antibiotics (rifaximin, neomicin), neuromodulators (flumazenil, bromkriptin, levodopa) as well as substances that affect the metabolism of ammonia (L-ornithine-L-aspartate, zinc, sodium benzoate).

07U09 METABOLIC AND THYROID ABNORMALITIES IN PATIENTS WITH CHRONIC HEPATITIS C – SINGLE CENTRE EXPERIENCE

Chaloska-Ivanova V, Genadieva-Dimitrova M, Todorovska B, Joksimovic N, Popova R, Curakova E, Janevska D, Miloshevski M, Isahi U, Mishevski J, Andreevski V, Avramovski V, Ramadani A, Koloska T, Serafimoski V

HCV appears to induce insulin resistance and is a risk factor for the development of diabetes mellitus. The IR represents an independent factor for progression of liver fibrosis in patients with chronic hepatitis C. The combination of pegylated interferon alpha (PEG-IFN) and ribavirin (RBV) is the current standard of care for chronic hepatitis C.
The thyroid function abnormality is more frequent finding in HCV infected subjects comparing the general population. Moreover, autoimmune thyroid disorders have been widely reported as adverse effect of interferon therapy of chronic hepatitis C (CHC).

AIM OF THE STUDY:

1. To determine the relation between HCV and IR and the effect of antiviral therapy to IR.
2. To assess the frequency of thyroid abnormalities in patients with CHC before and after the combined antiviral therapy.

MATERIAL AND METHOD:
98 pts with chronic hepatitis C were enrolled in the study. Pretreatment investigations included biochemical, virological and histological evaluation, as well as BMI and IR. The degree of insulin resistance was measured according to the homeostasis model assessment for insulin resistance: HOMA-IR=(FPGLxFIL)/22.5, where FPGL is the fasting insulin level measured in micromoles per liter and FIL is fasting insulin level measured in microIU/ml. The thyroid function was defined with free tiroxin level and TSH. Liver auto antibodies were tested in all cases, and antithyroid antibodies in pts who developed thyroid abnormality. Clinical, biochemical and virological parameters were determined at baseline, during the therapy (w.4, 12, 24/48) and 24 weeks after the end of therapy.

RESULTS: Male: female ratio was 57:41. Age distribution was between 19 and 59 years. HCV genotype distribution was the following: HCV g.1 38, g.3 60. BMI (kg/m2) was in normal range in 75%, whereas in 25% was >29. Average range of fasting glucose was 5.5mmol/L (3.8-6.5), and average insulin level 12.9 (2.0-25microIU/ml). Histological activity index according Knodell was in range 2-12. Liver steatosis was found in 12 cases (3 of them had moderate to severe steatosis involving more than 30% of hepatocytes). The thyroid disorders were found in 11pts (11.2%). In 9 of them thyreosuppressive drugs were introduced. One patient firstly developed thyreotoxicosis and thyreosuppressive treatment was started. Follow-up of the patient showed transition to hypothyreotic state and modification of therapy was necessary. The patient had very high level of antithyroid antibodies. One single case had regular follow-up, whithout indication for thyreosubstitution. 10 pts successfully finished the scheduled antiviral treatment. Post-treatment follow-up has shown slight improvement of IR, but the thyroid substitution treatment was ongoing after the end of therapy.

CONCLUSION: Insulin resistance in HCV positive subjects is related to HCV infection. The antiviral treatment and sustained virological response has beneficial effect on this parameter. The thyroid function abnormality might be induced by interferon therapy, but the presence of antithyroid antibodies suggests preexisting autoimmune phenomenon, additionaly stimulated by antiviral therapy.

08U03 GASTRO ESOPHAGEAL REPHLUX DISEASE (GERD) IN REPUBLIC OF MACEDONIA