masters	Sociology
2009-2013	Vanessa Martinez	Graduate/Masters	Anthropology
2005-2007	Tasha-Neisha Wilson	Undergraduate	Sociology

HONORS AND AWARDS

Alliance for Applied Research in Education and Anthropology (AAREA)

Research Achievement Award (\$500)

Department of Anthropology, University of South Florida

2007 National Institute of Diabetes and Digestive and Kidney Diseases

Network of Minority Research Investigators (\$500) Annual South Region Conference, Atlanta, GA

2005 Student Honorary Award for Research and Practice (\$500)

College of Public Health, University of South Florida

2001 Student Honorary Award for Research and Practice (\$500)

College of Public Health, University of South Florida

1997 Committee on Africa and the Americas (\$1000)

University of Maryland, College Park

1991 Merit Scholarship (\$1000), Howard University, DC

PROFESSIONAL SERVICE

2011-present Reviewer, Journal of Immigrant and Minority Health

2015 Member, Women's Health Collaborative Advisory Committee, University of South

Florida Morsani College of Medicine

2015	Reviewer, National Science Foundation
2012	Reviewer, National Institutes of Health

2008 Reviewer, Journal of the American College of Nutrition

PROFESSIONAL AFFILIATIONS

American Anthropological Association

REFERENCES

Gladis Kersaint, Ph.D.

Dean

Neag School of Education University of Connecticut Charles B. Gentry Bldg 249 Glenbrook Rd #3064 Storrs, CT 06269

Storrs, CT 06269 Phone: 860-486-3815

E-mail: Kersaint@uconn.edu

Michelle Hughes Miller, Ph.D.

Associate Professor
Department of Women's and Gender Studies
University of South Florida
4202 East Fowler Ave, CMC 202
Tampa, FL 33620-7200

Phone: (813) 974-0982

E-mail: hughesmiller@usf.edu

Lorena Madrigal, Ph.D.

Professor

Department of Anthropology University of South Florida 4202 East Fowler Ave, SOC 143

Tampa, FL 33620-7200 Phone: (813) 974-2138 E-mail: madrigal@usf.edu