My program of research involves the study of sexual risk behaviors and sexually transmitted infection (STIs). An important aspect of this work is the consideration of risk behavior measurement and the issue of self-report bias. As part of a multi-disciplinary team at Johns Hopkins University, I have studied the use of biomarkers to help clarify sensitivity issues related to condom use self-report. We developed a polymerase chain reaction (PCR) assay to detect Y-chromosome fragments in vaginal swabs collected from women accessing a public STI clinic and compared results to self-reported condom use. Results showed that we can detect DNA in a clinical sample of women for up to 2 weeks.