

# Eerste stappen naar een nieuwe diagnostiek van syfilis

Tijdens haar doctoraatstudie onderzoekt Kara K. Osbak nieuwe diagnostische technieken ter vervanging van de 100 jaar oude serologische testen.

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Dit is de omschrijving

**Syfilis is een seksueel overdraagbare aandoening die veroorzaakt wordt door de *Treponema pallidum*-bacterie. Wereldwijd worden elk jaar meer dan 6 miljoen mensen met de ziekte besmet. In België gaat het in 90 procent van de gevallen om mannen die seks hebben met mannen (MSM). De helft van hen liep de ziekte al eens eerder op. Als syfilis onbehandeld blijft, kan het dodelijk zijn en complicaties bij zwangerschap veroorzaken.**

Diagnosis of a *T. pallidum* infection remains an onerous affair for clinicians because the present techniques don't look for the presence of the syphilis bacteria in the patient's body but for the presence of antibodies directed against the bacteria in the blood. These indirect tests are based on a method that was introduced over one hundred years ago.

Kara researched the use of mass spectrometry on blood samples to directly detect the syphilis bacteria. She investigated whether the proteins in blood could be used as biomarkers. Diagnostic tests could then focus on the presence of these biomarkers to determine whether the patient is infected with syphilis. The results turned out to be negative, so a second avenue of investigation was pursued. This time, mass spectrometry was performed on urine samples. During the initial tests, *T. pallidum* proteins were indeed detected.

Because this second method shows promise, a follow-up study will further explore the possibilities, with the aim of developing new and faster tests. These new tests would not only lighten the workload of clinicians, they would also benefit syphilis prevention because the results would be available quicker. It would mean that patients, and their partners, are informed of their status sooner.

## Link

- De studie: [Contemporary syphilis epidemics: efforts to improve syphilis diagnostics](#)