

Comparison of Heparin Binding Growth Factor Level in Multiple sclerosis Against Neuromyelitis Optica Patients

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Objective: A heparin-binding growth factor known as Midkine (MK) possess various effects in role important in induction of oncogenesis, inflammation and restoration of tissues. MK with promoting effects in inflammatory responses through enhancing the leukocytes migration in neurological diseases. The aim of this study was to assess the concentration of MK in MS patients with first attack and neuromyelitis optica or a NMJ also called Devic disease.

Methods: The MK level was assessed in 100 new case of MS, 80 Devic patients and 40 healthy samples blood from isolated were Sera samples healthy a for C₂₀ at stored maximum of 48 h before being stored at -70°C prior to analysis using a MK sandwich ELISA. Data was analyzed by SPSS software.

Results: Our results showed that the MK concentration in MS patients with first attack was significantly higher than Devic subjects. The average mean was MK 1191.39±356.78 in MS patients, 882.67±212.93 in Devic patients and 612.96±81.58 healthy samples. **Conclusion:** overall, these results demonstrated that MK plays a prominent function in inflammatory reactions. So, MS in especially, disease autoimmune neuro in also and the MK level may be applied for earlier diagnose and also to prevent from disease by progression inhibitor special using.

Keywords: Midkine, neuromyelitis optica, Multiple Sclerosis