

Augsburg, 12 September 2016

September 2016

New at ArminLabs: The *Borrelia miyamotoi* EliSpot

Dear Sir or Madam,

A special form of an infection with *Borrelia* is the infection with the spirochete *Borrelia miyamotoi*, which was detected in Japan in 1995. However, the infection occurs increasingly worldwide. In the past years, more and more *Borrelia miyamotoi* have been found in ticks (England, Germany, USA, amongst others) and related diseases have been documented at the same time.

Borrelia miyamotoi is the human pathogen of relapsing fever. An infection with *Borrelia miyamotoi* can cause the following symptoms: relapsing fever, chills, headaches, joint and muscle pain, fatigue, nausea/vomiting, sometimes conjunctivitis, and cough at an incubation period of 5-15 days. Typically, the symptoms appear for 2-9 days. They can recur in periods of different lengths or even persist. Contrary to an infection with *Borrelia burgdorferi*, an erythema migrans does typically not appear.

Atypical symptoms of an infection with *Borrelia miyamotoi* are as follows: abdominal pain, diarrhoea, hepatitis, myocarditis, arrhythmia, pulmonary symptoms (like ARDS), disseminated intravascular coagulation (DIC), facial nerve paralysis, hearing loss, iritis, polyneuropathies or neuropsychiatric symptoms.

Laboratory diagnostics via detection of antibodies is not available in routine laboratories at the moment. As of now, the analysis of the cellular activity against *Borrelia miyamotoi* is performed at ArminLabs by means of the certified EliSpot method.

The EliSpot (Enzyme-Linked ImmunoSpot) belongs to the group of the interferon gamma release assays (IGRA). The following EliSpot tests have been available at ArminLabs so far: *Borrelia burgdorferi*, Ehrlichia/Anaplasma, Chlamydia pneumoniae/trachomatis, Yersinia, EBV, CMV, Herpes Simplex Virus 1/2. As of now, ArminLabs has extended its EliSpot analytics and is able to offer the *Borrelia miyamotoi* EliSpot.

Please write on the order form by hand if the *Borrelia miyamotoi* EliSpot is not listed on your Order Form.

Borrelia miyamotoi EliSpot

Material: 1x CPDA blood tube

The costs for the *Borrelia miyamotoi* EliSpot are the same as for the Chlamydia pneumoniae EliSpot and can be found on your Order Form.

Yours sincerely,

The ArminLabsTeam

