ID der Kurzfassung : **333**

Detection of Bartonella quintana in lice collected from cloth of Ethiopian homeless

Inhalt

Human lice Pediculus humanus can transmit various pathogens comprising Bartonella quintana, Borrelia recurrentis and Rickettsia prowazekii. Xenosurveillance is an epidemiological approach of assessing human infection risks by screening vectors of infectious diseases. In the proof-of-principle study conducted here, 23 human lice collected from the cloths of 30 homeless Ethiopian individuals were assessed by 16S rRNA gene-specific panbacterial PCR and PCR with specificity for relapsing fever-associated Borrelia spp. with subsequent sequencing of the amplicons. In one amplicon of the panbacterial PCR (4.3% of the assessed lice), DNA of Bartonella quintana was identified. Correlating clinical data were not available, however, the assessment confirmed the abundance of B. quintana in local lice and thus an associated infection pressure. Larger-sized cross-sectional studies seem advisable to more reliable quantify the infection risk for lice-infested local individuals. The need for prevention by providing options of maintaining standard hygiene for Ethiopian homeless individuals is stressed by the finding.

Keywords

Ethiopia; xenosurveillance; Pediculus humanus; Bartonella quintana; infection risk; vector

Registration-ID code

ZOO23-629

Professional Status of the Speaker

Senior Scientist

Junior Scientist Status

No, I am not a Junior Scientist.

Thema Einordnung: Epidemiology and Secondary Data Use

Typ des Beitrags: Poster presentation