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## A CLINICAL CASE OF A COMBINATION OF CROHN'S DISEASE AND JUVENILE RHEUMATOID ARTHRITIS IN A MALE SAKHA ADOLESCENT

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The case of the current of two severe autoimmune diseases (Crohn's disease and juvenile rheumatoid arthritis) in a male Sakha adolescent is presented in the article.

Keywords: Crohn's disease, juvenile rheumatoid arthritis, arthralgias, Yakutia.

Introduction. The first description of inflammatory bowel disease was published in 1932 in the USA [6]. Three authors Berrill W. Krohn, Leon Ginsburg, and Gordon D. Oppenheimer described subacute and chronic inflammation of the terminal ileum with chronic narcotic and scarring inflammation in young men. Since then, the history of Crohn's disease research has continued, but the etiology of this disease has not yet been determined and no effective therapy leading to complete recovery has been developed.

Crohn's disease (CD) is a chronic recurrent autoimmune disease of the gastrointestinal tract of unclear etiology characterized by segmental transmural granulomatous inflammation, predominantly with the development of local and systemic complications [1].

Crohn's disease is one of the serious problems in pediatrics. In this disease in children, there are no specific complaints and characteristic changes in general clinical and biochemical tests. The pathological process can involve any part of

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the digestive organs from the oral cavity to the anus. There may also be extraintestinal manifestations. A multidisciplinary approach is necessary for prompt diagnosis [3].

Progress in the field of determining the mechanisms of autoimmune inflammation and the development of genetically engineered drugs has made it possible to achieve persistent remission [2,5]. In the literature it is described that patients with a combination of several immunoinflammatory diseases are shown the use of genetically engineered biological therapy with good effect [4].

**Clinical example.** Child L., Sakha, 17 years old.

From the anamnesis: The child from the 2nd pregnancy, 2nd childbirth. Pregnancy proceeded against the background of anemia, threat of interruption. Premature birth occurred at the 25-26th week. Birth weight was 1200 g, body length was 47 cm. Due to prematurity she was nursed in the neonatal pathology department until 2 months of age.

Heredity: aggravated on the father's side - unspecified arthritis.

Past diseases: Acute respiratory viral infections frequently.

Allergologic anamnesis: Since 5 years of age he suffers from bronchial asthma, atopic form, mild course.

Medical history: According to the words of the boy, he has had the disease since the age of 16. At the onset of the disease, the patient was bothered by pain in the lumbar region. Since the beginning of December 2022, he has been concerned about pain in the left foot. He went to the hospital, a plaster cast was applied. On December 18, 2023, pain in the right foot with progressive swelling appeared. The patient repeatedly went to the hospital - recommendations were given, topical ointment Troxevasin was

applied. Since December 22, 2022 pain in knee joints, hip joints, fever up to 38°C, which decreased independently without antipyretics. In this connection he was hospitalized in the cardio-rheumatology department of the Pediatric Center of the Republican Hospital No. 1-National Center of Medicine named after M.E. Nikolaev.

Complaints on admission: pain in the joints after physical activity, periodic pain in the epigastrium when eating.

On admission: condition of average severity in the main disease. Height was 171 cm, body weight was 90.4 kg. Respiratory rate was 20 per min. Saturation was 99%. Heart rate was 77 beats per minute. BP was 120/65 mm Ha. Feeling decreased. Appetite not disturbed. Sleep was calm. Consciousness was clear. The physique was normal. Increased nutrition. The pharynx was not hyperemic. Mucous membranes of the mouth and pharynx clean, pale color. Nasal breathing was free. Bone and joint system were without features. Peripheral lymphatic system: lymph nodes were not enlarged. The thorax was regular in shape. Percussion - clear lung sound in all fields. Vesicular breathing, no rales. Heart tones clear, rhythmic. The abdomen was soft, painless. Liver and spleen were not enlarged. Edema of the right foot. Urination was free, painless. No peripheral edema.

Paraclinical: In the general blood test dated 12/22/2022.: hemoglobin - 120 g/L (RI: 120-160 g/L); red blood cells -  $4.4\times10^{12}$ /L (RI: 4.1- $5.2\times10^{12}$ /L); platelets - 250  $10^9$ /L (RI: 150 -  $450\times10^9$ /L); white blood cells - $16.8\times10^9$ /L (RI: 4.5 -  $13\times10^9$ /L); lymphocytes - 12% (RI 8-10%); monocytes -  $0.4\times10^9$ /L (RI: 0.05 -  $0.4\times10^9$ /L); neutrophils - 8% (RI: 1-5%); neutrophils - 8% (RI: 43-60%); eosinophils - 3% (RI: 0-5%); COE - 20 mm/h (RI: 1-15 mm/h). Conclusion: lymphocy-



tosis, leukocytosis, neutrophilic shift of leukocytic formula, increased ESR.

Biochemical blood test 22.12.2022: ALT - 96 units/l (RI: 00-29.00 units/I), AST - 92.5 units/I (RI:00-36 units/I), CRP - 114.9 mg/I (RI:0-5mg/I). Conclusion: Increased levels of alanine aminaminosrasferase, aspartate aminotransferase, C-reactive protein.

Hand radiography dated 21.12.2022 joint gaps were preserved, articular surfaces with smooth, clear contours, without bone-destructive changes, paraarticular tissues were edematous.

Digital radiograph of knee joints in 2 projections dated 16.10.2023: Bone relationships were not disturbed. Bone dimensions were normal, contours were clear. Intra-articular gaps were irregularly narrowed. The articular surfaces were not deformed, clearly and evenly contoured. The bone structure was preserved. Conclusion: Radiologic signs of arthritis of knee joints.

X-ray of thoracic cavity organs from 22.12.2022 without pathology.

Fibrogastroscopy dated 21.12.2022: The esophageal mucosa was pink, shiny. The dentate line was clear. The cardia was closed. In the stomach cavity there was a large amount of bile, secretory fluid. hematine. The folds of the stomach of the usual shape and height. Gastric mucosa was edematous, hyperemic, vulnerable, with contact bleeding, total with multiple hemorrhagic erosions with hematinous plaque 0.5-1.5 cm in some places with fibrin plaque, expressed contact bleeding. Peristalsis of antral section with medium waves. The preauricle was closed. The bulb was deformed, on the upper wall with formation of pseudodiverticulosis on the lower wall with semicircular scar. The mucous membrane was focal-hyperemic, with slight epithelizing erosions, the mucous membrane of the descending part of the duodenum was pink. Conclusion: Duodenogastric reflux. Erythematous gastropathy.

Ultrasound examination of abdominal cavity organs from 28.12.2022: ECHO-pathology was not revealed.

Computed tomography of abdominal cavity organs dated 28.12.2022: Liver of normal size and shape, contours smooth. structure of parenchyma homogeneous, density indices slightly decreased 47-51ed. Intrahepatic bile ducts were not dilated. Gall bladders 1.5x1 cm. with constriction in the area of the bottom, the walls of the bladder were smooth. Conclusion: Moderate diffuse changes in the liver parenchyma.

Colonoscopy dated 12/22/2022: Bauginia flap was semilunar in shape, its mouth was closed oriented to the dome of the cecum. The terminal part of the ileum was examined - the mucosa was pink, velvety. The lumen of the examined parts of the colon was not deformed, in the lumen there was a large amount of liquid, yellowish content, asperated. The folding of the intestine was preserved. The folds were well spread when insufflated with air. The tone of the intestine was normal. Visible mucosa of the colon was pale pink. Conclusion: signs of catarrhal proctitis.

Clinical diagnosis: Juvenile arthritis (seronegative), polyarthricular variant, 3rd degree of activity, 2nd radiologic stage. FC 3. Crohn's disease. Chronic gastric ulcer with bleeding. Autoimmune hepatitis.

Prescribed adalimumab (Humira) 40 mg once every 2 weeks (every 2 weeks), mesalazine (salofalc) 1g 3 times a day, with positive effect.

In May 2023, the child was again on a scheduled dispensary examination, in remission.

In October 2023, he was admitted with sharp pains in the epigastric region and stool color change (dark color, viscous consistency). He was examined in the reception-diagnostic department of PCC RB №1-NCM. The child's condition was severe. Self-being was decreased. Appetite was reduced. Anxious. Consciousness was clear. Correct physique. Increased nutrition. The pharynx was not hyperemic. The mucous membranes of the mouth and pharynx were clean, pale in color. Nasal breathing was free. Bone and joint system without features. Peripheral lymphatic system: lymph nodes were not enlarged. The thorax was regular in shape. At percussion of the chest - clear pulmonary sound. On auscultation of the chest there was vesicular breathing, no rales. Heart tones were clear, rhythmic. The abdomen was soft, sharp soreness in the epigastrium. The liver and spleen were not enlarged. Urination was free, painless. There was no peripheral edema. Stool 19.10.2023 1 time, formed.

Paraclinical: General blood test dated 13.10.2023.: hemoglobin - 145 g/L (RI: 120-160 g/L); red blood cells - 5.1x10<sup>12</sup>/L (RI: 4.1-5.2x10<sup>12</sup>/L); platelets -109/L (RI: 150 - 450x109/L); leukocytes - 6.31x10°/L (RI: 4.5 - 13x10°/L); lymphocytes - 44% (RI: 8-10%); monocytes - 9.5x109/L (RI: 0.05 - 0.4x109/L); neutrophils - 1% (RI: 1-5%); basophils - 0.5% (RI: 00-0.7%); eosinophils - 3.2% (RI: 0-5%); ESR -7 mm/h (RI: 1-15 mm/h). Conclusion: lymphocytosis.

Biochemical blood dated test 13.10.2023: C-reactive protein

(RI:0.00-10.00), ASLO - 265 IU/mL (RI:0.00-200.00), Rheumatoid factor negative, Ig A total >4. 2 mg/mL (RI:0.7-3.00), Ig M total >3.20mg/mL (RI:0.5-2.00), Ig G 10.10 mg/mL (RI:8.00-16.00), Ia E - 139.30 IU/mL. CIC - 48 units. Conclusion: increased ASLO, Ig A, Ig M, Ig E.

Coagulogram dated 10.10.2023: Prothrombin index - 84.00% (RI:20.00-140.00), prothrombin time - 15.00 s (RI:13.5-17.00), INR - 1.09(RI:0.81-1.13), fibrinogen - 2.82(RI: 1.9-4.3), ACTH - 41.1(RI: 30.8-41.4). Conclusion: coagulogram was normal.

Esophagogastroduodenoscopy from 10.10.2023: Conclusion: Duodenogastric reflux. Erosive gastropathy. Non-erosive reflux esophagitis.

Digital radiograph of knee joints in 2 projections dated 16.10.2023: Bone relationships were not disturbed. Bone dimensions were normal, contours were clear. Intra-articular gaps were irregularly narrowed. The articular surfaces were not deformed, clearly and evenly contoured. The bone structure was preserved. Conclusion: Radiologic signs of arthritis of knee joints. Osteochondropathy. Osgood-Schlatter disease.

Ultrasound examination of abdominal cavity organs dated 13.10.2023: Visualization was partial, extremely difficult due to pronounced flatulence and increased subcutaneous fatty tissue. The liver was enlarged, left half was 6.3 mm, right lobe was 129 mm, oblique vertical dimension was 150 mm. The contour was even. The structure was homogeneous, echogenicity was above average. Intrahepatic bile ducts were not dilated. The vascular pattern was smoothed. The hepatic veins were not dilated. The portal vein was 9 mm. The gallbladder was located typically. The shape was oval, with a bend in the area of the bottom. The wall was thin, the lumen was clear. The size was 69 mmx23 mm. The common bile duct was not dilated. The pancreas was not enlarged. The contour was even. The size of the head was 21 mm, body was 13 mm, tail was 24 mm. The structure was homogeneous, echogenicity was average. The kidneys were located typical. The right kidney was 99 mmx40 mm. The contours were even. The parenchyma was 19 mm thick. The calyx-lochanous system was not dilated. The left kidney measures 100 mmx50 mm. Contours were even. The parenchyma was 20 mm thick. The calyx-lochanous system was not dilated. Urinary bladder was empty. Conclusion: Hepatomegaly. Diffuse changes in the liver parenchyma. Deformation of the gallbladder.

Test for Helico bacterium from 18.10.2023: Hp +

Colonoscopy from 12.10.2023: The lumen of the cecum was narrowed by 1/3 due to edema of the bauginia flap, the mucosa of the bauginia flap was sharply edematous and hyperemic, with multiple ulcers of 2.0 cm with fresh undermined edges, the crater was covered with fibrin. The aperture of the flap was spasmodic, impassable for the apparatus. The rest of the examined areas of the colonic mucosa were without peculiarities. For biopsy 2 fragments of the ileum mucosa, 3 fragments of the mucosa of the Bauginia flap were taken. Conclusion: Terminal ileitis. Crohn's disease. Active stage with ulcers and stricturing.

Biopsy of small intestine mucosa fragments from 20.10.2023: biopsy material contains fragments of small intestine mucosa with the picture of chronic active ileitis, with focal cryptitis, with focal hyperplasia of peyer's plaques.

Clinical diagnosis: Inflammatory bowel disease. Crohn's disease with extraintestinal manifestations. Juvenile arthritis (seronegative), polyarthricular variant, grade 3 activity, X-ray grade 2. FC 3. Autoimmune hepatitis. Osgood-Schlatter disease.

Treatment was prescribed: ward regime, table #5, adalimumab (Humira) 40mg p/k, pancreatin 1 capsule 3 times a day with meals, omeprazole 20 mg 2 times a day (8 h-20 h) for 14 days.

On 20.11.2023 the child was discharged with improvement.

Recommendations at discharge: observation of the district pediatrician, table #4, exemption from physical training (exclude physical activity), contraindicated insolation, contraindicated vaccination and administration of gamma globulin, contraindicated hypothermia and bathing in open water, immunomodulators, contact with animals, contraindicated physical and mental trauma. Examination of gastroenterologist and rheumatologist once a month, ophthalmologist once every 3 months, planned hospitalization in Pediatric Endocrinology and Gastroenterology Department every 3 months, cardiac ultrasound once every 3 months, chest Computed Tomography once every 6 months.

Adalimumab (Humira) 40 mg once every 2 weeks. (every 2 weeks) constantly, calcium preparation, vitamin D constantly for 3 months, 1 month break, mesalazine (salofalc) 1g 3 times a day constant intake, Nexium 20 mg once a day for 3 weeks, pancreatin (Creon, Micrazyme) 10 TE 3 times a day with meals for 3 weeks, urodesoxycholic acid 250 mg at lunch, 500 mg in the evening.

Conclusion. This article presents a case of the course of two severe auto-immune diseases (Crohn's disease and juvenile rheumatoid arthritis) in a male Sakha adolescent. Such clinical examples are rare in the publicly available

literature. The management of this child requires a multidisciplinary approach and joint therapy by gastroenterologists and rheumatologists to achieve a durable remission.

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## COMBINATION OF MILLER FISHER SYNDROME AND UNSPECIFIED PERIPHERAL T-CELL LYMPHOMA

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The article presents a clinical case of combination of Miller Fisher syndrome and unspecified peripheral T-cell lymphoma, which is an aggressive disease with an extremely poor prognosis. The pathogenetic treatment of the identified syndrome did not cause an improvement in the patient's condition and did not affect the expected unfavorable prognosis of the primary malignant disease, for which chemotherapy was not carried out due to the extremely serious condition of the patient. This case emphasizes the importance of an oncological search in patients with Miller Fisher syndrome and the mandatory determination of onconeural antibodies used in the diagnosis of paraneoplastic neurological syndrome, which occurs in malignant tumors of various histogenetic types.

**Keywords:** unspecified peripheral T-cell lymphoma, paraneoplastic neurological syndrome, Guillain-Barré syndrome, Miller Fisher syndrome.

Paraneoplastic syndrome (PNS) is a clinical and laboratory manifestation of a malignant tumor, caused by nonspecific

reactions from various organs and systems or ectopic production of biologically active substances by the tumor. It is