

THEMATIC PLAN
of lecture classes on the academic discipline
'Radiation and ecological medicine' for the students of the 2nd course
medical faculty, medical-diagnostic faculty and FIS.
2023-2024 academic year

Name of topics, content of lectures
Section 1 'Ecological medicine' 4 semester
<p>1. Methodological foundations of environmental medicine</p> <p>1. Ecological medicine (environmental medicine): concept, goals, objectives. The concept of 'environmental diseases'.</p> <p>2. Methods of studying the influence of environmental conditions on public health. Contribution of various factors and possible mechanisms of development of environmentally dependent diseases.</p> <p>3. Environmentally dependent pathology.</p> <p>4. Peculiarities of approach to diagnostics, treatment and prevention of diseases from the point of view of ecological medicine.</p>
<p>2. Medical and ecological consequences of atmospheric pollution</p> <p>1. Structure, properties and functions of the atmosphere. Natural and anthropogenic sources of atmospheric pollution.</p> <p>2. Medical consequences of atmospheric pollution.</p> <p>3. 'Greenhouse effect, smogs: concept, causes of development. Ecological and medical consequences of global temperature rise on the planet.</p> <p>4. Regulatory and legal support in the field of atmospheric air protection.</p>
<p>3. Medical and ecological consequences of pollution of the hydrosphere</p> <p>1. Structure, properties and functions of the hydrosphere. Global consequences of water pollution.</p> <p>2. Medico-biological consequences of pollution of the waters of the world ocean.</p> <p>3. Eutrophication of water bodies: concept, causes of development, consequences.</p> <p>4. Characteristics and peculiarities of xenobiotics entering the human body with water, including the peculiarities of neurotoxicity and nephrotoxicity.</p> <p>5. Regulatory and legal support in the field of water resources protection</p>
<p>4. Medical and ecological consequences of lithospheric pollution</p> <p>1. Chemical composition of the Earth's crust. Biogeochemical provinces.</p> <p>2. Endemic pathologies in the Republic of Belarus.</p> <p>3. Iodine deficiency disorders in the population of the Republic. Conditions and factors contributing to the formation of endemic goitre. Diagnosis, non-specific and specific prophylaxis of endemic goitre. Side effects of specific iodine prophylaxis. Medical control of iodine prophylaxis effectiveness.</p> <p>4. Microelementoses. Endemic diseases. Types and sources of lithosphere pollution. Detoxification of xenobiotics.</p> <p>5. Regulatory and legal support in the field of protection of land fund and food quality.</p>
<p>5. Environmental monitoring and public health</p>

1. Types of environmental monitoring. Importance of environmental monitoring.
2. Monitoring of the state of public health. Public health.
3. Organisational model of the SHM system. Social and hygienic monitoring and its importance in preservation and promotion of public health.
4. Normative-legal and methodological support of socio-hygienic monitoring.

Заведующий кафедрой
02.02.2024

В.Н. Бортниковский