

**МІНІСТЕРСТВО ОХОРОНИ ЗДОРОВ'Я УКРАЇНИ
БУКОВИНСЬКИЙ ДЕРЖАВНИЙ МЕДИЧНИЙ УНІВЕРСИТЕТ»**



МАТЕРІАЛИ

**104-ї підсумкової науково-практичної конференції
з міжнародною участю
професорсько-викладацького персоналу
БУКОВИНСЬКОГО ДЕРЖАВНОГО МЕДИЧНОГО УНІВЕРСИТЕТУ
06, 08, 13 лютого 2023 року**

Конференція внесена до Реєстру заходів безперервного професійного розвитку,
які проводитимуться у 2023 році №5500074

Чернівці – 2023

bronchial asthma.

Material and methods. 92 patients were involved in the study: 30 patients with mild and moderate persisting BA (1st group), 30 patients with mild and moderate persisting BA of comorbid chronic acalculous cholecystitis (CAC) in the acute phase (2nd group), 32 patients with CAC in the acute phase (3rd group) and a control group - 30 practically healthy individuals (PHI) of the respective age.

Results. All the patients with BA and BA combined with CAC had a marked predominance of the parasympathetic nervous system, as evidenced by the established significant decrease in the activity of acetylcholinesterase (AChE) in patients with isolated asthma is 1,4 times ($p < 0,05$), in patients with asthma combined with CAC - there was more intense inhibition of enzyme activity – in 1,8 times ($p < 0,05$) and in patients with CAC of the 3rd group there were identical changes – a decreased activity of acetylcholinesterase in 1,6 times ($p < 0,05$) with significant intergroup differences between the groups ($p < 0,05$).

The distribution of patients according to the severity of asthma and correlation analysis showed a direct interdependence between the severity of asthma (by FEV₁ index-forced expiratory volume) of AChE activity ($r = 0,784$, $p < 0,05$).

Conclusions. These data suggest that patients suffering from asthma combined with CAC have a cholinergic imbalance due to vagotonia, established on clinical grounds, and also due to AChE activity inhibition. This vegetative background promotes BA development, mucus hypersecretion by the bronchial glands, and dyscrinia, as was found in the patients under examination. It also leads to a lack of gallbladder contractility, development of sphincter of Oddi hypertension dysfunction, and CAC.

Ferfetska K.V.

CHANGES IN INDICATORS OF C-REACTIVE PROTEIN AND TUMOR NECROSIS FACTOR ALPHA IN PATIENTS WITH CHRONIC PANCREATITIS COMBINED WITH OBESITY AND TYPE 2 DIABETES

*Department of Internal Medicine
Bukovinian State Medical University*

Introduction. Advance of chronic pancreatitis, especially with comorbid obesity and type 2 diabetes mellitus (DM), depends on the intensity of the immune response to damage, in the implementation of which pro-inflammatory cytokines and C-reactive protein (CRP) are important.

The aim of the study is to investigate the levels of C-reactive protein and tumor necrosis factor alpha (TNF- α) in patients with chronic pancreatitis associated with obesity and type 2 diabetes.

Material and methods. 97 patients with chronic pancreatitis were included in the study. All examinees were divided into 3 groups, representative in their number, age and sex. There were 27 patients with chronic pancreatitis in the first group, 28 patients with chronic pancreatitis and type 2 diabetes in the II group, 42 patients with chronic pancreatitis and obesity and type 2 diabetes in the III group. The study also included 30 practically healthy individuals (PHI), whose age and gender did not differ significantly from these characteristics of chronic pancreatitis patients. All the patients underwent general clinical examination methods: history taking, physical examination, laboratory tests. In addition, an anthropometric examination was performed: body weight index (BWI) (kg/m²) was calculated according to the Quetelet's formula and waist circumference was measured. CRP levels were determined with the help of the kit produced by the company NVL "Granum" LLC (Ukraine) using the principle of latex agglutination. TNF- α content was determined using the Human TNF- α total Platinum ELISA kit (Austria).

Results. According to the obtained data, the concentration of TNF- α in patients of the 1st group significantly increased relatively to those in PHI by 1.4 times ($p < 0,05$). Probably the highest levels of TNF- α were found in patients of the III group - 2.8 ($p < 0,05$), 1.9 ($p < 0,05$) and 1.3 times ($p < 0,05$), respectively to indicators in PHI, in the 1st and 2nd groups of patients. As for CRP indicators, the analysis of the results showed a probable increase in its content in patients of the III

group compared to the indicators in patients of the 1st and 2nd groups and PHI. The highest level of CRP was found in the presence of the combined course of chronic pancreatitis with obesity and type 2 diabetes, which is 5.7 times ($p<0.05$) more than in patients with isolated chronic pancreatitis. Systemic low-intensity inflammation, especially under conditions of atherogenic dyslipidemia and hyperinsulinemia, is confirmed by a strong correlation between CRP indicators and immunoreactive insulin (IRI) in patients of the II group ($r=0.94$, $p<0.05$).

Conclusions. The analysis of the results proved the pathogenetic connection of TNF- α , CRP, oxidative stress in the advance of chronic systemic inflammation, especially in the group of patients with chronic pancreatitis combined with obesity and type 2 diabetes. It is evidence of the severity of the disease course in this group of patients, which complicates the prognosis regarding the course of diseases and life.

Honcharuk L.M.

SENSITIVITY OF HELICOBACTER PYLORI TO ANTIBIOTICS IN PATIENTS WITH OSTEOARTHRITIS

*Department of Internal Medicine
Bukovinian State Medical University*

Introduction. Nowadays, an urgent issue in the eradication of *Helicobacter pylori* (*H.pylori*) is the resistance of its strains to antibiotics. In addition to natural resistance, *H.pylori* is characterized by acquired resistance.

The aim of the study. To determine the sensitivity of *Helicobacter pylori* to antibiotics in erosive and ulcerative lesions of the stomach induced by nonsteroidal anti-inflammatory drugs in patients with osteoarthritis.

Materials and methods. Resistance of *H.pylori* infection to antibiotics (clarithromycin, amoxicillin and tetracycline) was determined in 30 patients with osteoarthritis and concomitant *H.pylori* -positive erosive and ulcerative lesions of the stomach (EUL) induced by nonsteroidal anti-inflammatory drugs (NSAIDs).

Results. When examining patients with OA with concomitant Hr-associated EUL caused by NSAIDs, we found a rather small resistance of *H.pylori* to clarithromycin. In 6.7% of patients *H.pylori* was resistant to this macrolide. Resistance of *H.pylori* strains to clarithromycin is important to be considered, since this macrolide is used in the main schemes of treatment of helicobacteriosis. In case of resistance to clarithromycin, eradication is generally reduced by almost 5 times. According to the literature, the resistance of *H.pylori* to clarithromycin in different countries of the world ranges from 3.0% to 48.0%. The resistance of *H.pylori* to β -lactams was also studied. Amoxicillin is the most effective in the treatment of *H.pylori*, a semi-synthetic penicillin of the III generation, with a wide spectrum of action, which has a bactericidal effect on *H.pylori* and is included in the first line of treatment of *H.pylori* according to the Maastricht Consensus-5, 2015. Resistance of *H.pylori* to this drug is considered to be quite low, but in recent years there has been an increase in the resistance of *H.pylori* to amoxicillin. The resistance of *H.pylori* to amoxicillin ranges from 0% to 8.8%. Our studies also found some resistance of *H.pylori* to amoxicillin. 3.3% of patients had resistance to this β -lactam. When studying *H.pylori* resistance to tetracycline, it was established that it rarely develops and has no clinical significance. All the *H.pylori* strains were sensitive to tetracycline in patients with OA and concomitant *H.pylori* -positive EUL induced by NSAIDs.

Conclusions. Determination of *Helicobacter pylori* resistance to antibiotics found a fairly high sensitivity of the infection to clarithromycin and amoxicillin (93.3% and 96.6%, respectively) and a very high sensitivity to tetracycline.