

## Academic Program Description Form

University Name: Al-Furat Al-Awsat Technical University

Faculty/Institute: Babylon Technical Institute

Scientific Department: Department of Community Health Technologies


Academic or Professional Program Name: Community Health Technical

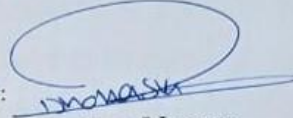
Final Certificate Name: Technical Diploma in Community Health

Academic System: Semester system

Description Preparation Date: 8-2-2024

File Completion Date: 22/2/2024


Signature:   
Head of Department Name:  
Enas Abbas Khairallah  
Date:

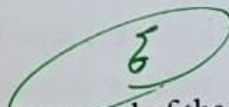
Signature:   
Scientific Associate Name:  
Oras Khudair Abbas  
Date:

The file is checked by:  
Department of Quality Assurance and University Performance  
Director of the Quality Assurance and University Performance Department:

Khansa Azeez Obayes

Date: 

Signature: 

  
Approval of the Dean

## Approval of the Dean

### 1. Program Vision

The Department of Community Health Technologies is a branch of medical sciences that provides experienced cadres for health care for the individual and society, in addition to education to create a healthy environment for the individual and society. Graduates of the department serve all groups and segments of society by providing primary, secondary and tertiary health care and education against pathological and environmental causes of health deterioration. Inspection and oversight to reveal the suitability of human-consumed materials, limit the development of the factors that lead to health deterioration, care for people with special disabilities and chronic diseases, and provide the necessary aid to bring them to safety. All of this is achieved by using updated learning techniques that keep pace with scientific development, the sober practical aspect, and competent teaching experiences.

### 2. Program Mission

The mission of the Community Health Department is to create a conscious and health-educated generation capable of containing crises and finding immediate and long-term solutions to create a safe, healthy environment, and to provide the health sectors with cadres trained to provide health care at all levels.

### 3. Program Objectives

The department aims to graduate technical professionals working in the fields of health, occupational safety, inspection, and public health oversight.

Assistance in implementing health monitoring programmes, health awareness campaigns and medical assistance in the countryside

Diagnostic programs implemented in health centers.

#### 4. Program Accreditation

The program has not received accreditation

#### 5. Other external influences

Department graduates serve the community in health institutions

#### 6. Program Structure

| Program Structure        | Number of Courses | Credit hours | Percentage | Reviews*      |
|--------------------------|-------------------|--------------|------------|---------------|
| Institution Requirements | 1                 | 2            | 1.35%      |               |
| College Requirements     | 4                 | 10           | 6.7%       |               |
| Department Requirements  | 28                | 136          | 91.89      |               |
| Summer Training          | -----             | -----        | -----      | Interpolation |
| Other                    |                   |              |            |               |

\* This can include notes whether the course is basic or optional.

#### 7. Program Description

##### The first stage/first semester

| Year/Level      | Course Code | Course Name                 | Credit Hours |           |
|-----------------|-------------|-----------------------------|--------------|-----------|
|                 |             |                             | theoretical  | practical |
| The first stage | COM         | Principles Community Health | 2            | 3         |
| The first stage | FNF1        | Fundamentals of Nursing1    | 2            | 3         |
| The first stage | ANA1        | General Anatomy1\)          | 2            | 2         |
| The first stage | PHY1        | Physiology                  | 2            | 3         |

| The first stage                     | MIC1        | Medical Microbiology1        | 2            | 3         |
|-------------------------------------|-------------|------------------------------|--------------|-----------|
| The first stage                     | BIOS1       | Biostatic1                   | 2            |           |
| The first stage                     | BIOC1       | Clinical Chemistry1          | 1            | 3         |
| The first stage                     | CA1         | Computer Applications (1)    | 1            | 2         |
| The first stage                     | HRD         | Human Rights & Democratic    | 2            |           |
| <b>First stage/second semester</b>  |             |                              |              |           |
| Year/Level                          | Course Code | Course Name                  | Credit Hours |           |
|                                     |             |                              | theoretical  | practical |
| The first stage                     | COM         | Principles Community Health2 | 2            | 3         |
| The first stage                     | FNF1        | Fundamentals of Nursing2     | 2            | 3         |
| The first stage                     | ANA1        | General Anatomy2\1           | 2            | 2         |
| The first stage                     | PHY1        | Physiology2                  | 2            | 3         |
| The first stage                     | MIC1        | Medical Microbiology2        | 2            | 3         |
| The first stage                     | BIOS1       | Biostatic2                   | 2            |           |
| The first stage                     | BIOC1       | Clinical Chemistry2          | 1            | 3         |
| The first stage                     | CA1         | Computer Applications 2      | 1            | 2         |
| The first stage                     |             | English Language             | 2            |           |
| <b>Second stage/first semester</b>  |             |                              |              |           |
| Year/Level                          | Course Code | Course Name                  | Credit Hours |           |
|                                     |             |                              | theoretical  | practical |
| The Second stage                    | CH2         | Community Health             | 2            | 3         |
| The Second stage                    | HIN         | Health Inspection            | 2            | 4         |
| The Second stage                    | MS          | Medicine & Surgery           | 2            | 4         |
| The Second stage                    | HOS         | Health &Occupational Safety  | 2            | 3         |
| The Second stage                    | EPI         | Epidemiology                 | 2            | 2         |
|                                     | PHA         | Pharmacology                 | 2            | 2         |
| The Second stage                    | EH          | Environmental Health         | 2            | 2         |
| <b>Second stage/second semester</b> |             |                              |              |           |
| Year/Level                          | Course Code | Course Name                  | Credit Hours |           |
|                                     |             |                              | theoretical  | practical |

|                  |     |                             |   |   |
|------------------|-----|-----------------------------|---|---|
| The Second stage | CH2 | Community Health            | 2 | 3 |
| The Second stage | HIN | Health Inspection           | 2 | 4 |
| The Second stage | MS  | Medicine & Surgery          | 2 | 4 |
| The Second stage | HOS | Health &Occupational Safety | 2 | 3 |
| The Second stage | EPI | Epidemiology                | 2 | 2 |
| The Second stage | PHA | Pharmacology                | 2 | 2 |
| The Second stage | PRO | Proposal                    |   | 2 |
| The Second stage | PRE | Professional Ethics         | 2 |   |

| 8. Expected learning outcomes of the program |   |
|--|---|
| <b>Knowledge</b>                             |   |
| A- Cognitive objectives                      | A1- Assisting in laboratory investigation of the examined samples and their conformity with health conditions and assisting in health inspection and control teams. |
|  | A2- He has an effective role in the field of occupational health and safety and implementing primary health care programmes.  |
|  | A3- Operating and caring for used medical devices and machines used in diagnosis and treatment.   |
| <b>Skills</b>                                |   |
| Skills objectives of the programme           | B1 - Implementing medical programs such as periodic vaccinations and laboratory tests.  |
|  | B2- Skills in programs to control communicable diseases and assist the doctor in diagnosis and treatment.   |
|  | B3-Practical skill in operating and caring for laboratory equipment.  |
| <b>Ethics</b>                                |   |
| Emotional and value goals.                   | C1- Investigation and control of transmissible diseases   |
|  | C2- Implementing the schedule of periodic vaccinations for children and pregnant mothers  |
|  | C3- Assisting in treating patients and dispensing medicine to them  |

## 9. Teaching and Learning Strategies

- 1- Theoretical lecture method
- 2- Practical lecture method
- 3-Method of discussion and dialogue

## 10. Evaluation methods

- 1- Daily test
- 2- Monthly test
- 3- Semester test
- 4-Discussing monthly and quarterly research.

## 11. Faculty

### Faculty Members

| Academic Rank       | Specialization       |                                      | Special Requirements/Skills (if applicable) |  | Number of the teaching staff |          |
|---------------------|----------------------|--------------------------------------|---|--|------------------------------|----------|
|                     | General              | Special                              |   |  | Staff                        | Lecturer |
| Professor           | Biology              | Physiology                           |   |  | √                            |          |
| Professor           | Microbiology         | Parasitology                         |   |  | √                            |          |
| Assistant Professor | Plant production     | Biocontrol                           |   |  | √                            |          |
| Lecturer            | Medical microbiology | Immunology and genetics of parasites |   |  | √                            |          |
| Lecturer            | Medicine             | Clinical pharmacology                |   |  | √                            |          |

|                        |                          |                              |  |  |   |  |
|------------------------|--------------------------|------------------------------|--|--|---|--|
|                        |                          | and<br>therapeutics          |  |  |   |  |
| Lecturer               | Medical<br>microbiology  | Genetic virus<br>immunity    |  |  | √ |  |
| Lecturer               | Biology                  | Environment<br>and pollution |  |  | √ |  |
| Lecturer               | Biology                  | Zoology /<br>physiology      |  |  | √ |  |
| Lecturer               | Chemistry                | clinical<br>Chemistry        |  |  | √ |  |
| Assistant lecturer (2) | Community<br>health      | Community<br>health          |  |  | √ |  |
| Assistant lecturer     | Biology                  | Biology                      |  |  | √ |  |
| Assistant lecturer     | Medical<br>physiology    | Medical<br>physiology        |  |  | √ |  |
| Assistant lecturer     | Computer<br>science      | Information<br>systems       |  |  | √ |  |
| Assistant lecturer     | Medical<br>physiology    | Cardio<br>physiology         |  |  | √ |  |
| Assistant lecturer     | Agricultural<br>sciences | Horticulture                 |  |  | √ |  |

### **Professional Development**

#### **Mentoring new faculty members**

New members of the department are developed by holding a training course, seminars and workshops to train them on the approved work contexts

#### **Professional development of faculty members**

Faculty members are developed through holding a training course, seminars and workshops to train them on approved work contexts.

## **12. Acceptance Criterion**

**1– According to the admission plan approved by the Ministry of Higher Education and Scientific Research and according to the annual average of graduates of the sixth scientific year.**

**2– Differentiation lessons (biology + chemistry lesson) for the sixth science grade.**

## **13. The most important sources of information about the program**

1–Methodological books

2–Supporting sources

3–General sources

4– The Internet.

## **14. Program Development Plan**

One of the future plans to develop the department is to create laboratories (nursing foundations laboratory).



| Program Skills Outline |             |                                      |                   |                                    |    |    |    |        |    |    |    |        |    |    |    |
|------------------------|-------------|--------------------------------------|-------------------|------------------------------------|----|----|----|--------|----|----|----|--------|----|----|----|
|                        |             |                                      |                   | Required program Learning outcomes |    |    |    |        |    |    |    |        |    |    |    |
| Year/Level             | Course Code | Course Name                          | Basic or optional | Knowledge                          |    |    |    | Skills |    |    |    | Ethics |    |    |    |
|                        |             |                                      |                   | A1                                 | A2 | A3 | A4 | B1     | B2 | B3 | B4 | C1     | C2 | C3 | C4 |
| The first stage,       | COM         | Community Health(1)                  | Basic             |                                    | √  |    | √  | √      |    | √  |    | √      |    | √  |    |
|                        | FNF1        | Fundamentals of Nursing & first aids | Basic             | √                                  |    | √  |    | √      |    | √  |    | √      | √  |    | √  |
| The first stage,       | ANA1        | Anatomy                              | Basic             | √                                  | √  |    |    |        | √  | √  |    | √      |    | √  | √  |
|                        | PHY1        | Physiology                           | Basic             | √                                  |    | √  |    |        | √  | √  |    | √      | √  |    | √  |
|                        | MIC1        | Microbiology                         | Basic             | √                                  | √  |    | √  |        | √  | √  | √  | √      |    | √  | √  |

|                         |             |                                      |                  |   |   |  |   |  |   |   |   |   |   |   |   |
|-------------------------|-------------|--------------------------------------|------------------|---|---|--|---|--|---|---|---|---|---|---|---|
| <b>The first stage,</b> | <b>BI01</b> | <b>Biostatic</b>                     | Basic            | √ |   |  | √ |  | √ | √ | √ | √ | √ |   | √ |
| <b>The first stage,</b> | <b>BI01</b> | <b>Bio chemistry</b>                 | <b>Assistant</b> |   | √ |  | √ |  | √ | √ | √ | √ |   | √ |   |
|                         | <b>COM1</b> | <b>Computer Applications (1)</b>     | <b>Assistant</b> | √ |   |  | √ |  | √ | √ | √ | √ |   | √ |   |
| <b>The first stage,</b> | <b>HRD1</b> | <b>Human Rights &amp; Democratic</b> | <b>General</b>   |   | √ |  | √ |  | √ | √ | √ | √ |   | √ |   |
| <b>The Second stage</b> | CH2         | Community Health                     | Basic            |   | √ |  | √ |  |   |   |   | √ |   |   | √ |
|                         | HIN         | Health Inspection                    | Basic            | √ |   |  | √ |  | √ | √ |   | √ | √ | √ | √ |

|                         |     |                              |                  |   |   |   |   |   |   |   |   |   |   |   |   |
|-------------------------|-----|------------------------------|------------------|---|---|---|---|---|---|---|---|---|---|---|---|
| <b>The Second stage</b> | MS  | Medicine & Surgery           | Basic            | √ |   | √ |   | √ |   |   | √ | √ | √ |   | √ |
| <b>The Second stage</b> | HOS | Health & Occupational Safety | Basic            | √ |   | √ |   |   | √ |   |   | √ | √ | √ | √ |
|                         | EPI | Epidemiology                 | Basic            | √ |   |   |   |   | √ | √ | √ | √ |   |   |   |
| <b>The Second stage</b> | PHA | Pharmacology                 | <b>Assistant</b> | √ | √ | √ | √ | √ | √ | √ | √ | √ | √ | √ | √ |
|                         |     | Environment Health           | Basic            |   |   | √ |   | √ |   |   |   | √ | √ |   | √ |
| <b>The Second stage</b> | PRO | Proposal                     | Basic            | √ |   | √ |   |   | √ |   |   | √ | √ | √ | √ |
|                         | PRE | Professional Ethics          | <b>Assistant</b> | √ |   |   | √ |   | √ | √ | √ | √ | √ |   | √ |

Please tick the boxes corresponding to the individual program learning outcomes under evaluation. ●

## Course Description Form

|   |   |
|---|---|
| 1. Course Name: Principles of community health + community health   |   |
| 2. Course Code: COM1  |   |
| 3. Semester / Year: First semester – second semester  |   |
| 4. Description Preparation Date: 14-2-2024  |   |
| 5. Available Attendance Forms: Form of attendance: academic + practical application + on-site training (hospitals and health centers) |   |
| 6. Number of Credit Hours (Total) / Number of Units (Total): 5 hours (2 theoretical + 3 practical)                                    |   |
| 7. Course administrator's name (mention all, if more than one name)   |   |
| Name: Dr. Inas Abbas Khairallah<br>Email: inas.Khairualla@atu.edu.iq  |   |
| 8. Course Objectives  |   |
| <b>Course Objectives</b>  | <ul style="list-style-type: none"> <li>• To become familiar with the goals and strategies of the community health system.</li> <li>• 2. Identifying the services and facilities provided in primary health care centers.</li> <li>• 3. To know how to organize family registry forms for pregnant women and children.</li> <li>• 4. To know the most important types of vaccines and how to deal with them.</li> <li>• 5. To become familiar with health information and health and disease standards.</li> </ul> |
| 9. Teaching and Learning Strategies   |   |
| <b>Strategy</b>   | <p style="text-align: center;">1- Theoretical lecture method<br/>2- Practical lecture method<br/>3- Method of discussion and dialogue</p>   |

10. Course Structure

| Week       | Hours | Required Learning Outcomes   | Unit or subject name             | Learning method                 | Evaluation method                                |
|------------|-------|--|----------------------------------|---------------------------------|--|
| (1)        | 2     | Definition of community health – What does community health include<br>The goal of community health  | Introduction to community health | The lecture theory and practice | Theoretical, practical and quarterly examination |
| (2)        | 2     | Primary health care - Primary health care programs - Objectives and strategies<br>Disease, its causes, factors affecting the disease (causative, host environment) | Primary health care              | The lecture theory and practice | Theoretical, practical and quarterly examination |
| (3)        | 2     | Vaccines - Immunity - Vaccines of all types and methods of administering them. Passive Active vaccine<br>Types - Routine vaccine                                   | Vaccine                          | The lecture theory and practice | Theoretical, practical and quarterly examination |
| (4)<br>(5) | 2     | Maternal and child care services   | motherhood and Child health care | The lecture theory and practice | Theoretical, practical and quarterly examination |

|      |   |  |                             |                                 |  |
|------|---|--|-----------------------------|---------------------------------|--|
| (6)  | 2 | Breastfeeding its benefits for the mother and the child - artificial feeding         | Breastfeeding               | The lecture theory and practice | Theoretical, practical and quarterly examination |
| (7)  | 2 | Diarrhea in children - its causes - types how to avoid and prevent it.               | Diarrhea in children        | The lecture theory and practice | Theoretical, practical and quarterly examination |
| (8)  | 2 | Dehydration in children - its types, signs, and how to treat it                      | Dehydration in children     | The lecture theory and practice | Theoretical, practical and quarterly examination |
| (9)  | 2 | The importance of school health unit services within the primary health care center. | School health unit          | The lecture theory and practice | Theoretical, practical and quarterly examination |
| (10) | 2 | Medical waste and how to deal with it  | Medical waste               | The lecture theory and practice | Theoretical, practical and quarterly examination |
| (11) | 2 | Pandemic influenza (Corona - bird flu)   | Pandemic influenza          | The lecture theory and practice | Theoretical, practical and quarterly examination |
| (12) | 2 | Some transmissible diseases (tuberculosis polio).                                    | Some transmissible diseases | The lecture theory and practice | Theoretical, practical and quarterly examination |

|                 |   |   |                                |                                 |  |
|-----------------|---|---|--------------------------------|---------------------------------|--|
| (1)             | 2 | - Some communicable diseases (diphtheria, whooping cough tetanus).  | Some communicable diseases     | The lecture theory and practice | Theoretical, practical and quarterly examination |
| (1)             | 2 | Vital statistics - The general method of health research, information on births and deaths                | Vital statistics               | The lecture theory and practice | Theoretical, practical and quarterly examination |
| (1)             | 2 | Measures of health and disease: measures of births and deaths   | Measures of health and disease | The lecture theory and practice | Theoretical, practical and quarterly examination |
| Second semester |   |   |                                |                                 |  |
| (1)             | 2 | The disease, its causes, and the factors affecting the occurrence of the disease, the epidemiologic triad | The disease, its causes        | The lecture theory and practice | Theoretical, practical and quarterly examination |
| (2)             | 2 | Health education and its procedures   | Health education               | The lecture theory and practice | Theoretical, practical and quarterly examination |
| (3)             | 2 | Acute respiratory infections and their control.   | Acute respiratory              | The lecture theory and practice | Theoretical, practical and quarterly examination |
| (4)             | 2 | Nutrition and food - the basic elements of food and how they affect the structure, growth                 | Nutrition and food             | The lecture theory and practice | Theoretical, practical and quarterly examination |

|     |   |  |                                      |                                 |  |
|-----|---|--|--------------------------------------|---------------------------------|--|
|     |   | and development of the child - diseases of malnutrition  |                                      |                                 |  |
| (5) | 2 | The concept of school health and mental health the emergence of school health services   | School health and mental health      | The lecture theory and practice | Theoretical, practical and quarterly examination |
| (6) | 2 | Objectives and importance of school health Development of school health systems  | school health:                       | The lecture theory and practice | Theoretical, practical and quarterly examination |
| (7) | 2 | School health strategies, services and duties  | School health services and duties    | The lecture theory and practice | Theoretical, practical and quarterly examination |
| (8) | 2 | School health components. Conditions of the school environment. The importance of the school's healthy relationship with the community           | School health components.            | The lecture theory and practice | Theoretical, practical and quarterly examination |
| (9) | 2 | Procedures followed in inspecting the school environment. Drinking water General conditions - Sample collection and analysis Sanitary facilities | Inspection of the school environment | The lecture theory and practice | Theoretical, practical and quarterly examination |



|    |   |   |   |                                 |  |
|----|---|---|---|---------------------------------|--|
| (1 | 2 | Initial examination procedures for new students (sight, hearing, speech, and physical examination)<br>Physical disabilities - primary eye and dental care | Initial examination procedure for new student   | The lecture theory and practice | Theoretical, practical and quarterly examination |
| (1 | 2 | Prevention and control of communicable diseases. - Principles of prevention - Types of prevention   | Prevention and control of communicable diseases | The lecture theory and practice | Theoretical, practical and quarterly examination |
| (1 | 2 | Some communicable diseases - mumps - measles - German measles symptoms - prevention - treatment   | Some communicable diseases                      | The lecture theory and practice | Theoretical, practical and quarterly examination |
| (1 | 2 | Some sexually transmitted diseases (AIDS, viral hepatitis type B - symptoms - prevention - treatment).  | Some sexually transmitted disease               | The lecture theory and practice | Theoretical, practical and quarterly examination |
| (1 | 2 | Measures of health and disease - incidence rate diseases<br>Incidence - rate of spread of diseases  | Measures health and disease                     | The lecture theory and practice | Theoretical, practical and quarterly examination |

|    |   |   |                       |                                 |  |
|----|---|---|-----------------------|---------------------------------|--|
| (1 | 2 | Health administration introduction objectives | Health administration | The lecture theory and practice | Theoretical, practical and quarterly examination |
|----|---|---|-----------------------|---------------------------------|--|

### 11. Course Evaluation

Monthly theoretical exam 25  
 Monthly practical exam 15+  
 Final theoretical exam 35 +Final practical exam 25

### 12. Learning and Teaching Resources

|  |  |
|--|--|
| Required textbooks (curricular books, if any)                      |  |
| Main references (sources)  |  |
| Recommended books and references (scientific journals, reports...) |  |
| Electronic References, Websites                                    |  |

## Course Description Form

|  |  |  |
|--|--|--|
| 13.  | Course Name: Fundamentals of nursing                             |  |
|  |  |  |
| 14.  | Course Code: FNF   |  |
|  |  |  |
| 15.  | Semester / Year: First semester – second semester                |  |
|  |  |  |
| 16.  | Description Preparation Date: 19 /2/2024                         |  |
|  |  |  |
| 17. Available Attendance Forms: Form of attendance: academic + practical application + on-site training (hospitals and health centers) |  |  |
|  |  |  |
| 18. Number of Credit Hours (Total) / Number of Units (Total)   |  |  |
| 4 hours (2 theoretical + 2 practical)  |  |  |
|  |  |  |
| 19.  | Course administrator's name (mention all, if more than one name) |  |
| Name: Ayad abbas Anied   |  |  |
| Email: ayed.aned@atu.edu.iq  |  |  |
|  |  |  |
| 20.  | Course Objectives  |  |
|  |  |  |
| <b>Course Objectives</b>   |  | <ul style="list-style-type: none"> <li>• - General objectives:<br/>The student able to know the general information about Nursing .</li> <li>2- Specific objective :               <ul style="list-style-type: none"> <li>• History of Nursing , Nursing , Nurse , Hospital its department , health agency in Iraq .</li> <li>• Vital signs ,<br/>Temperature ,<br/>Respiration , Blood pressure &amp; its methods. •</li> <li>Administration of Medication as general ,&amp; storage of drugs .</li> <li>• Methods</li> </ul> </li> </ul> |

of giving O2, section the recreation from chest, Arterial respiration Mouth to Mouth. • Normal feeding & gastric Laval. • Physical examination & Laboratory test . • Pre-post-operative care. • First aid & Civil defiance. • Make practices in collection sample. • First aid in nursing procedures in case of fractures, wounds, bleeding , burns, poisoning, shock.

21. Teaching and Learning Strategies

**Strategy**

Teaching and learning methods  
 1- Theoretical lecture method  
 2- Practical lecture method  
 3- Method of discussion and dialogue

22. Course Structure

| Week | Hours | Required Learning Outcomes  | Unit or subject name   | Learning method                    | Evaluation method                                |
|------|-------|---|------------------------|------------------------------------|--|
| (1)  | 2     | First aid in laboratories and Personal protective equipment, fundamental of Nursing, definition nursing, Nurse, health, Hospital. | Fundamental of Nursing | the lecture is theory and practice | Theoretical, practical and quarterly examination |

|              |   |   |   |                                    |  |
|--------------|---|---|---|------------------------------------|--|
| (2)<br>(3)   | 4 | Administration & discharge of patient from hospital, pt. chart, oral report, written of report, Nursing process.(Assessing, planning, Implementation, Evaluation  | Administration & discharge of patient from hospital | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (4)<br>(5)   | 4 | Physical examination, prepare the pt. to exam, role of Nurse in physical examination, collection of samples, prepare the equipment                                | Physical examination, prepare the pt                | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (6)          | 2 | Position of patient, patient lifting and its risks  | motherhood and Childhood care                       | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (7)<br>(8)   | 4 | Basic Needs of Pt. care of Pt. unit, bed making, personal hygiene patient bath, mouth and tooth care. Bed sores, care of sores, causes & prevention of bed sores. | Basic Needs of Pt                                   | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (9)<br>(10)  | 4 | Method of sterilization, surgical sterilization, Medical sterilization, kind of disinfectant Dressing the wound, kind of sterilize of surgical equipment          | Method of sterilization Method of sterilization     | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (11)<br>(12) | 4 | Vital signs, Definition Temperature, check temperature, Type of check Temp-oral, axillia, Rectal Definition of fever,   | Vital signs,  | the lecture is theory and practice | Theoretical, practical and quarterly examination |

|                 |   |  |   |                                    |  |
|-----------------|---|--|---|------------------------------------|--|
|                 |   | causes, signs, & symptom, Nursing care of pyrexia, pulse, definition, factors affecting of pulse, site of taking pulse, Nursing point in check pulse, Respiration, definition of respiration, definition of Blood pressure. definition of diastolic & systolic pressure. |   |                                    |  |
| (13)<br>(14)    | 4 | Drug administration, definition of drug Type of administration of medication, and injection, {I.M, I.V., c, I.D,} cold & hot. compress, nose eyes & ears drops   | Drug administration                             | The lecture is theory and practice | Theoretical, practical and quarterly examination |
| (15)            | 2 | IM Giving fluid & blood by intravenous infusion, role of Nurse giving intravenous infusion   | Giving fluid & Blood by intravenous infusion, . | The lecture is theory and practice | Theoretical, practical and quarterly examination |
| Second semester |   |  |   |                                    |  |
| (1)             | 2 | First aid in laboratories and Personal protective equipment, fundamental of Nursing, definition nursing, Nurse, health, Hospital.  | Fundamental of Nursing                          | The lecture is theory and practice | Theoretical, practical and quarterly examination |

|              |   |   |   |                                    |  |
|--------------|---|---|---|------------------------------------|--|
| (2)<br>(3)   | 4 | Administration & discharge of patient from hospital, pt. chart, oral report, written of report, Nursing process.(Assessing, planning, Implementation, Evaluation  | Administration & discharge of patient from hospital | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (4)<br>(5)   | 4 | Physical examination, prepare the pt. to exam, role of Nurse in physical examination, collection of samples, prepare the equipment                                | Physical examination, prepare the pt                | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (6)          | 2 | Position of patient, patient lifting and its risks  | motherhood and Childhood care                       | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (7)<br>(8)   | 4 | Basic Needs of Pt. care of Pt. unit, bed making, personal hygiene patient bath, mouth and tooth care. Bed sores, care of sores, causes & prevention of bed sores. | Basic Needs of Pt                                   | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (9)<br>(10)  | 4 | Method of sterilization, surgical sterilization, Medical sterilization, kind of disinfectant Dressing the wound, kind of sterilize of surgical equipment          | Method of sterilization Method of sterilization     | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (11)<br>(12) | 4 | Vital signs, Definition Temperature, check temperature, Type of check Temp-oral, axillia, Rectal definition of fever, causes, signs, & symptom, Nursing           | Vital signs,  | the lecture is theory and practice | Theoretical, practical and quarterly examination |

|              |   |   |   |                                    |  |
|--------------|---|---|---|------------------------------------|--|
|              |   | <p>re of pyrexia, pulse, definition, factors affecting of pulse, site of taking pulse, nursing point in check pulse, Respiration, definition of respiration, definition of Blood pressure. definition of diastolic &amp; systolic pressure.</p> |   |                                    |  |
| (13)<br>(14) | 4 | <p>drug administration, define of drug Type of administration of medication, and injection, {I.M, I.V., c, I.D,} cold &amp; hot. compress, nose eyes &amp; ears drops</p>   | drug administration                                 | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (15)         | 2 | <p>M Giving fluid &amp; blood by intravenous infusion, role of Nurse giving intravenous infusion</p>  | giving fluid & Blood by intravenous infusion, .     | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (1)          | 2 | <p>First aid in laboratories and Personal protective equipment, fundamental of Nursing, definition nursing, Nurse, health, Hospital.</p>  | Fundamental of Nursing                              | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (2)<br>(3)   | 4 | <p>Administration &amp; discharge of patient from hospital, pt.chart report, written of report , Nursing</p>  | Administration & discharge of patient from hospital | the lecture is theory and practice | Theoretical, practical and quarterly examination |



|             |   |  |   |  |  |
|-------------|---|--|---|--|--|
|             |   | rocess.(Assessing ,<br>planning ,<br>Implementation ,<br>Evaluation  |   |  |  |
| (4)<br>(5)  | 4 | ysical examination,<br>prepare the pt. to<br>am, role of Nurse in<br>ysical examination,<br>ollection of samples,<br>epare the equipment   | Physical<br>amination, prepare<br>the pt            | he lecture is<br>heory and<br>practice | Theoretical,<br>ractical and<br>quarterly<br>examination |
| (6)         | 2 | osition of patient,<br>atient lifting and its<br>risks   | motherhood and<br>Childhood care                    | he lecture is<br>heory and<br>practice | Theoretical,<br>ractical and<br>quarterly<br>examination |
| (7)<br>(8)  | 4 | asic Needs of Pt. care<br>of Pt. unit, bed<br>making, personal<br>ygiene patient bath,<br>outh and tooth care.<br>Bed sores, care of<br>sores, causes &<br>prevention of bed<br>sores. | asic Needs of Pt                                    | he lecture is<br>heory and<br>practice | Theoretical,<br>ractical and<br>quarterly<br>examination |
| (9)<br>(10) | 4 | Method of<br>erilization, surgical<br>erilization, Medical<br>erilization, kind of<br>sinfectant Dressing<br>he wound, kind of<br>terilize of surgical<br>equipment                    | Method of<br>erilization Method<br>of sterilization | he lecture is<br>heory and<br>practice | Theoretical,<br>ractical and<br>quarterly<br>examination |

### 23. Course Evaluation

Monthly theoretical exam 25  
 Monthly practical exam 15+  
 Final theoretical exam 35 +Final practical exam 25

### 24. Learning and Teaching Resources

|   |  |
|---|--|
| Required textbooks (curricular books, if any) | -Salo Abbas - Principles of Nursi<br>Foundations - Ministry of Health<br>Health Education Foundation - 1 |
| Main references (sources)                     | Fuerst fundamental of nursing<br>phaeladelphia 1976  |

|   |   |
|---|---|
| <p>Recommended books and references (scientific journals, reports...)</p> | <p>Fundamentals of Nursing - Salwa Abbas - Nazira Hussein - Sarah Dinkha - Ministry of Education Higher - Authority of Technical Institutes - 1989<br/>         Ahlam Farag, Elham Amin - Basic Principles in Nursing - Ministry of Higher Education and Scientific Research – 1986</p> |
| <p>Electronic References, Websites</p>                                    |   |

## Course Description Form

|   |  |  |
|---|--|--|
| 25.   | Course Name: General Anatomy1+2  |  |
|   |  |  |
| 26.   | Course Code: ANA   |  |
|   |  |  |
| 27.   | Semester / Year: First semester – second semester  |  |
|   |  |  |
| 28.   | Description Preparation Date:19 /2/2024  |  |
|   |  |  |
| 29.Available Attendance Forms: Form of attendance: academic + practical application + on-site training (hospitals and health centers) |  |  |
|   |  |  |
| 30.Number of Credit Hours (Total) / Number of Units (Total)   |  |  |
| 4 hours (2 theoretical + 2 practical)   |  |  |
| 31. Course administrator's name (mention all, if more than one name)  |  |  |
| Name: Salina Abdel Abbas  |  |  |
| Email: <a href="mailto:dr.salina8@gmail.com">dr.salina8@gmail.com</a>   |  |  |
| 32. Course Objectives   |  |  |
| <p><b>Course Objectives</b></p>   | <ul style="list-style-type: none"> <li>● General Goals : The students at the end of the Academic Year will have the ability to recognize all the parts of the human body anatomically .</li> <li>2- Special Goals : The students will be able to : a- He can correlate between the functions and the anatomy of each part of the body. b- He can assist the medical doctor in diagnosis and treatment in some way , primarily and simply as necessary</li> </ul> |  |
| 33. Teaching and Learning Strategies  |  |  |
| <b>Strategy</b>   | <p>Teaching and learning methods</p> <p>1- Theoretical lecture method</p> <p>2- Practical lecture method</p> <p>3- Method of discussion and dialogue</p>   |  |
| 34. Course Structure  |  |  |

| Week | Hours | Required Learning Outcomes  | Unit or subject name                   | Learning method                   | Evaluation method                                |
|------|-------|---|--|-----------------------------------|--|
| (1)  | 2     | roduction and definition of anatomy , surface anatomy of the body , anatomical position ,median plane   | Introduction and definition of anatomy | he lecture is theory and practice | Theoretical, practical and quarterly examination |
| (2)  | 2     | urface anatomy , planes and vertical lines  | Surface anatomy                        |                                   |  |
| (3)  | 2     | Tissues and cells ,types of cells which form different types of tissues , eg : epithelial , connective muscular , nervous tissues etc                     | Tissues and cells                      | he lecture is theory and practice | Theoretical, practical and quarterly examination |
| (4)  | 2     | nes and joints :types of bone ,functions of bones ,parts of skeleton  | Bones and joints                       | he lecture is theory and practice | Theoretical, practical and quarterly examination |
| (5)  | 2     | keleton of upper limb general anatomical appearance ,skeleton of shoulder girdle :clavicle ,scapula ,umerus ,radius ,ulna ,skeleton of hand               | skeleton of upper limb                 | he lecture is theory and practice | Theoretical, practical and quarterly examination |
| (6)  | 2     | keleton of lower limb general anatomical appearance, skeleton of pelvis :hip bone,: isium ,pubic, ischium , femur : leg ,:tibia ,fibula .skeleton of foot | skeleton of lower limb                 | he lecture is theory and practice | Theoretical, practical and quarterly examination |
| (7)  | 2     | unk skeleton :thorax , sternum , ribs   | Trunk skeleton                         | he lecture is theory and practice | Theoretical, practical and quarterly examination |

|                 |   |  |                           |                                    |  |
|-----------------|---|--|---------------------------|------------------------------------|--|
|                 |   |  |                           |                                    | quarterly examination                            |
| (8)             | 2 | Skull : general appearance   | Skull                     | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (9)             | 2 | Cranium , lower jaw  | Cranium                   | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (10)            | 2 | Vertebral column: types of vertebra of each part   | Vertebral column          | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (11)            | 2 | Joint: definition, types   | Joints                    | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (12)            | 2 | Joints of upper and lower limb and trunk   | Joints                    | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (13)            | 2 | Muscular system: types of muscles, muscles of head and face, general information   | Muscular system           | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (14)            | 2 | Muscles of upper limb: limb, vertebral muscles, limb, thoracic muscles, muscles of the shoulder, muscles of upper arm, muscles of hand | Muscles of upper limb     | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (15)            | 2 | Muscles of the lower limb: muscles of the pelvic region, muscles of the gluteal region, muscles of thigh                               | Muscles of the lower limb | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| Second semester |   |  |                           |                                    |  |

|      |   |   |   |                                    |  |
|------|---|---|---|------------------------------------|--|
| (1)  | 2 | Muscles of leg and foot   | Muscles of leg and foot   | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (2)  | 2 | Muscles of the trunk , muscles of thorax (superficial and deep), muscles of the abdomen , muscles of the back | Muscles of the trunk , muscles of thorax (superficial and deep), muscles of the abdomen , muscles of the back | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (3)  | 2 | Nervous system: brain , cerebrum , cerebellum , brain stem  | Nervous system  | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (4)  | 2 | Spinal cord: vertebrae of brain   | Spinal cord   | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (5)  | 2 | Peripheral nervous system : cranial nerves number and function  | Peripheral nervous system   | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (6)  | 2 | Spinal nerves   | Spinal nerves   | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (7)  | 2 | Autonomic nervous system : parts and functions  | Autonomic nervous system  | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (8)  | 2 | Digestive system: mouth and accessories pharynx esophagus , stomach   | Digestive system  | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (9)  | 2 | Cardio vascular system : blood vessel in general  | Cardio vascular system  | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (10) | 2 | Blood and heart   | Blood and heart   | the lecture is theory and practice | Theoretical, practical and quarterly examination |

|      |   |   |   |                                    |  |
|------|---|---|---|------------------------------------|--|
|      |   |   |   |                                    | quarterly examination                            |
| (11) | 2 | Veins and arteries: systemic circulation arteries thoracic aorta                  | Veins and arteries  | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (12) | 2 | Abdominal aorta and its branches  | Abdominal aorta and its branches  | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (13) | 2 | Veins of the systemic circulation , veins of lower limb , veins of abdomen        | Veins of the systemic circulation , veins of lower limb , veins of abdomen          | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (14) | 2 | Veins of head and neck applied points, veins and arteries , pulmonary circulation | Veins of head and neck , applied points, veins and arteries , pulmonary circulation | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (15) | 2 | Lymphatic system and respiratory system   | Lymphatic system and respiratory system   | the lecture is theory and practice | Theoretical, practical and quarterly examination |

### 1. Course Evaluation

Monthly theoretical exam 25  
 Monthly practical exam 15+  
 Final theoretical exam 35 +Final practical exam 25+

### 2. Learning and Teaching Resources

|  |   |
|--|---|
| Required textbooks (curricular books, if any)                      |   |
| Main references (sources)  | - Principle of anatomy , Dr. Hani T Al-Azawi , 4 th edition , 1988. 2- Principle of anatomy , Dr. Abdul-Rahman M. Abdul- Raheim & Dr. Ali K |
| Recommended books and references (scientific journals, reports...) |   |
| Electronic References, Websites                                    |   |

## Course Description Form

|   |              |   |   |                                    |  |
|---|--------------|---|---|------------------------------------|--|
| 3. Course Name: Physiology  |              |   |   |                                    |  |
|   |              |   |   |                                    |  |
| 4. Course Code: PHY   |              |   |   |                                    |  |
|   |              |   |   |                                    |  |
| 5. Semester / Year: First semester – second semester  |              |   |   |                                    |  |
|   |              |   |   |                                    |  |
| 6. Description Preparation Date: 19 /2/2024   |              |   |   |                                    |  |
|   |              |   |   |                                    |  |
| 7. Available Attendance Forms: Form of attendance: academic + practical application + on-site training (hospitals and health centers) |              |   |   |                                    |  |
|   |              |   |   |                                    |  |
| 8. Number of Credit Hours (Total) / Number of Units (Total)   |              |   |   |                                    |  |
| 4 hours (2 theoretical + 2 practical)   |              |   |   |                                    |  |
| 9. Course administrator's name (mention all, if more than one name)   |              |   |   |                                    |  |
| Name: Thanaa Abdulmahdi Mukheef<br>Email: <a href="mailto:inb.thn@atu.edu.iq">inb.thn@atu.edu.iq</a>                                  |              |   |   |                                    |  |
| 10. Course Objectives   |              |   |   |                                    |  |
| <b>Course Objectives</b>  |              |   | 1-The student is able to know physiology of human body (Structure and functions)<br>2- The 2-student is able to done more clinical examination that Related with physiology |                                    |  |
| 11. Teaching and Learning Strategies  |              |   |   |                                    |  |
| <b>Strategy</b>   |              | Teaching and learning methods<br>1- Theoretical lecture method<br>2- Practical lecture method<br>3- Method of discussion and dialogue |   |                                    |  |
| Course Structure .۱۲  |              |   |   |                                    |  |
| <b>Week</b>   | <b>Hours</b> | <b>Required Learning Outcomes</b>   | <b>Unit or subject name</b>   | <b>Learning method</b>             | <b>Evaluation method</b>                         |
| (1)<br>(2)  | 4            | Safety precautions from the hazards of laboratory   | laboratory materials  | the lecture is theory and practice | Theoretical, practical and quarterly examination |



|            |   |  |   |                                    |  |
|------------|---|--|---|------------------------------------|--|
|            |   | materials, chemicals and electricity. Cells define – Types Structures of (cells) , Tissues define , Types , Structures of (tissues) , Muscles (Define , Types , Structures of muscles) |   |                                    |  |
| (3)<br>(4) | 4 | Blood – Functions – properties composition – blood plasma – blood serum- Erythrocyte properties – shapes-number –functions) production and degradation of blood cells                  | Blood –Functions – properties composition |                                    |  |
| (5)        | 2 | Leukocyte (Types –Shapes number-functions)   | Leukocyte                                 | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (6)        | 2 | Hemoglobin-functions –normal value- composition Platelets(number- functions) Coagulation of blood – anticoagulant  | Platelets+ Hemoglobin                     | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (7)        | 2 | Cardiovascular system heart- structure of heart – function – cardiac valves \ cardiac cycle – heart sound  | Cardiovascular system                     | the lecture is theory and practice | Theoretical, practical and quarterly examination |

|                 |   |   |                     |                                   |  |
|-----------------|---|---|---------------------|-----------------------------------|--|
| (8)             | 2 | lood vessels (arteries veins-capillary blood vessels) properties – blood cycle (pulmonary & systemic) | Blood vessels       | he lecture is theory and practice | Theoretical, practical and quarterly examination |
| (9)             | 2 | Blood pressure – normal value- factors effecting of blood pressure                                    | Blood pressure      | he lecture is theory and practice | Theoretical, practical and quarterly examination |
| (10)            | 2 | espiratory system – ucture – expiration – inspiration – spiratory muscles – respiratory rate.         | espiratory system.  | he lecture is theory and practice | Theoretical, practical and quarterly examination |
| (11)            | 2 | ulmonary volume – lmonary ventilation - regulation of gas change in blood by respiration.             | ulmonary volume     | he lecture is theory and practice | Theoretical, practical and quarterly examination |
| (12)            | 2 | Urinary system – ructure – functions  | Urinary system      | he lecture is theory and practice | Theoretical, practical and quarterly examination |
| (13)            | 2 | unctions of kidneys- mposition of urine – st and stone in urine normal                                | unctions of kidneys | he lecture is theory and practice | Theoretical, practical and quarterly examination |
| (14)            | 2 | ar and eye (structure and functions)  | Ear and eye         | he lecture is theory and practice | Theoretical, practical and quarterly examination |
| (15)            | 2 | Skin (Define, ructures, Functions)  | Skin                | he lecture is theory and practice | Theoretical, practical and quarterly examination |
| Second semester |   |   |                     |                                   |  |
| (1)             | 2 | igestive system and parts of it   | Digestive system    | he lecture is theory and practice | Theoretical, practical and quarterly examination |

|              |   |  |                           |                                    |  |
|--------------|---|--|---------------------------|------------------------------------|--|
| (2)          | 2 | Stages of digestion (Oral, Stomach, Intestine). and Digestives enzymes.                      | Stages of digestion       | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (3)          | 2 | Intestinal functions and absorption  | Intestinal absorption     | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (4)          | 2 | Digestive system glands (salivary glands, pancreas-Liver) structure – Functions              | Digestive system glands   | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (5)          | 2 | Gallbladder – structures and functions   | Gallbladder               | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (6)          | 2 | Stool formation  | Stool formation           | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (7)<br>(8)   | 2 | Nervous system – structure – functions<br>Central nervous system – peripheral nervous system | Nervous system            | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (9)          | 2 | The brain and spinal cord  | The brain and spinal cord | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (10)<br>(11) | 2 | Different area in brain which responsible for sense, movement, hearing, smell, taste, sight. | Different area in brain   | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (12)<br>(13) | 2 | Endocrine glands (types and functions)   | Endocrine glands          | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (14)<br>(15) | 2 | Reproductive system (male and female) structure and functions                                | Reproductive system       | the lecture is theory and practice | Theoretical, practical and quarterly examination |

## 1. Course Evaluation

Monthly theoretical exam 25  
Monthly practical exam 15+  
Final theoretical exam 35 +Final practical exam 25

## 2. Learning and Teaching Resources

|  |   |
|--|---|
| Required textbooks (curricular books, if any)                      |   |
| Main references (sources)  | Guyton, A. C. and Hall, J. E. 2001. Textbook of Medical Physiology. 11th Edition. Saunders Company, Philadelphia. USA. - Bipin Kumar, 2001. Human Physiology. Campbell and Reece, 2002. Biology. 6th Edition. Benjamin Cummings, San Francisco, CA. - Campbell and Reece, 2002. Biology. 6th Edition. Benjamin Cummings, San Francisco, CA. - Campbell and Reece, 2002. Biology. 6th Edition. Benjamin Cummings, San Francisco, CA. |
| Recommended books and references (scientific journals, reports...) |   |
| Electronic References, Websites                                    |   |

## Course Description Form

|  |  |  |
|--|--|--|
| 35.  | Course Name: Medical Microbiology 1  |  |
|  |  |  |
| 36.  | Course Code: BIO   |  |
|  |  |  |
| 37.  | Semester / Year: First semester – second semester  |  |
|  |  |  |
| 38.  | Description Preparation Date: 19 /2/2024   |  |
|  |  |  |
| 39. Available Attendance Forms: Form of attendance: academic + practical application + on-site training (hospitals and health centers) |  |  |
|  |  |  |
| 40. Number of Credit Hours (Total) / Number of Units (Total)   |  |  |
| 4 hours (2 theoretical + 2 practical)  |  |  |
| 41. Course administrator's name (mention all, if more than one name)   |  |  |
| Name: Prof. Dr. Saba Fadhil Ali Malaa  |  |  |
| Email: sabafam6@atu.edu.iq   |  |  |
| 42. Course Objectives  |  |  |
| <p><b>Course Objectives</b></p>  | <ul style="list-style-type: none"> <li>• General objectives : Student will be able to know a simple general idea about : Pathogenes (Bacteria, fungi, parasites and viruses), the immunity and disease prevention</li> <li>Special objectives : Student will be able to : • To diagnose some simple cases in his field work, instead of special test, when special test is absent. • Do some tests in the labs. • Collect, preserve and transport the pathogenic samples. • Give an advice for disease prevention and control</li> </ul> |  |
| 43. Teaching and Learning Strategies   |  |  |
| <b>Strategy</b>  | Teaching and learning methods<br>1- Theoretical lecture method   |  |

2- Practical lecture method  
3- Method of discussion and dialogue

Course Structure .εε

| Week | Hours | Required Learning Outcomes  | Unit or subject name                    | Learning method              | Evaluation method                                |
|------|-------|---|---|------------------------------|--|
| (1)  | 2     | History of microbiology, Role of microorganism in the world of the living & the branches of microbiology. Biological hazards and how to deal with them, signs and warning signs in laboratories, Disposal of waste from workshops and medical laboratories, Disposal of medical laboratory waste. | History of microbiology                 | Lecture, theory and practice | Theoretical, practical and quarterly examination |
| (2)  | 2     | Bacterial morphology, bacterial cell structure.   | Bacterial morphology                    |                              |  |
| (3)  | 2     | Bacterial requirement, growth curve   | Bacterial requirement                   | Lecture, theory and practice | Theoretical, practical and quarterly examination |
| (4)  | 2     | Control of microorganisms   | Control of microorganisms               | Lecture, theory and practice | Theoretical, practical and quarterly examination |
| (5)  | 2     | Pathogens of respiratory system   | Pathogens of respiratory system         | Lecture, theory and practice | Theoretical, practical and quarterly examination |
| (6)  | 2     | Pathogens of digestive system.  | Pathogens of digestive system.          | Lecture, theory and practice | Theoretical, practical and quarterly examination |
| (7)  | 2     | Pathogens of urinary and sexual systems   | Pathogens of urinary and sexual systems | Lecture, theory and practice | Theoretical, practical and quarterly examination |
| (8)  | 2     | Food poisoning.   | Food poisoning.                         | Lecture, theory              | Theoretical, practical and                       |

|                 |   |   |                                  |  |   |
|-----------------|---|---|----------------------------------|--|---|
|                 |   |   |                                  | and<br>practice                          | quarterly<br>examination                                  |
| (9)             | 2 | Contamination of hospitals .                          | Contamination of<br>hospitals .  | e lecture<br>s theory<br>and<br>practice | Theoretical,<br>practical and<br>quarterly<br>examination |
| (10)            | 2 | General characters of fungi .                         | General characters<br>of fungi . | e lecture<br>s theory<br>and<br>practice | Theoretical,<br>practical and<br>quarterly<br>examination |
| (11)            | 2 | Fungal diseases.                                      | Fungal diseases.                 | e lecture<br>s theory<br>and<br>practice | Theoretical,<br>practical and<br>quarterly<br>examination |
| (12)            | 2 | The viruses , shapes , sizes &<br>some viral diseases | The viruses                      | e lecture<br>s theory<br>and<br>practice | Theoretical,<br>practical and<br>quarterly<br>examination |
| (13)            | 2 | Introduction of parasites.                            | parasites.                       | e lecture<br>s theory<br>and<br>practice | Theoretical,<br>practical and<br>quarterly<br>examination |
| (14)            | 2 | Protozoa , Entamoeba<br>histolytica                   | Protozoa                         | e lecture<br>s theory<br>and<br>practice | Theoretical,<br>practical and<br>quarterly<br>examination |
| (15)            | 2 | Flagellates, Giardia .<br>Trichomonase .              | Flagellates                      | e lecture<br>s theory<br>and<br>practice | Theoretical,<br>practical and<br>quarterly<br>examination |
| Second semester |   |   |                                  |  |   |
| (1)             | 2 | Food flagellates, Leishmania.                         | Food flagellates,<br>Leishmania. | e lecture<br>s theory<br>and<br>practice | Theoretical,<br>practical and<br>quarterly<br>examination |
| (2)             | 2 | Sporozoa, Plasmodium ,<br>Toxoplasma.                 | Sporozoa                         | e lecture<br>s theory<br>and<br>practice | Theoretical,<br>practical and<br>quarterly<br>examination |
| (3)             | 2 | Helimenthes , Taenia .                                | Helimenthes ,<br>Taenia .        | e lecture<br>s theory<br>and<br>practice | Theoretical,<br>practical and<br>quarterly<br>examination |

|      |   |                               |                                   |  |   |
|------|---|-------------------------------|-----------------------------------|--|---|
| (4)  | 2 | Echinococcus granulosus.      | Echinococcus granulosus.          | 1 lecture<br>1 theory<br>and<br>1 practice | Theoretical,<br>practical and<br>quarterly<br>examination |
| (5)  | 2 | Hymenolipes nana              | Hymenolipes nana                  | 1 lecture<br>1 theory<br>and<br>1 practice | Theoretical,<br>practical and<br>quarterly<br>examination |
| (6)  | 2 | Trematoda helminthes          | Trematoda<br>helminthes           | 1 lecture<br>1 theory<br>and<br>1 practice | Theoretical,<br>practical and<br>quarterly<br>examination |
| (7)  | 2 | Trepanoma ,Schistosomes       | Trepanoma<br>,Schistosomes        | 1 lecture<br>1 theory<br>and<br>1 practice | Theoretical,<br>practical and<br>quarterly<br>examination |
| (8)  | 2 | Bacterial genetics            | Bacterial genetics                | 1 lecture<br>1 theory<br>and<br>1 practice | Theoretical,<br>practical and<br>quarterly<br>examination |
| (9)  | 2 | Immunity and immune system    | Immunity                          | 1 lecture<br>1 theory<br>and<br>1 practice | Theoretical,<br>practical and<br>quarterly<br>examination |
| (10) | 2 | Antibody &antigen .           | Antibody &antigen<br>.            | 1 lecture<br>1 theory<br>and<br>1 practice | Theoretical,<br>practical and<br>quarterly<br>examination |
| (11) | 2 | Antibody &antigen reactions   | Antibody<br>&antigen<br>reactions | 1 lecture<br>1 theory<br>and<br>1 practice | Theoretical,<br>practical and<br>quarterly<br>examination |
| (12) | 2 | Hypersensitivity              | Hypersensitivity                  | 1 lecture<br>1 theory<br>and<br>1 practice | Theoretical,<br>practical and<br>quarterly<br>examination |
| (13) | 2 | Autoimmune diseases           | Autoimmune<br>diseases            | 1 lecture<br>1 theory<br>and<br>1 practice | Theoretical,<br>practical and<br>quarterly<br>examination |
| (14) | 2 | Discussion of course material | Discussion of<br>course material  | 1 lecture<br>1 theory                      | Theoretical,<br>practical and                             |



|      |   |                               |                                  |  |  |
|------|---|-------------------------------|----------------------------------|--|--|
|      |   |                               |                                  | and<br>practice                          | quarterly<br>examination                                 |
| (15) | 2 | discussion of course material | Discussion of<br>course material | e lecture<br>s theory<br>and<br>practice | Theoretical,<br>ractical and<br>quarterly<br>examination |

### 13. Course Evaluation

Monthly theoretical exam 25  
 Monthly practical exam 15+  
 Final theoretical exam 35 +Final practical exam 25

### 14. Learning and Teaching Resources

|   |  |
|---|--|
| Required textbooks (curricular books, if any)                         |  |
| Main references (sources)   | - Michael J. Leboffe. (2002).<br>Microbiology: Laboratory<br>eory & Application, Brief 3e<br>3rd Edition 2- P.C. Trivedi,<br>Sonali Pandey, Seema<br>adauria. 2010. TEXT BOOK<br>OF MICROBIOLOGY.<br>Aavishkar Publishers,<br>Distributors. ISBN 978-81-<br>7910-306-7. 3- Subhash<br>andra Parija. 2012. Textbook<br>of Microbiology and<br>Immunology, 2 nd edition.<br>Elsevier |
| Recommended books and references (scientific journals,<br>reports...) |  |
| Electronic References, Websites                                       |  |

## Course Description Form

|                 |  |  |
|-----------------|--|--|
| 45.             | Course Name: Biostatic1+2  |  |
|                 |  |  |
| 46.             | Course Code: BIOS  |  |
|                 |  |  |
| 47.             | Semester / Year: First semester – second semester  |  |
|                 |  |  |
| 48.             | Description Preparation Date:19 /2/2024  |  |
|                 |  |  |
| 49.             | Available Attendance Forms: Form of attendance: academic + practical application + on-site training (hospitals and health centers) |  |
|                 |  |  |
| 50.             | Number of Credit Hours (Total) / Number of Units (Total)   |  |
|                 | 2 hours (theoretical)  |  |
| 51.             | Course administrator's name (mention all, if more than one name)   |  |
|                 | Name: Qusay Abdulhamza Muttaleb<br>Email: qusay.muttaleb@atu.edu.iq  |  |
| 52.             | Course Objectives  |  |
|                 | <p><b>Course Objectives</b></p>  | <ul style="list-style-type: none"> <li>● Objectives of the article- :</li> <li>● At the end of the school year, the student will be able to process and analyze statistical data and reach conclusions.</li> <li>● The correct one.</li> <li>● The student will be able to:<br/>Special:</li> <li>● -Dealing with statistical data.</li> <li>● -Dealing with and knowing life and health statistics.</li> <li>● -Organizing the statistical form and the health form related to daily incidents such as births, deaths, and diseases.</li> </ul> |
| 53.             | Teaching and Learning Strategies   |  |
| <b>Strategy</b> | Teaching and learning methods<br>1- Theoretical lecture method   |  |

2- Practical lecture method  
3- Method of discussion and dialogue

54. Course Structure

| Week              | Hours | Required Learning Outcomes   | Unit or subject name                 | Learning method       | Evaluation method          |
|-------------------|-------|--|--------------------------------------|-----------------------|----------------------------|
| (1)<br>(2)        | 4     | Introduction to statistics and its types, samples, variables, classified and unclassified data.  | Definition of Statistics             | the lecture is theory | Monthly and quarterly exam |
| (3)<br>(4)        | 4     | Representing frequency distributions "classified data" - graphical display methods (frequency histogram, frequency curve, frequency polygon) | Representing Frequency Distributions | the lecture is theory | Monthly and quarterly exam |
| (5)<br>(6)<br>(7) | 6     | - Measures of central tendency - Arithmetic mean. - Mediator. - The loom.  | Measures of Central Tendency         | the lecture is theory | Monthly and quarterly exam |
| (8)               | 2     | Methods of selecting statistical samples, their meaning and reasons for choosing them.   | Display Statistical Data             | the lecture is theory | Monthly and quarterly exam |
| (9)<br>(10)       | 4     | Preparing a questionnaire form for health and medical research.  | Questionnaire                        | the lecture is theory | Monthly and quarterly exam |

|                        |   |   |                     |                       |                            |
|------------------------|---|---|---------------------|-----------------------|----------------------------|
| (11)                   | 2 | Definition of health statistics and its sources.  | Health Statistics   | the lecture is theory | Monthly and quarterly exam |
| (12)<br>(13)<br>(14)   | 6 | Biostatistics: - The concept of ratio and rate - Death statistics - Birth statistics  | Biostatistics       | the lecture is theory | Monthly and quarterly exam |
| (15)                   | 2 | Statistics of causes of death) medical certificate, obituary, death, death certificate  | Statistics          | the lecture is theory | Monthly and quarterly exam |
| <b>Second semester</b> |   |   |                     |                       |                            |
| (1)<br>(2)             | 4 | Scientific research (the purpose of the research and what are the ambitions for conducting it)  | Scientific Research | the lecture is theory | Monthly and quarterly exam |
| (3)                    | 2 | Ethics of scientific research   | Research Ethics     | the lecture is theory | Monthly and quarterly exam |
| (4)                    | 2 | Structure of scientific research  | Research Elements   | the lecture is theory | Monthly and quarterly exam |
| (5)                    | 2 | Types of statistical studies  | Types of studies    | the lecture is theory | Monthly and quarterly exam |
| (6)<br>(7)             | 4 | Research basics (statistical method) -Technology with data- Data collection plan – data analysis - Testing and ethical considerations | Research Basics     | the lecture is theory | Monthly and quarterly exam |

|                    |   |  |  |                       |                            |
|--------------------|---|--|--|-----------------------|----------------------------|
| (8)<br>(9)<br>(10) | 6 | Preparing the questionnaire form   | Preparing the Form                               | the lecture is theory | Monthly and quarterly exam |
| (11)               | 2 | How to transcribe questionnaires and convert them into classified statistical data | Questionnaires and Turning them into Statistics. | the lecture is theory | Monthly and quarterly exam |
| (12)<br>(13)       | 4 | How to start scientific research (choosing the title, objectives, type of samples) | How to do scientific research                    | the lecture is theory | Monthly and quarterly exam |
| (14)<br>(15)       | 4 | Some applications used in scientific research.                                     | Examples of Search Applications                  | the lecture is theory | Monthly and quarterly exam |

#### 15. Course Evaluation

Monthly theoretical exam 40  
Final theoretical exam 60

#### 16. Learning and Teaching Resources

|  |   |
|--|---|
| Required textbooks (curricular books, if any)                      | Adnan Shaker Al-Rubaie - principles of statistics and its uses in the field of public health / Ministry of Health 1             |
| Main references (sources)  | - 1- W.DIXON and F. massey _ introduction to statistical Analysis<br>2- Paul G. Hoel _ Introduction to mathematical statistics. |
| Recommended books and references (scientific journals, reports...) | 1-Banderford Hill. Fundamental Biostatistics 1975<br>2 -F. Margrette -Fundamental in Public health                              |
| Electronic References, Websites                                    |   |

## Course Description Form

|                                 |  |
|---------------------------------|--|
| 55.                             | Course Name: Clinical Chemistry1+2   |
| 56.                             | Course Code: BIOC  |
| 57.                             | Semester / Year: First semester – second semester  |
| 58.                             | Description Preparation Date:19 /2/2024  |
| 59.                             | Available Attendance Forms: Form of attendance: academic + practical application + on-site training (hospitals and health centers)   |
| 60.                             | Number of Credit Hours (Total) / Number of Units (Total)<br>4 hours (1 theoretical + 3 practical)  |
| 61.                             | Course administrator's name (mention all, if more than one name)<br>Name: Najlaa Jawad hasani<br>Email: njlaajawad66.iba@atu.edu.iq  |
| 62.                             | Course Objectives  |
| <p><b>Course Objectives</b></p> | <ul style="list-style-type: none"> <li>• Objectives of the article: general aims:             <ul style="list-style-type: none"> <li>• 1 (The student knows what clinical chemistry is, its principles and its importance in the field                 <ul style="list-style-type: none"> <li>• of medicine.</li> </ul> </li> <li>• 2 (It measures the chemical components in the human body in the laboratory.</li> </ul> </li> <li>• Special goals: That the student will be able to:             <ul style="list-style-type: none"> <li>• 1 (Knows clinical chemistry.</li> <li>• 2 (He knows the chemical compounds present in the human body and the sources of them                 <ul style="list-style-type: none"> <li>• formation in the body.</li> </ul> </li> </ul> </li> </ul> |

|  |  |
|--|--|
|  | <ul style="list-style-type: none"> <li>• 3 (Knows the normal ratios of chemical compounds in the blood.</li> <li>• 4 (Recognize the variables that can occur to these compounds in abnormal cases.</li> <li>• 5 (It uses the levels of these compounds in the blood serum to measure the efficiency of the</li> <li>• Functional performance of some body organs such as the liver and kidneys.</li> <li>• 6 (Diagnoses various diseases in terms of changes that occur at the levels of these</li> <li>• Compounds in blood and other body fluids.</li> <li>• 7 (Know the different laboratory methods that are used in clinical chemistry laboratories.</li> <li>• 8 (Uses devices that are used in clinical chemistry laboratories</li> <li>9) Measures the levels of</li> <li>• Chemical components important in diagnosing diseases in the blood laboratory.</li> </ul> |
|--|--|

### 63. Teaching and Learning Strategies

|                 |   |
|-----------------|---|
| <b>Strategy</b> | Teaching and learning methods<br>1- Theoretical lecture method<br>2- Practical lecture method<br>3- Method of discussion and dialogue |
|-----------------|---|

### 64. Course Structure

| Week | Hours | Required Learning Outcomes  | Unit or subject name   | Learning method                          | Evaluation method   |
|------|-------|---|------------------------|--|---|
| (1)  | 2     | safety standards<br>when establishing<br>or establishing<br>workshops and | Safety of laboratories | the lecture is<br>theory and<br>practice | Theoretical,<br>practical and<br>quarterly<br>examination |

|     |   |   |                                      |                                    |  |
|-----|---|---|--------------------------------------|------------------------------------|--|
|     |   | <p>scientific laboratories. basic equipment be available in laboratories .</p> <p>Safety precautions from the hazards of laboratory materials, chemicals and electricity.</p> <p>Chemical hazards and how to deal with them,</p> <p>Radiation hazards and how to deal with them</p> |                                      |                                    |  |
| (2) | 2 | <p>Introduction to analytical chemistry - methods of expressing solution concentrations - molar concentration - standard concentration - percent concentration - methods of dilution and preparation of laboratory</p>  | Introduction to analytical chemistry | The lecture is theory and practice | Theoretical, practical and quarterly examination |
| (3) | 2 | <p>-Hydrogen concentration (pH) - the importance of the hydrogen concentration in the human body - the hydrogen concentration of the blood - buffer solutions - their</p>   | -Hydrogen concentration (pH)         | The lecture is theory and practice | Theoretical, practical and quarterly examination |



|     |   |  |  |                                    |  |
|-----|---|--|--|------------------------------------|--|
|     |   | properties and methods of preparation  |  |                                    |  |
| (4) | 2 | analytical methods used in clinical chemistry laboratories - qualitative analysis - quantitative analysis - types of quantitative analysis   | analytical methods used in clinical chemistry laboratories | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (5) | 2 | Chromatography - Types of chromatography - Beer's law - Beer Lambert's law - Standard  | Chromatography   | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (6) | 2 | Definition of biochemistry - Definition of clinical chemistry - Body fluids and their importance in conducting clinical chemistry tests - Urine - Urine collection and methods of preservation The formation of urine in the human body - Normal rate of urinecretion - Definition of excessive urine - definition of poor urine Definition of lack of urine | Definition of biochemistry                                 | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (7) | 2 | Natural and unnatural components of urine - general urine analysis - clinical importance - urinary system stones and their types - and the reasons for their formation   | Urine  | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (8) | 2 | Blood - blood collection blood plasma - blood serum - the difference between plasma and serum and how to get each of them -  | Blood  | the lecture is theory and practice | Theoretical, practical and quarterly examination |

|      |   |   |                         |                                    |  |
|------|---|---|-------------------------|------------------------------------|--|
|      |   | anticoagulants - the most important types of anticoagulants used in clinical chemistry - precipitation of blood proteins - the purpose of precipitation of blood proteins when conducting some clinical chemistry tests - The most important blood protein precipitators used in clinical chemistry |                         |                                    |  |
| (9)  | 2 | Electrolytes - the importance of electrolytes in the human body - types of electrolytes - sodium - its metabolism - its function its clinical importance - potassium its metabolism - its function - its clinical importance - chloride - its metabolism - its function - its clinical importance   | Electrolytes            | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (10) | 2 | Calcium - Metabolism - Function - Clinical Importance - Phosphorous - Metabolism - Function - Clinical Importance - Iron - Metabolism - Function - Clinical Importance  | - types of electrolytes | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (11) | 2 | Carbohydrate compounds - their sources - their classification - glucose sugar - glucose metabolism - glucose level in blood - factors   | Carbohydrate            | the lecture is theory and practice | Theoretical, practical and quarterly examination |

|                 |   |   |                        |                                    |  |
|-----------------|---|---|------------------------|------------------------------------|--|
|                 |   | that maintain blood glucose level - clinical significance of glucose - renal threshold and urine glucose level  |                        |                                    |  |
| (12)            | 2 | Diabetes mellitus - alternative energy - sources of its formation - ketone bodies - acidification of the blood  | Diabetes mellitus      | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (13)            | 2 | glucose tolerance test - preparing the patient for the test - the most important glucose tolerance charts - normal chart - diabetes mellitus chart - poor storage process chart - flat chart - diabetes urine chart | glucose tolerance test | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (14)            | 2 | Fats - classification - lipid metabolism - lipids in blood plasma - fatty acids   | Fats                   | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (15)            | 2 | cholesterol - chemical formula - presence of cholesterol - cholesterol metabolism - cholesterol synthesis - function of cholesterol in the human body - clinical significance of cholesterol                        | Cholesterol            | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| Second semester |   |   |                        |                                    |  |
| (1)             | 2 | triglycerides - types of triglycerides - their clinical significance  | Triglycerides          | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (2)             | 2 | Proteins - protein structure - amino acids - properties of amino acids - union of amino acids to form protein -   | Proteins               | the lecture is theory and practice | Theoretical, practical and quarterly examination |

|            |   |  |                            |                                    |  |
|------------|---|--|----------------------------|------------------------------------|--|
|            |   | peptide bond - Zwitter ion   |                            |                                    |  |
| (3)        | 2 | Classification of proteins in the human body - insoluble proteins - soluble proteins - blood plasma proteins - serum proteins - functions and importance of proteins in the human body - clinical significance of total protein in serum | Classification of proteins | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (4)        | 2 | Techniques used to separate different types of blood proteins - Electrophoresis of serum proteins - Factors affecting the electrophoresis process - Types of supporting media - Separation method - Methods for reading the results      | Separation of blood        | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (5)        | 2 | Non-protein nitrogen compounds - their types in the human body - uric acid - the biosynthesis of uric acid - the clinical importance of uric acid - urea - the biosynthesis of urea - the clinical importance of urea                    | Non-protein compounds      | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (6)        | 2 | Creatine - Creatine biosynthesis - Clinical significance of creatine - Creatinine - Creatinine biosynthesis - Clinical significance of creatinine - Creatinine clearance test  | Creatine                   | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (7)<br>(8) | 2 | Liver function tests - Liver - liver function - clinical signs of liver  | Liver                      | the lecture is theory and practice | Theoretical, practical and quarterly examination |

|      |   |  |                  |                                    |  |
|------|---|--|------------------|------------------------------------|--|
|      |   | disease - bilirubin - synthesis and fate of bilirubin  |                  |                                    | quarterly examination                            |
| (9)  | 2 | Jaundice - types of jaundice - pigment excretion in different cases of jaundice - liver function tests importances   | Jaundice         | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (10) | 2 | Enzymes - Functions of enzymes in the body - Classification of enzymes - Factors affecting the work of enzymes - The basic substance on which the enzyme works - How does an enzyme work - ALT & GPT enzymes - properties and function of each and its clinical importance | Enzymes          | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (11) | 2 | Alkaline phosphatase and acid phosphatase - properties, functions and clinical significance of each  | types of Enzymes | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (12) | 2 | Amylase and lipase - properties, functions and clinical significance of each   | Amylase          | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (13) | 2 | Vitamins - their classification - Vitamins (A - B - C - D) their respective functions - and their sources  | Vitamins         | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (14) | 2 | Hormones - nature of hormones - their functions - some important hormones and their functions and the way of producing each of them  | Hormones         | the lecture is theory and practice | Theoretical, practical and quarterly examination |

|   |   |  |   |                                    |  |
|---|---|--|---|------------------------------------|--|
| (15)  | 2 | Introduction to PCR technique (Polymerase chain reaction) - definition - importance – uses | Introduction to PCR   | The lecture is theory and practice | Theoretical, practical and quarterly examination |
| <b>17. Course Evaluation</b>  |   |  |   |                                    |  |
| Monthly theoretical exam 25<br>Monthly practical exam 15+<br>Final theoretical exam 35 +Final practical exam 25 |   |  |   |                                    |  |
| <b>18. Learning and Teaching Resources</b>  |   |  |   |                                    |  |
| Required textbooks (curricular books, if any)   |   |  |   |                                    |  |
| Main references (sources)   |   |  | - Pr1) Clinical Chemistry / Muhammad Fathi Al-Hawari / Technical Education Authority<br>2 (Clinical Chemistry Binding / Muhammad Ramzi Al-Omari / Technical Education Authority<br>3 (Practical Clinical Chemistry / Muhammad Ramzi Al-Omari / Technical Education Authority<br>4 (General Chemistry / Saiba Abdullah - Hanaa Salman - Maysoon Suleiman / Technical Education Authority<br>5 (Quality control for pharmacy students / Sayed Muhammad Abu Zaid / Technical Education Authority<br>6 (Laboratory and pharmaceutical equipment / Sayed Muhammad Abu Zaid / Technical Education Authority<br>7 (Analytical Chemistry / Dr. Sajida Abdel Hamid / Technical Education Authority<br>24<br>Fundamental of clinical chemistry (Norbert Tietz)8<br>Clinical chemical pathology / G.J. Gary)9<br>Basic Techniques for the medical laboratory / Jean Jorgenas |                                    |  |

|  |  |
|--|--|
| Recommended books and references (scientific journals, reports...) |  |
| Electronic References, Websites                                    |  |

## Course Description Form

| 65. Course Name: Computer Applications(1)+(2)  |       |   |  |                                    |  |
|--|-------|---|--|------------------------------------|--|
| 66. Course Code: CAI   |       |   |  |                                    |  |
| 67. Semester / Year: First semester – second semester  |       |   |  |                                    |  |
| 68. Description Preparation Date:19 /2/2024  |       |   |  |                                    |  |
| 69. Available Attendance Forms: Form of attendance: academic + practical application + on-site training (hospitals and health centers) |       |   |  |                                    |  |
| 70. Number of Credit Hours (Total) / Number of Units (Total)   |       |   |  |                                    |  |
| 3 hours (1 theoretical + 2 practical)  |       |   |  |                                    |  |
| 71. Course administrator's name (mention all, if more than one name)   |       |   |  |                                    |  |
| Name: ALI MOHAMMED ABDUL MAJEED  |       |   |  |                                    |  |
| Email: <a href="mailto:ali.majed@atu.edu.iq">ali.majed@atu.edu.iq</a>  |       |   |  |                                    |  |
| 72. Course Objectives  |       |   |  |                                    |  |
| Course Objectives  |       |   | <ul style="list-style-type: none"> <li>The student must be able to use a computer, be familiar with its use, and understand how to use its software</li> </ul> |                                    |  |
| 73. Teaching and Learning Strategies   |       |   |  |                                    |  |
| Strategy   |       | Teaching and learning methods<br>1- Theoretical lecture method<br>2- Practical lecture method<br>3- Method of discussion and dialogue |  |                                    |  |
| 74. Course Structure   |       |   |  |                                    |  |
| Week   | Hours | Required Learning Outcomes  | Unit or subject name   | Learning method                    | Evaluation method                                |
| (1)  | 2     | An introduction to computers: the generations - the components: hardware and software - (system                                       | Introduction to computers: its generations   | The lecture is theory and practice | Theoretical, practical and quarterly examination |



|                 |    |  |   |                                    |  |
|-----------------|----|--|---|------------------------------------|--|
|                 |    | software and application programs).  |   |                                    |  |
| (2)             | 2  | MS-DOS operating system the concept of the operating system system reference disks - directories their levels and files - internal operating system commands - an external commands (the most commonly used commands | S MS-DOS: operating System Concept  |                                    |  |
| (3-12)          | 10 | Internal operating system commands Internal commands: Dir Del – Time – D – Cls – RD – CI MD – Echo – R – Copy – Vol Ver – Path   | internal operating system commands  | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| 13-15)          | 3  | Windows operating system The concept of the Windows system its advantages - basic requirements - operating the system  | Windows operating system  | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| Second semester |    |  |   |                                    |  |
| (1-12)          | 12 | Desktop main screen components - the concept of the icon - how to deal with mouse  | The concept of window for any program and identifying its main components | the lecture is theory and practice | Theoretical, practical and quarterly examination |

|  |  |   |  |  |  |
|--|--|---|--|--|--|
|  |  | <p>activities - the importance and components of the Task Bar - making use of Start to enter programs - the concept of loaded tasks - exiting the system and turning off the calculator</p> <p>Shut Down.</p> <p>Take advantage of the Run option to execute programs directly, as well as switch to the MS-DOS operating system signal and deal with its commands.</p> <p>dealing with Paint is a drawing program for creating, saving and retrieving drawings through the commands it provides.</p> <p>Working with the NotePad and WordPad note window to write, save, retrieve, print texts, and change their printing style and format.</p> <p>Use entertainment programs such as Window media player to play movies</p> |  |  |  |
|--|--|---|--|--|--|

|   |   |   |                        |                                    |  |
|---|---|---|------------------------|------------------------------------|--|
|   |   | <p>Take advantage of additional Accessories programs such as the Calculator.</p> <p>The concept of the window for any program and learning about its main components -</p> <p>Dealing with desktop icons Getting to know the components of My Computer in terms of disks - folders and files</p> <p>How to deal with -</p> <p>Formatting floppy disks Copying folders and files</p> <p>- Taking advantage of cutting and pasting and knowing the properties of disks, folders and files</p> <p>- Dealing with The trash can and how to delete and retrieve files through what the trash can provides in this aspect</p> |                        |                                    |  |
| 13-15)  | 3 | <p>The concept of computer viruses how to get infected - their types, treatment, and dealing with them through antivirus programs available within the Windows operating system environment</p>   | Computer virus concept | The lecture is theory and practice | Theoretical, practical and quarterly examination |
| <b>19. Course Evaluation</b>  |   |   |                        |                                    |  |
| <p>Monthly theoretical exam 25<br/> Monthly practical exam 15+<br/> Final theoretical exam 35 +Final practical exam 25+</p> |   |   |                        |                                    |  |

## 20. Learning and Teaching Resources

|  |  |
|--|--|
| Required textbooks (curricular books, if any)                      |  |
| Main references (sources)  | Principle of anatomy , Dr. Hani Al-Azawi , 4 th edition , 1988.<br>2- Principle of anatomy , Dr. Abdul-Rahman M. Abdul- Raheim & Dr. Ali K |
| Recommended books and references (scientific journals, reports...) |  |
| Electronic References, Websites                                    |  |

## Course Description Form

|   |  |
|---|--|
| 75.   | Course Name: Human Rights & Democratic   |
|   |  |
| 76.   | Course Code: HRD   |
|   |  |
| 77.   | Semester / Year: second semester   |
|   |  |
| 78.   | Description Preparation Date: 19 /2/2024   |
|   |  |
| 79. Available Attendance Forms: Form of attendance: academic + practical application + on-site training |  |
|   |  |
| 80. Number of Credit Hours (Total) / Number of Units (Total)  |  |
| 2 hours (2 theoretical)   |  |
|   |  |
| 81.   | Course administrator's name (mention all, if more than one name)   |
| Name: Dr. Zaid Khader Jassim  |  |
| Email: <a href="mailto:zaid.bermany@atu.edu.iq">zaid.bermany@atu.edu.iq</a>                             |  |
| 82.   | Course Objectives  |
| <p><b>Course Objectives</b></p>   | <ul style="list-style-type: none"> <li>• General objectives: At the end of the academic year:</li> <li>• 1 /The student learns about the principles and values of human rights, introduces them, and educates him or her to respect and adhere to them.</li> <li>• 2 /Learn about public freedoms and what these freedoms are in their details.</li> <li>• Specific objectives:</li> <li>• 1 /The student learns about continuous awareness of human rights and the fundamental freedoms associated with them.</li> <li>• 2 /Fights everything that aims to ignore it, undermine it, or undermine its sanctity.</li> </ul> |

Learn about the concept of /3 •  
 democracy and its relationship  
 .to public freedoms

83. Teaching and Learning Strategies

**Strategy** Teaching and learning methods  
 1- Theoretical lecture method  
 2- Method of discussion and dialogue

Course Structure .Λε

| Week | Hours | Required Learning Outcomes  | Unit or subject name   | Learning method       | Evaluation method          |
|------|-------|---|--|-----------------------|----------------------------|
| (1)  | 2     | Human rights - their definition - their goals<br>Human rights in ancient civilizations, especially the Mesopotamian civilization  | Human rights - their definition - their goals                      | the lecture is theory | Monthly and quarterly exam |
| (2)  | 2     | Human rights in divine laws, with a focus on human rights in Islam  | Human rights in divine laws,                                       | the lecture is theory | Monthly and quarterly exam |
| (3)  | 2     | Non-governmental organizations and human rights (International Committee of the Red Cross - Amnesty International - Human Rights Watch - Arab Human Rights Organizations) | Non-governmental organizations and human rights                    | the lecture is theory | Monthly and quarterly exam |
| (4)  | 2     | Human rights in the Iraqi constitutions between theory and reality. The Iraqi constitution  | Human rights in the Iraqi constitutions between theory and reality | the lecture is theory | Monthly and quarterly exam |
| (5)  | 2     | the relationship between human rights and public freedoms: 1- In the Universal Declaration of Human Rights 0  | the relationship between human rights and public freedoms          | the lecture is theory | Monthly and quarterly exam |

|      |   |   |   |                       |                            |
|------|---|---|---|-----------------------|----------------------------|
| (6)  | 2 | Modern human rights: economic, social and cultural human rights and civil and political human rights 0<br>In regional charters -2<br>and national constitutions   | Modern human rights: economic, social and cultural human rights and civil and political human rights              | the lecture is theory | Monthly and quarterly exam |
| (7)  | 2 | Guarantees of respect and protection of human rights at the national and international levels<br>The role of non- governmental organizations in respecting and protecting human rights                      | Guarantees of respect and protection of human rights at the national and international levels                     | the lecture is theory | Monthly and quarterly exam |
| (8)  | 2 | Liberty and freedoms: the origin of rights and freedoms - the project's position on declared rights and freedoms - the use of the term freedoms   | General theory of freedoms  | the lecture is theory | Monthly and quarterly exam |
| (9)  | 2 | Equality: The historical development of the concept of equality<br>The modern development of the idea of equality<br>Gender equality 0 - Equality between individuals according to their beliefs and race 0 | Equality: The historical development of the concept of equality<br>The modern development of the idea of equality | the lecture is theory | Monthly and quarterly exam |
| (10) | 2 | Democracy, definition and types   | Democracy, definition and types   | the lecture is theory | Monthly and quarterly exam |
| (11) | 2 | Democracy in the world -  | Democracy in the world  | the lecture is theory | Monthly and quarterly exam |
| (12) | 2 | The crime of genocide   | The concept of annihilation   | the lecture is theory | Monthly and quarterly exam |
| (13) | 2 | The concept of freedoms, classification of public freedoms<br>Fundamental freedoms, intellectual freedoms,  | The concept of freedoms, classification of public freedoms<br>Fundamental freedoms,                               | the lecture is theory | Monthly and quarterly exam |

|      |   |  |  |                       |                            |
|------|---|--|--|-----------------------|----------------------------|
|      |   | economic and social freedoms   | intellectual freedoms, economic and social freedoms                                  |                       |                            |
| (14) | 2 | freedom of security and feeling of reassurance - freedom to come and go              | Freedom of security and feeling of reassurance - freedom to come and go              | the lecture is theory | Monthly and quarterly exam |
| (15) | 2 | Freedom of education - Freedom of the press - Freedom of assembly - Freedom of women | Freedom of education - Freedom of the press - Freedom of assembly - Freedom of women | the lecture is theory | Monthly and quarterly exam |

## 21. Course Evaluation

Monthly theoretical exam 40  
Final theoretical exam 60

## 22. Learning and Teaching Resources

|  |  |
|--|--|
| Required textbooks (curricular books, if any)                      |  |
| Main references (sources)  |  |
| Recommended books and references (scientific journals, reports...) |  |
| Electronic References, Websites                                    |  |



## Course Description Form

|  |   |
|--|---|
| 85.  | Course Name: Health Community   |
|  |   |
| 86.  | Course Code: CH2  |
|  |   |
| 87.  | Semester / Year: First semester – second semester   |
|  |   |
| 88.  | Description Preparation Date: 19 /2/2024  |
|  |   |
| 89. Available Attendance Forms: Form of attendance: academic + practical application + on-site training (hospitals and health centers) |   |
|  |   |
| 90. Number of Credit Hours (Total) / Number of Units (Total)   |   |
| 5 hours (2 theoretical + 3 practical)  |   |
|  |   |
| 91.  | Course administrator's name (mention all, if more than one name)  |
| Name: Aseel Hafez Jawad  |   |
| Email: aseel.abbod.iba@atu.edu.iq  |   |
| 92. Course Objectives  |   |
| <b>Course Objectives</b>   | <ul style="list-style-type: none"> <li>• He will be able to play with the concepts of the health of society and the technologies involved in it.</li> <li>• Ankhbeskh -: Antanb will be able to:</li> <li>• 1 .To learn about the components of counseling and counseling education.</li> <li>• 2 .To be familiar with the method of organizing family and children's forms in an organized manner.</li> <li>• 3 .To emphasize the importance of nutrition</li> </ul> |

- 4 .To play with advice concepts and advice standards and get carried away.

### 93. Teaching and Learning Strategies

|                 |   |
|-----------------|---|
| <b>Strategy</b> | Teaching and learning methods<br>1- Theoretical lecture method<br>2- Practical lecture method<br>3- Method of discussion and dialogue |
|-----------------|---|

### Course Structure .94

| Week | Hours | Required Learning Outcomes  | Unit or subject name                                | Learning method                    | Evaluation method                                |
|------|-------|---|---|------------------------------------|--|
| (1)  | 2     | Details of theoretical vocabulary<br><br>First semester                             | Single noun of the week                             | The lecture is theory and practice | Theoretical, practical and quarterly examination |
| (2)  | 2     | Definition of health and disease ,<br>The epidemiological triad                     | The epidemiological triad                           |                                    |  |
| (3)  | 2     | Community health ,<br>Maternal and childhood care                                   | Community health<br><br>Maternal and childhood care | The lecture is theory and practice | Theoretical, practical and quarterly examination |
| (4)  | 2     | Health education  | Health education                                    | The lecture is theory and practice | Theoretical, practical and quarterly examination |
| (5)  | 2     | Nutrition ,Basic food components and their importance                               | Nutrition   | The lecture is theory and practice | Theoretical, practical and quarterly examination |
| (6)  | 2     | Environmental health and its goals  | Environmental health and its goals                  | The lecture is theory and practice | Theoretical, practical and quarterly examination |
| (7)  | 2     | Medical wastes ,its classification ,<br>method of handing ,<br>how to dispose of it | Medical wastes                                      | The lecture is theory and practice | Theoretical, practical and quarterly examination |

|                 |   |  |   |                                    |  |
|-----------------|---|--|---|------------------------------------|--|
|                 |   | waste its types and disposal                                       |   |                                    |  |
| (8)             | 2 | The concept of disability and the physically and mentally disabled | The concept of disability                             | The lecture is theory and practice | Theoretical, practical and quarterly examination |
| (9)             | 2 | Rehabilitation and its type  | Rehabilitation and its type                           | The lecture is theory and practice | Theoretical, practical and quarterly examination |
| (10)            | 2 | Control of infection and transmissible diseases                    | Control of infection and transmissible diseases       | The lecture is theory and practice | Theoretical, practical and quarterly examination |
| (11)            | 2 | Transmissible disease -  | Transmissible disease                                 | The lecture is theory and practice | Theoretical, practical and quarterly examination |
| (12)            | 2 | Life Statistics , birth and death rate                             | Life Statistics , birth and death rate                | The lecture is theory and practice | Theoretical, practical and quarterly examination |
| (13)            | 2 | Details of theoretical vocabulary<br>First semester                | Single noun of the week                               | The lecture is theory and practice | Theoretical, practical and quarterly examination |
| (14)            | 2 | Definition of health and disease ,<br>The epidemiological triad    | The epidemiological triad                             | The lecture is theory and practice | Theoretical, practical and quarterly examination |
| (15)            | 2 | Community health ,<br>Maternal and childhood care                  | Community health<br>Maternal and childhood care       | The lecture is theory and practice | Theoretical, practical and quarterly examination |
| Second semester |   |  |   |                                    |  |
| (1)             | 2 | The concept of international health and its emergence              | The concept of international health and its emergence | The lecture is theory and practice | Theoretical, practical and quarterly examination |

|      |   |   |   |                                    |  |
|------|---|---|---|------------------------------------|--|
| (2)  | 2 | historical overview of international health   | International health                                    | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (3)  | 2 | Global policy of international health   | Global policy of international health                   | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (4)  | 2 | Ethical issues in international health service delivery                               | Ethical issues in international health service delivery | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (5)  | 2 | International treaties and international health diplomacy                             | International treaties                                  | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (6)  | 2 | Global health policies development  | Global health policies development                      | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (7)  | 2 | Eradication and elimination of disease  | Eradication and elimination of disease                  | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (8)  | 2 | Definition of infection disease and what are the factors of the epidemiological triad | Factors of the epidemiological Triad                    | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (9)  | 2 | Ways to prevent infection disease   | Ways to prevent infection disease                       | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (10) | 2 | Method of controlling infectious diseases   | Method of controlling infectious diseases               | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (11) | 2 | Statistical are vital   | Statistical are vital                                   | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (12) | 2 | DS and hepatitis A and B  | AIDS and hepatitis A and B                              | the lecture is theory and practice | Theoretical, practical and quarterly examination |

|      |   |                    |                           |                                    |  |
|------|---|--------------------|---------------------------|------------------------------------|--|
|      |   |                    |                           |                                    | quarterly examination                            |
| (13) | 2 | Pandemic influenza | Pandemic influenza        | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (14) | 2 | Hemorrhagic fever  | Ebola hemorrhagic disease | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (15) | 2 | Malaria            | Malaria                   | the lecture is theory and practice | Theoretical, practical and quarterly examination |

### 23. Course Evaluation

Monthly theoretical exam 25  
 Monthly practical exam 15+  
 Final theoretical exam 35 +Final practical exam 25

### 24. Learning and Teaching Resources

|  |  |
|--|--|
| Required textbooks (curricular books, if any)                      |  |
| Main references (sources)  |  |
| Recommended books and references (scientific journals, reports...) |  |
| Electronic References, Websites                                    |  |

## Course Description Form

|  |   |  |
|--|---|--|
| 95.  | Course Name: Health and Occupational Safety   |  |
|  |   |  |
| 96.  | Course Code: HOS  |  |
|  |   |  |
| 97.  | Semester / Year: First semester – second semester   |  |
|  |   |  |
| 98.  | Description Preparation Date: 19 /2/2024  |  |
|  |   |  |
| 99. Available Attendance Forms: Form of attendance: academic + practical application + on-site training (hospitals and health centers) |   |  |
|  |   |  |
| 100.   | Number of Credit Hours (Total) / Number of Units (Total)  |  |
| 5 hours (2 theoretical + 3 practical)  |   |  |
|  |   |  |
| 101.   | Course administrator's name (mention all, if more than one name)  |  |
| Name: Dr. Shahad saad mohammed   |   |  |
| Email: <a href="mailto:Shahad.mohammed.bib22@atu.edu.iq">Shahad.mohammed.bib22@atu.edu.iq</a>  |   |  |
| 102.   | Course Objectives   |  |
| <p><b>Course Objectives</b></p>  | <ul style="list-style-type: none"> <li>● At the end of his humanization, Antana will be able to recognize him</li> <li>● The importance of professional advice and safety.</li> <li>● In particular: Antana will be able to:</li> <li>● A - To recognize the harms that their livestock are exposed to in different establishments.</li> <li>● B - That the conditions for professional health care and safety provided by a means of prevention in the event of accidents are concerned.</li> <li>● General injuries and various occupational diseases.</li> </ul> |  |
|  |   |  |
| 103.   | Teaching and Learning Strategies  |  |

| <b>Strategy</b>              |              | Teaching and learning methods<br>1- Theoretical lecture method<br>2- Practical lecture method<br>3- Method of discussion and dialogue |  |                                    |  |
|------------------------------|--------------|---|--|------------------------------------|--|
| <b>104. Course Structure</b> |              |   |  |                                    |  |
| <b>Week</b>                  | <b>Hours</b> | <b>Required Learning Outcomes</b>   | <b>Unit or subject name</b>  | <b>Learning method</b>             | <b>Evaluation method</b>                         |
| (1)                          | 2            | Principles of occupational health and safety  | The concept of occupational health and safety and its goals                  | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (2)                          | 2            | Occupational health and safety in Iraq  | Occupational health  |                                    |  |
| (3)                          | 2            | Occupational health and safety and its relationship to productivity   | Production elements and production processes                                 | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (4)                          | 2            | Physical (natural) hazards  | Its types, factors in the work environment, and diseases resulting from them | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (5)                          | 2            | Noise and vibrations  | Noise and vibrations   | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (6)                          | 2            | Temperature, humidity and air velocity  | The basic factors that affect the individual's adaptation process to heat    | the lecture is theory and practice | Theoretical, practical and quarterly examination |

|      |   |                                     |   |                                    |  |
|------|---|-------------------------------------|---|------------------------------------|--|
|      |   |                                     | -The effect of temperature and humidity in the atmosphere on human health   |                                    |  |
| (7)  | 2 | Lighting and radiation of all kinds | Poor lighting, its types, and protecting the eye from the danger of improper lighting<br><br>Types of ionizing radiation and ionizing radiation | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (8)  | 2 | Atmospheric pressure                | Low atmospheric pressure - high atmospheric pressure - preventing the effects of high and low atmospheric pressure                              | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (9)  | 2 | electricity                         | Electricity risks - electric shock - prevention of electrical accidents   | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (10) | 2 | Chemical risks                      | Chemical risks resulting from the presence of solid, liquid and gaseous materials   | the lecture is theory and practice | Theoretical, practical and quarterly examination |



|      |   |   |  |                                    |  |
|------|---|---|--|------------------------------------|--|
| (11) | 2 | Chemical risks  | Which cause environmental pollution - sources of air pollution - atmospheric air pollutants and their risks - risks of gases and fumes                   | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (12) | 2 | Biological risks, infectious diseases and psychological factors | Causes of infection with biological risks and the most important causative diseases - psychological risks  | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (13) | 2 | Mechanical hazards  | Causes and prevention: Machines and hand tools - ladders and stairs  | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (14) | 2 | Industrial poisons  | Introduction to toxicology (definition of poison - the way it enters the body - its interactions inside the body and ways of excreting it from the body) | the lecture is theory and practice | Theoretical, practical and quarterly examination |

|                 |   |                                  |   |                                    |  |
|-----------------|---|----------------------------------|---|------------------------------------|--|
| (15)            | 2 | Heavy metal poisoning            | Lead - mercury - chromium   | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| Second semester |   |                                  |   |                                    |  |
| (1)             | 2 | Pesticide poisoning              | What are insecticides used for?<br>And its symptoms   | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (2)             | 2 | Poisoning with organic compounds | Organic solvents - hydrocarbons and their derivatives<br>The most important industries that use organic solvents with solvent properties  | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (3)             | 2 | Work accidents and injuries      | Definition of accident and injury, its causes and types   | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (4)             | 2 | Handling and storing materials   | Storage objectives - factors that must be studied for the storage process - sources of danger in warehouses - basic rules that must be provided in storage places -Methods of transporting and handling solid | the lecture is theory and practice | Theoretical, practical and quarterly examination |

|      |   |   |   |                                    |  |
|------|---|---|---|------------------------------------|--|
|      |   |   | and liquid materials  |                                    |  |
| (5)  | 2 | Signs and effects of safety and security              | Slides for safety and security signs - Meanings of symbols on containers of hazardous chemicals | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (6)  | 2 | Obstacles and the role of civil defense in facilities | Work injury statistics - ways to prevent occupational risks                                     | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (7)  | 2 | Medical prevention methods                            | Primary, periodic, special and rehabilitation examinations                                      | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (8)  | 2 | First aid services at the work site                   | Health and professional services at the workplace (organization and duties)                     | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (9)  | 2 | Engineering prevention methods                        | Closing - replacement - isolation   | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (10) | 2 | Ventilation   | Monitoring the work environment (detecting and measuring pollutants in the work                 | the lecture is theory and practice | Theoretical, practical and quarterly examination |

|      |   |   |  |                                    |  |
|------|---|---|--|------------------------------------|--|
|      |   |   | environment and comparing them to the recommended limits to identify an occupational health basis) |                                    |  |
| (11) | 2 | personal cleanliness<br>Personal protective equipment   | Work site inspection<br>Its types - specifications - use   | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (12) | 2 | Age and safety legislation  | 1-Decisions related to occupational health and safety<br>2- Laws<br>3- Systems<br>4-Instructions   | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (13) | 2 | Study and use of inhalable dust collection devices -<br>Study of the types of filters used to collect dust samples      | Study and use of inhalable dust  | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (14) | 2 | Study and use of the bacteria collection device   | Sample bacteria  | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (15) | 2 | Recognize the signs of safety and security by displaying slides.<br>Study and use of a lung efficiency screening device | Recognize the signs of safety and security   | the lecture is theory and practice | Theoretical, practical and quarterly examination |

|   |  |  |   |  |  |
|---|--|--|---|--|--|
|   |  |  |   |  |  |
| <b>25. Course Evaluation</b>  |  |  |   |  |  |
| Monthly theoretical exam 25<br>Monthly practical exam 15+<br>Final theoretical exam 35 +Final practical exam 25 |  |  |   |  |  |
| <b>26. Learning and Teaching Resources</b>  |  |  |   |  |  |
| Required textbooks (curricular books, if any)   |  |  |   |  |  |
| Main references (sources)   |  |  | Occupational health and safety book 2015<br>Occupational Health and Safety Management Book 2009<br>Iraqi Labor Law No. 37 of 2015<br>Law No. 2 of 2018 Instructions for Vocational Training<br>Encyclopedia of Occupational Health and Safety (ILO) |  |  |
| Recommended books and references (scientific journals, reports...)  |  |  |   |  |  |
| Electronic References, Websites   |  |  |   |  |  |

## Course Description Form

|   |       |  |                      |                 |                   |
|---|-------|--|----------------------|-----------------|-------------------|
| 105. Course Name: Medicine &Surgical  |       |  |                      |                 |                   |
| 106. Course Code: MS  |       |  |                      |                 |                   |
| 107. Semester / Year: First semester – second semester  |       |  |                      |                 |                   |
| 108. Description Preparation Date:19 /2/2024  |       |  |                      |                 |                   |
| 109. Available Attendance Forms: Form of attendance: academic + practical application + on-site training (hospitals and health centers) |       |  |                      |                 |                   |
| 110. Number of Credit Hours (Total) / Number of Units (Total)<br>6 hours (2 theoretical + 4 practical)                                  |       |  |                      |                 |                   |
| 111. Course administrator's name (mention all, if more than one name)   |       |  |                      |                 |                   |
| Name: Naiel abbass kadhiem<br>Email: drnaiel81@gmail.com  |       |  |                      |                 |                   |
| 112. Course Objectives  |       |  |                      |                 |                   |
| Course Objectives   |       | <ul style="list-style-type: none"> <li>• General Goals : ; The Student Will be able how treat simple cases Special ; The Student Will be able to give blood &amp; injection The Student Will be able to dress Wound . The Student Will be able to measure blood pressure , pulse ,Temperature</li> </ul> |                      |                 |                   |
| 113. Teaching and Learning Strategies   |       |  |                      |                 |                   |
| Strategy  |       | Teaching and learning methods<br>1- Theoretical lecture method<br>2- Practical lecture method<br>3- Method of discussion and dialogue  |                      |                 |                   |
| 114. Course Structure   |       |  |                      |                 |                   |
| Week  | Hours | Required Learning Outcomes   | Unit or subject name | Learning method | Evaluation method |

|      |   |   |  |                                    |  |
|------|---|---|--|------------------------------------|--|
| (1)  | 2 | Causes, clinical features, diagnosis, treatment.                            | Diphtheria ( Medicine ) + Head injury ( Surgery )  | The lecture is theory and practice | Theoretical, practical and quarterly examination |
| (2)  | 2 | Causes, clinical features, diagnosis, treatment, prevention of the disease. | Whooping Cough , Mumps ( M ) + Meningeal injury (S)                                      |                                    |  |
| (3)  | 2 | Causes, clinical features, diagnosis, treatment, management and approach.   | Typhoid (M) + face injury (S)  | The lecture is theory and practice | Theoretical, practical and quarterly examination |
| (4)  | 2 | Causes, clinical features, diagnosis, treatment, prevention of the disease. | Measles, German Measles , small pox (M) + surgical mouth (S),<br>Corona virus infections | The lecture is theory and practice | Theoretical, practical and quarterly examination |
| (5)  | 2 | Causes, clinical features, diagnosis, treatment, prevention of the disease. | Infection of mouth and tongue (M) + surgical tongue (S)                                  | The lecture is theory and practice | Theoretical, practical and quarterly examination |
| (6)  | 2 | Causes, clinical features, diagnosis, treatment, prevention of the disease. | Gastritis and Opticulcer (M) + gum ulcer (S)   | The lecture is theory and practice | Theoretical, practical and quarterly examination |
| (7)  | 2 | Causes, clinical features, diagnosis, treatment, prevention of the disease. | Jaundice (M) + tonsillitis (S)   | The lecture is theory and practice | Theoretical, practical and quarterly examination |
| (8)  | 2 | Causes, clinical features, diagnosis, treatment, prevention of the disease. | Heart failure (M) + esophagus ca. (S)  | The lecture is theory and practice | Theoretical, practical and quarterly examination |
| (9)  | 2 | Causes, clinical features, diagnosis, treatment, prevention of the disease. | Myocardial infarction MI angina (M)  | The lecture is theory and practice | Theoretical, practical and quarterly examination |
| (10) | 2 | Causes, clinical features, diagnosis,                                       | angina (M)   | The lecture is theory and practice | Theoretical, practical and                       |

|                 |   |   |   |                                    |  |
|-----------------|---|---|---|------------------------------------|--|
|                 |   | reatment, prevention of the disease.  |   |                                    | quarterly examination                            |
| (11)            | 2 | Causes, clinical features, diagnosis, treatment, prevention of the disease. | Ca. stomach , ca. intestine (S)                           | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (12)            | 2 | Causes, clinical features, diagnosis, treatment, prevention of the disease. | Hypertension (M) + appendicitis (S)                       | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (13)            | 2 | Causes, clinical features, diagnosis, treatment, prevention of the disease. | Congenital heart disease (M) + intestinal obstruction (S) | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (14)            | 2 | Causes, clinical features, diagnosis, treatment, prevention of the disease. | 4 Pneumonia (M) + liver abscess (S)                       | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (15)            | 2 | Causes, clinical features, diagnosis, treatment, prevention of the disease. | Asthma (M) + liver injury (S)                             | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| Second semester |   |   |   |                                    |  |
| (1)             | 2 | Causes, clinical features, diagnosis, treatment, prevention of the disease. | 1 Bronchitis (M) + cholecystitis (S)                      | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (2)             | 2 | Causes, clinical features, diagnosis, treatment, prevention of the disease. | 2 pleural effusion (M)) + gall bladder stone (S)          | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (3)             | 2 | Causes, clinical features, diagnosis, treatment, prevention of the disease. | 3 anemia (M) + spleen injury (S)                          | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (4)             | 2 | Causes, clinical features, diagnosis, treatment, prevention of the disease. | Leukemia (M) + pancreatitis (S)<br>Hemorrhagic fever      | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (5)             | 2 | Causes, clinical features, diagnosis, treatment, prevention of the disease. | Lymphoma (M) + hernia (S)                                 | the lecture is theory and practice | Theoretical, practical and quarterly examination |



|                              |   |   |   |                                    |  |
|------------------------------|---|---|---|------------------------------------|--|
| (6)                          | 2 | Causes, clinical features, diagnosis, treatment, prevention of the disease. | Hemophilia (M) + types of hernia (S)                    | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (7)                          | 2 | Causes, clinical features, diagnosis, treatment, prevention of the disease. | Glomerulonephritis (M) + tracheal obstruction (S)       | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (8)                          | 2 | Causes, clinical features, diagnosis, treatment, prevention of the disease. | Nephrotic syndrome and renal failure (M) + lung ca. (S) | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (9)                          | 2 | Causes, clinical features, diagnosis, treatment, prevention of the disease. | Rheumatoid arthritis (M) + fracture (S)                 | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (10)                         | 2 | Causes, clinical features, diagnosis, treatment, prevention of the disease. | Gout (M) + pyelonephritis (S)                           | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (11)                         | 2 | Causes, clinical features, diagnosis, treatment, prevention of the disease. | Gout (M) + pyelonephritis (S)                           | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (12)                         | 2 | Causes, clinical features, diagnosis, treatment, prevention of the disease. | Hyperparathyroidism (M) + renal stones (S)              | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (13)                         | 2 | Causes, clinical features, diagnosis, treatment, prevention of the disease. | Thyroid gland disease (M) + bladder ca. (S)             | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (14)                         | 2 | Causes, clinical features, diagnosis, treatment, prevention of the disease. | Addison diseases (M) + blood transfusion (S)            | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (15)                         | 2 | Causes, clinical features, diagnosis, treatment, prevention of the disease. | Para Thyroid gland disease (M) + hemorrhoid (S)         | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| <b>27. Course Evaluation</b> |   |   |   |                                    |  |
| Monthly theoretical exam 25  |   |   |   |                                    |  |
| Monthly practical exam 15+   |   |   |   |                                    |  |

Final theoretical exam 35 +Final practical exam 25+

## 28. Learning and Teaching Resources

|  |   |
|--|---|
| Required textbooks (curricular books, if any)                      | 1- Surgical internal medicine binding_ Dr. Fawaz Al Khalti  |
| Main references (sources)  |   |
| Recommended books and references (scientific journals, reports...) | - Principle of anatomy , Dr. Hani Al-Azawi , 4 th edition , 1988. 2<br>Principle of anatomy , Dr. Abdul Rahman M. Abdul- Raheim & D<br>Ali K<br>Internal Surgical Nursing - Written by Fayza Boulos |
| Electronic References, Websites                                    |   |

## Course Description Form

|   |  |  |
|---|--|--|
| 115.  | Course Name: Health Inspection   |  |
|   |  |  |
| 116.  | Course Code: HIN   |  |
|   |  |  |
| 117.  | Semester / Year: First semester – second semester  |  |
|   |  |  |
| 118.  | Description Preparation Date: 19 /2/2024   |  |
|   |  |  |
| 119.  | Available Attendance Forms: Form of attendance: academic + practical application + on-site training (hospitals and health centers)   |  |
|   |  |  |
| 120.  | Number of Credit Hours (Total) / Number of Units (Total)   |  |
| 6 hours (2 theoretical + 4 practical)                               |  |  |
| 121.  | Course administrator's name (mention all, if more than one name)   |  |
| Name: Zainab Kareem Jawad   |  |  |
| Email: <a href="mailto:inb.znb5@atu.edu.iq">inb.znb5@atu.edu.iq</a> |  |  |
| 122.  | Course Objectives  |  |
| <p><b>Course Objectives</b></p>                                     | <ul style="list-style-type: none"> <li>● General Goals : At the end of the academic year, the student will be able to become familiar with the programs and concept of health inspection</li> <li>● . 2- Special Goals : The students will be able to - To become familiar with the foundations, rules and requirements for the success of the inspection process.</li> <li>● B - To determine the health conditions and specifications that must be legally available in stores</li> <li>● Subject to health supervision</li> </ul> |  |
| 123.  | Teaching and Learning Strategies   |  |
| <b>Strategy</b>   | Teaching and learning methods<br>1- Theoretical lecture method<br>2- Practical lecture method  |  |

3- Method of discussion and dialogue

124. Course Structure

| Week | Hours | Required Learning Outcomes  | Unit or subject name                              | Learning method                 | Evaluation method                                |
|------|-------|---|---|---------------------------------|--|
| (1)  | 2     | The concept of health control foundations, rules, objectives and requirements the inspection process                                | The concept of health control, foundations, rules | The lecture theory and practice | Theoretical, practical and quarterly examination |
| (2)  | 2     | Structure and units of the Public Health Department their duties, and the fundamental procedures for following up health conditions | Public health department units                    |                                 |  |
| (3)  | 2     | Food system, extracted from the Public Health Law   | Food system                                       | The lecture theory and practice | Theoretical, practical and quarterly examination |
| (4)  | 2     | General conditions for granting health leave, conditions that must be met by the leave holder and the work                          | Conditions for granting health leave              | The lecture theory and practice | Theoretical, practical and quarterly examination |
| (5)  | 2     | Special conditions including hotels, restaurants, public cafes, casinos, family parks and shops selling coffee and tea.             | Special conditions                                | The lecture theory and practice | Theoretical, practical and quarterly examination |
| (6)  | 2     | Sk Ovens, bakeries and pastries, food and beverage preparation and serving shops  | Ovens, bakeries and pastries                      | The lecture theory and practice | Theoretical, practical and quarterly examination |

|                 |   |  |  |                                 |  |
|-----------------|---|--|--|---------------------------------|--|
| (7)             | 2 | TrOvens, bakeries and pastries, food and beverage preparation and serving shops  | Shops that prepare and sell ice cream services | The lecture theory and practice | Theoretical, practical and quarterly examination |
| (8)             | 2 | Stores selling meat, dairy, eggs, and animal products (wholesale)<br>Stores selling red meat, poultry and their products | Stores selling meat, dairy and eggs            | The lecture theory and practice | Theoretical, practical and quarterly examination |
| (9)             | 2 | C Stores selling ready-made food and beverages, wholesale and retail river and sea fish stores, and street kiosks        | Stores selling ready-made food and beverages   | The lecture theory and practice | Theoretical, practical and quarterly examination |
| (10)            | 2 | Barber and beauty salons, coffee grinding and selling shops, livestock and chicken shops                                 | Barber and beauty salons                       | The lecture theory and practice | Theoretical, practical and quarterly examination |
| (11)            | 2 | The role of agility  | The role of agility                            | The lecture theory and practice | Theoretical, practical and quarterly examination |
| (12)            | 2 | Food industry laboratory, food additives   | Food industry laboratory, food additives       | The lecture theory and practice | Theoretical, practical and quarterly examination |
| (13)            | 2 | Food safety (food fraud)   | Food safety                                    | The lecture theory and practice | Theoretical, practical and quarterly examination |
| (14)            | 2 | Food industry laboratory, food additives   | Food industry laboratory, food additives       | The lecture theory and practice | Theoretical, practical and quarterly examination |
| (15)            | 2 | Sweets factory, Al Rashi production factory  | Sweets factory                                 | The lecture theory and practice | Theoretical, practical and quarterly examination |
| Second semester |   |  |  |                                 |  |

|     |   |   |   |                                 |  |
|-----|---|---|---|---------------------------------|--|
| (1) | 2 | Ice factor, gypsum factor   | Ice factor, gypsum factor   | The lecture theory and practice | Theoretical, practical and quarterly examination |
| (2) | 2 | Juice and jam factories, mineral water and soft drink factories   | Juice and jam factories, mineral water and soft drink factories   | The lecture theory and practice | Theoretical, practical and quarterly examination |
| (3) | 2 | Potable water desalination and sterilization plants with spiral membrane systems and reverse osmosis, liquefaction water projects | Potable water desalination and sterilization plants with spiral membrane systems and reverse osmosis        | The lecture theory and practice | Theoretical, practical and quarterly examination |
| (4) | 2 | Beauty centers  | Beauty centers  | The lecture theory and practice | Theoretical, practical and quarterly examination |
| (5) | 2 | Cosmetics and detergent laboratories  | Cosmetics and detergent laboratories  | The lecture theory and practice | Theoretical, practical and quarterly examination |
| (6) | 2 | Means of transport intended for transporting, preserving, displaying, selling and processing food materials                       | Means of transport intended for transporting, preserving, displaying, selling and processing food materials | The lecture theory and practice | Theoretical, practical and quarterly examination |
| (7) | 2 | Public baths, swimming pools, public baths  | Public baths, swimming pools  | The lecture theory and practice | Theoretical, practical and quarterly examination |
| (8) | 2 | Organizing the work of street vendors   | Organizing the work of street vendors   | The lecture theory and practice | Theoretical, practical and quarterly examination |
| (9) | 2 | Health and environmental inspection of schools  | Health and environmental inspection of schools  | The lecture theory and practice | Theoretical, practical and quarterly examination |

|      |   |   |   |                                 |  |
|------|---|---|---|---------------------------------|--|
| (10) | 2 | Massacres                                 | Massacres                                 | The lecture theory and practice | Theoretical, practical and quarterly examination |
| (11) | 2 | Entities supporting health oversight work | Entities supporting health oversight work | The lecture theory and practice | Theoretical, practical and quarterly examination |
| (12) | 2 | Sanitary landfill sites                   | Sanitary landfill sites                   | The lecture theory and practice | Theoretical, practical and quarterly examination |
| (13) | 2 | HACCP system                              | HACCP system                              | The lecture theory and practice | Theoretical, practical and quarterly examination |
| (14) | 2 | Pull food models                          | Pull food models                          | The lecture theory and practice | Theoretical, practical and quarterly examination |
| (15) | 2 | Work contexts                             | Work contexts                             | The lecture theory and practice | Theoretical, practical and quarterly examination |

### 29. Course Evaluation

Monthly theoretical exam 25  
 Monthly practical exam 15+  
 Final theoretical exam 35 +Final practical exam 25

### 30. Learning and Teaching Resources

|  |  |
|--|--|
| Required textbooks (curricular books, if any)                      |  |
| Main references (sources)  | 1- Iraqi Ministry of Health - Health Oversight Guide 2012-2013<br>2 -Public Health Law No. 89 of 1981 and its amendments<br>3 -Law No. 54 of 2001 (Eighth Amendment to the Public Health Law)<br>4 -Food Regulation No. 29 of 1981 |
| Recommended books and references (scientific journals, reports...) |  |
| Electronic References, Websites                                    |  |

## Course Description Form

|                                 |   |
|---------------------------------|---|
| 125.                            | Course Name: Epidemiology1+2  |
| 126.                            | Course Code: EPI  |
| 127.                            | Semester / Year: First semester – second semester   |
| 128.                            | Description Preparation Date:19 /2/2024   |
| 129.                            | Available Attendance Forms: Form of attendance: academic + practical application + on-site training (hospitals and health centers)  |
| 130.                            | Number of Credit Hours (Total) / Number of Units (Total)<br>4 hours (2 theoretical + 2 practical)   |
| 131.                            | Course administrator's name (mention all, if more than one name)<br>Name: Ibtisam Mohammed Hussein<br>Email: inb.ebts@atu.edu.iq  |
| 132.                            | Course Objectives   |
| <p><b>Course Objectives</b></p> | <ul style="list-style-type: none"> <li>• General Goals : The student will be able to understand the concept of epidemiology and its techniques</li> <li>• He will be able to learn about how diseases occur and how infectious diseases are transmitted and controlled</li> <li>• To learn how to analyze the occurrence of epidemics</li> <li>• To identify the pathogens</li> <li>• To learn about calculating the spread of diseases and calculating the different rates of diseases and deaths</li> </ul> |
| 133.                            | Teaching and Learning Strategies  |
| <b>Strategy</b>                 | Teaching and learning methods   |



- 1- Theoretical lecture method
- 2- Practical lecture method
- 3- Method of discussion and dialogue

#### 134. Course Structure

| Week | Hours | Required Learning Outcomes  | Unit or subject name       | Learning method                    | Evaluation method                                |
|------|-------|---|----------------------------|------------------------------------|--|
| (1)  | 2     | Types of epidemiology, - objectives basics - general strategies , factors that control the infection process        | .Epidemiology              | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (2)  | 2     | General definitions used in the study of epidemiology, disease measures, risk factors in epidemiology               | Terms used in epidemiology |                                    |  |
| (3)  | 2     | The epidemiological triad, its importance and applications disease Factors of- currence (personality, place, time ) | and epidemiological        | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (4)  | 2     | transmissible and non - diseases transmissible and factors that control the infection process                       | Transmissible diseases     | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (5)  | 2     | prevention Methods and control of communicable diseases   | infectious diseases        | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (6)  | 2     | immunity - General herd immunity and the factors that determine the immunity levels in human body                   | Immunity                   | the lecture is theory and practice | Theoretical, practical and quarterly examination |

|      |   |  |   |  |   |
|------|---|--|---|--|---|
| (7)  | 2 | types - ) Vaccines<br>methods - giving them,<br>preserving them,<br>administering them   | Vaccines                                    | the lecture is<br>theory and<br>practice | Theoretical,<br>practical and<br>quarterly<br>examination |
| (8)  | 2 | Epidemiological<br>investigation and<br>monitoring (<br>objectives of<br>epidemiological<br>monitoring - basic<br>steps for<br>epidemiological<br>( monitoring<br>Types of<br>epidemiological studies            | Epidemiological<br>monitoring               | the lecture is<br>theory and<br>practice | Theoretical,<br>practical and<br>quarterly<br>examination |
| (9)  | 2 | of Methods<br>investigating epidemic<br>diseases   | Epidemiological<br>investigation            | the lecture is<br>theory and<br>practice | Theoretical,<br>practical and<br>quarterly<br>examination |
| (10) | 2 | Administrative<br>division of health<br>prevention<br>departments in the<br>Ministry of Health<br>mechanism and the<br>of work in the field<br>of prevention<br>laws form for Instant -<br>communicable diseases | Health prevention                           | the lecture is<br>theory and<br>practice | Theoretical,<br>practical and<br>quarterly<br>examination |
| (11) | 2 | German - Measles<br>measles - mumps  | German - Measles<br>measles - mumps         | the lecture is<br>theory and<br>practice | Theoretical,<br>practical and<br>quarterly<br>examination |
| (12) | 2 | polio - Tuberculosis   | tuberculosis - polio                        | the lecture is<br>theory and<br>practice | Theoretical,<br>practical and<br>quarterly<br>examination |
| (13) | 2 | whooping - Diphtheria<br>cough - tetanus   | - Diphtheria<br>whooping cough -<br>tetanus | the lecture is<br>theory and<br>practice | Theoretical,<br>practical and<br>quarterly<br>examination |

|                 |   |  |   |                                    |  |
|-----------------|---|--|---|------------------------------------|--|
| (14)            | 2 | hepatitis Viral  | hepatitis Viral                           | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (15)            | 2 | typhoid fever - Malta Typhoid fever  | typhoid fever - Typhoid Malta fever       | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| Second semester |   |  |   |                                    |  |
| (1)             | 2 | diseases that occurred their ,in the world consequences, and dealing with them | diseases Epidemic                         | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (2)             | 2 | ( Regional plan )  | against Vaccination communicable diseases | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (3)             | 2 | of health Types prevention, environmental pollution, medical . waste           | prevention Health                         | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (4)             | 2 | poisoning (types Food and causes )   | poisoning Food                            | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (5)             | 2 | meningitis Cerebral  | meningitis Cerebral                       | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (6)             | 2 | Cholera  | Cholera                                   | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (7)             | 2 | bags Water   | Water bags                                | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (8)             | 2 | Malaria  | Malaria                                   | the lecture is theory and practice | Theoretical, practical and quarterly examination |

|      |   |  |                                   |                                    |  |
|------|---|--|-----------------------------------|------------------------------------|--|
| (9)  | 2 | Schistosomiasis  | Schistosomiasis                   | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (10) | 2 | Influenza Pandemic (types and causes )   | Influenza Pandemic                | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (11) | 2 | Covid - 19 (factors - that led to the emergence of new viruses belonging to the coronavirus family | -Covid <sup>19</sup> -            | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (12) | 2 | Acquired immunodeficiency disease  | Acquired immunodeficiency disease | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (13) | 2 | fever Hemorrhagic  | Hemorrhagic fever                 | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (14) | 2 | pox Chicken  | Chicken pox                       | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (15) | 2 | Rabies   | rabies                            | the lecture is theory and practice | Theoretical, practical and quarterly examination |

### 31. Course Evaluation

Monthly theoretical exam 25  
 Monthly practical exam 15+  
 Final theoretical exam 35 +Final practical exam 25

### 32. Learning and Teaching Resources

|  |   |
|--|---|
| Required textbooks (curricular books, if any)                      | Community Health Guide / Dr. Amjad Niazi 1986 |
| Main references (sources)  |   |
| Recommended books and references (scientific journals, reports...) |   |
| Electronic References, Websites                                    |   |

## Course Description Form

|      |  |   |
|------|--|---|
| 135. | Course Name: Pharmacology  |   |
| 136. | Course Code: PHA   |   |
| 137. | Semester / Year: First semester – second semester  |   |
| 138. | Description Preparation Date: 19 /2/2024   |   |
| 139. | Available Attendance Forms: Form of attendance: academic + practical application + on-site training (hospitals and health centers) |   |
| 140. | Number of Credit Hours (Total) / Number of Units (Total)<br>4 hours (2 theoretical + 2 practical)                                  |   |
| 141. | Course administrator's name (mention all, if more than one name)<br>Name: Ali Kareem Hameed<br>Email: ali.rasheed.bib7@atu.edu.iq  |   |
| 142. | Course Objectives  |   |
|      | <b>Course Objectives</b>   | <ul style="list-style-type: none"> <li>● General: the student must know</li> <li>● 1- Basic science of pharmacology 2- The activity of drugs 3-Absorption and excretion of drug 4- Dose and dosage form 5- Toxicology, toxins, poisoning with metals</li> </ul> <p>Specific: 1- Routes of drug administration. 2- Effect of drug on the body. 3- Injection routes of drug administration. 4- Toxicity with drugs and metals</p> |
| 143. | Teaching and Learning Strategies   |   |
|      | <b>Strategy</b>  | Teaching and learning methods<br>1- Theoretical lecture method<br>2- Practical lecture method   |

3- Method of discussion and dialogue

144. Course Structure

| Week              | Hours | Required Learning Outcomes   | Unit or subject name                  | Learning method                    | Evaluation method                                |
|-------------------|-------|--|---------------------------------------|------------------------------------|--|
| (1)               | 2     | Introduction and general definition of pharmacology (pharmacology, pharmacy, pharmacists, Dose, Concentration)   | Introduction and General pharmacology | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (2)<br>(3)<br>(4) | 6     | Infection: Antibacterial, antiviral, antifungal, antiprotozoal, Anthelmintic drugs   | Infection                             |                                    |  |
| (5)               | 2     | Nutrition: vitamins. parenteral nutrition, electrolyte, intravenous fluid  | Nutrition                             | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (6)               | 2     | Corticosteroid drugs   | Corticosteroid drugs                  | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (7)               | 2     | Non-steroidal anti-inflammatory drugs  | Non-steroidal anti-inflammatory drugs | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (8)<br>(9)        | 4     | Cardiovascular system drugs Digitalis and cardiac glycoside, Diuretics, Adrenoreceptors blocking   | Cardiovascular system drugs           | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (10)<br>(11)      | 4     | Gastrointestinal tract drugs. Antacid, Antispasmodic, relieving peptic and ulcer, Antidiarrheal, Laxative, Rectal and colonic drug, intestinal section | Gastrointestinal tract drugs          | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (12)<br>(13)      | 4     | Respiratory system Bronchodilator, corticosteroids. Allergic   | Respiratory system                    | the lecture is theory and practice | Theoretical, practical and quarterly examination |

|                 |   |   |                                 |                                    |  |
|-----------------|---|---|---------------------------------|------------------------------------|--|
|                 |   | disorders, respiratory stimulant, mucolytic, anti-tussive and expectorant, nasal decongestant   |                                 |                                    |  |
| (14)<br>(15)    | 4 | Endocrine<br>Drug use in diabetic, hypoglycemia, pituitary hormone, thyroid and thyroid drug. female sex hormone male sex hormone and anti- androgens, anabolic steroid, hyperglycemia drug, hyperandocrine hyper lipid<br>Imia drugs | Endocrine                       | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| Second semester |   |   |                                 |                                    |  |
| (1)             | 2 | G U T<br>uterine stimulant, uterine relaxants, vulvar and vaginal disorder.<br>contraceptics ut disorder  | G U T                           | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (2)<br>(3)      | 4 | Muscular skeletal disorder<br>chronic rheumatic disease, treatment of gut, myasthenia gravis, muscle relaxant, rubefacients. soft tissue inflammation   | muscular skeletal disorder      | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (4)<br>(5)      | 4 | Blood formation and coagulation<br>Iron deficiency anemia, other type of anemia<br>anticoagulant, antiplatelet, fibrin lytic and anti-fibrinolytic  | blood formation and coagulation | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (6)<br>(7)      | 4 | Skin<br>Emollients, antipruritic, topical corticosteroid<br>eczema psoriasis acne<br>antibacterial disinfectant   | Skin                            | the lecture is theory and practice | Theoretical, practical and quarterly examination |

|              |   |  |              |  |   |
|--------------|---|--|--------------|--|---|
|              |   | antifungal antiviral<br>antiparasitic melanizing and<br>demeaning  |              |  |   |
| (8)          | 2 | E N T<br>Drug acting on E NT<br>including antibiotic and<br>inflammatory   | E N T        | the lecture is<br>theory and<br>practice | Theoretical,<br>practical and<br>quarterly<br>examination |
| (9)          | 2 | EYE<br>Anti- infective<br>preparations, anti-<br>inflammatory.<br>mydriatics,cycloplegics<br>.Glaucoma other<br>preparation  | EYE          | the lecture is<br>theory and<br>practice | Theoretical,<br>practical and<br>quarterly<br>examination |
| (10)<br>(11) | 2 | Chemotherapy and<br>immunosuppressant<br>Alkylating,<br>antimetabolites,enzyme ,<br>hormones . alter<br>immunosuppressant  | Chemotherapy | the lecture is<br>theory and<br>practice | Theoretical,<br>practical and<br>quarterly<br>examination |
| (12)<br>(13) | 2 | Anesthesia<br>general anesthesia, local,<br>inhalation, parenthetic  | Anesthesia   | the lecture is<br>theory and<br>practice | Theoretical,<br>practical and<br>quarterly<br>examination |
| (14)<br>(15) | 2 | C N S<br>Hypnotic and anxiolytic<br>antipsychotic,<br>antidepressants, CNS<br>stimulants ,anorectics.<br>analgesic (mild, moderate,<br>sever pain, migraine,<br>antiepileptic's,<br>parkinsonism, drug use in<br>chorea, tics, trigeminal<br>neuralgia | C N S        | the lecture is<br>theory and<br>practice | Theoretical,<br>practical and<br>quarterly<br>examination |

### 33. Course Evaluation

Monthly theoretical exam 25  
 Monthly practical exam 15+  
 Final theoretical exam 35 +Final practical exam 25+

### 34. Learning and Teaching Resources

Required textbooks (curricular books, if any)

Main references (sources)



|   |  |
|---|--|
| <p>Recommended books and references (scientific journals, reports...)</p> | <p>Mycek, M .J. ; Harvey R.A. and Champe , P.C. (1997).Lippencott's Illustrated Reviews: Pharmacology.(2nd ed.). Lippincott-aven, Philadel phia New York . - Laurence, D.R. ; Bennett , P.N. and Brown, M.J.(1997).Clinical Pharmacology. New York ; London : Churchill Livingstone.</p> |
| <p>Electronic References, Websites</p>                                    |  |

## Course Description Form

|   |  |  |                      |                       |                            |
|---|--|--|----------------------|-----------------------|----------------------------|
| 145. Course Name: professional Ethics   |  |  |                      |                       |                            |
|   |  |  |                      |                       |                            |
| 146. Course Code: PRE   |  |  |                      |                       |                            |
|   |  |  |                      |                       |                            |
| 147. Semester / Year: second semester   |  |  |                      |                       |                            |
|   |  |  |                      |                       |                            |
| 148. Description Preparation Date:19 /2/2024  |  |  |                      |                       |                            |
|   |  |  |                      |                       |                            |
| 149. Available Attendance Forms: Form of attendance: academic + practical application + on-site training (hospitals and health centers) |  |  |                      |                       |                            |
|   |  |  |                      |                       |                            |
| 150. Number of Credit Hours (Total) / Number of Units (Total)   |  |  |                      |                       |                            |
| 2 hours (2 theoretical )  |  |  |                      |                       |                            |
| 151. Course administrator's name (mention all, if more than one name)   |  |  |                      |                       |                            |
| Name: Maysoon Kooshi Jasim  |  |  |                      |                       |                            |
| Email: maysoon.Husain iba3@.atu.edu.iq  |  |  |                      |                       |                            |
| 152. Course Objectives  |  |  |                      |                       |                            |
| Course Objectives   |  | <ul style="list-style-type: none"> <li>General Goals : Identify the basic etiquette of professional behavior for workers in medical specialties.</li> <li>2- Special Goals : Qualifying the graduate on professional behavior in dealing with his profession to achieve compatibility with his professional self (the patient, his companions, workers in the health field, and medical equipment).</li> </ul> |                      |                       |                            |
| 153. Teaching and Learning Strategies   |  |  |                      |                       |                            |
| Strategy  | Teaching and learning methods<br>1- Theoretical lecture method<br>2- Method of discussion and dialogue |  |                      |                       |                            |
| Course Structure . ١٠٤  |  |  |                      |                       |                            |
| Week  | Hours  | Required Learning Outcomes   | Unit or subject name | Learning method       | Evaluation method          |
| (1)   | 2  | Professional conduct   | Professional conduct | the lecture is theory | Monthly and quarterly exam |

|     |   |   |   |                       |                            |
|-----|---|---|---|-----------------------|----------------------------|
|     |   | definition - its concept, its practical applications, the relationship between workers and their bosses - the components of human behavior  | Its definition - its concept  |                       |                            |
| (2) | 2 | Principles of professional etiquette in the stages of civilizational developments<br>Principles of - professional ethics in Arab and Islamic civilization<br>I practice - dealing with patients in hospitals from ancient times until now | Principles of professional etiquette in the stages of civilizational developments | the lecture is theory | Monthly and quarterly exam |
| (3) | 2 | Behavioral trends and tendencies, their classification, factors influencing them, and ways of developing them   | Behavioral trends and tendencies,   | the lecture is theory | Monthly and quarterly exam |
| (4) | 2 | The Values, customs and traditions<br>Its definition, classification, factors affecting it, methods of ,its establishment   | The Values, customs and traditions  | the lecture is theory | Monthly and quarterly exam |
| (5) | 2 | Personality types, how to deal with them<br>Definition of personality, its types, relationships, nature,  | Personality types   | the lecture is theory | Monthly and quarterly exam |

|     |   |   |  |                       |                            |
|-----|---|---|--|-----------------------|----------------------------|
|     |   | motivations and interpretations   |  |                       |                            |
| (6) | 2 | Basic ethics of the health and medical profession<br>Characteristics and characteristics of health workers, appearance, behavior and commitment<br>Characteristics of a - successful medical associate<br>Some undesirable - practices in the medical field | Basic ethics of the health and medical profession    | the lecture is theory | Monthly and quarterly exam |
| (7) | 2 | The legal and moral rights of the patient<br>Legal and moral rights of workers in health and medical professions  | The legal and moral rights of the patient            | the lecture is theory | Monthly and quarterly exam |
| (8) | 2 | Behavioral dealing with the patient<br>Receiving and dealing with the patient and maintaining professional secrets<br>Determine appointments for required procedures<br>Maintaining the - patient's needs   | Behavioral dealing with the patient                  | the lecture is theory | Monthly and quarterly exam |
| (9) | 2 | Behavioral handling of medical devices and equipment<br>Daily access to - devices, tools and solutions<br>Requirements, - preparing them for daily work, sustaining them, maintaining them and preserving them  | Behavioral handling of medical devices and equipment | the lecture is theory | Monthly and quarterly exam |

|      |   |   |  |                          |                               |
|------|---|---|--|--------------------------|-------------------------------|
|      |   | Preparing the -<br>necessary medications<br>work and disposing<br>.of them properly   |  |                          |                               |
| (10) | 2 | Conditions for the<br>embodiment of mental<br>.health<br>Definition of the -<br>factors affecting it<br>The role of mental -<br>.health in diseases   | conditions for the<br>embodiment of mental<br>health   | the lecture is<br>theory | Monthly and<br>quarterly exam |
| (11) | 2 | Professional<br>compatibility and its<br>relationship to work (its<br>concept and conditions)   | Professional<br>compatibility  | the lecture is<br>theory | Monthly and<br>quarterly exam |
| (12) | 2 | Occupational safety<br>preventing work risks -<br>.and accidents<br>preventing the risks of -<br>bacterial, toxic and<br>radioactive<br>contamination<br>preventing the risk of -<br>infection from<br>infectious and<br>communicable<br>.diseases<br>Avoid wrong -<br>practices in the field of<br>.work | Occupational safety  | the lecture is<br>theory | Monthly and<br>quarterly exam |
| (13) | 2 | The humanitarian,<br>religious and<br>democratic dimensions<br>of the health and<br>medical professions   | The humanitarian,  | the lecture is<br>theory | Monthly and<br>quarterly exam |
| (14) | 2 | The role of the medical<br>personnel in reporting<br>and spreading health<br>culture among<br>members of society<br>Factors of effective -<br>communication<br>between medical<br>personnel and patients  | The role of the medical<br>personnel in reporting<br>and spreading health<br>culture among<br>members of society | the lecture is<br>theory | Monthly and<br>quarterly exam |

|   |   |  |  |                          |                               |
|---|---|--|--|--------------------------|-------------------------------|
|   |   | Conditions necessary -<br>for the success of a<br>medical member during<br>his watch |  |                          |                               |
| (15)  | 2 | - Applications in<br>professional behavior   | Applications in<br>professional behavior   | the lecture is<br>theory | Monthly and<br>quarterly exam |
| <b>35. Course Evaluation</b>  |   |  |  |                          |                               |
| Monthly theoretical exam 40<br>Final theoretical exam 60              |   |  |  |                          |                               |
| <b>36. Learning and Teaching Resources</b>                            |   |  |  |                          |                               |
| Required textbooks (curricular books, if any)                         |   |  | Professional Behavior - Written by Dr.<br>Adnan Shaker - Dr. Hana Ahmed Tawf<br>- Dr. Abdullah Jassim  |                          |                               |
| Main references (sources)   |   |  | The Islamic Constitution for the Medic<br>Profession - Kuwait Document - 1981<br>the First World Conference - Islamic<br>Medicine in Kuwait<br>Forensic medicine and professional eth<br>- written by Dr. Dhia Al-Moussawi 198<br>A handbook on the professional behavi<br>of doctors<br>A handbook on the professional behavi<br>of doctors - issued by the Iraqi Medical<br>Syndicate 1977 |                          |                               |
| Recommended books and references (scientific<br>journals, reports...) |   |  | Professional Behavior for Doctors -<br>Written by Dr. Raji Abbas Al-Tikriti<br>1970  |                          |                               |
| Electronic References, Websites                                       |   |  |  |                          |                               |

## Course Description Form

|  |  |  |
|--|--|--|
| 155.                                   | Course Name: Environment Health  |  |
|  |  |  |
| 156.                                   | Course Code: EH  |  |
|  |  |  |
| 157.                                   | Semester / Year: First semester –  |  |
|  |  |  |
| 158.                                   | Description Preparation Date: 19 /2/2024   |  |
|  |  |  |
| 159.                                   | Available Attendance Forms: Form of attendance: academic + practical application + on-site training (hospitals and health centers)   |  |
|  |  |  |
| 160.                                   | Number of Credit Hours (Total) / Number of Units (Total)   |  |
| 4 hours (2 theoretical + 2 practical)  |  |  |
| 161.                                   | Course administrator's name (mention all, if more than one name)   |  |
| Name: Haider farhan Abdullah           |  |  |
| Email: haider.abdullah.iba3@atu.edu.iq |  |  |
| 162.                                   | Course Objectives  |  |
| <b>Course Objectives</b>               | <ul style="list-style-type: none"> <li>• General: The student should be able to identify the most important environmental components and their sources of pollution, toxins, poisoning with metals</li> <li>• Specific Learn about water, soil and air pollution in cities and how to treat pollutants</li> <li>• Treatment of all industrial waste</li> <li>• Ground and surface water treatment</li> <li>• Identify global environmental problems and heat emission</li> </ul> |  |
| 163.                                   | Teaching and Learning Strategies   |  |
| <b>Strategy</b>                        | Teaching and learning methods  |  |
|  | 1- Theoretical lecture method  |  |
|  | 2- Practical lecture method  |  |
|  | 3- Method of discussion and dialogue   |  |
| Course Structure .١٦٤                  |  |  |

| Week       | Hours | Required Learning Outcomes  | Unit or subject name                               | Learning method                    | Evaluation method                                |
|------------|-------|---|--|------------------------------------|--|
| (1)        | 2     | Environmental health concept<br>Objectives<br>Types of environment  | Environmental Health                               | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (2)        | 2     | The concept and importance of environmental components<br>Types of pollutants and bioremediation                                | Environment components<br>Environmental pollutants | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (3)<br>(4) | 4     | Air pollution concept<br>And risks that affect human health<br>And risks affecting the environment                              | air pollution                                      | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (5)<br>(6) | 4     | Natural resources<br>Unnatural sources<br>How to reduce the dangers of air pollution  | air pollution                                      | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (7)        | 2     | What does air pollution mean<br>Causes that lead to water pollution<br>How can water be treated                                 | Water pollution                                    | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (8)<br>(9) | 4     | Causes of water pollution<br>The main sources of water pollution<br>Diseases resulting from Water pollution and how to treat it | Water pollution                                    | the lecture is theory and practice | Theoretical, practical and quarterly examination |



|      |   |  |  |                                    |  |
|------|---|--|--|------------------------------------|--|
| (10) | 2 | Soil pollution concept<br>Causes that lead to soil pollution<br>Types of defects<br>And treatment of soil pollution  | Soil contamination   | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (11) | 2 | Waste sources<br>The impact of waste on the environment<br>Waste treatment methods                                   | Drainage of waste and waste                                    | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (12) | 4 | Sources of waste and waste<br>The impact of waste on the environment<br>Waste treatment                              | Drainage of waste and waste                                    | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (13) | 2 | Wastewater concept<br>Main sources of wastewater<br>The impact of wastewater on the environment<br>Processing effect | Sewage water treatment   | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (14) | 2 | The effect of foods on food<br>Diseases caused by food to humans<br>How<br>Reducing its harms                        | Environment, food, foodborne diseases<br><br>Food preservation | the lecture is theory and practice | Theoretical, practical and quarterly examination |
| (15) | 2 | Types of insects and their impact on the environment<br>Insect control methods                                       | Insect and rodent control                                      | the lecture is theory and practice | Theoretical, practical and quarterly examination |

|  |  |   |  |  |  |
|--|--|---|--|--|--|
|  |  | What are rodents?<br>How to control rodents |  |  |  |
| <b>37. Course Evaluation</b>   |  |   |  |  |  |
| Monthly theoretical exam 25<br>Monthly practical exam 15+<br>Final theoretical exam 35 +Final practical exam 25+ |  |   |  |  |  |
| <b>38. Learning and Teaching Resources</b>   |  |   |  |  |  |
| Required textbooks (curricular books, if any)  |  |   |  |  |  |
| Main references (sources)  |  |   |  |  |  |
| Recommended books and references (scientific journals, reports...)   |  |   |  |  |  |
| Electronic References, Websites  |  |   |  |  |  |