

Report, Research stay at George Washington University, Washington, DC, USA from July 1st , 2018 to June 30th , 2019.

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During my research stay in the US I mainly worked on studies about cervical cancer and cervical cancer prevention, which resulted in several publications.

I continued my work about Human Papillomavirus latency with professor Patti Gravitt, and the first paper was published in January 2019, and we expect to have more analyses completed by the end of October. We also continued our work on understanding HPV natural history by describing determinants of HPV infection in middle-aged women and by estimating the attribution of new HPV detections due to recent acquisition versus redetection. Understanding whether HPV detection occurs as a result of recent acquisition or because of redetection of a previously acquired infection is important for recommendation on screening and HPV vaccination and for clinical counseling of women. We expect to have papers ready for submission soon. We also finalized a paper about mycoplasma genitalium, a less known sexually transmitted infection. Importantly, we found that the prevalence of this STI was just as high as that of chlamydia. However, no efforts are currently put into place to reduce the burden of this STI, which is concerning as mycoplasma genitalium may be associated with increased risk of PID, ectopic pregnancy, and infertility and because no routine testing is currently performed prior to invasive procedures such as surgical abortion.

During my stay, we also published a paper on cervical cancer mortality rates in Denmark in which we found that mortality rates increased with age, especially after age 65. The paper received massive media attention in Denmark, raising awareness about the underlying reasons for the high mortality rates.

During my stay I was fortunate to be invited to join in on some studies at the National Cancer Institute. We worked on screening data from Kaiser Permanente Northern California, resulting in at least three papers so far. In these papers, we explored the value of using previous screening history in clinical management, estimated risks of cervical precancer and cancer by HPV genotype, and explored the role of different factors such as smoking, oral contraceptives etc. for risk of precancer and cancer. Additionally, I was invited to join in on the ASCCP screening guidelines meeting (meeting about national cervical cancer screening guidelines). After the meeting I was invited to join in on one of the guidelines papers, and I am excited about being a part of this new exciting study that, along with other research papers, forms the basis of the US cervical cancer screening guidelines.

Moving forward, I am working on setting up two ph.d. studies with professor Patti Gravitt (with whom I have been collaborating since 2014), collaborators from the National Cancer Institute and Danish colleagues. With colleagues from NCI, I am collaborating on two other studies, aiming to explore the value of p16/Ki67 dual stain as a triage biomarker for older women who screen HPV-positive, and we are currently finalizing a paper describing uterine cancer mortality rates in Denmark. The paper is expected to be submitted within 2 months.