

Ehrlichiosis

General:

Ehrlichiosis is caused by coccoid gram negative ehrlichia bacteria belonging to rickettsia. Transmission occurs through ticks (*Ixodes ricinus*). The vectors can accommodate and transmit simultaneously *Borrelia burgdorferi* or *Babesia microti*. The incubation period is about 1-3 weeks. Out of 9 known types of ehrlichiosis, 2 are virulent for humans and cause the clinical symptoms of human granulocytosis ehrlichiosis (HGE):

1. *Ehrlichia sennetsu*: sennetsu fever in Japan,
2. *Ehrlichia chaffeensis canis*: North America (Georgia, Missouri, Oklahoma).

Symptomatology: Sennetsu fever in Japan presents acute with fever, shivering attacks, headaches and pains of the joints, sore throats and insomnia. Frequently a generalized, painful lymphadenopathy occurs; especially the retroauricular and posterior cervical lymph nodes are affected. The diseases described in the USA cover a spectrum of mildly proceeding diseases up to complicated forms, rarely with lethal outcome.

The **clinical picture** resembles the Rocky Mountain Spotted Fever (RMSF). The patients complain of fever, headaches, pain of joints, cough, nausea and loss of appetite. In contrast to the RMSF an exanthema is rarely observed. There is usually leukopenia and thrombopenia. It rarely leads to death with kidney failure, encephalopathy or ARDS.

The following tests are available:

- **Ehrlichia IgG antibodies**

Indication: Suspicion of earlier infection

Material: 1 ml serum

TAT: 7-10 days*

Method: IFT

Units: Titer

Ref.- range: <1:64

- **Ehrlichia IgM antibodies**

Indication: Suspicion of acute infection

Material: 1 ml serum

TAT: 7-10 days*

Method: IFT

Method: Titer

Ref.- range: <1:20

For complete list of laboratory test offered at Freiburg Medical Laboratory, please visit
<http://www.fml-dubai.com/parameter-listings/>