



# INTEGRATED ACADEMIC STUDIES OF MEDICINE

**FIFTH YEAR OF STUDIES**

School year 2025/2026.

**Surgical pathology**

Subject:

# **SURGICAL PATHOLOGY**

The course is evaluated with 3 ECTS. There are 3 hours of active classes per week (2 hours of lectures, 1 hour of work in a small group).

## TEACHERS AND ASSOCIATES:

|    | Name and surname | Email                    | Vocation            |
|----|------------------|--------------------------|---------------------|
| 1. | Milena Vuletic   | milena.vuletic@gmail.com | Assistant professor |
| 2. | Milena Ilic      | lena.ilic@gmail.com      | Assistant professor |

## COURSE STRUCTURE:

|   | The name of the segment | weeks | Lectures weekly | Work in a small group per week | Teacher - head of the segment |
|---|-------------------------|-------|-----------------|--------------------------------|-------------------------------|
| 1 | Tumor diagnosis         | 15    | 2               | 1                              | Asst. Prof. Milena Vuletic    |

# EVALUATION:

By fulfilling the pre-examination obligations and passing the final exam, the student can achieve a maximum of 100 points. The final grade is formed on the basis of the number of points gained in the following ways:

## PRE-EXAM ACTIVITIES

In this way, the student can acquire up to 30 points; in a special part of the work in a small group, answers two exam questions from that week of classes and receives 0-2 points in accordance with the demonstrated knowledge.

## FINAL EXAM

The final exam is organized as a final test. In this way, a student can earn up to 70 points. The test consists of 35 questions. Each question is worth 2 points. If the student achieves 36 or more points on the test, the final exam has been passed. A student has the right to take the final test if he has achieved more than 50% points in the pre-exam activities. Postponed passing of the final test (in the following exam periods) does not reduce the number of points is defined by the final grade.

| MAXIMUM POINTS |                       |      |          |
|----------------|-----------------------|------|----------|
|                | Activity during class | Test | $\Sigma$ |
| POINTS         | 30                    | 70   | 100      |

## The final grade is formed as follows

In order to pass the course, the student must obtain a minimum of 51 points in the pre-exam activities and in the final exam. In order to pass the exam, the student must:

1. Obtain more than 50% points in each form of activity (class activity)
2. Pass the final exam (test), i.e. have more than 50% correct answers.

| the number of points | grade |
|----------------------|-------|
| 0 - 50               | 5     |
| 51 - 60              | 6     |
| 61 - 70              | 7     |
| 71 - 80              | 8     |
| 81 - 90              | 9     |
| 91 - 100             | 10    |

## **FINAL GRADE**

**Activity in class**  
**0-30 POINTS**

### **EVALUATION OF ACTIVITIES**

2 questions each week

Each question is worth 0-2 points

**Test**  
**0-70 POINTS**

### **EVALUATION OF THE TEST**

The test has 35 questions

Each question is worth 2 points

## LITERATURE:

| BOOK TITLE                                                    | THE AUTHOR                 | PUBLISHER                     | THE LIBRARY |
|---------------------------------------------------------------|----------------------------|-------------------------------|-------------|
| Diagnostic histopathology of tumors. Fourth Edition/Volume 1. | Christopher D. M. Fletcher | Elsevier, Philadelphia. 2013. | X           |
| Diagnostic Surgical Pathology, 7 <sup>th</sup> Edition        | Mills and Sternberg        | Wolters Kluwer, 2022          | X           |
| Surgical Pathology. 11th Edition, Volume 2                    | Rosai and Ackerman         | Elsevier, Philadelphia. 2017. | X           |

## THE PROGRAM:

### TEACHING UNIT 1 (FIRST WEEK):

| DIAGNOSIS OF HEART TUMORS                                                                                                          |                                                                                      |
|------------------------------------------------------------------------------------------------------------------------------------|--------------------------------------------------------------------------------------|
| lectures 2 hours                                                                                                                   | practical teaching 1 hour                                                            |
| Cytopathological, histopathological, histochemical and immunohistochemical diagnosis of heart tumors, pericardium, vascular tumors | Light-microscopic analysis of histological preparations of individual tumor entities |

### TEACHING UNIT 2 (SECOND WEEK):

| DIAGNOSIS OF TUMORS OF THE LUNGS AND PLEURA                                                                     |                                                                                      |
|-----------------------------------------------------------------------------------------------------------------|--------------------------------------------------------------------------------------|
| lectures 2 hours                                                                                                | practical teaching 1 hour                                                            |
| Cytopathological, histopathological, histochemical and immunohistochemical diagnosis of lung and pleural tumors | Light-microscopic analysis of histological preparations of individual tumor entities |

### TEACHING UNIT 3 (THIRD WEEK):

| DIAGNOSIS OF TUMORS OF THE ORAL CAVITY AND SALIVARY GLANDS                                                                            |                                                                                      |
|---------------------------------------------------------------------------------------------------------------------------------------|--------------------------------------------------------------------------------------|
| lectures 2 hours                                                                                                                      | practical teaching 1 hour                                                            |
| Cytopathological, histopathological, histochemical and immunohistochemical diagnosis of tumors of the oral cavity and salivary glands | Light-microscopic analysis of histological preparations of individual tumor entities |

### TEACHING UNIT 4 (FOURTH WEEK):

| DIAGNOSIS OF ESOPHAGUS AND STOMACH TUMORS                                                                                   |                                                                                      |
|-----------------------------------------------------------------------------------------------------------------------------|--------------------------------------------------------------------------------------|
| lectures 2 hours                                                                                                            | practical teaching 1 hour                                                            |
| Cytopathological, histopathological, histochemical and immunohistochemical diagnosis of tumors of the esophagus and stomach | Light-microscopic analysis of histological preparations of individual tumor entities |

TEACHING UNIT 5 (FIFTH WEEK):

| <b>DIAGNOSIS OF TUMORS OF THE SMALL INTESTINE, COLON AND ANAL TRACT</b>                                                                               |                                                                                      |
|-------------------------------------------------------------------------------------------------------------------------------------------------------|--------------------------------------------------------------------------------------|
| <b>lectures 2 hours</b>                                                                                                                               | <b>practical teaching 1 hour</b>                                                     |
| Cytopathological, histopathological, histochemical and immunohistochemical diagnosis of tumors of the small intestine, large intestine and anal tract | Light-microscopic analysis of histological preparations of individual tumor entities |

TEACHING UNIT 6 (SIXTH WEEK):

| <b>DIAGNOSIS OF LIVER, GALLBLADDER AND BILE TRACT TUMORS</b>                                                                             |                                                                                      |
|------------------------------------------------------------------------------------------------------------------------------------------|--------------------------------------------------------------------------------------|
| <b>lectures 2 hours</b>                                                                                                                  | <b>practical teaching 1 hour</b>                                                     |
| Cytopathological, histopathological, histochemical and immunohistochemical diagnosis of tumors of the liver, gall bladder and bile ducts | Light-microscopic analysis of histological preparations of individual tumor entities |

TEACHING UNIT 7 (SEVENTH WEEK)

| <b>DIAGNOSIS OF TUMORS OF THE EXOCRINE PANCREAS AND PERITONEUM</b>                                                                     |                                                                                      |
|----------------------------------------------------------------------------------------------------------------------------------------|--------------------------------------------------------------------------------------|
| <b>lectures 2 hours</b>                                                                                                                | <b>practical teaching 1 hour</b>                                                     |
| Cytopathological, histopathological, histochemical and immunohistochemical diagnosis of tumors of the exocrine pancreas and peritoneum | Light-microscopic analysis of histological preparations of individual tumor entities |

TEACHING UNIT 8 (EIGHT WEEK):

| <b>DIAGNOSIS OF TUMORS OF THE THYROID GLAND AND PARATHYROID GLAND</b>                                                  |                                                                                      |
|------------------------------------------------------------------------------------------------------------------------|--------------------------------------------------------------------------------------|
| <b>lectures 2 hours</b>                                                                                                | <b>practical teaching 1 hour</b>                                                     |
| Cytopathological, histopathological, histochemical and immunohistochemical diagnosis of thyroid and parathyroid tumors | Light-microscopic analysis of histological preparations of individual tumor entities |

TEACHING UNIT 9 (NINTH WEEK):

| <b>DIAGNOSIS OF ADRENAL GLAND AND PITUITARY TUMOR</b>                                                                                   |                                                                                  |
|-----------------------------------------------------------------------------------------------------------------------------------------|----------------------------------------------------------------------------------|
| <b>lectures 2 hours</b>                                                                                                                 | <b>practical teaching 1 hour</b>                                                 |
| Cytopathological, histopathological, histochemical and immunohistochemical diagnosis of tumors of the adrenal gland and pituitary gland | Светлосномикроскопска анализа хистолошких препарата појединих туморских ентитета |

TEACHING UNIT 10 (TENTH WEEK):

| <b>DIAGNOSIS OF TUMORS OF THE ENDOCRINE PANCREAS</b>                                                                     |                                                                                      |
|--------------------------------------------------------------------------------------------------------------------------|--------------------------------------------------------------------------------------|
| <b>lectures 2 hours</b>                                                                                                  | <b>practical teaching 1 hour</b>                                                     |
| Cytopathological, histopathological, histochemical and immunohistochemical diagnosis of tumors of the endocrine pancreas | Light-microscopic analysis of histological preparations of individual tumor entities |



TEACHING UNIT 11 (ELEVENTH WEEK):

| <b>BREAST TUMOR DIAGNOSIS</b>                                                                         |                                                                                      |
|-------------------------------------------------------------------------------------------------------|--------------------------------------------------------------------------------------|
| <b>lectures 2 hours</b>                                                                               | <b>practical teaching 1 hour</b>                                                     |
| Cytopathological, histopathological, histochemical and immunohistochemical diagnosis of breast tumors | Light-microscopic analysis of histological preparations of individual tumor entities |

TEACHING UNIT 12 (TWELFTH WEEK):

| <b>DIAGNOSIS OF TUMORS OF THE LYMPHORETICULAR AND HEMATOPOEIOUS SYSTEM, SPLEEN AND THYMUS</b>                                                                     |                                                                                      |
|-------------------------------------------------------------------------------------------------------------------------------------------------------------------|--------------------------------------------------------------------------------------|
| <b>lectures 2 hours</b>                                                                                                                                           | <b>practical teaching 1 hour</b>                                                     |
| Cytopathological, histopathological, histochemical and immunohistochemical diagnosis of tumors of the lymphoreticular and hematopoietic system, spleen and thymus | Light-microscopic analysis of histological preparations of individual tumor entities |

TEACHING UNIT 13 (WEEK THIRTEEN):

| <b>DIAGNOSIS OF TUMORS OF THE MALE AND FEMALE GENITAL TRACT</b>                                                                     |                                                                                      |
|-------------------------------------------------------------------------------------------------------------------------------------|--------------------------------------------------------------------------------------|
| <b>lectures 2 hours</b>                                                                                                             | <b>practical teaching 1 hour</b>                                                     |
| Cytopathological, histopathological, histochemical and immunohistochemical diagnosis of tumors of the male and female genital tract | Light-microscopic analysis of histological preparations of individual tumor entities |

TEACHING UNIT 14 (FOURTEENTH WEEK):

| <b>SKIN TUMOR DIAGNOSIS</b>                                                                         |                                                                                      |
|-----------------------------------------------------------------------------------------------------|--------------------------------------------------------------------------------------|
| <b>lectures 2 hours</b>                                                                             | <b>practical teaching 1 hour</b>                                                     |
| Cytopathological, histopathological, histochemical and immunohistochemical diagnosis of skin tumors | Light-microscopic analysis of histological preparations of individual tumor entities |

TEACHING UNIT 15 (FIFTEENTH WEEK):

| <b>DIAGNOSIS OF TUMORS OF SOFT TISSUES, OSTEOARTICULAR SYSTEM, CENTRAL, AUTONOMIC, PERIPHERAL SYSTEM AND NEUROECTODERMAL TUMORS</b>                                                                 |                                                                                      |
|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|--------------------------------------------------------------------------------------|
| <b>lectures 2 hours</b>                                                                                                                                                                             | <b>practical teaching 1 hour</b>                                                     |
| Cytopathological, histopathological, histochemical and immunohistochemical diagnosis of soft tissue tumors, osteoarticular system, central, autonomic, peripheral system and neuroectodermal tumors | Light-microscopic analysis of histological preparations of individual tumor entities |

## LESSON SCHEDULE FOR SURGICAL PATHOLOGY

| week | type     | method unit name                                                                     | a teacher |
|------|----------|--------------------------------------------------------------------------------------|-----------|
| 1    | <b>L</b> | <b>DIAGNOSIS OF HEART TUMORS</b>                                                     |           |
| 1    | <b>P</b> | Light-microscopic analysis of histological preparations of individual tumor entities |           |
| 2    | <b>L</b> | <b>DIAGNOSIS OF TUMORS OF THE LUNGS AND PLEURA</b>                                   |           |
| 2    | <b>P</b> | Light-microscopic analysis of histological preparations of individual tumor entities |           |
| 3    | <b>L</b> | <b>DIAGNOSIS OF TUMORS OF THE ORAL CAVITY AND SALIVARY GLANDS</b>                    |           |
| 3    | <b>P</b> | Light-microscopic analysis of histological preparations of individual tumor entities |           |
| 4    | <b>L</b> | <b>DIAGNOSIS OF ESOPHAGUS AND STOMACH TUMORS</b>                                     |           |
| 4    | <b>P</b> | Light-microscopic analysis of histological preparations of individual tumor entities |           |
| 5    | <b>L</b> | <b>DIAGNOSIS OF TUMORS OF THE SMALL INTESTINE, COLON AND ANAL TRACT</b>              |           |
| 5    | <b>P</b> | Light-microscopic analysis of histological preparations of individual tumor entities |           |
| 6    | <b>L</b> | <b>DIAGNOSIS OF LIVER, GALLBLADDER AND BILE TRACT TUMORS</b>                         |           |
| 6    | <b>P</b> | Light-microscopic analysis of histological preparations of individual tumor entities |           |

## LESSON SCHEDULE FOR SURGICAL PATHOLOGY

| week | type     | method unit name                                                                              | a teacher |
|------|----------|-----------------------------------------------------------------------------------------------|-----------|
| 7    | <b>L</b> | <b>DIAGNOSIS OF TUMORS OF THE EXOCRINE PANCREAS AND PERITONEUM</b>                            |           |
| 7    | <b>P</b> | Light-microscopic analysis of histological preparations of individual tumor entities          |           |
| 8    | <b>L</b> | <b>DIAGNOSIS OF TUMORS OF THE THYROID GLAND AND PARATHYROID GLAND</b>                         |           |
| 8    | <b>P</b> | Light-microscopic analysis of histological preparations of individual tumor entities          |           |
| 9    | <b>L</b> | <b>DIAGNOSIS OF ADRENAL GLAND AND PITUITARY TUMOR</b>                                         |           |
| 9    | <b>P</b> | Light-microscopic analysis of histological preparations of individual tumor entities          |           |
| 10   | <b>L</b> | <b>DIAGNOSIS OF TUMORS OF THE ENDOCRINE PANCREAS</b>                                          |           |
| 10   | <b>P</b> | Light-microscopic analysis of histological preparations of individual tumor entities          |           |
| 11   | <b>L</b> | <b>BREAST TUMOR DIAGNOSIS</b>                                                                 |           |
| 11   | <b>P</b> | Light-microscopic analysis of histological preparations of individual tumor entities          |           |
| 12   | <b>L</b> | <b>DIAGNOSIS OF TUMORS OF THE LYMPHORETICULAR AND HEMATOPOEIOUS SYSTEM, SPLEEN AND THYMUS</b> |           |
| 12   | <b>P</b> | Light-microscopic analysis of histological preparations of individual tumor entities          |           |

## LESSON SCHEDULE FOR SURGICAL PATHOLOGY

| week | type     | method unit name                                                                                                                    | a teacher |
|------|----------|-------------------------------------------------------------------------------------------------------------------------------------|-----------|
| 13   | <b>L</b> | <b>DIAGNOSIS OF TUMORS OF THE MALE AND FEMALE GENITAL TRACT</b>                                                                     |           |
| 13   | <b>P</b> | Light-microscopic analysis of histological preparations of individual tumor entities                                                |           |
| 14   | <b>L</b> | <b>SKIN TUMOR DIAGNOSIS</b>                                                                                                         |           |
| 14   | <b>P</b> | Light-microscopic analysis of histological preparations of individual tumor entities                                                |           |
| 15   | <b>L</b> | <b>DIAGNOSIS OF TUMORS OF SOFT TISSUES, OSTEOARTICULAR SYSTEM, CENTRAL, AUTONOMIC, PERIPHERAL SYSTEM AND NEUROECTODERMAL TUMORS</b> |           |
| 15   | <b>P</b> | Light-microscopic analysis of histological preparations of individual tumor entities                                                |           |
|      |          | <b>EXAM (MARCH-APRIL TERM)</b>                                                                                                      |           |