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| №              | krok 2023   |
| Topic          | Drugs acting on cardiovascular system.  |
| Task           | A patient developed an atrioventricular block. What drug is indicated in this case? |
| Correct answer | Atropine  |
| B              | Clophelin (Clonidine)   |
| C              | Metoprolol  |
| D              | Anaprilin (Propranolol)   |
| E              | Pirenzepine   |
| №              | krok 2023   |
| Topic          | General pharmacology. Pharmacokinetics. Pharmacodynamics.                           |
| Task           | What is the name of the phenomenon when one drug enhances the effect of another?    |
| Correct answer | Synergism   |
| B              | Withdrawal  |
| C              | Tachyphylaxis   |
| D              | Sensitization   |
| E              | Antagonism  |
| №              | krok 2023   |
| Topic          | Agents influencing on afferent and efferent innervations.                           |
| Task           | What drug can be used to stop a bronchospasm?                                       |
| Correct answer | Salbutamol  |
| B              | Amoxicillin   |
| C              | Aspirin   |
| D              | Atenolol  |
| E              | Omnoponum   |
| №              | krok 2023   |
| Topic          | Drugs acting on metabolism, blood and immunity.                                     |
| Task           | A fibrinolysis inhibitor was used to stop postpartum bleeding. Name this drug.      |

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| Correct answer | Aminocaproic acid  |
| B              | Thrombin   |
| C              | Calcium chloride   |
| D              | Nettle leaves  |
| E              | Hemostatic sponge  |
| №              | krok 2023  |
| Topic          | Antimicrobial and antiparasitic drugs.   |
| Task           | What is the mechanism of action of the antiviral drug acyclovir?   |
| Correct answer | Inhibition of nucleic acid synthesis   |
| B              | Blockade of cellular wall synthesis  |
| C              | Antagonism with para-aminobenzoic acid   |
| D              | Inhibition of protein synthesis  |
| E              | Increase of cellular membrane permeability   |
| №              | krok 2023  |
| Topic          | Agents influencing on afferent and efferent innervations.  |
| Task           | A doctor prescribed metoprolol to a patient, which helped to lower the patient's blood pressure. This drug belongs to the following pharmacological group: |
| Correct answer | Beta-blockers  |
| B              | Alpha-blockers   |
| C              | Nicotinic antagonists  |
| D              | Muscarinic antagonists   |
| E              | Sympatholytics   |
| №              | krok 2023  |
| Topic          | General pharmacology. Pharmacokinetics. Pharmacodynamics.  |

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| Task           | During a surgery with application of tubocurarine as a muscle relaxant, the patient developed a respiratory disturbance. The disturbance was eliminated after the patient was administered proserin (neostigmine). What term can be used to describe the interaction between these two drugs? |
| Correct answer | Antagonism  |
| B              | Cumulation  |
| C              | Incompatibility   |
| D              | Synergism   |
| E              | Tachyphylaxis   |
| №              | krok 2023   |
| Topic          | Agents influencing on afferent and efferent innervations.   |
| Task           | What drug is indicated in case of an overdose of depolarizing muscle relaxants?   |
| Correct answer | Prozerin (Neostigmine)  |
| B              | Naloxone  |
| C              | Magnesium sulfate   |
| D              | Unithiol  |
| E              | Metoprolol  |
| №              | krok 2023   |
| Topic          | Drugs acting on the CNS.  |
| Task           | A patient suffering from neurosis associated with feelings of anxiety and fear was prescribed diazepam. What pharmacological effect of this drug allows using it in treatment of this condition?  |
| Correct answer | Anxiolytic  |
| B              | Hypotensive   |
| C              | Antiarrhythmic  |
| D              | Anti-inflammatory   |
| E              | Antianginal   |

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| №              | krok 2023   |
| Topic          | Drugs acting on metabolism, blood and immunity.   |
| Task           | What drug has a hypoglycemic effect because it stimulates pancreatic beta- cells?   |
| Correct answer | Glibenclamide   |
| B              | Retabolil (Nandrolone)  |
| C              | Prednisolone  |
| D              | Heparin   |
| E              | Adrenaline  |
| №              | krok 2023   |
| Topic          | Drugs acting on metabolism, blood and immunity.   |
| Task           | A patient developed a hemorrhage caused by a long-term use of neodicumarin (ethyl biscoum acetate). What neodicumarin antagonist must be used in this case?   |
| Correct answer | Vicasol (Menadione)   |
| B              | Aminocaproic acid   |
| C              | Etamsylate  |
| D              | Fibrinogen  |
| E              | Ascorbic acid   |
| №              | krok 2023   |
| Topic          | Agents influencing on afferent and efferent innervations.   |
| Task           | Phenylephrine (mczaton) was administered to a patient with collapse for blood pressure correction. What is the mechanism of hypertensive action of this drug? |
| Correct answer | Stimulates alpha-adrenoceptors  |
| B              | Stimulates beta-adrenoceptors   |
| C              | Stimulates muscarinic acetylcholine receptors   |
| D              | Stimulates angiotensin receptors  |
| E              | Stimulates nicotinic acetylcholine receptors  |
| №              | krok 2023   |

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| Topic          | Drugs acting on cardiovascular system.   |
| Task           | A patient with essential hypertension was prescribed lisinopril. What is the mechanism of action of this drug?   |
| Correct answer | Inhibits angiotensin-converting enzyme   |
| B              | Blocks $\alpha$ -adrenergic receptors  |
| C              | Blocks muscarinic receptors  |
| D              | Stimulates $\beta$ -adrenergic receptors   |
| E              | Blocks $\beta$ -adrenergic receptors   |
| №              | krok 2023  |
| Topic          | Drugs acting on cardiovascular system.   |
| Task           | A patient has toxic pulmonary edema. What drug must be used for emergency aid in this case?  |
| Correct answer | Mannitol   |
| B              | Hydrochlorothiazide  |
| C              | Diacarb (Acetazolamide)  |
| D              | Spirolactone   |
| E              | Indapamide   |
| №              | krok 2023  |
| Topic          | Agents influencing on afferent and efferent innervations.  |
| Task           | A 34-year-old woman with bronchitis presents with persistent dry non-productive cough. Her physician prescribed her a centrally acting antitussive drug. Name this drug. |
| Correct answer | Glaucine   |
| B              | Mucaltin   |
| C              | Ambroxol   |
| D              | Bromhexine   |
| E              | Acetylcysteine   |
| №              | krok 2023  |
| Topic          | Agents influencing on afferent and efferent innervations.  |

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| Task           | What anticholinesterase agent is used to stimulate intestinal peristalsis in the patients during the postoperative period? |
| Correct answer | Prozerin (Neostigmine)   |
| B              | Metoprolol   |
| C              | Adrenaline hydrochloride   |
| D              | Dithylin (Suxamethonium)   |
| E              | Salbutamol   |
| №              | krok 2023  |
| Topic          | Drugs acting on metabolism, blood and immunity.  |
| Task           | Ascorutin is used in treatment of bleeding gums and punctate hemorrhages. What vitamin does it contain?                    |
| Correct answer | C  |
| B              | D  |
| C              | E  |
| D              | K  |
| E              | A  |
| №              | krok 2023  |
| Topic          | Antimicrobial and antiparasitic drugs.   |
| Task           | What drug is used in treatment of herpes infection?  |
| Correct answer | Acyclovir  |
| B              | Sabin's vaccine  |
| C              | Tamiflu (Ozeltamivir)  |
| D              | Rimantadine  |
| E              | Gamma globulin   |
| №              | krok 2023  |
| Topic          | Antimicrobial and antiparasitic drugs.   |
| Task           | What groups of antibiotics can be classified as beta-lactam antibiotics?   |

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| Correct answer | Penicillins, cephalosporins, monobactams, carbapenems  |
| B              | Penicillins, cephalosporins, tetracyclines   |
| C              | Penicillins, cephalosporins, macrolides, carbapenems   |
| D              | Cephalosporins, macrolides, aminoglycosides  |
| E              | Cephalosporins, monobactams, aminoglycosides   |
| №              | krok 2023  |
| Topic          | Drugs acting on cardiovascular system.   |
| Task           | To quickly stop an attack of angina pectoris, a 55-year-old patient was prescribed an organic nitrate drug. What drug is it?                   |
| Correct answer | Nitroglycerin  |
| B              | Labetalol  |
| C              | Octadine (Guanethidine)  |
| D              | Prazosin   |
| E              | Nifedipine   |
| №              | krok 2023  |
| Topic          | Drugs acting on the CNS.   |
| Task           | A 33-year-old woman was admitted into a psychiatric hospital with an anxiety disorder of neurotic origin. What drug is indicated in this case? |
| Correct answer | Diazepam   |
| B              | Naloxone   |
| C              | Droperidol   |
| D              | Levodopa   |
| E              | Valerian extract   |
| №              | krok 2023  |
| Topic          | Drugs acting on cardiovascular system.   |
| Task           | What drugs can be classified as angiotensin-converting enzyme (ACE) inhibitors?  |
| Correct answer | Captopril, enalapril   |

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| B              | Nifedipine, diltiazem   |
| C              | Losartan, irbesartan  |
| D              | Raunatin, reserpine   |
| E              | Dibazol (bendazol), papaverine  |
| №              | krok 2017   |
| Topic          | Drugs affecting the cardiovascular system. Uricosuric drugs.  |
| Task           | Gout develops when purine nucleotide metabolism is disturbed. A doctor prescribed the patient allopurinol that is a competitive inhibitor of:   |
| Correct answer | Xanthine oxidase  |
| B              | Succinate dehydrogenase   |
| C              | Alcohol dehydrogenase   |
| D              | Lactate dehydrogenase   |
| E              | Hexokinase  |
| №              | krok 2017   |
| Topic          | Drugs acting on metabolism, blood and immunity. Drugs influencing blood coagulation.  |
| Task           | A 45-year-old woman, who for two weeks has been taking neodicoumarin (ethyl biscoumacetate) due to trombophlebitis, during a regular examination was detected to have decreased blood content of prothrombin, in urine there is microhematuria. What drug should be administered as a neodicoumarin antagonist? |
| Correct answer | Vicasol (Menadione)   |
| B              | Protamine sulfate   |
| C              | Sodium citrate  |
| D              | Heparin   |
| E              | Aminocapronic acid  |
| №              | krok 2017, 2016   |
| Topic          | Drugs influencing the efferent innervation. Cholinergic agonists.   |

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| Task           | A patient complaining of dry mouth, photophobia, and visual impairment has been delivered into an admission room. The skin is hyperemic and dry; pupils are dilated; tachycardia is observed. The patient was diagnosed with belladonna alkaloids intoxication. What drug would be advisable? |
| Correct answer | Proserin  |
| B              | Aceclidine  |
| C              | Pilocarpine   |
| D              | Armin   |
| E              | Dipiroxim   |
| №              | krok 2017   |
| Topic          | Drugs influencing the efferent innervation. Cholinergic antagonists.  |
| Task           | A child accidentally took a drink from the vial of grandmother's medicine for glaucoma. The medicine was identified as pilocarpine hydrochloride. What drug can be used as an antidote?   |
| Correct answer | Atropine  |
| B              | Carbachol   |
| C              | Aceclidine  |
| D              | Benzohexonium (Hexamethonium)   |
| E              | Pentamin (Azamethonium bromide)   |
| №              | krok 2017, 2016   |
| Topic          | Drugs affecting the central nervous system. Neuroleptic drugs. Tranquilizers. Psychosedatives.  |
| Task           | A woman suffering from neurosis has disturbed sleep. What drug is optimal for insomnia treatment?   |
| Correct answer | Nitrazepam  |
| B              | Phenobarbital   |
| C              | Aethaminalum-natrium (Pentobarbital)  |
| D              | Bromisoval  |
| E              | Valerian tincture   |

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| №              | krok 2017   |
| Topic          | Antimicrobial and antiparasitic drugs. Antituberculosis, antispirochetal and antiprotozoal drugs.                                 |
| Task           | What antiprotozoal drug can be recommended to a woman with trichomoniasis?  |
| Correct answer | Metronidazole   |
| B              | Primaquine  |
| C              | Chloridine  |
| D              | Solusurminum(Sodiumsti-bogluconate)   |
| E              | Chiniofon   |
| №              | krok 2017, 2016   |
| Topic          | Antimicrobial and antiparasitic drugs. Disinfectants and antiseptics.   |
| Task           | Select the halogenated antiseptic that would be preferable for a child to pack in the first aid kit, when going to a summer camp: |
| Correct answer | Iodine alcoholic solution   |
| B              | Brilliant green   |
| C              | Copper sulfate  |
| D              | Methylene blue  |
| E              | Formaldehyde solution   |
| №              | krok 2017   |
| Topic          | Drugs influencing the efferent innervation. Cholinergic antagonists.  |
| Task           | Name the most typical symptom of atropine poisoning:  |
| Correct answer | Dilated pupils unresponsive to light  |
| B              | Constricted pupils unresponsive to light  |
| C              | Excessive sweating  |
| D              | Bradycardia   |
| E              | Low intraocular pressure  |
| №              | krok 2017   |

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| Topic          | Drugs affecting metabolism. Water-soluble vitamins.  |
| Task           | A patient consulted an ophthalmologist about deterioration of twilight vision and xerophthalmus. What drug should the doctor prescribe?                              |
| Correct answer | Retinol  |
| B              | Pyridoxine   |
| C              | Tocopherol   |
| D              | Ascorbic acid  |
| E              | Coccarboxylase   |
| №              | krok 2017  |
| Topic          | Drugs affecting the cardiovascular system. Drug affecting the vascular tonus. Antihypertensive, hypertensive drugs   |
| Task           | A woman with hypertension came to a doctor complaining of dry cough that developed against the background of her therapy. What antihypertensive drug was she taking? |
| Correct answer | Lisinopril   |
| B              | Atenolol   |
| C              | Nifedipine   |
| D              | Furosemide   |
| E              | Dichlothiazide (Hydrochlorothiazide)   |
| №              | krok 2017  |
| Topic          | General pharmacology. Pharmacokinetics.  |
| Task           | Decreased absorption of tetracyclines, if they are taken simultaneously with antacids, is an example of their:   |
| Correct answer | Pharmacokinetic incompatibility  |
| B              | Pharmaceutical incompatibility   |
| C              | Pharmacodynamic incompatibility  |
| D              | Synergism  |
| E              | Functional antagonism  |

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| №              | krok 2017  |
| Topic          | Drugs acting on the CNS. Nootrops. Adaptogens. Analeptics.   |
| Task           | A patient after craniocerebral trauma has been prescribed piracetam. What pharmacological group does this drug belong to?                                  |
| Correct answer | Nootropic agents   |
| B              | Non-narcotic analgesics  |
| C              | Tranquilizers  |
| D              | General anesthetics  |
| E              | Antipsychotics   |
| №              | krok 2017  |
| Topic          | Agents influencing on afferent and efferent innervations. Preparations influencing on impulse transmission in cholinergic junction. M-, N-cholinomimetics. |
| Task           | Recommend the patient with glaucoma an M-cholinomimetic agent:   |
| Correct answer | Pilocarpine hydrochloride  |
| B              | Ephedrine hydrochloride  |
| C              | Sulfacyl-sodium (Sulfacetamide)  |
| D              | Atropine sulfate   |
| E              | Levomyctin (Chloramphenicol)   |
| №              | krok 2017  |
| Topic          | Drugs acting on cardiovascular system. Drugs acting on blood pressure. Hypotensive and hypertensive preparations.  |
| Task           | A patient with hypertension was prescribed a nonselective beta-adrenergic blocking agent. Name this drug:  |
| Correct answer | Anaprilin (Propranolol)  |
| B              | Prazosin   |
| C              | Proserin   |
| D              | Adrenalin hydrochloride  |

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| E              | Labetalol  |
| №              | krok 2017  |
| Topic          | Antimicrobial, antiviral, and antiparasitic agents. Antibiotics.   |
| Task           | In the course of bronchitis pharmacotherapy a patient has developed dyspeptic disorders, photodermatitis and hepatic failure What drug can cause such disorders?             |
| Correct answer | Doxycycline  |
| B              | Paracetamol  |
| C              | Ascorbic acid  |
| D              | Acetylcysteine   |
| E              | Codeine phosphate  |
| №              | krok 2017, 2016  |
| Topic          | Drugs acting on the CNS. Psychotropic agents. Psychodysleptics. Narcotic (opioid) analgesics.  |
| Task           | A 25-year-old woman with signs of acute morphine intoxication was administered naloxone, which rapidly improved her condition. What is the mechanism of action of this drug? |
| Correct answer | Opioid receptor blockade   |
| B              | GABA receptor blockade   |
| C              | Serotonin receptor blockade  |
| D              | Dopamine receptor blockade   |
| E              | Benzodiazepine receptor blockade   |
| №              | krok 2017  |
| Topic          | General pharmacology. Pharmacokinetics.  |
| Task           | Name the ability of a drug to accumulate within the patient's body:  |
| Correct answer | Cumulation   |
| B              | Antagonism   |
| C              | Synergism  |
| D              | Habituation  |
| E              | Allergy  |

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| №              | krok 2017  |
| Topic          | Drugs acting on the CNS. Non-steroidal anti-inflammatory agents. Antipyretics. Non-narcotical analgesics.  |
| Task           | What pharmacological effect of acetylsalicylic acid allows its application in patients with ischemic heart disease for prevention of thromboses? |
| Correct answer | Antiaggregant  |
| B              | Analgesic  |
| C              | Antipyretic  |
| D              | Ulcerogenic  |
| E              | Anti-inflammatory  |
| №              | krok 2017  |
| Topic          | Antimicrobial, antiviral, and anti-parasitic agents. Antiviral preparations.   |
| Task           | A patient developed herpetic rashes. What drug should be prescribed in this case?  |
| Correct answer | Acyclovir  |
| B              | Gentamicin   |
| C              | Clotrimazole   |
| D              | Benzympenicillin   |
| E              | Biseptol (Co-trimoxazole)  |
| №              | krok 2017  |
| Topic          | Drugs acting on the CNS. Neuroleptics. Tranquilisers. Psychoedative preparations.  |
| Task           | A woman complaining of sleep disturbance, fearfulness, and anxiety came to a neurologist. What drug should be prescribed in this case?           |
| Correct answer | Diazepam   |
| B              | Levodopa   |
| C              | Nitroglycerine   |
| D              | Oxytocin   |
| E              | Lisinopril   |



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| E              | Choline esterase blockade  |
| №              | krok 2017  |
| Topic          | Drugs acting on the CNS. Neuroleptics. Tranquilisers. Psychoedative preparations.  |
| Task           | What pharmacological effect of diazepam allows its application for termination of convulsions?                               |
| Correct answer | Anticonvulsant   |
| B              | Analgesic  |
| C              | Antipyretic  |
| D              | Anti-inflammatory  |
| E              | Hypnotic   |
| №              | krok 2017  |
| Topic          | Drugs acting on metabolism, blood and immunity. Pharmacology of water- soluble vitamins.                                     |
| Task           | A patient suffers from hyperchromic $B_{12}$ -deficiency anemia. What vitamin preparation should be prescribed in this case? |
| Correct answer | Cyanocobalamin   |
| B              | Riboflavin   |
| C              | Vicasol (Menadione)  |
| D              | Thiamine chloride  |
| E              | Retinol acetate  |
| №              | krok 2017  |
| Topic          | Drugs acting on the CNS. Hypnotic and anticonvulsants.   |
| Task           | A man is diagnosed with Parkinson's disease. What drug should be prescribed in this case?                                    |
| Correct answer | Levodopa   |
| B              | Nitrazepam   |
| C              | Paracetamol  |
| D              | Aminazine  |
| E              | Anaprilin (Propranolol)  |

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| №              | krok 2017   |
| Topic          | Agents influencing on afferent and efferent innervations. Preparations influencing on impulse transmission in cholinergic junction. M-, N-cholinomimetics.  |
| Task           | A patient complains of general weakness, muscle weakness in the extremities (if the patient is asked to make a fist several times in a row, for example, the patient is capable of doing it only once), facial muscles are weak, swallowing is disturbed. Administration of acetylcholinesterase drugs removes these disturbances to a certain degree. Determine the pathology: |
| Correct answer | Myasthenia  |
| B              | Paralysis   |
| C              | Paresis   |
| D              | Hemiplegia  |
| E              | Monoplegia  |
| №              | krok 2017   |
| Topic          | Agents influencing on afferent and efferent innervations. Preparations influencing on impulse transmission in cholinergic junction. M-, N-cholinomimetics.  |
| Task           | A sanitary-epidemic station employee has been poisoned when the premises were processed with an organophosphorous insecticide. What enzyme is inhibited by organophosphorous compounds?   |
| Correct answer | Acetylcholinesterase  |
| B              | Lactate dehydrogenase   |
| C              | Xanthine oxidase  |
| D              | Catalase  |
| E              | Pepsin  |
| №              | krok 2017   |
| Topic          | Antimicrobial, antiviral, and antiparasitic agents. Disinfectants and antiseptics.  |
| Task           | A patient with gingivitis was prescribed oral cavity irrigation with 0,02% potassium permanganate solution. What group of antiseptics does this drug belong to?   |

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| Correct answer | Oxidants   |
| B              | Dyes   |
| C              | Detergents   |
| D              | Alcohols   |
| E              | Nitrofurans  |
| №              | krok 2017  |
| Topic          | Drugs affecting on respiratory tract.  |
| Task           | To relieve dry cough a patient with bronchitis was prescribed a drug that is an alkaloid of yellow horned-poppy. Name this drug: |
| Correct answer | Glaucine hydrochloride   |
| B              | Codeine phosphate  |
| C              | Libexin (Prenoxdiazine)  |
| D              | Oxeladin   |
| E              | Codterpin  |
| №              | krok 2017  |
| Topic          | Drugs affecting on gastrointestinal tract.   |
| Task           | A pregnant woman was diagnosed with vaginal dysbacteriosis. What drug should be prescribed in this case?                         |
| Correct answer | Probiotic  |
| B              | Antibiotic   |
| C              | Bacteriophage  |
| D              | Interferon   |
| E              | Polyvitamins   |
| №              | krok 2017, 2016  |
| Topic          | Drugs acting on the CNS. Antidepressants. Normothymics. Psychostimulators. Actoprotectors.                                       |

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| Task           | A patient has been receiving Theophylline (inhibitor of cyclic adenosine monophosphate phosphodiesterase) for a week. What hormone can increase its action due to such treatment and cause hyperglycemia? |
| Correct answer | Glucagon  |
| B              | Testosterone  |
| C              | Aldosterone   |
| D              | Insulin   |
| E              | Estradiol   |
| №              | krok 2007   |
| Topic          | Drugs acting on metabolism, blood and immunity. Preparations affecting erythropoiesis. Blood substitutes.   |
| Task           | In order to restore a man's circulating blood volume he was transfused with blood substitute - isotonic solution $N aCl$ . What is the concentration of this solution?                                    |
| Correct answer | 0, 9%   |
| B              | 0, 3%   |
| C              | 0, 5%   |
| D              | 1%  |
| E              | 3%  |
| №              | krok 2007   |
| Topic          | Drugs acting on metabolism, blood and immunity. Preparations affecting leucopoiesis and blood coagulation.  |
| Task           | A patient was prescribed with an antitumoral antibiotic that inhibits synthesis of nucleic acids in the cells. What of the following antibiotics has such a mechanism of action?                          |
| Correct answer | Actinomycin   |
| B              | Tetracycline  |
| C              | Nystatin  |
| D              | Lincomycin  |

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| E              | Erythromycin  |
| №              | krok 2007   |
| Topic          | Antimicrobial, antiviral, and antiparasitic agents. Antituberculosal and antispirochetal preparations.  |
| Task           | Patients ill with tuberculosis take a drug that is an antivitamin of nicotinic acid. Name this substance:   |
| Correct answer | Isoniazid   |
| B              | Sulfanilamide   |
| C              | Acricine  |
| D              | Isoriboflavin   |
| E              | Oxythiamine   |
| №              | krok 2007   |
| Topic          | Drugs acting on metabolism, blood and immunity. Hormonal preparations of steroid structure and their synthetic substitutes. Mineralocorticoids and glucocorticoids. Peculiarities of usage. |
| Task           | A woman in labour was given a preparation that activates contractions of smooth uterine muscles. What hormone is contained in this preparation?   |
| Correct answer | Oxytocin  |
| B              | Gastrin   |
| C              | Secretin  |
| D              | Angiotensin   |
| E              | Bradykinin  |
| №              | krok 2007   |
| Topic          | Antimicrobial, antiviral, and antiparasitic agents. Antibiotics.  |
| Task           | Antibiotics are classified by sources of production. Name an antibiotic of bacterial origin:  |
| Correct answer | Gramicidin  |
| B              | Penicillin  |
| C              | Tetracycline  |

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| D              | Lysozyme   |
| E              | Gentamycin   |
| №              | krok 2007  |
| Topic          | Drugs acting on metabolism, blood and immunity. Preparations affecting leucopoiesis and blood coagulation.   |
| Task           | Antivitamins are substances of various structure that limit utilization of vitamins in an organism and have an opposite to them action. Name antivitamin of vitamin K:   |
| Correct answer | Dicumarol  |
| B              | Sulfapyridasine  |
| C              | Deoxypyridoxine  |
| D              | Aminopterin  |
| E              | Isoniazid  |
| №              | krok 2008  |
| Topic          | Drugs affecting on gastrointestinal tract.   |
| Task           | It is known that a peroral drug contains over 1 billion of living microbial cells per 1 millilitre. Nonetheless the drug was accepted as applicable. What drug group does it relate to?  |
| Correct answer | Eubiotics  |
| B              | Antibiotics  |
| C              | Vitamins   |
| D              | Sulfanilamides   |
| E              | Immunostimulants   |
| №              | krok 2008  |
| Topic          | Antimicrobial, antiviral, and antiparasitic agents. Antihelminthal and antifungal preparations.  |
| Task           | A female patient has been treated with antibiotics for a long time. Thereafter examination of smears form vaginal secretion revealed oval cells with well-defined nucleus, some cells gemmate. What preparations can help to confirm the diagnosis "candidosis"? |
| Correct answer | Antifungal   |

|                |   |
|----------------|---|
| B              | Antibacterial   |
| C              | Antichlamydial  |
| D              | Antiviral   |
| E              | Antiprotozoal   |
| №              | krok 2008   |
| Topic          | Drugs acting on metabolism, blood and immunity. Pharmacology of water- soluble vitamins.  |
| Task           | A patient complains about gingival haemorrhage, petechial haemorrhages. What vitamin preparation should be recommended?             |
| Correct answer | Ascorutinum   |
| B              | Thiamine hydrochloride  |
| C              | Cyanocobalamin  |
| D              | Nicotinic acid  |
| E              | Pyridoxine hydrochloride  |
| №              | krok 2008   |
| Topic          | Drugs acting on metabolism, blood and immunity. Preparations affecting leucopoiesis and blood coagulation.                          |
| Task           | A patient underwent an operation. After it he was prescribed glycosaminoglycan that has coagulating action. Specify this substance: |
| Correct answer | Heparin   |
| B              | Keratan sulfate   |
| C              | Hyaluronic acid   |
| D              | Chondroitin-6-sulfate   |
| E              | Chondroitin-4-sulfate   |
| №              | krok 2009   |
| Topic          | Antimicrobial, antiviral, and antiparasitic agents. Antiviral preparations.   |
| Task           | Epidemic of influenza was announced in a town. Which drug can be recommended for the nonspecific prophylaxis of influenza?          |

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| Correct answer | Leukocytic interferon   |
| B              | Anti-influenza vaccine  |
| C              | Antibiotics   |
| D              | Anti-influenza immunoglobulin   |
| E              | Anti-influenza serum  |
| №              | krok 2009   |
| Topic          | Drugs acting on the CNS. Non-steroidal anti-inflammatory agents. Antipyretics. Non-narcotical analgesics.                             |
| Task           | Anti-inflammatory effect of a number of drugs is caused by the inhibition of arachidonic acid release. This acid is the precursor of: |
| Correct answer | Prostaglandins  |
| B              | Uric acid   |
| C              | Urea  |
| D              | Haem  |
| E              | Cholesterol   |
| №              | krok 2009   |
| Topic          | Antimicrobial, antiviral, and antiparasitic agents. Disinfectants and antiseptics.  |
| Task           | Colloidal protection is used while manufacturing drug preparations. Name the preparation of colloidal silver protected by proteins:   |
| Correct answer | Protargol   |
| B              | Festal  |
| C              | Enzymtal  |
| D              | Argentum  |
| E              | Collagen  |
| №              | krok 2009   |
| Topic          | Drugs acting on cardiovascular system. Diuretic drugs. Complex therapy of chronic heart failure. Anti-gout drugs.                     |

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| Task           | Analysis of a patient's urine revealed increased concentration of the uric acid. The patient was prescribed allopurinol. What is the biochemical mechanism of its action?   |
| Correct answer | Xanthine oxidase inhibition   |
| B              | Cyclooxygenase activation   |
| C              | Desaminase inhibition   |
| D              | Phosphorylase inhibition  |
| E              | Nucleosidase inhibition   |
| №              | krok 2009   |
| Topic          | Antimicrobial, antiviral, and antiparasitic agents. Antituberculosal and antispirochetal preparations.  |
| Task           | A 30 year-old patient suffering from pulmonary tuberculosis, has been prescribed isoniazid. Continuous taking of this drug may lead to the deficiency of the following vitamin:   |
| Correct answer | Pyridoxine  |
| B              | Tocopherol  |
| C              | Cobalamin   |
| D              | Ergocalciferol  |
| E              | Retinol   |
| №              | krok 2010   |
| Topic          | Drugs acting on the CNS. Non-steroidal anti-inflammatory agents. Antipyretics. Non-narcotical analgesics.   |
| Task           | Nonsteroid anti-inflammatory drugs are used in medical practice for treating the rheumatoid arthritis, osteoporosis, inflammatory diseases of the connective tissue. These preparations inhibit the activity of the following enzyme: |
| Correct answer | Cyclooxygenase  |
| B              | Hexokinase  |
| C              | Succinate dehydrogenase   |
| D              | Aminotransferase  |

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| E              | Xanthine oxidase  |
| №              | krok 2010   |
| Topic          | Antimicrobial, antiviral, and antiparasitic agents. Antiviral preparations.   |
| Task           | A drugstore received a supply of a drug that is widely used for treatment of many virus diseases since it is not virus specific. What drug is it? |
| Correct answer | Interferon  |
| B              | Remantadin  |
| C              | Metisazone  |
| D              | Immunoglobulin  |
| E              | Vaccine   |
| №              | krok 2010   |
| Topic          | Agents influencing on afferent and efferent innervations. Cholinergic blockers.   |
| Task           | In course of an experiment a dog has been injected a preparation that reduces secretory and motor activity of stomach. What preparation is it?    |
| Correct answer | Atropine  |
| B              | Histamine   |
| C              | Secretin  |
| D              | Acetylcholine   |
| E              | Gastrin   |
| №              | krok 2010, 2009, 2008   |
| Topic          | Drugs acting on metabolism, blood and immunity. Pharmacology of water- soluble vitamins.  |
| Task           | Water-soluble vitamins take coenzyme form in an organism. Thiamine diphosphate is the coenzyme of the following vitamin:                          |
| Correct answer | <i>B</i> <sub>1</sub>   |
| B              | <i>B</i> <sub>2</sub>   |
| C              | <i>C</i>  |

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| D              | $B_6$  |
| E              | $B_{12}$   |
| №              | krok 2010  |
| Topic          | Drugs acting on metabolism, blood and immunity. Preparations affecting leucopoiesis and blood coagulation.   |
| Task           | Heparin is the directacting anti-coagulant that reduces blood coagulation and prevents thrombosis. Its action is based upon the following phenomenon:  |
| Correct answer | Protective power of colloids   |
| B              | Syneresis  |
| C              | Thixotropy   |
| D              | Micelle formation  |
| E              | Dialysis   |
| №              | krok 2010, 2009  |
| Topic          | Antimicrobial, antiviral, and antiparasitic agents. Antiviral preparations.  |
| Task           | It is known that infectious type B hepatitis is a systemic disease caused by the type B hepatitis virus and characterized by a predominant liver affection. Choose from the below given list the drugs for the etiotropic therapy of this infection: |
| Correct answer | Acyclovir  |
| B              | Penicillin   |
| C              | Tetracycline   |
| D              | Sulfanilamides   |
| E              | Fluoroquinolones   |
| №              | krok 2010, 2009  |
| Topic          | Agents influencing on afferent and efferent innervations. Preparations influencing on impulse transmission in cholinergic junction. M-, N-cholinomimetics. A patient has been administered a competitive inhibitor of cholinesterase. Name it:       |

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| Task           |   |
| Correct answer | Proserin  |
| B              | Aspirin   |
| C              | Sodium diclophenac  |
| D              | Allopurinol   |
| E              |   |
| №              | krok 2011   |
| Topic          | Drugs acting on metabolism, blood and immunity. Pharmacology of lipid-soluble vitamins. Enzyme and anti-enzyme preparations. Aminoacids derivatives. Drugs acting of calcium-phosphorus balance.  |
| Task           | The listed below drugs can be used to correct acid-base and ionic balance. Provided that their molar concentration is the same, the following solution will have the maximum value of ionic strength:   |
| Correct answer | Calcium chloride  |
| B              | Potassium chloride  |
| C              | Potassium iodide  |
| D              | Sodium chloride   |
| E              | Sodium fluoride   |
| №              | krok 2011   |
| Topic          | Antimicrobial, antiviral, and antiparasitic agents. Antiviral preparations.   |
| Task           | A patient fell ill the day before, the disease is acute with a predominance of general toxic symptoms. With an account for the epidemic situation in the city, the doctor diagnosed the patient with influenza A. What emergency etiotropic treatment must be administered to this patient? |
| Correct answer | Rimantadine   |
| B              | Oxolinic ointment   |
| C              | Gentamicin  |

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| D              | Inactivated influenza vaccine  |
| E              | Human gamma globulin   |
| №              | krok 2011, 2009  |
| Topic          | Antimicrobial, antiviral, and antiparasitic agents. Antiviral preparations.  |
| Task           | A female patient bitten by a stray dog came to a surgery. Wide lacerated wounds were localized on the patient's face. What treatment and prevention aid should be rendered in order to prevent rabies? |
| Correct answer | Immunization with the antirabic vaccine  |
| B              | Combined antibiotic therapy  |
| C              | Hospitalization, injection of diphtheria-pertussis-tetanus vaccine   |
| D              | Hospitalization, medical surveillance  |
| E              | Urgent injection of normal gamma-globulin  |
| №              | krok 2011, 2009, 2008  |
| Topic          | Agents influencing on afferent and efferent innervations. Adrenonegative preparations. Sympatholytics.   |
| Task           | It is required to diminish pump function of patient's heart. This can be done by means of blockers of the following membrane cytoceptors:  |
| Correct answer | $\beta$ -adrenoreceptors   |
| B              | Nicotinic cholinoreceptors   |
| C              | Muscarinic cholinoreceptors  |
| D              | $\alpha$ -adrenoreceptors  |
| E              | Dopamine receptors   |
| №              | krok 2011, 2008  |
| Topic          | Antimicrobial, antiviral, and antiparasitic agents. Antibiotics.   |
| Task           | Antibiotics can be classified according to various principles. According to the action mechanism cephalosporins relate to the following group:   |
| Correct answer | Inhibitors of cell wall synthesis  |

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| B              | Inhibitors of protein synthesis  |
| C              | Inhibitors of respiratory processes  |
| D              | Inhibitors of oxidative phosphorylation  |
| E              | Inhibitors of cytoplasmic membrane synthesis   |
| №              | krok 2011, 2010  |
| Topic          | Agents influencing on afferent and efferent innervations. Cholinergic blockers.  |
| Task           | A man got an injection of curarelike substance causing the relaxation of all skeletal muscles. What is its mechanism of action?                          |
| Correct answer | Block of cholinergic receptors of postsynaptic membrane  |
| B              | Disturbance of acetylcholine synthesis   |
| C              | Block of $Ca^{2+}$ -channels of presynaptic membrane   |
| D              | Disturbance of cholinesterase synthesis  |
| E              | Disturbance of acetylcholine secretion   |
| №              | krok 2012  |
| Topic          | Drugs acting on the CNS. Antidepressants. Normothymics. Psychostimulators. Actoprotectors.   |
| Task           | Caffeine inhibits phosphodiesterase which converts cAMP to AMP. The most typical feature of caffeine intoxication is the reduced intensity of:           |
| Correct answer | Glycogen synthesis   |
| B              | Protein phosphorylation  |
| C              | Pentose phosphate pathway  |
| D              | Glycolysis   |
| E              | Lipolysis  |
| №              | krok 2012  |
| Topic          | Drugs affecting on gastrointestinal tract.   |
| Task           | A 45-year-old patient with a gastric ulcer needs the reduction of $HCl$ secretion. Which drug provides this effect due to inhibition of the proton pump? |

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| Correct answer | Omeprazole   |
| B              | Atropine   |
| C              | Quamatel   |
| D              | Benzohexonium  |
| E              | Proglumide   |
| №              | krok 2012  |
| Topic          | Drugs acting on metabolism, blood and immunity. Hormonal preparations of polypeptide structure, their synthetic analogs and antagonists.   |
| Task           | After an insulin injection a 45-year-old woman with a long history of diabetes mellitus has developed weakness, paleness, palpitation, anxiety, double vision, numbness of lips and the tip of tongue. Blood glucose is at the rate of 2,5 mmol/l. What complication has developed in the patient? |
| Correct answer | Hypoglycemic coma  |
| B              | Hyperosmolar coma  |
| C              | Hyperglycemic coma   |
| D              | Hyperketonemic coma  |
| E              | Uremic coma  |
| №              | krok 2012  |
| Topic          | Antimicrobial, antiviral, and antiparasitic agents. Antibiotics.   |
| Task           | Bacteria eventually become resistant to antibacterial agents. Resistance of gram-positive bacteria to penicillin antibiotics is caused by:   |
| Correct answer | Beta-lactamase production  |
| B              | Permeability of the cell wall  |
| C              | Active synthesis of peptidoglycan  |
| D              | Active transport of antibiotic   |
| E              | Protein synthesis  |
| №              | krok 2012  |

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| Topic          | Agents influencing on afferent and efferent innervations. Cholinergic blockers.  |
| Task           | Which of the listed biologically active compounds inhibits the secretion of pancreatic juice?  |
| Correct answer | Atropine   |
| B              | Acetylcholine  |
| C              | Insulin  |
| D              | Gastrin  |
| E              | Secretin   |
| №              | krok 2012  |
| Topic          | Drugs affecting on gastrointestinal tract.   |
| Task           | Fatty degeneration of liver is prevented by lipotropic substances. Which of the following substances relates to them?                                    |
| Correct answer | Methionine   |
| B              | Cholesterol  |
| C              | Bilirubin  |
| D              | Glycine  |
| E              | Glucose  |
| №              | krok 2012  |
| Topic          | Antimicrobial, antiviral, and antiparasitic agents. Sulfanilamide preparations.  |
| Task           | Sulfonamides are widely used as bacteriostatic agents. The mechanism of antimicrobial action of sulfonamides is based on their structural similarity to: |
| Correct answer | Para-aminobenzoic acid   |
| B              | Glutamic acid  |
| C              | Folic acid   |
| D              | Nucleic acid   |
| E              | Antibiotics  |
| №              | krok 2012  |
| Topic          | Agents influencing on afferent and efferent innervations. Cholinergic blockers.  |

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| Task           | What substance blocks the conduction of excitation in the neuromuscular synapses?  |
| Correct answer | Curare   |
| B              | Noradrenaline  |
| C              | Adrenaline   |
| D              | Somatostatin   |
| E              | Aspartate  |
| №              | krok 2012  |
| Topic          | Drugs acting on the CNS. Antidepressants. Normothymics. Psychostimulators. Actoprotectors.   |
| Task           | Depressive states can be treated by means of drugs inhibiting the enzyme that inactivates biogenic amines. Specify this enzyme:  |
| Correct answer | MAO (monoamine oxidase)  |
| B              | LDH (lactate dehydrogenase)  |
| C              | CPK (creatine phosphokinase)   |
| D              | AST (aspartate aminotransferase)   |
| E              | ALT (alanine aminotransferase)   |
| №              | krok 2013  |
| Topic          | Drugs acting on metabolism, blood and immunity. Hormonal preparations of steroid structure and their synthetic substitutes. Mineralocorticoids and glucocorticoids. Peculiarities of usage.  |
| Task           | A parturient woman diagnosed with uterine inertia has been delivered to the maternity ward. The doctor gave her an injection of the drug that activates the contraction of smooth muscles of the uterus. What hormone is a component of this drug? |
| Correct answer | Oxytocin   |
| B              | Gastrin  |
| C              | Secretin   |
| D              | Angiotensin  |
| E              | Bradykinin   |
| №              | krok 2013  |

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| Topic          | Drugs acting on the CNS. Hypnotic and anticonvulsants.   |
| Task           | A patient with Parkinson's disease exhibits low level of dopamine which is produced from dihydroxyphenylalanine (DOPA). What enzyme catalyzes this conversion? |
| Correct answer | Decarboxylase  |
| B              | Deaminase  |
| C              | Hydrolase  |
| D              | Aminotransferase   |
| E              | Carboxypeptidase   |
| №              | krok 2013  |
| Topic          | Antimicrobial, antiviral, and antiparasitic agents. Antituberculosal and antiprotozoal preparations.   |
| Task           | A 40-year-old female farmworker has been diagnosed with brucellosis and administered causal chemotherapy. What group of drugs will be used for this purpose?   |
| Correct answer | Antibiotic   |
| B              | Donor immunoglobulin   |
| C              | Inactivated therapeutic vaccine  |
| D              | Polyvalent bacteriophage   |
| E              | Antitoxic serum  |
| №              | krok 2013, 2012  |
| Topic          | Drugs acting on the CNS. Antidepressants. Normothymics. Psychostimulators. Actoprotectors.   |
| Task           | Antidepressants can increase the concentration of catecholamines in the synaptic cleft. What is the mechanism of action of these drugs?                        |
| Correct answer | Inhibition of monoamine oxidase  |
| B              | Activation of monoamine oxidase  |
| C              | Inhibition of xanthine oxidase   |
| D              | Activation of acetylcholinesterase   |
| E              | Inhibition of acetylcholinesterase   |

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| №              | krok 2013   |
| Topic          | Drugs acting on metabolism, blood and immunity. Hormonal preparations of steroid structure and their synthetic substitutes. Mineralocorticoids and glucocorticoids. Peculiarities of usage. |
| Task           | A patient who had been continuously treated with glucocorticoids was found to have a duodenal ulcer. What mechanism plays a major part in its development?                                  |
| Correct answer | Increase of gastric juice secretion and acidity   |
| B              | Acceleration of histamine inactivation in the stomach   |
| C              | Inhibition of gastrin secretion in the stomach  |
| D              | Excess production of prostaglandin E  |
| E              | Hyperglycemia   |
| №              | krok 2013   |
| Topic          | Antimicrobial, antiviral, and antiparasitic agents. Antituberculous and antischistosomal preparations.  |
| Task           | P.Ehrlich is considered to be the founder of modern chemotherapy. What chemotherapy drug was developed by this scientist?   |
| Correct answer | Salvarsan   |
| B              | Solusurminum  |
| C              | Calomel   |
| D              | Novarsenolum  |
| E              | Osarsolum   |
| №              | krok 2013, 2012   |
| Topic          | Antimicrobial, antiviral, and antiparasitic agents. Antituberculous and antischistosomal preparations.  |
| Task           | A patient with tuberculosis has been prescribed some anti-TB preparations. Which of the following chemotherapeutic drugs has an effect on the tuberculosis pathogen?                        |
| Correct answer | Fluvoxid  |
| B              | Furacilinum   |

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| C              | Methisazonum  |
| D              | Sulfadimezinum  |
| E              | Phtalazolium  |
| №              | krok 2013   |
| Topic          | Drugs acting on metabolism, blood and immunity. Hormonal preparations of steroid structure and their synthetic substitutes. Mineralocorticoids and glucocorticoids. Peculiarities of usage. |
| Task           | Addison's (bronze) disease is treated with glucocorticoids. Their effect is provided by the potentiation of the following process:  |
| Correct answer | Gluconeogenesis   |
| B              | Glycolysis  |
| C              | Pentose phosphate cycle   |
| D              | Glycogenolysis  |
| E              | Ornithine cycle   |
| №              | krok 2013, 2012   |
| Topic          | Antimicrobial, antiviral, and antiparasitic agents. Disinfectants and antiseptics.  |
| Task           | Before a surgical operation, a surgeon treated his hands with an alcohol-containing solution. Which group of drugs does this solution relate to?  |
| Correct answer | Antiseptics   |
| B              | Disinfectants   |
| C              | Sterilizing solutions   |
| D              | Detergents  |
| E              | Surface-active substances   |
| №              | krok 2013   |
| Topic          | Agents influencing on afferent and efferent innervations. Preparations influencing on impulse transmission in cholinergic junction. M-, N-cholinomimetics.                                  |

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| Task           | A 40-year-old patient has a history of bronchial asthma and bradyarrhythmia. In order to eliminate bronchospasm, the drugs of the following pharmacological group should be administered:  |
| Correct answer | <i>M</i> -anticholinergics   |
| B              | $\beta$ -adrenergic blocking agents  |
| C              | <i>M</i> -cholinergic agents   |
| D              | Anticholinesterase agents  |
| E              | Muscle relaxants   |
| №              | krok 2013  |
| Topic          | Drugs acting on the CNS. Psychotropic agents. Psychodysleptics. Narcotic (opioid) analgesics.  |
| Task           | A patient with a diagnosis of drug poisoning has been admitted to the resuscitation department. The patient is in grave condition. Respiration is rapid, superficial, with periods of apnea (Biot's respiration). What was the main cause of the development of periodic breathing in the patient? |
| Correct answer | Inhibition of the respiratory center function  |
| B              | Impaired function of spinal cord motoneurons   |
| C              | Impaired function of the neuromuscular system  |
| D              | Diminished chest mobility  |
| E              | Pulmonary dysfunction  |
| №              | krok 2013  |
| Topic          | Agents influencing on afferent and efferent innervations. Preparations irritating the peripheral receptors of skin and mucous membranes.   |
| Task           | A patient with symptoms of chronic bronchitis has been administered acetylcysteine. What is the mechanism of its expectorant action?   |
| Correct answer | Depolymerization of sputum mucopolysaccharides   |
| B              | Stimulation of adrenergic receptors  |
| C              | Inhibition of cough center   |
| D              | Stimulation of respiratory center  |

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| E              | Anesthesia of respiratory mucosa   |
| №              | krok 2013  |
| Topic          | Drugs affecting on respiratory tract.  |
| Task           | What non-narcotic centrally-acting antitussive drug can be used for dry cough?   |
| Correct answer | Glaucine   |
| B              | Codeine  |
| C              | Acetylcysteine   |
| D              | Ambroxol   |
| E              | Mucaltinum   |
| №              | krok 2013  |
| Topic          | Antimicrobial, antiviral, and antiparasitic agents. Sulfanilamide preparations.  |
| Task           | Sulfanilamides are widely used as bacteriostatic agents. The mechanism of antimicrobial action of Para-aminobenzoic acid                                 |
| Correct answer | Glutamic acid  |
| B              | Folic acid   |
| C              | Nucleic acid   |
| D              | Antibiotics  |
| E              |  |
| №              | krok 2013  |
| Topic          | Antimicrobial, antiviral, and antiparasitic agents. Sulfanilamide preparations.  |
| Task           | Sulfanilamides inhibit the growth and development of bacteria. The mechanism of their action is based on the impairment of the following acid synthesis: |
| Correct answer | Folic  |
| B              | Lipoic   |
| C              | Nicotinic  |
| D              | Pantothenic  |
| E              | Pangamic   |

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| №              | krok 2013  |
| Topic          | A patient has been diagnosed with bronchial asthma. Specify a medicament that can be administered for asphyxiation:                      |
| Task           | Salbutamol   |
| Correct answer | Diclofenac sodium  |
| B              | Paracetamol  |
| C              | Anapriline   |
| D              | Acetylcysteine   |
| E              |  |
| №              | krok 2013  |
| Topic          | Agents influencing on afferent and efferent innervations. Preparations irritating the peripheral receptors of skin and mucous membranes. |
| Task           | Specify the drug that constricts pupils and reduces intraocular pressure:  |
| Correct answer | Pilocarpine hydrochloride  |
| B              | Fenofibrate  |
| C              | Nitrazepamum   |
| D              | Atropine sulfate   |
| E              | Dithylinum   |
| №              | krok 2013  |
| Topic          | Drugs acting on the CNS. Non-steroidal anti-inflammatory agents. Antipyretics. Non-narcotical analgesics.                                |
| Task           | A female student with a cold has been prescribed an antipyretic medication. Specify this drug:   |
| Correct answer | Paracetamol  |
| B              | Ascorbic acid  |
| C              | Oxytocin   |
| D              | Famotidine   |
| E              | Cyanocobalamin   |

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| №              | krok 2013   |
| Topic          | Antimicrobial, antiviral, and antiparasitic agents. Antituberculosal and antiprotozoal preparations.  |
| Task           | What synthetic drug of the hydrazide group is typically prescribed for pulmonary tuberculosis?  |
| Correct answer | Isoniazid   |
| B              | Rifampicin  |
| C              | Acyclovir   |
| D              | Metronidazole   |
| E              | Doxycycline hydrochloride   |
| №              | krok 2013   |
| Topic          | Drugs affecting on respiratory tract.   |
| Task           | A pharmacy dispenses glaucine hydrochloride to a patient with chronic bronchitis. The patient must be warned about the following typical side effect of the drug: |
| Correct answer | Blood pressure fall   |
| B              | Excitation of the central nervous system  |
| C              | Arrhythmia  |
| D              | Rise of intraocular pressure  |
| E              | Allergic skin rash  |
| №              | krok 2013   |
| Topic          | Drugs acting on metabolism, blood and immunity. Preparations affecting leucopoiesis and blood coagulation.  |
| Task           | A patient with myocardial infarction has been administered intravenously a direct anticoagulant, namely:  |
| Correct answer | Heparin   |
| B              | Neodicumarinum  |
| C              | Vikasol   |
| D              | Thrombin  |

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| E              | Calcium gluconate   |
| №              | krok 2013   |
| Topic          | Drugs acting on metabolism, blood and immunity. Hormonal preparations of steroid structure and their synthetic substitutes. Mineralocorticoids and glucocorticoids. Peculiarities of usage. |
| Task           | What drug is administered in case of uterine inertia?   |
| Correct answer | Oxytocin  |
| B              | No-spa  |
| C              | Progesterone  |
| D              | Vikasolum   |
| E              | Fenoterol   |
| №              | krok 2013   |
| Topic          | Agents influencing on afferent and efferent innervations. Cholinergic blockers.   |
| Task           | A patient with renal colic has been administered a spasmolytic from the group of M-cholinergic antagonists as a part of the complex therapy. Specify this drug:                             |
| Correct answer | Atropine  |
| B              | Proserin  |
| C              | Galantamine   |
| D              | Dithylinum  |
| E              | Benzohexonium   |
| №              | krok 2013   |
| Topic          | Drugs acting on the CNS. Non-steroidal anti-inflammatory agents. Antipyretics. Non-narcotical analgesics.   |
| Task           | A female patient asked a pharmacist to recommend her a drug for headache with antiplatelet effect. Specify this drug:   |
| Correct answer | Acetylsalicylic acid  |
| B              | Codeine phosphate   |
| C              | Promedol  |



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| Task           | A patient with a heart rhythm disorder has been given lidocaine. Apart from the local anesthetic effect, this drug has the following pharmacological effect: |
| Correct answer | Antiarrhythmic   |
| B              | Hypnotic   |
| C              | Antipyretic  |
| D              | Antidepressant   |
| E              | Nootropic  |
| №              | krok 2013  |
| Topic          | Drugs affecting on gastrointestinal tract.   |
| Task           | A patient with gastric ulcer has been administered omeprazole. What is the mechanism of its action?  |
| Correct answer | Inhibition of $H^+K^+$ -ATPase   |
| B              | Blockade of histamine $H_2$ -receptors   |
| C              | $M$ -cholinergic receptor blockade   |
| D              | Neutralization of $HCl$  |
| E              | Stimulation of mucus production  |
| №              | krok 2013  |
| Topic          | Drugs acting on cardiovascular system. Drugs acting on blood pressure. Hypotensive and hypertensive preparations.  |
| Task           | A patient with hypertension has been prescribed a drug that blocks angiotensin receptors. Specify this drug:   |
| Correct answer | Losartan   |
| B              | Nifedipine   |
| C              | Prazosin   |
| D              | Captopril  |
| E              | Apressin   |

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| №              | krok 2013   |
| Topic          | Drugs acting on cardiovascular system. Diuretic drugs. Complex therapy of chronic heart failure. Anti-gout drugs.   |
| Task           | A patient with hypertensive crisis should be administered a diuretic as a part of complex therapy. What drug should be given the patient?                   |
| Correct answer | Furosemide  |
| B              | Diacarb   |
| C              | Spironolactone  |
| D              | Triamterene   |
| E              | Amiloride   |
| №              | krok 2013   |
| Topic          | Drugs acting on metabolism, blood and immunity. Immunotropic agents and antiallergic drugs.   |
| Task           | Consult a patient on which antihistamine drug <b>DOES NOT</b> have sedative and hypnotic effect:  |
| Correct answer | Loradatine  |
| B              | Diphenhydramine   |
| C              | Promethazine  |
| D              | Suprastinum   |
| E              | Tavegil (Clemastine)  |
| №              | krok 2013   |
| Topic          | Drugs acting on cardiovascular system. Drugs acting on blood pressure. Hypotensive and hypertensive preparations.   |
| Task           | A patient with hypertensive crisis has been given an intravenous injection of clonidine. What mechanism underlies the antihypertensive effect of clonidine? |
| Correct answer | Stimulation of presynaptic central $\alpha_2$ -adrenoceptors  |
| B              | Blockade of peripheral $\alpha_1$ -adrenoceptors  |
| C              | Blockade of $\beta$ -adrenoceptors  |

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| D              | Blockade of <i>N</i> -cholinergic receptors  |
| E              | Direct myotropic effect on blood vessels   |
| №              | krok 2013  |
| Topic          | Drugs acting on the CNS. Non-steroidal anti-inflammatory agents. Antipyretics. Non-narcotical analgesics.  |
| Task           | On the 4th day of treatment with indomethacin a male 55-year-old patient developed gastric bleeding due to the ulceration of the gastric mucosa. Ulcerogenic effect of the drug is associated with a decrease in the activity of the following enzyme: |
| Correct answer | Cyclooxygenase-1   |
| B              | Cyclooxygenase-2   |
| C              | Lipoxygenase   |
| D              | Thromboxane synthetase   |
| E              | Prostacyclin synthase  |
| №              | krok 2013  |
| Topic          | Non-steroidal anti-inflammatory agents. Antipyretics. Non-narcotical analgesics.   |
| Task           | A patient with stenocardia has been administered acetylsalicylic acid for:   |
| Correct answer | Antiplatelet effect  |
| B              | Inhibition of blood fibrinolytic activity  |
| C              | Aggregate effect   |
| D              | Anti-inflammatory effect   |
| E              | Increase in blood fibrinolytic activity  |
| №              | krok 2014  |
| Topic          | Drugs acting on cardiovascular system. Antianginal drugs.  |
| Task           | The 55-year-old patient had been diagnosed with angina pectoris. Calcium channel-blocking agent was prescribed for treatment. Name this agent.   |
| Correct answer | Amlodipine   |
| B              | Atenolol   |

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| C              | Guanethidine  |
| D              | Reserpine   |
| E              | Labetalol   |
| №              | krok 2014   |
| Topic          | Drugs acting on the CNS. Psychotropic agents. Psychodysleptics. Narcotic (opioid) analgesics.                                   |
| Task           | Which one of the drugs listed below is potentially addictive?   |
| Correct answer | Trimeperidine   |
| B              | Acetylsalicylic acid  |
| C              | Naloxone  |
| D              | Diclofenac sodium   |
| E              | Paracetamol   |
| №              | krok 2014   |
| Topic          | Drugs acting on cardiovascular system. Cardiotonic agents. Cardiac glycosides. Non-glycosides cardiotonics. Cardiotonic agents. |
| Task           | Choose the most efficient way of convallariae glycoside administration for acute cardiac failure treatment.                     |
| Correct answer | Intravenous   |
| B              | Intramuscular   |
| C              | Subcutaneous  |
| D              | Internal  |
| E              | Inhalational  |
| №              | krok 2014   |
| Topic          | Antimicrobial, antiviral, and antiparasitic agents. Antiprotozoal preparations.   |
| Task           | What drug is advisable for individual malaria prophylaxis?  |
| Correct answer | Chingamin   |
| B              | Rifampicin  |
| C              | Ampicillin  |

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| D              | Gentamicin  |
| E              | Trimethoprim/sulfamethoxazole (Co-trimoxazole)  |
| №              | krok 2014   |
| Topic          | Agents influencing on afferent and efferent innervations. Preparations influencing on transmission of neural impulse in adrenergic synapse. Adrenomimetics. |
| Task           | The patient with bronchial asthma had been prescribed salbutamol, which led to disappearance of bronchospasm symptoms. It happened due to stimulation of:   |
| Correct answer | $\beta_2$ -adrenoreceptors  |
| B              | $\alpha_1$ -adrenoreceptors   |
| C              | Muscarinic acetylcholine receptors  |
| D              | Acetylcholine synthesis   |
| E              | $\beta_1$ -adrenoreceptors  |
| №              | krok 2014   |
| Topic          | influencing on afferent and efferent innervations. Preparations protecting the receptors of skin and mucous membranes.                                      |
| Task           | What local anesthetic is given to patients with cardiac rhythm disturbance?   |
| Correct answer | Lidocaine   |
| B              | Paracetamol   |
| C              | Morphine hydrochloride  |
| D              | Caffeine and sodium benzoate  |
| E              | Nitrazepam  |
| №              | krok 2014   |
| Topic          | Antimicrobial, antiviral, and antiparasitic agents. Antiviral preparations.   |
| Task           | What chemotherapeutic agent is a drug of choice for treatment of herpes?  |
| Correct answer | Acyclovir   |
| B              | Rifampicin  |

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| C              | Doxycycline hydrochloride  |
| D              | Chingamin  |
| E              | Metronidazole  |
| №              | krok 2014  |
| Topic          | Drugs acting on cardiovascular system. Antianginal drugs.  |
| Task           | Which of the drugs listed below quickly arrests angina pectoris attack when taken sublingually?  |
| Correct answer | Nitroglycerine   |
| B              | Digoxin  |
| C              | Amiodarone   |
| D              | Lisinopril   |
| E              | Convallariae glycoside   |
| №              | krok 2014  |
| Topic          | Drugs acting on the CNS. Non-steroidal anti-inflammatory agents. Antipyretics. Non-narcotical analgesics.  |
| Task           | The patient with rheumatoid arthritis and concomitant duodenal ulcer has to be prescribed nonsteroid antiinflammatory drug. Which one of the drugs listed below is a drug of choice in the given case? |
| Correct answer | Celecoxib  |
| B              | Acetylsalicylic acid   |
| C              | Paracetamol  |
| D              | Metamizole   |
| E              | Diclofenac sodium  |
| №              | krok 2014  |
| Topic          | Drugs acting on metabolism, blood and immunity. Immunotropic agents and antiallergic drugs.  |
| Task           | The student asks the pharmacist to recommend him the drug to relieve allergic rhinitis symptoms he suffers from when lime tree is in bloom. What drug can be recommended in this case?                 |

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| Correct answer | Loratadine   |
| B              | Epinephrine  |
| C              | Propranolol  |
| D              | Ambroxol   |
| E              | Losartan   |
| №              | krok 2014  |
| Topic          | Antimicrobial, antiviral, and antiparasitic agents. Antiprotozoal preparations.  |
| Task           | What drug is more advisable for the patient with amebic dysentery?   |
| Correct answer | Metronidazole  |
| B              | Pyrantel   |
| C              | Levamisole   |
| D              | Bicillin-5   |
| E              | Benzympenicillin sodium salt (Penicillin G sodium salt)  |
| №              | krok 2014  |
| Topic          | Agents influencing on afferent and efferent innervations. Preparations irritating the peripheral receptors of skin and mucous membranes.                             |
| Task           | The elderly patient suffers from constipation caused by large intestine hypotonia. What drug should be prescribed?   |
| Correct answer | Bisacodyl  |
| B              | Sodium sulfate   |
| C              | Castor oil   |
| D              | Atropine sulphate  |
| E              | Procainamide   |
| №              | krok 2014  |
| Topic          | Antimicrobial, antiviral, and antiparasitic agents. Antibiotics.   |
| Task           | In the course of bronchitis pharmacotherapy, the patient has developed dyspeptic disorders, photodermatitis and hepatic failure. What drug can cause such disorders? |

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| Correct answer | Doxycycline   |
| B              | Paracetamol   |
| C              | Ascorbic acid   |
| D              | Acetylcysteine  |
| E              | Codeine phosphate   |
| №              | krok 2014   |
| Topic          | Drugs acting on the CNS. Neuroleptics. Tranquilisers. Psychosedative preparations.  |
| Task           | The patient with neurosis has been prescribed anxiolytic derivative of benzodiazepine. Name this drug.                        |
| Correct answer | Diazepam  |
| B              | Atropine sulphate   |
| C              | Piroxicam   |
| D              | Nandrolone  |
| E              | Trihexyphenidyl   |
| №              | krok 2014   |
| Topic          | Drugs acting on the CNS. Hypnotic and anticonvulsants.  |
| Task           | The patient with parkinsonism has been prescribed a drug - dopamine precursor - to relieve muscular rigidity. Name this drug. |
| Correct answer | Levodopa  |
| B              | Aminazine   |
| C              | Paracetamol   |
| D              | Scopolamine hydrobromide  |
| E              | Atropine sulphate   |
| №              | krok 2014   |
| Topic          | Drugs acting on cardiovascular system. Diuretic drugs. Complex therapy of chronic heart failure. Anti-gout drugs.             |

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| Task           | The patient with acute poisoning needs forced diuresis. What drug can be used for this purpose?   |
| Correct answer | Furosemide  |
| B              | Caffeine and sodium benzoate  |
| C              | Galantamine hydrobromide  |
| D              | Enalapril   |
| E              | Piracetam   |
| №              | krok 2014   |
| Topic          | Drugs acting on cardiovascular system Drugs acting on blood pressure. Hypotensive and hypertensive preparations..                       |
| Task           | What side effect is characteristic of captopril?  |
| Correct answer | Dry cough   |
| B              | Increase of arterial pressure   |
| C              | Hyperglycemia   |
| D              | Cardiac rate disorder   |
| E              | Hypokaliemia  |
| №              | krok 2014   |
| Topic          | Drugs acting on the CNS. Hypnotic and anticonvulsants.  |
| Task           | Due to prolonged taking of phenobarbital the epileptic patient has developed tolerance for this drug. What is this phenomenon based on? |
| Correct answer | Biotransformation acceleration  |
| B              | Absorption process weakening  |
| C              | Increase of receptor sensitivity  |
| D              | Biotransformation suppression   |
| E              | Substance accumulation in body  |
| №              | krok 2014   |

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| Topic          | Drugs acting on metabolism, blood and immunity. Hormonal preparations of steroid structure and their synthetic substitutes   |
| Task           | The 33-year-old female patient, who undergoes long-term treatment due to her chronic polyarthritis, complains of increased arterial pressure, adipose tissue redistribution and menstrual irregularities. What drug does the patient take? |
| Correct answer | Prednisolone   |
| B              | Indometacin  |
| C              | Phenylbutazone   |
| D              | Fluocinolone acetonide   |
| E              | Diclofenac sodium  |
| №              | krok 2014  |
| Topic          | Antimicrobial, antiviral, and antiparasitic agents. Antituberculosal and antiprotozoal preparations.   |
| Task           | The 32-year-old patient has been taking antituberculosis drugs. Later he noticed that his urine had become redorange in color. What drug is conducive to this phenomenon?  |
| Correct answer | Rifampicin   |
| B              | Isoniazid  |
| C              | Pyrazinamide   |
| D              | Ethambutol   |
| E              | Streptomycin sulphate  |
| №              | krok 2014  |
| Topic          | Drugs acting on the CNS. Hypnotic and anticonvulsants.   |
| Task           | Certain drugs can stimulate liver to synthesize enzyme systems taking part in drugs and toxins metabolism. What compound stimulates drug metabolism in liver microsomes?   |
| Correct answer | Phenobarbital  |
| B              | Heparin  |
| C              | Menadione sodium bisulfite   |

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| D              | Sulfanilamide   |
| E              | Aspirin   |
| №              | krok 2014   |
| Topic          | Antimicrobial, antiviral, and antiparasitic agents. Antituberculous and antispirochetal preparations.   |
| Task           | The patient has been prescribed drug with antibacterial effect on tuberculosis mycobacteria. What drug is used in tuberculosis treatment and is pyridoxine antivitamin?                             |
| Correct answer | Isoniazid   |
| B              | Heparin   |
| C              | Trimethoprim/sulfamethoxazole (Co-trimoxazole)  |
| D              | Streptomycin  |
| E              | Sulfanilamide   |
| №              | krok 2014   |
| Topic          | Antimicrobial, antiviral, and antiparasitic agents. Antiviral preparations.   |
| Task           | Pharmacy has received viricides. Choose the viricide used for influenza treatment from the list given below.  |
| Correct answer | Rimantadine   |
| B              | Metisazone  |
| C              | Levamisole  |
| D              | Azidothymidine  |
| E              | Acyclovir   |
| №              | krok 2014   |
| Topic          | Antimicrobial, antiviral, and antiparasitic agents. Antibiotics.  |
| Task           | 1 minute after the patient had been administered penicillin the patient's arterial pressure sharply dropped, pulse became thready, cold sweating and clonic convulsions began. Name this condition. |
| Correct answer | Anaphylactic shock  |

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| B              | Traumatic shock   |
| C              | Cardiogenic shock   |
| D              | Septic shock  |
| E              | Burn shock  |
| №              | krok 2014   |
| Topic          | Agents influencing on afferent and efferent innervations. Preparations influencing on transmission of neural impulse in adrenergic synapse. Adrenomimetics. |
| Task           | Epinephrine is used to prolong the effect of novocaine during infiltration anesthesia. What epinephrine action is this effect caused by?                    |
| Correct answer | Vasoconstriction  |
| B              | Potentialiation of novocaine action at CNS level  |
| C              | Suppression of nerve endings and conductors functioning   |
| D              | Vasodilatation  |
| E              | Suppression of tissue esterases   |
| №              | krok 2014   |
| Topic          | Agents influencing on afferent and efferent innervations. Preparations influencing on impulse transmission in cholinergic junction. M-, N-cholinomimetics.  |
| Task           | Name the drug that causes miosis and lowers intraocular pressure.   |
| Correct answer | Pilocarpine hydrochloride   |
| B              | Fenofibrate   |
| C              | Nitrazepam  |
| D              | Atropine sulphate   |
| E              | Suxamethonium chloride  |
| №              | krok 2014   |
| Topic          | Drugs acting on the CNS. Non-steroidal anti-inflammatory agents. Antipyretics. Non-narcotical analgesics.   |
| Task           | The student with cold has been prescribed antipyretic medicine. Name this medicine.   |

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| Correct answer | Paracetamol  |
| B              | Ascorbic acid  |
| C              | Oxytocin   |
| D              | Famotidine   |
| E              | Cyanocobalamin   |
| №              | krok 2014  |
| Topic          | Drugs affecting on respiratory tract.  |
| Task           | Pharmacy sells glaucine hydrochloride to the patient with chronic bronchitis. What common side effect should he be warned about?                           |
| Correct answer | Decrease of arterial pressure  |
| B              | Excitation of central nervous system   |
| C              | Disruption of cardiac rate   |
| D              | Increase of intraocular pressure   |
| E              | Allergic skin rashes   |
| №              | krok 2014  |
| Topic          | Agents influencing on afferent and efferent innervations. Cholinergic blockers.  |
| Task           | The patient with hepatic colic has been prescribed spasmolytic of muscarinic receptor antagonists group as a part of his complex therapy. What drug is it? |
| Correct answer | Atropine   |
| B              | Proserin   |
| C              | Galantamine  |
| D              | Dithylin   |
| E              | Benzohexonium  |
| №              | krok 2014  |
| Topic          | Drugs acting on the CNS. Narcotic (opioid) analgesics.   |
| Task           | What naloxone indications are there?   |
| Correct answer | Narcotic analgetics acute poisoning  |

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| B              | Heavy metals poisoning   |
| C              | Cardiac glycosides poisoning   |
| D              | Ergot alkaloids poisoning  |
| E              | Atropine sulphate poisoning  |
| №              | krok 2014  |
| Topic          | Agents influencing on afferent and efferent innervations. Adrenomimetics.  |
| Task           | Dobutamine has been administered to the 49-year-old-patient with acute cardiac failure and cardiac glycoside intolerance. What is this drug's mechanism of action? |
| Correct answer | Stimulation of $\beta_1$ -adrenoreceptors  |
| B              | Stimulation of $\alpha_1$ -adrenoreceptors   |
| C              | Blockade of $K^+$ -, $Na^+$ -adenosinetriphosphatase   |
| D              | Suppression of phosphodiesterase activity  |
| E              | Stimulation of $M$ -cholinergic receptors  |
| №              | krok 2015  |
| Topic          | Drugs acting on the CNS. Neuroleptics. Tranquilisers. Psychoedative preparations.  |
| Task           | A doctor prescribed diazepam to a patient with anxiety disorders. What pharmacological effect is the reason for such a prescription?                               |
| Correct answer | Anxiolytic   |
| B              | Anticonvulsant   |
| C              | Anti-inflammatory  |
| D              | Antianginal  |
| E              | Hypotensive  |
| №              | krok 2015  |
| Topic          | Antimicrobial, antiviral, and antiparasitic agents. Antibiotics.   |
| Task           | What drug is used in treatment regimen for peptic ulcer disease to eliminate Helicobacter pylori?  |
| Correct answer | Clarithromycin   |

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| B              | Tienam   |
| C              | Biseptol   |
| D              | Chloridine   |
| E              | Sulfalene  |
| №              | krok 2015  |
| Topic          | Agents influencing on afferent and efferent innervations. Adrenomimetics.  |
| Task           | Adrenomimetic agents are differentiated into selective and non-selective. What drug is an agonist of $\beta$ adrenergic receptors and can be used for treatment of bronchial asthma? |
| Correct answer | Salbutamol   |
| B              | Metoprolol   |
| C              | Atenolol   |
| D              | Anaprilin (Propranolol)  |
| E              | Nebivolol  |
| №              | krok 2015  |
| Topic          | Antimicrobial, antiviral, and antiparasitic agents. Antibiotics.   |
| Task           | A pharmaceutical manufacture produces a drug, that is an animal antibiotic. Point out this drug among those listed below:  |
| Correct answer | Lysozyme   |
| B              | Gramicidin   |
| C              | Novobiocin   |
| D              | Phaseolin  |
| E              | Chloramphenicol  |
| №              | krok 2015  |
| Topic          | Drugs affecting on gastrointestinal tract.   |

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| Task           | A doctor prescribed a herbal drug with flavonoid complex of Silybum marianum to a patient suffering from chronic hepatitis. This hepatic protector stimulates protein synthesis, normalizes phospholipid metabolism, acts as an antioxidant. Name this drug:  |
| Correct answer | Silymarin   |
| B              | Essentiale  |
| C              | Galstena  |
| D              | Thiotriasoline  |
| E              | Ursodeoxycholic acid  |
| №              | krok 2015   |
| Topic          | Drugs affecting on gastrointestinal tract.  |
| Task           | A 37-year-old patient with peptic gastric ulcer disease was prescribed a medicine as a part of his multimodality therapy. The medicine lowers acidity of gastric juice, inhibits $H^+$ , $H^+$ -adenosine triphosphatase, decreases the volume of gastric secretion and pepsinogen production. It is a prodrug. Name this medicine: |
| Correct answer | Omeprazole  |
| B              | Famotidine  |
| C              | Gastrozepin (Pirenzepine)   |
| D              | Ranitidine  |
| E              | Phosphalugel (Aluminium phosphate)  |
| №              | krok 2015   |
| Topic          | Agents influencing on afferent and efferent innervations. Preparations irritating the peripheral receptors of skin and mucous membranes.  |
| Task           | A patient with acute bronchitis was prescribed an expectorant that caused bronchial spasm after the patient had taken it. What drug of those listed below can cause such side effect?   |
| Correct answer | Acetylcysteine  |
| B              | Salbutamol  |

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| C              | Validol (Menthyl isovalerate)  |
| D              | Platyphyllin   |
| E              | Prenoxdiazine (Libexin)  |
| №              | krok 2015  |
| Topic          | Drugs acting on the CNS. Narcotic (opioid) analgesics.   |
| Task           | A woman is to be prescribed a narcotic analgesic for labor pain relief. What drug is indicated in this case?                                 |
| Correct answer | Promedol (Trimeperidine)   |
| B              | Morphine   |
| C              | Papaveretum (Omnopon)  |
| D              | Codeine  |
| E              | Fentanyl   |
| №              | krok 2015  |
| Topic          | Drugs acting on cardiovascular system. Antianginal drugs.  |
| Task           | What drug group has the most pronounced vasodilatory action, and has little effect on cardiac conduction system and miocardial activity?     |
| Correct answer | Dihydropyridine derivatives  |
| B              | Phenylalkylamine derivatives   |
| C              | Benzodiazepine derivatives   |
| D              | Sulfonylurea preparations  |
| E              | $\beta$ -adrenoceptor agonist  |
| №              | krok 2015  |
| Topic          | Drugs acting on cardiovascular system. Antianginal drugs.  |
| Task           | A 55-year-old patient had been diagnosed with angina pectoris. Calcium channel-blocking agent was prescribed for treatment. Name this agent: |
| Correct answer | Amlodipine   |
| B              | Atenolol   |

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| C              | Guanethidine  |
| D              | Reserpine   |
| E              | Labetalol   |
| №              | krok 2015   |
| Topic          | Antimicrobial, antiviral, and antiparasitic agents. Antibiotics.  |
| Task           | In the course of bronchitis pharmacotherapy a patient has developed dyspeptic disorders, photodermatitis and hepatic failure. What drug can cause such disorders?   |
| Correct answer | Doxycycline   |
| B              | Paracetamol   |
| C              | Ascorbic acid   |
| D              | Acetylcysteine  |
| E              | Codeine phosphate   |
| №              | krok 2015   |
| Topic          | Drugs acting on cardiovascular system. Cardiotonic agents. Cardiac glycosides.  |
| Task           | During treatment of chronic cardiac failure with digitoxin a patient developed the drug-specific signs of intoxication. A doctor prescribed Unithiol (Dimercaptopropansulfonate sodium). Explain its mechanism of action of Unithiol in case of cardiac glycoside intoxication: |
| Correct answer | Restoration of $^{+}Na^{+}$ -adenosine triphosphatase activity  |
| B              | Binding of calcium ions   |
| C              | Increase of sodium concentration in cardiac hystiocytes   |
| D              | Increase of calcium permeability of cardiac hystiocytes   |
| E              | Binding of glycosides into complex compound   |
| №              | krok 2015   |
| Topic          | Drugs acting on the CNS. Neuroleptics. Tranquilisers. Psychosedative preparations.  |
| Task           | Neuroleptanalgesia has been applied in the case of cardiac infarction. What neuroleptic is most often applied along with fentanyl?  |

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| Correct answer | Droperidol   |
| B              | Perphenazine (Aethaperazinum)  |
| C              | Levomepromazine  |
| D              | Clozapine  |
| E              | Sulpiride  |
| №              | krok 2015  |
| Topic          | Antimicrobial, antiviral, and antiparasitic agents. Antiviral preparations.  |
| Task           | Pharmacy has received viricides. Choose the viricide used for influenza treatment from the list given below:   |
| Correct answer | Rimantadine  |
| B              | Metisazone   |
| C              | Levamisole   |
| D              | Azidothymidine   |
| E              | Acyclovir  |
| №              | krok 2015, 2011  |
| Topic          | Drugs affecting on gastrointestinal tract.   |
| Task           | A 3,5-year-old child has been diagnosed with dysbacteriosis in the form of critical reduction of gram-positive anaerobic bacteria and increased number of staphylococci and yeast fungi. What preparation should be used for the correction of dysbacteriosis? |
| Correct answer | Bifidumbacterin  |
| B              | Colibacterin   |
| C              | Coli-Proteus bacteriophage   |
| D              | Furazolidone   |
| E              | Lactoglobulin  |
| №              | krok 2015  |
| Topic          | Drugs acting on metabolism, blood and immunity. Pharmacology of water- soluble vitamins.   |

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| Task           | Diet of a human must contain vitamins. What vitamin is usually prescribed for treatment and prevention of pellagra?   |
| Correct answer | Vitamin PP  |
| B              | Vitamin C   |
| C              | Vitamin A   |
| D              | Vitamin B <sub>1</sub>  |
| E              | Vitamin D   |
| №              | krok 2015, 2013   |
| Topic          | Drugs acting on the CNS. Non-steroidal anti-inflammatory agents.  |
| Task           | A patient has been taking diclofenac sodium for a long time. A family physician withdrew this drug and prescribed celecoxib. What disease was the cause of drug substitution? |
| Correct answer | Peptic ulcer  |
| B              | Bronchial asthma  |
| C              | Urolithiasis  |
| D              | Arterial hypertension   |
| E              | Chronic hepatitis   |
| №              | krok 2016, 2015   |
| Topic          | Drugs acting on the CNS. Neuroleptics. Tranquilisers. Psychosedative preparations.  |
| Task           | What group of drugs is characterized by development of drug addiction as a side effect?   |
| Correct answer | Psychosedatives   |
| B              | Cholinergic antagonists   |
| C              | Adrenergic drugs  |
| D              | Diuretics   |
| E              | Emetics   |
| №              | krok 2016, 2015   |
| Topic          | General pharmacology. Pharmacodynamics.   |

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| Task           | A woman, who during the 5th-10th weeks of her pregnancy had been taking sodium valproate for treatment of epilepsy, gave birth to a child with pathology of the vertebral column (split spine). What side effect of the drug caused such malformation?                            |
| Correct answer | Teratogenic   |
| B              | Mutagenic   |
| C              | Embryotoxic   |
| D              | Fetotoxic   |
| E              | Sensitizing   |
| №              | krok 2016   |
| Topic          | Drugs acting on the CNS. Non-steroidal anti-inflammatory agents. Antipyretics. Non-narcotical analgesics.   |
| Task           | A patient with headache consulted a pharmacist. The patient was prescribed a cyclooxygenase inhibitor - an aminophenol derivative. What drug was prescribed?  |
| Correct answer | Paracetamol   |
| B              | Acetylsalicylic acid  |
| C              | Diclofenac  |
| D              | Ketorolac   |
| E              | Ibuprofen   |
| №              | krok 2016   |
| Topic          | Antimicrobial, antiviral, and antiparasitic agents. Antihelminthal and antifungal preparations.   |
| Task           | Aurococcus culture was obtained from the nasal cavity of a child suffering from chronic tonsillitis. Causative agent's sensitivity towards a number of antibiotics was tested to choose the optimal drug. What drug <b>WAS NOT</b> included in antibiotic susceptibility testing? |
| Correct answer | Nystatin  |
| B              | Ampicillin  |
| C              | Tetracycline  |
| D              | Levomycetin (Chloramphenicol)   |

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| E              | Erythromycin   |
| №              | krok 2016  |
| Topic          | Drugs acting on cardiovascular system. Antianginal drugs.  |
| Task           | The 55-year-old patient has been diagnosed with angina pectoris. Calcium channel-blocking agent was prescribed for treatment. Name this agent: |
| Correct answer | Amlodipine   |
| B              | Atenolol   |
| C              | Guanethidine   |
| D              | Reserpine  |
| E              | Labetalol  |
| №              | krok 2016, 2015  |
| Topic          | Drugs acting on the CNS. Non-steroidal anti-inflammatory agents. Antipyretics. Non-narcotical analgesics.                                      |
| Task           | A doctor has prescribed a nonsteroidal antiinflammatory drug to relieve inflammation and pain syndrome. Name this drug:                        |
| Correct answer | Diclofenac sodium  |
| B              | Glibenclamide  |
| C              | Loratadine   |
| D              | Prednisolone   |
| E              | Calcium chloride   |
| №              | krok 2016  |
| Topic          | Drugs acting on cardiovascular system. Diuretic drugs.   |
| Task           | Diuretic should be prescribed to treat cerebral edema. What drug is to be administered?  |
| Correct answer | Furosemide   |
| B              | Hydrochlorothiazide  |
| C              | Caffeine and sodium benzoate   |
| D              | Diacarb (Acetazolamide)  |

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| E              | Spironolactone  |
| №              | krok 2016   |
| Topic          | Pharmacotherapy of acute poisoning.   |
| Task           | A patient with signs of mercury poisoning has been delivered into an admission room. What antidote should be prescribed in this case? |
| Correct answer | Unithiol  |
| B              | Atropine sulfate  |
| C              | Proserin  |
| D              | Naloxone  |
| E              | Calcium chloride  |
| №              | krok 2016   |
| Topic          | Drugs acting on cardiovascular system. Cardiotonic agents. Cardiac glycosides.  |
| Task           | What drug should be administered in case of acute cardiac insufficiency?  |
| Correct answer | Corglycon   |
| B              | Salbutamol  |
| C              | Pilocarpine hydrochloride   |
| D              | Naloxone  |
| E              | Heparin   |
| №              | krok 2016, 2015   |
| Topic          | Drugs acting on cardiovascular system. Cardiotonic agents. Cardiac glycosides.  |
| Task           | Choose the most efficient way of convallariae glycoside administration for acute heart failure treatment:                             |
| Correct answer | Intravenous   |
| B              | Intramuscular   |
| C              | Subcutaneous  |
| D              | Internal  |
| E              | Inhalational  |

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| №              | krok 2016   |
| Topic          | Drugs acting on metabolism, blood and immunity. Hormonal preparations of steroid structure and their synthetic substitutes.   |
| Task           | A 48-year-old patient has been intravenously administered prednisolone solution to arrest severe attack of bronchial asthma. What group of hormonal agents does prednisolone belong to?               |
| Correct answer | Glucocorticoids   |
| B              | Gestagenic drugs  |
| C              | Estrogenic drugs  |
| D              | Mineralocorticoid   |
| E              | Anabolic steroids   |
| №              | krok 2016, 2015   |
| Topic          | Drugs acting on the CNS. Non-steroidal anti-inflammatory agents.  |
| Task           | A patient with rheumatoid arthritis and concomitant duodenal ulcer has to be prescribed nonsteroid anti-inflammatory drug. Which one of the drugs listed below is a drug of choice in the given case? |
| Correct answer | Celecoxib   |
| B              | Acetylsalicylic acid  |
| C              | Paracetamol   |
| D              | Metamizole  |
| E              | Diclofenac sodium   |
| №              | krok 2016   |
| Topic          | Drugs acting on the CNS. Non-steroidal anti-inflammatory agents. Non-narcotical analgesics.   |
| Task           | Paracetamol belongs to the following pharmacological group:   |
| Correct answer | Nonnarcotic analgetics  |
| B              | Soporifics  |
| C              | Diuretics   |
| D              | Hypotensive drugs   |

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| E              | Antianginal drugs  |
| №              | krok 2016, 2015  |
| Topic          | Drugs acting on cardiovascular system. Drugs acting on blood pressure. Hypotensive and hypertensive preparations.                      |
| Task           | What side effect is characteristic of captopril?   |
| Correct answer | Dry cough  |
| B              | Increased blood pressure   |
| C              | Hyperglycemia  |
| D              | Cardiac rate disorder  |
| E              | Hypokalemia  |
| №              | krok 2016  |
| Topic          | Drugs acting on cardiovascular system. Diuretic drugs.   |
| Task           | A patient with epilepsy is prescribed a diuretic. Name this drug:  |
| Correct answer | Diacarb (Acetazolamide)  |
| B              | Verospiron   |
| C              | Furosemide   |
| D              | Hypothiazid (Hydrochlorothiazide)  |
| E              | Mannitol   |
| №              | krok 2016, 2015  |
| Topic          | Drugs acting on the CNS. Hypnotic and anticonvulsants.   |
| Task           | Due to prolonged taking of phenobarbital an epileptic patient has developed tolerance for this drug. What is this phenomenon based on? |
| Correct answer | Biotransformation acceleration   |
| B              | Absorption process weakening   |
| C              | Increase of receptor sensitivity   |
| D              | Biotransformation suppression  |
| E              | Substance accumulation in body   |

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| №              | krok 2016   |
| Topic          | Drugs acting on cardiovascular system. Cardiotonic agents. Cardiac glycosides.  |
| Task           | A patient with signs of cardiac glycosides intoxication was prescribed Unithiol. What is the mechanism of drug action in this case? |
| Correct answer | Reactivation of membrane $Na^+$ -adenosine triphosphatase   |
| B              | Binding of ionized $Ca^{2+}$  |
| C              | Increased permeability of $K^+$ into myocardiocytes   |
| D              | Increased $Na^+$ content in myocardium  |
| E              | Induction of cardiac glycoside metabolism   |
| №              | krok 2016   |
| Topic          | Drugs acting on the CNS. Neuroleptics. Tranquilisers. Psychoedative preparations.   |
| Task           | Neuroleptanalgesia has been applied in the case of cardiac infarction. What neuroleptic is most often applied along with fentanyl?  |
| Correct answer | Droperidol  |
| B              | Perphenazine (Aethaperazinum)   |
| C              | Levomepromazine   |
| D              | Clozapine   |
| E              | Sulpiride   |
| №              | krok 2016   |
| Topic          | Antimicrobial, antiviral, and antiparasitic agents. Antibiotics.  |
| Task           | A pharmaceutical enterprise offers wide range of antimicrobial agents. Select the broad spectrum antimicrobial agent:               |
| Correct answer | Tetracycline  |
| B              | Rimantadine   |
| C              | Nystatin  |
| D              | Griseofulvin  |

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| E              | Phthalazolum  |
| №              | krok 2016   |
| Topic          | Antimicrobial, antiviral, and anti-parasitic agents. Antiviral preparations.  |
| Task           | Pharmacy has received viricides. Choose the viricide for influenza treatment from the list given below:                                 |
| Correct answer | Rimantadine   |
| B              | Metisazone  |
| C              | Levamisole  |
| D              | Azidothimidine  |
| E              | Acyclovir   |
| №              | krok 2016   |
| Topic          | Drugs affecting on gastrointestinal tract.  |
| Task           | Contrykal is used to prevent pancreatic autolysis. This drug is the inhibitor of the following enzymes:                                 |
| Correct answer | Proteases   |
| B              | Lipases   |
| C              | Glycosidases  |
| D              | Nucleases   |
| E              | Synthetases   |
| №              | krok 2016, 2015   |
| Topic          | Drugs acting on metabolism, blood and immunity. Preparations affecting leucopoiesis and blood coagulation.                              |
| Task           | A woman noticed that a cut on her skin was still bleeding even after minutes had passed. What vitamin deficiency causes such condition? |
| Correct answer | Vitamin <i>K</i>  |
| B              | Vitamin <i>A</i>  |
| C              | Vitamin <i>D</i>  |

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| D              | Vitamin <i>E</i>  |
| E              | Vitamin <i>B</i> <sub>12</sub>  |
| №              | krok 2016, 2015, 2013   |
| Topic          | Antimicrobial, antiviral, and anti-parasitic agents. Antiprotozoal preparations.  |
| Task           | What drug should be administered for individual prevention of malaria?  |
| Correct answer | Chingamin   |
| B              | Rifampicin  |
| C              | Ampicillin  |
| D              | Gentamicin  |
| E              | Biseptol (Co-Trimoxazole)   |
| №              | krok 2016, 2013   |
| Topic          | Drugs acting on the CNS. Narcotic (opioid) analgesics.  |
| Task           | What are the indications for the use of naloxone?   |
| Correct answer | Acute intoxication with narcotic analgesics   |
| B              | Heavy metals intoxication   |
| C              | Intoxication with cardiac glycosides  |
| D              | Intoxication with ergot alkaloids   |
| E              | Atropine sulfate intoxication   |
| №              | krok 2016, 2015   |
| Topic          | Agents influencing on afferent and efferent innervations. Preparations irritating the peripheral receptors of skin and mucous membranes.  |
| Task           | A patient with chronic constipation had been prescribed bisacodyl. After 3 weeks of treatment the patient noticed a reduction of laxative effect. This is caused by the development of the following side-effect: |
| Correct answer | Tolerance   |
| B              | Dependence  |

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| C              | Sensibilization   |
| D              | Cumulation  |
| E              | Disbacteriosis  |
| №              | krok 2017   |
| Topic          | Drugs acting on the CNS. Narcotic (opioid) analgesics.  |
| Task           | An interhospital pharmacy received a short-acting narcotic analgesic that is times more active than morphine. Name this drug:   |
| Correct answer | Fentanyl  |
| B              | Naltrexone  |
| C              | Naloxone  |
| D              | Analgin (Metamizole)  |
| E              | Ketanov (Ketorolac)   |
| №              | krok 2017   |
| Topic          | Drugs acting on metabolism, blood and immunity. Hormonal preparations of steroid structure and their synthetic substitutes.   |
| Task           | A man has been suffering from rheumatoid arthritis for 10 years. Due to its exacerbation he had been taking acetylsalicylic acid and prednisolone. The patient complains of stomachache, eructation, nausea, sensation of full epigastrium, and meteorism. On gastroscopy there was an erosion (0,5x0,5 cm) of gastric mucosa detected. What is the cause of gastric mucosa defect development? |
| Correct answer | Prolonged taking of aspirin and hormones  |
| B              | Immune-mediated destruction of gastric mucosa   |
| C              | Dysbacteriosis development  |
| D              | Age-related changes of mucosa   |
| E              | Prolonged hypersthenia of gastric muscles   |
| №              | krok 2017   |
| Topic          | Antimicrobial, antiviral, and anti-parasitic agents. Antibiotics.   |

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| Task           | Antibiotics derived from various species of actinomycetes are widely used in medical practice. Point out these drugs among those listed below:  |
| Correct answer | Aminoglycosides (streptomycin, monomycin)   |
| B              | Penicillin, cephalosporin, griseofulvin   |
| C              | Polymyxin, bacitracin   |
| D              | Chloreline, arenarinum  |
| E              | Lysozyme, erytrinum   |
| №              | krok 2017   |
| Topic          | Drugs acting on metabolism, blood and immunity. Pharmacology of lipid-soluble vitamins.   |
| Task           | Increased concentration of active oxygen forms is a mechanism of pathogenesis in a number of diseases. To prevent this process, antioxidants are prescribed. Select an antioxidant from the list below: |
| Correct answer | Alpha-tocopherol  |
| B              | Glucose   |
| C              | Calciferol  |
| D              | Cobalamine  |
| E              | Glicerol  |
| №              | krok 2017, 2015   |
| Topic          | Antimicrobial, antiviral, and anti-parasitic agents. Antiviral preparations.  |
| Task           | A local general practitioner recommends taking interferon for influenza prevention. What is the mechanism of action of this drug?   |
| Correct answer | Blocks virus protein synthesis  |
| B              | Blocks virus stripping  |
| C              | Inhibits virion exit from cells   |
| D              | Prevents adsorption of virus in cell receptors  |
| E              | Disrupts the process of virus assembly  |
| №              | krok 2018   |

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| Topic          | Drugs affecting the cardiovascular system. Uricosuric drugs.  |
| Task           | A patient with gout was prescribed allopurinol - a competitive inhibitor of xanthine oxidase. Xanthine oxidase is a terminal enzyme of catabolism of: |
| Correct answer | Purine nucleotides  |
| B              | Glycoproteins   |
| C              | Phospholipids   |
| D              | Higher fatty acids  |
| E              | Heteropolysaccharides   |
| №              | krok 2018   |
| Topic          | Drugs acting on metabolism, blood and immunity. Vitamins. Enzymes.  |
| Task           | To treat the patients with purulent wounds, a dressing with a certain immobilized enzyme is used. Name this enzyme:                                   |
| Correct answer | Tripsin   |
| B              | Arginase  |
| C              | Catalase  |
| D              | Alkaline phosphatase  |
| E              | Acid phosphatase  |
| №              | krok 2018   |
| Topic          | Drugs acting on metabolism, blood and immunity. Pharmacology of water- soluble vitamins.  |
| Task           | A structural analog of vitamin PP (nicotinic acid) is used as an antituberculous medicine. Name this medicine: advisable?                             |
| Correct answer | Isoniazid   |
| B              | Streptocide   |
| C              | Riboflavin  |
| D              | Tetracycline  |
| E              | Aspirin   |
| №              | krok 2018   |

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| Topic          | Antimicrobial and antiparasitic drugs. Antiviral drugs.   |
| Task           | The defensive mechanisms against some infectious diseases can be greatly reinforced with interferon. Interferon preparations will be the most advisable in cases of the following type of infections: |
| Correct answer | Viral   |
| B              | Helminthic  |
| C              | Protozoal   |
| D              | Microbioses   |
| E              | Fungal  |
| №              | krok 2018   |
| Topic          | Antimicrobial and antiparasitic drugs.  |
| Task           | A chemotherapeutic agent has bactericidal effect against streptococci, staphylococci, bacilli, and clostridia. According to its action spectrum this drug belongs to the following group:             |
| Correct answer | A. Broad spectrum antibacterial agents  |
| B              | B. Narrow spectrum antibacterial agents   |
| C              | C. Broad spectrum antifungal agents   |
| D              | D. Antiviral agents   |
| E              | E. Antituberculous agents   |
| №              | krok 2018   |
| Topic          | Drugs acting on metabolism, blood and immunity. Drugs influencing blood coagulation.  |
| Task           | Coumarins, vitamin K antagonists, suppress the processes of blood coagulation. What protein synthesis is blocked by coumarins?  |
| Correct answer | Prothrombin   |
| B              | Gamma globulin  |
| C              | Albumin   |
| D              | Transferrin   |
| E              | Ceruloplasmin   |

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| №              | krok 2018   |
| Topic          | Drugs acting on metabolism, blood and immunity. Drugs influencing blood coagulation.  |
| Task           | A patient with high risk of hemorrhages is recommended to take vicasol (menadione) by his physician. This drug is the structural analog of: |
| Correct answer | Vitamin K   |
| B              | Vitamin A   |
| C              | Vitamin B5  |
| D              | Vitamin B12   |
| E              | Vitamin B6  |
| №              | krok 2018   |
| Topic          | Drugs acting on metabolism, blood and immunity.   |
| Task           | An oncological patient was prescribed fluorouracil that is a competitive inhibitor of thymidine synthase. It inhibits the process of:       |
| Correct answer | Pyrimidine nucleotides synthesis  |
| B              | Carbohydrate disintegration   |
| C              | Purine nucleotides synthesis  |
| D              | Purine nucleotides disintegration   |
| E              | Lipids synthesis  |
| №              | krok 2018   |
| Topic          | Drugs acting on metabolism, blood and immunity. Drugs influencing blood coagulation.  |
| Task           | A patient with acute myocardial infarction received anticoagulation therapy. What compound will have anticoagulation effect?                |
| Correct answer | Heparin   |
| B              | Hyaluronic acid   |
| C              | Chondroitin sulfate   |
| D              | Dermatan sulfate  |
| E              | Keratan sulfate   |

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| №              | krok 2018   |
| Topic          | Drugs affecting the cardiovascular system. Uricosuric drugs.  |
| Task           | Gout develops when purine nucleotide metabolism is disturbed. The doctor prescribed the patient allopurinol that is a competitive inhibitor of: |
| Correct answer | Xanthine oxidase  |
| B              | Succinate dehydrogenase   |
| C              | Alcohol dehydrogenase   |
| D              | Lactate dehydrogenase   |
| E              | Hexokinase  |
| №              | krok 2018   |
| Topic          | Drugs acting on the CNS. Neuroleptics   |
| Task           | Neuroleptanalgesia has been applied in a case of cardiac infarction. What neuroleptic is most often administered along with fentanyl?           |
| Correct answer | Droperidol  |
| B              | Perphenazine (Aethaperazinum)   |
| C              | Levomepromazine   |
| D              | Clozapine   |
| E              | Sulpiride   |
| №              | krok 2018   |
| Topic          | Antimicrobial agents. Disinfectants and antiseptics.  |
| Task           | Select the halogenated antiseptic that would be preferable for a child to pack in the first aid kit, when going to a summer camp:               |
| Correct answer | Iodine alcoholic solution   |
| B              | Brilliant green   |
| C              | Copper sulfate  |
| D              | Methylene blue  |
| E              | Formaldehyde solution   |

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| №              | krok 2018  |
| Topic          | Drugs affecting on gastrointestinal tract.   |
| Task           | A patient, who was prescribed famotidine to treat peptic ulcer disease, came to the pharmacy. What is this drug's mechanism of action? |
| Correct answer | H2-histamine receptor blockade   |
| B              | H1-histamine receptor blockade   |
| C              | Muscarinic receptor blockade   |
| D              | Inhibition of hydrogen potassium ATPase  |
| E              | Ganglionic receptor blockade   |
| №              | krok 2018  |
| Topic          | General pharmacology. Pharmacokinetics.  |
| Task           | What is represented by such a pharmacokinetic value of a drug as its biological half-life (T1/2)?                                      |
| Correct answer | Time period in which plasma drug concentration decreases by 50%  |
| B              | Blood plasma volume cleared of drug within a time unit   |
| C              | Period of total body clearance   |
| D              | Renal clearance rate   |
| E              | Correlation between the drug clearance rate and plasma drug concentration  |
| №              | Krok 2018  |
| Topic          | Drugs acting on metabolism, blood and immunity. Hormones of polypeptid and aminocids .   |
| Task           | A doctor needs to prescribe the patient a drug for replacement therapy after thyroidectomy. What drug would you recommend?             |
| Correct answer | L-thyroxine  |
| B              | Insulin  |
| C              | Prednisolone   |
| D              | Parathyroidin  |
| E              | Thiamazole   |
| №              | krok 2018  |

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| Topic          | Antimicrobial, antiviral, and antiparasitic agents. Antibiotics.   |
| Task           | What is the main mechanism of benzylpenicillin bactericidal action on the coccalflora?   |
| Correct answer | Disturbed synthesis of microbial cell wall   |
| B              | Inhibition of protein synthesis  |
| C              | Disturbed cytoplasmic membrane permeability  |
| D              | Activation of macroorganism immune system  |
| E              | Increased phagocytic activity of leukocytes  |
| №              | krok 2018(115)   |
| Topic          | Agents influencing on afferent and efferent innervations. Preparations irritating the peripheral receptors of skin and mucous membranes. |
| Task           | What mucolytic agent would you recommend for the patient with acute bronchitis to facilitate expectoration?                              |
| Correct answer | Acetylcysteine   |
| B              | Glaucine   |
| C              | Codeine  |
| D              | Libexin (Prenoxdiazine)  |
| E              | Hydrocodone  |
| №              | krok 2018  |
| Topic          | Drugs acting on metabolism, blood and immunity. Antiallergic drugs   |
| Task           | A patient with allergic dermatitis came to the hospital. What anti-inflammatory and anti-allergic drug must be prescribed in this case?  |
| Correct answer | Prednisolone   |
| B              | Ethamide   |
| C              | Oxytocin   |
| D              | Insulin  |
| E              | Retabolil (Nandrolone)   |
| №              | krok 2018(   |

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| Topic          | Agents influencing on afferent and efferent innervations. Preparations influencing on transmission of neural impulse in adrenergic synapse. Adrenomimetics.                      |
| Task           | A patient with bronchial asthma was prescribed a drug with the mechanism of action that is primarily based on the stimulation of $\beta_2$ adrenergic receptors. Name this drug: |
| Correct answer | Salbutamol   |
| B              | Adrenaline hydrochloride   |
| C              | Droperidol   |
| D              | Clonidine  |
| E              | Isadrine (Isoprenaline)  |
| №              | krok 2018  |
| Topic          | General pharmacology. Pharmacokinetics. Pharmacodynamics.  |
| Task           | Name the ability of a drug to accumulate within the patient's body:  |
| Correct answer | Cumulation   |
| B              | Antagonism   |
| C              | Synergism  |
| D              | Habituation  |
| E              | Allergy  |
| №              | krok 2018  |
| Topic          | Drugs acting on metabolism, blood and immunity. Drugs influencing blood coagulation.   |
| Task           | What pharmacological effect of acetylsalicylic acid allows its application in patients with ischemic heart disease for prevention of thromboses?                                 |
| Correct answer | Antiaggregant  |
| B              | Analgesic  |
| C              | Antipyretic  |
| D              | Ulcerogenic  |
| E              | Anti-inflammatory  |
| №              | krok 2018  |

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| Topic          | Drugs acting on metabolism, blood and immunity. Hormonal preparations of steroid structure and their synthetic substitutes.   |
| Task           | A 48-year-old patient has been intravenously administered prednisolone solution to arrest severe attack of bronchial asthma. What group of hormonal agents does prednisolone belong to? |
| Correct answer | Glucocorticoids   |
| B              | Gestagenic drugs  |
| C              | Estrogenic drugs  |
| D              | Mineralocorticoid   |
| E              | Anabolic steroids   |
| №              | krok 2018   |
| Topic          | Drugs acting on the CNS. Non-steroidal anti-inflammatory agents. Non-narcotical analgesics.   |
| Task           | A doctor has prescribed a nonsteroidal anti-inflammatory drug to relieve inflammation and pain syndrome. Name this drug:  |
| Correct answer | Diclofenac sodium   |
| B              | Glibenclamide   |
| C              | Loratadine  |
| D              | Prednisolone  |
| E              | Calcium chloride  |
| №              | krok 2018   |
| Topic          | Drugs acting on metabolism, blood and immunity. Pharmacology of water-soluble vitamins.   |
| Task           | A patient suffers from hyperchromic B12-deficiency anemia. What vitamin preparation should be prescribed in this case?  |
| Correct answer | Cyanocobalamin  |
| B              | Riboflavin  |
| C              | Vicasol (Menadione)   |
| D              | Thiamine chloride   |
| E              | Retinol acetate   |

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| №              | krok 2018   |
| Topic          | Drugs acting on metabolism, blood and immunity. Hormones of Polipeptide structure                                       |
| Task           | To stimulate birth activity, a certain neurohypophyseal hormone is used. Name this hormone:                             |
| Correct answer | Oxytocin  |
| B              | Insulin   |
| C              | Glucagon  |
| D              | Thyroxine   |
| E              | Testosterone  |
| №              | krok 2018   |
| Topic          | Drugs acting on cardiovascular system. Antihypertensive drugs.  |
| Task           | A patient was prescribed losartan for treatment of arterial hypertension. What mechanism of action does this drug have? |
| Correct answer | Angiotensin-receptor blockade   |
| B              | Inhibition of angiotensin-converting enzyme   |
| C              | Inhibition of phosphodiesterase   |
| D              | Activation of central $\alpha$ -adrenoceptors   |
| E              | Calcium channel blockade  |
| №              | krok 2018   |
| Topic          | Hepatoprotectors  |
| Task           | Select the hepatoprotective drugs from the list below:  |
| Correct answer | Essentiale (Phospholipides), Thiotriasoline   |
| B              | No-Spa (drotaverine), papaverine hydrochloride  |
| C              | Allochol, Cholenzym   |
| D              | Festal, Panzinorm (Pancreatin)  |
| E              | Oxaphenamide (Osalmid), Nicodin   |
| №              | krok 2018   |
| Topic          | Drugs acting on the CNS. Non-steroidal anti-inflammatory agents. Non-narcotical analgesics.                             |

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| Task           | Paracetamol has antipyretic and analgesic effect. In the human body it is neutralized in the following organ:                      |
| Correct answer | Liver  |
| B              | Spleen   |
| C              | Intestine  |
| D              | Lungs  |
| E              | Heart  |
| №              | krok 2018  |
| Topic          | Antimicrobial, antiviral, and antiparasitic agents. Antiviral agents   |
| Task           | A pharmacy has received a batch of drugs for treatment of upper respiratory tract infection. What drug is used to treat influenza? |
| Correct answer | Rimantadine  |
| B              | Methisazone  |
| C              | Levamisole   |
| D              | Idoxuridine  |
| E              | Doxycycline  |
| №              | krok 2018  |
| Topic          | Drugs acting on cardiovascular system. Diuretic drugs.   |
| Task           | Choose the potent fast-acting diuretic to induce forced diuresis:  |
| Correct answer | Furosemide   |
| B              | Hydrochlorothiazide  |
| C              | Spirolactone   |
| D              | Triamterene  |
| E              | Acetazolamide  |
| №              | krok 2018  |
| Topic          | Drugs acting on the CNS. Analeptics  |
| Task           | Name the psychostimulant with analeptical action, which is a purine derivative:  |

|                |  |
|----------------|--|
| Correct answer | Caffeine and sodium benzoate   |
| B              | Tramadol   |
| C              | Medazepam  |
| D              | Sodium bromide   |
| E              | Sulpiride  |
| №              | krok 2018  |
| Topic          | Drugs acting on the CNS. Antidepressants. Normothymics. Psychostimulators. Actoprotectors. Nootropic drugs   |
| Task           | After ischemic stroke the patient was prescribed a drug to improve his intellectual functioning and memory. What drug would he obtain in the pharmacy? |
| Correct answer | Piracetam  |
| B              | Metoclopramide   |
| C              | Tabex (Cytisine)   |
| D              | Diphenin (Phenytoin)   |
| E              | -  |
| №              | krok 2018  |
| Topic          | Antimicrobial agents. Disinfectants and antiseptics.   |
| Task           | A patient with a small cut on the palm came to the dispensing chemist. What antiseptic would be advisable in this case?                                |
| Correct answer | Hydrogen peroxide  |
| B              | Doxycycline hydrochloride  |
| C              | Ketoconazole   |
| D              | Lidocaine hydrochloride  |
| E              | Flemoxin (Amoxicillin)   |
| №              | krok 2018  |
| Topic          | Antimicrobial, antiviral, and antiparasitic agents.  |

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| Task           | Mother of a 10-year-old child came to the pharmacy to obtain a drug for prevention of upper respiratory tract infections. What drug would be recommended by the dispensing chemist?   |
| Correct answer | Interferon  |
| B              | Benzoteph   |
| C              | Carvedilol  |
| D              | Tetracycline  |
| E              | Doxorubicin   |
| №              | krok 2018   |
| Topic          | Drugs affecting on gastrointestinal tract.  |
| Task           | A patient came to the pharmacy to obtain an antidiarrheal agent. What drug would be recommended by the dispensing chemist?  |
| Correct answer | Loperamide  |
| B              | Dicaine (Tetracaine)  |
| C              | Ranitidine  |
| D              | Picolax (Sodium picosulfate)  |
| E              | Anesthesin (Benzocaine)   |
| №              | krok 2018   |
| Topic          | Drugs affecting on gastrointestinal tract.  |
| Task           | A patient came to the pharmacy to obtain a drug that contains pancreatic enzymes and can be taken for chronic pancreatitis. What drug would be recommended by the dispensing chemist? |
| Correct answer | Pancreatine   |
| B              | Triamcinolone   |
| C              | Gordox (Aprotinin)  |
| D              | Pirenzepine   |
| E              | Omeprazole  |
| №              | krok 2018   |
| Topic          | Drugs acting on metabolism, blood and immunity. Pharmacology of lipid- soluble vitamins.  |

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| Task           | Increased concentration of active oxygen forms is a mechanism of pathogenesis in a number of diseases. To prevent this process, antioxidants are prescribed. Select an antioxidant from the list below: |
| Correct answer | $\alpha$ -tocopherol  |
| B              | Glucose   |
| C              | Calciferol  |
| D              | Cobalamine  |
| E              | Glicerol  |
| №              | krok 2018   |
| Topic          | Drugs affecting on gastrointestinal tract.  |
| Task           | A 28-year-old man with peptic ulcer of the stomach was prescribed a drug that inhibits gastric juice secretion. Specify this drug:  |
| Correct answer | Omeprazole  |
| B              | Ethacrynic acid   |
| C              | Duphalac (Lactulose)  |
| D              | Lidocaine   |
| E              | Fenofibrate   |
| №              | krok 2018   |
| Topic          | Drugs acting on metabolism, blood and immunity. Antiallergic drugs  |
| Task           | An engine driver complains of his seasonal allergy symptoms. What nonsedating drug should be prescribed in this case?   |
| Correct answer | Loratadine  |
| B              | Novocaine   |
| C              | Fenofibrate   |
| D              | Analgin (Metamizole)  |
| E              | Atenolol  |
| №              | krok 2018   |

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| Topic          | General pharmacology. Pharmacokinetics. Pharmacodynamics.  |
| Task           | Specify the analgesic that affects opiate receptors and can cause development of tolerance and dependence:   |
| Correct answer | Morphine   |
| B              | Phenobarbital  |
| C              | Medazepam  |
| D              | Voltaren (Diclofenac sodium)   |
| E              | Haloperidol  |
| №              | krok 2018  |
| Topic          | Drugs affecting the cardiovascular system. Diuretics   |
| Task           | During furosemide therapy of a patient with chronic edematous syndrome, his plasma-cation concentration was disturbed. What drug should be used in this case?                          |
| Correct answer | Potassium chloride   |
| B              | Thiamine bromide   |
| C              | Ascorutin (Ascorbic acid + Rutoside)   |
| D              | MagneB6  |
| E              | Aspirin  |
| №              | krok 2018  |
| Topic          | Drugs acting on metabolism, blood and immunity. Pharmacology of lipid- soluble vitamins.   |
| Task           | Upon examination the ophthalmologist diagnosed a 21-year-old woman with visual impairment - hemeralopia ("night blindness"). What drug should this patient take to restore her vision? |
| Correct answer | Retinol acetate  |
| B              | Ergocalciferol   |
| C              | Suprastin (Chloropyramine)   |
| D              | Cholecalciferol  |
| E              | Sustac forte (Nitroglycerin)   |
| №              | krok 2019  |

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| Topic          | Drugs acting on the CNS. Neuroleptics. Tranquilisers. Psychoedative preparations.  |
| Task           | To quickly relieve the state of acute psychosis, the patient was prescribed a rapid/short-acting psychotropic drug. Name this drug:  |
| Correct answer | Droperidol   |
| B              | Piracetam  |
| C              | Caffeine and sodium benzoate   |
| D              | Valerian extract   |
| E              | Amitriptyline  |
| №              | krok 2019  |
| Topic          | Drugs acting on metabolism, blood and immunity. Pharmacology of fat- soluble vitamins.   |
| Task           | In case of hypovitaminosis of a certain vitamin, disturbed proliferation of epithelial and connective tissue can be observed. Patients with this type of hypovitaminosis usually present with impaired vision and spatial orientation. Name this drug: |
| Correct answer | Retinol  |
| B              | Tocopherol   |
| C              | Pyridoxine   |
| D              | Riboflavin   |
| E              | Cholecalciferol  |
| №              | krok 2019  |
| Topic          | General pharmacology. Pharmacodynamics.  |
| Task           | Name the ability of a drug to accumulate within the patient's body:  |
| Correct answer | Cumulation   |
| B              | Habituation  |
| C              | Antagonism   |
| D              | Allergy  |
| E              | Synergism  |
| №              | krok 2019  |

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| Topic          | Drugs acting on metabolism, blood and immunity. Pharmacology of lipid-soluble vitamins. Enzyme and anti-enzyme preparations. Aminoacids derivatives. Drugs acting of calcium-phosphorus balance. |
| Task           | Treatment with sodium bromide resulted in development of bromism in the patient: rhinitis,cough, conjunctivitis, and skin rashes. What should the patient be prescribed to treat this condition? |
| Correct answer | Sodium chloride  |
| B              | Potassium chloride   |
| C              | Sodium iodide  |
| D              | Sodium sulfate   |
| E              | Calcium chloride   |
| №              | krok 2019  |
| Topic          | Steroid hormonal preparations, their analogues and antagonists.  |
| Task           | What is the most common side-effect of inhaled corticosteroids?  |
| Correct answer | Oropharyngeal candidiasis  |
| B              | Increased body mass  |
| C              | Subcapsular cataract   |
| D              | Osteoporosis   |
| E              | Arterial hypertension  |
| №              | krok 2019  |
| Topic          | Antimicrobial and antiparasitic drugs. Disinfectants and antiseptics.  |
| Task           | Select the halogenated antiseptic that would be preferable for a child to pack in the first aid kit, when going to a summer camp:  |
| Correct answer | Iodine alcoholic solution  |
| B              | Copper sulfate   |
| C              | Formaldehyde solution  |
| D              | Brilliant green  |

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| E              | Methylene blue   |
| №              | krok 2019  |
| Topic          | Antimicrobial, antiviral, and anti-parasitic agents. Antiviral preparations.   |
| Task           | Select the drug with anti-herpesvirus activity that can be used for prevention and treatment of herpetic lesions on skin and mucosa:           |
| Correct answer | Aciclovir  |
| B              | Rifampicin   |
| C              | Ranitidine   |
| D              | Nystatin   |
| E              | Atropine   |
| №              | krok 2019  |
| Topic          | Agents influencing on efferent innervations. Preparations influencing on transmission of neural impulse in adrenergic synapse. Adrenomimetics. |
| Task           | A medical student needs to choose an adrenergic drug for treatment of anaphylactic shock. What would you recommend?                            |
| Correct answer | Adrenaline hydrochloride   |
| B              | Galazolin (Xylometazoline)   |
| C              | Clophelin (Clonidine)  |
| D              | Izadrin (Isoprenaline)   |
| E              | Fenoterol  |
| №              | krok 2019  |
| Topic          | Antimicrobial, antiviral, and antiparasitic agents. Antibiotics.   |
| Task           | What is the main mechanism of benzylpenicillin bactericidal action on the coccal flora?  |
| Correct answer | Disturbed synthesis of microbial cell wall   |
| B              | Activation of macroorganism immune system  |
| C              | Inhibition of protein synthesis  |
| D              | Increased phagocytic activity of leukocytes  |

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| E              | Disturbed cytoplasmic membrane permeability  |
| №              | krok 2019  |
| Topic          | Drugs influencing the efferent innervation. Cholinergic agonists and antagonists.  |
| Task           | During a surgery, tubocurarin chloride was used as a muscle relaxant. What antagonist should the patient be given to restore spontaneous breathing?                          |
| Correct answer | Proserin (Neostigmine)   |
| B              | Benzohexonium (Hexamethonium)  |
| C              | Dithylin (Suxamethonium)   |
| D              | Aethimizole (Methylamide)  |
| E              | Cytitone (Cytisine)  |
| №              | krok 2019  |
| Topic          | Drugs acting on the CNS. Non-steroidal anti-inflammatory agents. Antipyretics. Non-narcotical analgesics.  |
| Task           | A doctor has prescribed a nonsteroidal anti-inflammatory drug to relieve inflammation and pain syndrome. Name this drug:   |
| Correct answer | Diclofenac sodium  |
| B              | Prednisolone   |
| C              | Loratadine   |
| D              | Calcium chloride   |
| E              | Glibenclamide  |
| №              | krok 2019  |
| Topic          | Drugs affecting on respiratory tract.  |
| Task           | A patient with tracheitis was prescribed a centrally acting antitussive drug that does not depress respiration, causes no addict, and lowers blood pressure. Name this drug: |
| Correct answer | Glaucine hydrochloride   |
| B              | Codeine phosphate  |
| C              | Prenoxdiazine  |

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| D              | Acetylcysteine   |
| E              | Morphine hydrochloride   |
| №              | krok 2019  |
| Topic          | Agents influencing on afferent and efferent innervations. Preparations irritating the peripheral receptors of skin and mucous membranes.   |
| Task           | A patient suffers from intense cough with production of viscous sputum. What drug can thin the sputum and facilitate expectoration?  |
| Correct answer | Acetylcysteine   |
| B              | Butamirate   |
| C              | Prenoxdiazine  |
| D              | Codeine phosphate  |
| E              | Glaucine   |
| №              | krok 2019  |
| Topic          | Pharmacotherapy of acute poisoning.  |
| Task           | A patient with myocardial infarction was receiving heparin as a part of the complex therapy. With time the patient developed hematuria. What drug should be given as an antidote in this case? |
| Correct answer | Protaminesulfate   |
| B              | Neodicumarin   |
| C              | Aminocaproicacid   |
| D              | Vicasol (Menadione)  |
| E              | Fibrinogen   |
| №              | krok 2019  |
| Topic          | Drugs affecting the central nervous system. Nootropic drugs. Adaptagens. Analeptics. Drugs of abuse.   |
| Task           | After ischemic stroke the patient was prescribed a drug to improve his intellectual functioning and memory. What drug should he obtain from the pharmacy?                                      |

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| Correct answer | Piracetam   |
| B              | Diphenin (Phenytoin)  |
| C              | Metoclopramide  |
| D              | -   |
| E              | Tabex (Cytisine)  |
| №              | krok 2019   |
| Topic          | Drugs influencing the efferent innervation. Cholinergic antagonists.  |
| Task           | What drug is used for treatment of organophosphate poisoning?   |
| Correct answer | Atropine sulfate  |
| B              | Isoniazid   |
| C              | Metronidazole   |
| D              | Aciclovir   |
| E              | Platyphylline   |
| №              | krok 2019   |
| Topic          | Drugs affecting metabolism. Water-soluble vitamins.   |
| Task           | A patient suffers from diarrhea, dermatitis, and dementia. What vitamin is likely to be deficient in this patient, causing the patient's condition? |
| Correct answer | Nicotinicacid   |
| B              | Retinol   |
| C              | Tocopherol  |
| D              | Vitamin D   |
| E              | Vitamin K   |
| №              | krok 2019   |
| Topic          | Drug affecting the blood flow and microcirculation. Angioprotectors.  |
| Task           | Cholesterol synthesis inhibitors are used as antiatherosclerotic drugs. Select one such drug from the list:   |
| Correct answer | Lovastatin  |

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| B              | Benzympenicillin   |
| C              | Chloramphenicol  |
| D              | Pancreatin   |
| E              | Sulfanilamide  |
| №              | krok 2019  |
| Topic          | Drugs acting on cardiovascular system. Antianginal drugs.  |
| Task           | What drug can quickly stop an angina pectoris attack, when taken sublingually?   |
| Correct answer | Nitroglycerine   |
| B              | Corglycon  |
| C              | Amiodarone   |
| D              | Digoxin  |
| E              | Lisinopril   |
| №              | krok 2019  |
| Topic          | General pharmacology. Pharmacodynamics.  |
| Task           | A patient, who has been taking phenazepam for a month, came to the pharmacy. He insists that he needs to buy two more packages of this drug, because without it he feels unwell. The side-effect of this drug that can be observed in this patient is based on the development of: |
| Correct answer | Addiction  |
| B              | Cumulation   |
| C              | Idiosyncrasy   |
| D              | After-effect   |
| E              | Tolerance  |
| №              | krok 2019  |
| Topic          | Drugs affecting the cardiovascular system. Uricosuric drugs.   |
| Task           | Gout develops when purine nucleotide metabolism is disturbed. A doctor prescribed the patient allopurinol that is a competitive inhibitor of:  |
| Correct answer | Xanthine oxidase   |

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| B              | Hexokinase  |
| C              | Alcohol dehydrogenase   |
| D              | Succinate dehydrogenase   |
| E              | Lactate dehydrogenase   |
| №              | krok 2019   |
| Topic          | Antimicrobial, antiviral, and antiparasitic agents. Antibiotics.  |
| Task           | You work in the pharmacy located at the premises of the dermatovenerologic clinic. Consult an intern what antibiotic is a drug of choice for treatment of syphilis:                       |
| Correct answer | Benzylpenicillin sodium salt  |
| B              | Streptomycin sulfate  |
| C              | Polymyxin M sulfate   |
| D              | Lincomycin hydrochloride  |
| E              | Levorin sodium salt   |
| №              | krok 2019   |
| Topic          | Antimicrobial, antiviral, and antiparasitic agents. Antibiotics.  |
| Task           | A chemotherapeutic agent has bactericidal effect against streptococci, staphylococci, bacilli, and clostridia. According to its action spectrum this drug belongs to the following group: |
| Correct answer | Broad spectrum antibacterial agents   |
| B              | Antiviral agents  |
| C              | Narrow spectrum antibacterial agents  |
| D              | Antituberculous agents  |
| E              | Broad spectrum antifungal agents  |
| №              | krok 2019   |
| Topic          | Drugs acting on metabolism, blood and immunity. Pharmacology of water- soluble vitamins.  |
| Task           | Ascorutin vitamin preparation is used for treatment of bleeding gums and punctate hemorrhages. What vitamin does this preparation contain?  |
| Correct answer | C   |

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| B              | E  |
| C              | A  |
| D              | K  |
| E              | D  |
| №              | krok 2019  |
| Topic          | Drugs influencing on the immune system. Immunotropic agents and antiallergic drugs.  |
| Task           | A patient with allergic rhinitis was prescribed loratadine. This drug belongs to the following group of antiallergic agents:   |
| Correct answer | H1-antagonists   |
| B              | Glucocorticoids  |
| C              | Membrane stabilizers   |
| D              | H2-antagonists   |
| E              | Leukotriene receptor antagonists   |
| №              | krok 2019  |
| Topic          | Drugs acting on metabolism, blood and immunity. Hormonal preparations of polypeptide and aminoacidstructers. Antihormonal drugs.                                       |
| Task           | A patient with hyperproduction of thyroid hormones has been prescribed Merkazolilum. This drug inhibits the following enzyme participating in iodothyronine synthesis: |
| Correct answer | Iodide peroxidase  |
| B              | Reductase  |
| C              | Decarboxylase  |
| D              | Aminotransferase   |
| E              | Aromatase  |
| №              | krok 2019  |
| Topic          | Drugs acting on cardiovascular system. Diuretic drugs.   |
| Task           | Forced diuresis needs to be induced in a patient with acute medication poisoning. What drug must be used for this purpose?   |

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| Correct answer | Furosemide   |
| B              | Diphenhydramine  |
| C              | Bisacodil  |
| D              | Strophantin  |
| E              | Progesterone   |
| №              | krok 2019  |
| Topic          | Drugs acting on the CNS. Non-steroidal anti-inflammatory agents.   |
| Task           | The patient, who suffers from rheumatoid arthritis and concomitant duodenal ulcer should be prescribed a non-steroidal anti-inflammatory drug. What drug is most suitable in this case?            |
| Correct answer | Celecoxib  |
| B              | Diclofenac sodium  |
| C              | Acetylsalicylic acid   |
| D              | Metamizole   |
| E              | Paracetamol  |
| №              | krok 2019  |
| Topic          | General pharmacology. Pharmacokinetics.  |
| Task           | There are certain patterns of chemical and biological processes occurring with the drug in the body. Reduced absorption of tetracycline when it is co-administered with antacids is an example of: |
| Correct answer | Pharmacokinetic incompatibility  |
| B              | Pharmacodynamic incompatibility  |
| C              | Pharmaceutical incompatibility   |
| D              | Synergism  |
| E              | Functional antagonism  |
| №              | krok 2019  |
| Topic          | Drugs acting on metabolism, blood and immunity. Pharmacology of fat-soluble vitamins.  |

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| Task           | A 21-year-old patient during routine examination by an ophthalmologist was diagnosed with a visual impairment - generalopia ("night blindness"). What drug should she be prescribed to reduce the signs of this condition? |
| Correct answer | Retinol acetate  |
| B              | Cholecalciferol  |
| C              | Ergocalciferol   |
| D              | Nitroglycerin  |
| E              | Chloropyramine   |
| №              | krok 2019  |
| Topic          | Drugs acting on the CNS. Neuroleptics. Tranquilisers. Psychosedative preparations.   |
| Task           | An anxiolytic agent, a benzodiazepine derivative, was prescribed to a patient with a neurosis in order to reduce its signs. What medicine belongs to this group of drugs?  |
| Correct answer | Diazepam   |
| B              | Nandrolone   |
| C              | Piroxicam  |
| D              | Trihexyphenidyl  |
| E              | Atropine sulphate  |
| №              | krok 2021  |
| Topic          | Antimicrobial and antiparasitic drugs.   |
| Task           | A 40-year-old man was prescribed antibiotics as a part of the complex therapy for peptic ulcer disease of the stomach. Which of the following combinations is indicated in this case?                                      |
| Correct answer | Amoxicillin + clarithromycin   |
| B              | Oxacillin + nalidixic acid   |
| C              | Levomecetin (chloramphenicol) + ampicillin   |
| D              | Streptomycin + benzylpenicillin  |
| E              | Phenoxymethylpenicillin + lincomycin   |
| №              | krok 2021  |

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| Topic          | Drugs acting on the CNS.  |
| Task           | Name the psychostimulant with analeptical action, which is a purine derivative:   |
| Correct answer | Caffeine and sodium benzoate '  |
| B              | Medazepam   |
| C              | Sulpiride   |
| D              | Sodium bromide  |
| E              | Tramadol  |
| №              | krok 2021   |
| Topic          | Drugs acting on the CNS.  |
| Task           | A doctor has prescribed the patient a dopamine precursor for treatment of Parkinson's disease. After administration of this drug, the patient's mobility and mental processes improved and the ability to concentrate was restored. The maximum effect was observed after a month of treatment. Name this drug: |
| Correct answer | Levodopa  |
| B              | Cyclodol (Trihexyphenidyl)  |
| C              | Midantan (Amantadine)   |
| D              | Bromocriptine   |
| E              | Selegiline  |
| №              | krok 2021   |
| Topic          | Drugs acting on metabolism, blood and immunity.   |
| Task           | A nurse asks, what drug has a hypoglycemic effect because it stimulates pancreatic beta-cells. What will you answer?  |
| Correct answer | Glibenclamide   |
| B              | Retabolil (Nandrolone)  |
| C              | Prednisolone  |
| D              | Heparin   |
| E              | Adrenaline hydrochloride (Epinephrine)  |

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| №              | krok 2021  |
| Topic          | Drugs acting on the CNS.   |
| Task           | Among NSAIDs, the least damaging effect on the gastrointestinal mucosa is characteristic of:   |
| Correct answer | Celecoxib  |
| B              | Butadion (Phenylbutazone)  |
| C              | Acetylsalicylic acid   |
| D              | Diclofenac   |
| E              | Naproxen   |
| №              | krok 2021  |
| Topic          | Antimicrobial and antiparasitic drugs.   |
| Task           | Microscopy of a vaginal discharge detects round and oval Gram-positive cells that gemmate and form a pseudomycelium. What medicines must be recommended for treatment, if the diagnosis of candidiasis is confirmed? |
| Correct answer | Clotrimazole, nystatin   |
| B              | Erythromycin, monomycin  |
| C              | Sulgin (sulfaguanidine), phthalazol (phthalylsulfathiazole)  |
| D              | Penicillin, streptomycin   |
| E              | Tetracycline, oleandomycin   |
| №              | krok 2021  |
| Topic          | Drugs acting on the CNS.   |
| Task           | A patient in a state of psychosis was prescribed the following antipsychotic:  |
| Correct answer | Aminazine (Chlorpromazine)   |
| B              | Diazepam   |
| C              | Cyclodol (Trihexyphenidyl)   |
| D              | Phenobarbital  |
| E              | Caffeine   |
| №              | krok 2021  |

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| Topic          | Antimicrobial and antiparasitic drugs.  |
| Task           | Isoniazid is a drug with antituberculosis action. It is an anti-vitamin of:   |
| Correct answer | Nicotinic acid  |
| B              | Tocopherol  |
| C              | Riboflavin  |
| D              | Pantothenic acid  |
| E              | Ascorbic acid   |
| №              | krok 2021   |
| Topic          | Agents influencing on afferent and efferent innervations.   |
| Task           | What group of broncholytics should be ordered by the pulmonary department for treatment of patients with bronchial asthma?  |
| Correct answer | Muscarinic agonists   |
| B              | Anticholinesterase drugs  |
| C              | Beta-adrenergic antagonists   |
| D              | Beta-2-adrenergic agonists  |
| E              | Nicotinic agonists  |
| №              | krok 2021   |
| Topic          | Drugs acting on the CNS.  |
| Task           | A narcological department has received a man diagnosed with morphinism. The doctor notes decreased pharmacological activity of morphine. Name the phenomenon, when drug effectiveness is decreased after its repeated administration: |
| Correct answer | Tolerance   |
| B              | Summation   |
| C              | Material cumulation   |
| D              | Antagonism  |
| E              | Functional cumulation   |

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| №              | krok 2021  |
| Topic          | Agents influencing on afferent and efferent innervations.  |
| Task           | What mucolytic agent would you recommend for a patient with acute bronchitis to facilitate expectoration?  |
| Correct answer | Acetylcysteine   |
| B              | Glaucine   |
| C              | Codeine  |
| D              | Hydrocodonc  |
| E              | Libexin (Prenoxdiazine)  |
| №              | krok 2021  |
| Topic          | Drugs acting on the CNS.   |
| Task           | After a stress, a woman has problems sleeping. What medicine is preferable for the treatment of insomnia in this case?   |
| Correct answer | Nitrazepam   |
| B              | Barbital   |
| C              | Aminazine (Chlorpromazine)   |
| D              | Chloral hydrate  |
| E              | Phenobarbital  |
| №              | krok 2021  |
| Topic          | Drugs acting on cardiovascular system.   |
| Task           | A man developed a hypertensive crisis. He received an intravenous injection of a drug that caused a short-term increase in pressure, which then decreased. What drug was used? |
| Correct answer | Clophelin (Clonidine)  |
| B              | Enalapril  |
| C              | Nitroglycerine   |
| D              | Nifedipine   |
| E              | Anaprilin (Propranolol)  |

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| №              | krok 2021  |
| Topic          | Drugs acting on cardiovascular system.   |
| Task           | A man with essential hypertension takes diuretics as prescribed by a doctor. What imbalances of water-salt metabolism can develop in this case?  |
| Correct answer | Hypokalemia  |
| B              | Hypercalcemia  |
| C              | Hypernatremia  |
| D              | Hyperkalemia   |
| E              | Hypoglycemia   |
| №              | krok 2021  |
| Topic          | Drugs acting on metabolism, blood and immunity.  |
| Task           | A woman came to a pediatrician complaining of deteriorating condition of her child. The disorder manifests in enlarged fontanelle, a delay in tooth eruption, and bone deformation. What medicine must be prescribed first in this case? |
| Correct answer | Cholecalciferol  |
| B              | Thiamine bromide   |
| C              | Cyanocobalamin   |
| D              | Allopurinol  |
| E              | Proserin (Neostigmine)   |
| №              | krok 2021  |
| Topic          | Antimicrobial and antiparasitic drugs.   |
| Task           | For burn treatment, a man was prescribed a 2% antiseptic solution that produces manganese dioxide, when in contact with tissues, and has astringent and anti-inflammatory effect. Name this antiseptic:                                  |
| Correct answer | Potassium permanganate   |
| B              | Lugol solution   |
| C              | Brilliant green  |

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| D              | Phenol  |
| E              | Hydrogen peroxide   |
| №              | krok 2021   |
| Topic          | Antimicrobial and antiparasitic drugs.  |
| Task           | What antibiotic is used for treatment of syphilis?  |
| Correct answer | Benzylpenicillin  |
| B              | Amphotericin  |
| C              | Nystatin  |
| D              | Streptomycin  |
| E              | Kanamycin   |
| №              | krok 2021   |
| Topic          | Agents influencing on afferent and efferent innervations.   |
| Task           | A man suffers from cholelithiasis. What medicine should he be prescribed for biliary colic relief?  |
| Correct answer | Magnesium sulfate   |
| B              | Pancreatin  |
| C              | Bisacodyl   |
| D              | Contrykal (Aprotinin)   |
| E              | Almagel (Algedrate + magnesium hydroxide)   |
| №              | krok 2021   |
| Topic          | Agents influencing on afferent and efferent innervations.   |
| Task           | A 35-year-old woman came to a pharmacy to buy a drug for relief from a dry hacking cough. Which of the following drugs is indicated in this case? |
| Correct answer | Ambroxol  |
| B              | Libexin (Prenoxdiazine)   |
| C              | Mucaltin ( <i>Althaeae officinalis</i> extract)   |
| D              | Amoxicillin   |

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| E              |  |
| №              | krok 2021  |
| Topic          | Antimicrobial and antiparasitic drugs.   |
| Task           | A man with Trichomonas urethritis was prescribed an imidazole derivative for treatment. Name this drug:  |
| Correct answer | Metronidazole  |
| B              | Nitroxoline  |
| C              | Furacilin (Nitrofurantoin)   |
| D              | Ciprofloxacin  |
| E              | Azithromycin   |
| №              | krok 2021  |
| Topic          | General pharmacology. Pharmacokinetics. Pharmacodynamics.  |
| Task           | During a surgery with application of tubocurarine as a muscle relaxant, the patient developed a respiratory disturbance. The disturbance was eliminated after the patient was given proserin (neostigmine). What term can be used to describe the interaction between these two drugs? |
| Correct answer | Antagonism   |
| B              | Tachyphylaxis  |
| C              | Incompatibility  |
| D              | Cumulation   |
| E              | Synergism  |
| №              | krok 2021  |
| Topic          | Drugs acting on cardiovascular system.   |
| Task           | If there is no strophanthin in the pharmacy stock, the following cardiac glycoside can be used as its substitute:  |
| Correct answer | Corglycon (Convallatoxin)  |
| B              | Digitoxin  |
| C              | Adonisid ( <i>Adonis vernalis</i> glycosides)  |

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| D              | Izolanid (Lanatoside C)   |
| E              |   |
| №              | krok 2021   |
| Topic          | Drugs acting on metabolism, blood and immunity.   |
| Task           | After being stung by bees, the patient developed a Quincke's edema. What drug should the patient be urgently administered for a relief of this condition? |
| Correct answer | Adrenaline hydrochloride (Epinephrine)  |
| B              | Anaprilin (Propranolol)   |
| C              | Atropine sulfate  |
| D              | Platyphylline hydrotartrate   |
| E              | Sodium chloride   |