Faculty: medical

# MINISTRY OF HEALTH OF UKRAINE ODESSA NATIONAL MEDICAL UNIVERSITY

(faculty name)
Department of pediatrics №1
(name of department)
APPROVE
Acting pro-rector for scientific and educational work
prof Svitlana KOTIUZHYNSKA
"2022 y
METHODICAL RECOMMENDATION OF THE SEMINAR LESSON FROM THE SELECTIVE EDUCATIONAL DISCIPLINE  Faculty medical, course 5
Selective educational discipline: "Critical conditions in pediatric endocrinology"
(name of academic discipline)
Seminar class №4_ Topic: Critical conditions in diabetes mellitus
(topic name)  Approve:  Meeting of the Department of Pediatrics №1
Odessa national medical university
Protocol № _1 of "29_"08 2022 y
Head of the department (Mykola ARYAYEV)
(signature) (name, surname)

Department of pediatrics № 1, Odessa National Medical University

Elective educational discipline «Critical conditions in pediatric endocrinology».

### Developers:

(indicate surnames, scientific degrees, scientific titles and positions of developers; everyone who teaches the specified academic discipline must be among the developers)

## Developers:

Prof. Mykola ARYAYEV as. of prof. PhD Ludmila SENKIVSKA, Irina TALASHOVA, Daria USENKO

(name of academic discipline)

*Note*. In the case of publication of methodological developments as an independent printed work, the academic council of the faculty provides a recommendation for publication in the presence of two reviews, one of which is external — from a reviewer of another institution of higher education.

#### Department of pediatrics № 1, Odessa National Medical University

Elective educational discipline «Critical conditions in pediatric endocrinology».

#### Seminar lesson № 4\_\_\_\_

#### Critical conditions in diabetes mellitus.

**Meta:** Improvement knowledge on the diagnosis and emergency care children with acute complications of diabetes mellitus.

**Basic concepts:** Diabetic ketoacidosis. Hypoglycemic coma. Hyperosmolar coma. Hyperlactacidemic coma.

**Equipment:** 

**Study time:** 2 hours

#### Plan

- I. Organizational measures (greetings, checking those present, announcing the topic, the purpose of the lesson, motivating applicants to study the topic).
- II. Control of basic knowledge (frontal survey on basic terminology)

Questions to check basic knowledge on the topic of the seminar:

- 1. Factors in the development of complications in diabetes in children.
- 2. Differential diagnosis of acute complications of diabetes in children.
- 3. Clinical diagnostic criteria of diabetic ketoacidosis.
- 4. Clinical diagnostic criteria of hypoglycemic coma in children.
- 5. Clinical diagnostic criteria of hyperosmolar coma in children.
- 6. Clinical diagnostic criteria of hyperlactacidemic coma in children.

#### III. Discussion of theoretical issues:

- 1. Algorithms for providing emergency care for diabetic ketoacidosis in children.
- 2. Algorithms for providing emergency care for hypoglycemic coma in children.
- 3. Algorithms for providing emergency care for hyperosmolar coma in children.
- 4. Algorithms for providing emergency care for hyperlactacidemic coma in children.

Discussion of theoretical issues can take place in the form of role-playing, answers to questions, debates, discussions, presentations with reports, abstracts, discussion of reports and abstracts, review of applicant answers, etc.)

#### Topics of role play/reports/abstracts

- 1. Features of diagnosis and provision of emergency care for diabetic ketoacidosis in children (role play).
- 2. Features of diagnosis and provision of emergency care in hypoglycemic coma in children (role play).
- 3. Features of diagnosis and provision of emergency care for hyperosmolar coma in children. (role play).
- 4. Features of diagnosis and provision of emergency care for hyperlactacidemic coma in children. (role play).

When preparing a report, role-play, analytical review, etc., applicants can, along with this, prepare didactic visual aids in the form of tables, code diagrams, slides, drawings, portraits of famous specialists, drugs, etc.).

IV. Summing up

#### Basic:

1. **Nelson textbook** of pediatrics, 2 volume set. **Edition**: **21**st, 2019. PDF format. http://pediacalls.com/e-books/nelson-textbook-of-pediatrics-21st-edition/

**Recommended literature** 

- 2. Pediatrics. Differential diagnosis. Urgent conditions edited by Aryaeva ML, Kotova NV, electronic edition on CD.
- 3. Pediatrics. Differential diagnosis. Emergencies. ML Aryaev, NV Kotova, OO Zelinsky [etc.]; edited by Aryaeva ML, Kotova NV Odessa: ONMedU. 2017. 280 p.
- 4. Pediatrics Textbook in two volumes, ed. ML Aryaeva, NV Kotova. Vol.1. Neonatology. Hematology. Endocrinology. Odessa .: ONMedU. 2014. 155 p.

#### Additional:

1. EMERGENCY MEDICAL CARE: NEW CLINICAL PROTOCOL ( ORDER OF THE MOH OF UKRAINE OF 05.06.2019, №1269 ) .