Multiple studies support triple therapy with LABA/LAMA/ICS (fluticasone furoate / umeclidinium / vilanterol inhaled: (92/55/22 micrograms/dose inhaler) 1 puff once daily or beclomethasone/formoterol/glycoperion inhaled: (87/5/9 micrograms/dose inhaler) 1 puff once daily) as being superior to single- or double-agent therapy with LABA/LAMA or LABA/ICS regarding rate of moderate to severe COPD exacerbations and rate of hospitalisation.

**Conclusions.** Over the past few years, the potential of pharmacotherapy for COPD has substantially expanded: new fixed combinations of LABA and LAMA of different classes and triple combinations (LABA/LAMA / ICS) have become available.

## PHARMACOTHERAPY OF CHRONIC GLOMERULONEPHRITIS

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**Introduction.** Chronic glomerulonephritis (CGN) is a chronic progressive immune-inflammatory disease of both kidneys that is diagnosed with a duration of symptoms over 1 year. The prevalence of CGN is about 0.2%, CGN is ranked 3 among the causes of chronic renal failure (CRF).

**Aim** of our work is analysis and study of recommendations for pathogenetic pharmacotherapy of CGN.

**Materials and methods.** We have analyzed the Orders of the Ministry of Health of Ukraine No. 436 of August 31, 2004 and No. 593 of December 02, 2004, materials from Healthline and Guideline KDIGO, 2012 and Guideline NICE, 2014.

Results and discussion. Treatment for CGN consists of diet therapy and pathogenetic pharmacotherapy with medicinal products. Patients recommended diet number 7 with restriction of salt, water, and in cases of development of CRF – restriction of meat and consumption of products with high content of potassium and calcium. Glucocorticoids (Prednisolone or Methylprednisolone), cytostatics (Cyclophosphamide, Chlorobutyl), 4-hydroxyquinoline preparations (Delagil) are used for pathogenetic pharmacotherapy in order to influence the autoimmune inflammatory process. Anticoagulants of direct action (Heparin or low molecular weight heparins), antiplatelets (Dipyridamole, Pentoxifylline, Ticlopidine, Clopidogrel) are used to improve renal blood flow and prevent thrombotic formation. For patients with non-valvular atrial fibrillation, it is recommended to use inhibitors of the active site of the factor Xa – Apixaban. For the purpose of correction of arterial pressure (AT) predominantly in the hypertonic and mixed form of CGN and for the purpose of nephroprotection, ACE inhibitors are used (Enalapril, Lisinopril, Ramipril, Captopril, in the case of increasing creatinine – Fosinopril or Moexipril); antagonists of angiotensin II receptors (Valsartan, Losartan, Irbesartan, Candesartan); Calcium antagonists (preferred for Diltiazem, which has the largest nephroprotective effect, along with antihypertensive personally with prolonged use). In order to reduce edema, recommended loop diuretics (prescribed for long edema in intermittent mode: 1 time in 1-3 days); thiazide diuretics (Hydrochlorothiazide, Chlorthalidone, Indapamide), potassium-sparing diuretics (in the absence of azotemia and hyperpotassemia). Hypocholesterole diet is recommended for lowering lipid levels, and from hypolipidemic drugs – statins (Atorvastatin, Simvastatin, Rosuvastatin, Fluvastatin); fibrates (Fenofibrate), sequester of gall acids, nicotinic acid preparations. Vitamins A and E are used to normalize the function of cytomembranes.

**Conclusions.** Complex pathogenetic and symptomatic pharmacotherapy is used to the pharmacotherapy of CGN which helps to improve the effectiveness of CGN treatment and improve the quality of life of the patient.