

## Academic Program Description Form

For the academic year 2023–2024

University name: University Tikrit

College/Institute: College Management and Economics

Scientific Department: Department Economy

Name of academic or professional program: Department of Economics

Final Certificate Name: Bachelor Sciences in Economics

Academic system: Course system

Description preparation date: 1/28/2024

Date of filling the file: 1/28/2024

  
التوقيع:

اسم المعاون العلمي: د. أشرف هاشم

فارس العبدون

التاريخ:

  
التوقيع:

اسم رئيس القسم: د. إبراهيم

عبدالله جاسم

التاريخ:

دقق الملف من قبل

شعبة ضمان الجودة والأداء الجامعي

اسم مدير شعبة ضمان الجودة والأداء الجامعي: أسامة موسى فرحان

  
التوقيع:

/ / التاريخ



مصادقة السيد العميد

## 1. Program Vision

- ❖ Effective contribution to building an advanced economy based on sound planning in accordance with appropriate economic policies. Reality and following an advanced scientific approach in preparing economic curricula

## 2. Program message

- ❖ The objective need of the public and private sectors requires the formulation of economic plans and programmes at the micro and macro levels and the development of policies to achieve a set of economic and social objectives according to priorities embodied by the necessities and available capabilities. Here, it is necessary to prepare specialised cadres to conduct economic research and studies in a way that contributes to deepening economic awareness and maximising the economic and social benefits of available resources.

## 3. Program objectives

1. Graduating specialized cadres in the field of planning and building economic policies, capable of integrating into the labor market and economic life.
2. Developing students' skills to enable them to Integration into the labor market.
3. Motivating and supporting the faculty in the department to conduct studies and provide consultations. Economic For public and private entities in Iraq.
4. Effective contribution to preparing training and continuing education programs to develop expertise and skills in public and private sector institutions.

## 4. Program accreditation

5. Do The program Is the program accredited? And from which authority? both

## 5. Other external influences

6. Is there a sponsor? For program Yes, the Ministry of Higher Education and Scientific Research, the Presidency of Tikrit University, and the Deanship of the College of Administration and Economics.

## 6. Program Structure

comments	percentage	Study unit	Number of courses	Program Structure
	6.9%	10	5	Institutional Requirements
	7.5%	11	4	College

				Requirements
	<b>85.6%</b>	<b>125</b>	<b>55</b>	Department Requirements
	<b>Completed</b>			Summer training
				Other

\*Notes may include whether the course is basic or optional.

### 7. Program Description / Curriculum of the Department of Economics

Credit hours		Course name	Course code	Year/Level
practical	theoretical			
	3	Management principles		<b>First</b>
	3	Principles of Economics 1		
	2	Principles of Statistics		
2	1	Computer 1		
	2	Arabic		
	2	Human rights and democracy		
	3	Economic Readings1English		
	2	Principles of mathematics		
	3	Accounting principles		
	2	Economic Readings 2English		
	3	Principles of Economics 2		
	2	English language		
	3	Microeconomic theory1		<b>Second</b>
	2	Baath crimes		
	2	Economic statistics1		
	2	National Accounts1		
	2	Economic facts history		
	2	Economics of money		
	2	Human Resource Economics		
2	1	Computer 1		

	2	Mathematics for Economists	
	3	Microeconomic Theory 2	
	2	Economic Statistics 2	
	2	English language	
	2	History of Economic Thought 2	
	2	Banking Economics	
	2	National Accounts2	
2	1	Computer2	
	2	Mathematics for Economists 2	
	3	Mathematical Economics 1	
	2	International Economy	
	2	Economic development	
	3	Public Finance	
	3	Macroeconomics 1	
	2	Agricultural economics	
	2	Environmental Economics	
	2	Industrial economy	
	2	Knowledge Economics	
	2	English language	
	2	Development policy	
	2	Financial policy	
	2	Industrial policy	
	2	Agricultural policy	
	2	International Policy	
	3	Mathematical Economics 2	
	3	Macroeconomics 2	
	2	Economic development	
	3	Sports economics	
	3	Public Finance	
	2	Industrial economy	
	2	Educational guidance	
	3	Macroeconomics 1	
	2	English language	
	2	Educational management	
	2	Development policy	

**Third /  
General  
Economics**

**Third /  
Economic  
Teachers  
Branch**

	3	International Economy		
	3	Agricultural economics		
2	1	Computer		
	2	psychology		
	3	Macroeconomics 2		
	2	Educational foundations		
	2	Financial policy		
	3	Critical theory		
	3	Econometrics 1		
	3	Economic systems		
	2	Search methods		
	2	International Finance		
	2	Operations Research 1		
	3	Economic feasibility studies		
	2	Oil Economics		
	2	Economic planning		
	3	Monetary policy		
	3	Econometrics2		
	2	Computer applications (EV)		
	3	Economic Project Evaluation		
	2	Financial institutions		
	2	Operations Research 2		
	2	English language		
	2	Planning policy		
	2	Energy Economics		

**Fourth**

**8. Expected learning outcomes of the program**

**Knowledge**

- |                                                                              |                                                                                                                                                                                                |
|------------------------------------------------------------------------------|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| - Providing the labor market with the necessary skills from human resources. | - Providing graduates who are able to perform economic analysis and predict economic variables.<br>- Disseminating knowledge in government institutions to achieve the aspirations of society. |
|------------------------------------------------------------------------------|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|

**Skills**

<ul style="list-style-type: none"> <li>- The ability of economics graduates to conduct economic feasibility studies and economic analysis.</li> </ul>	<ul style="list-style-type: none"> <li>- The ability to solve economic problems that economic activity suffers from, such as inflation and recession.</li> <li>- Exchange of experiences and data with ministries with economic decision-making powers</li> </ul>
<ul style="list-style-type: none"> <li>- Our outputs should be knowledgeable and skilled in how to accomplish the tasks assigned to them.</li> </ul>	<ul style="list-style-type: none"> <li>- Providing economic advice to the public and private sectors.</li> </ul>

### Values

<ul style="list-style-type: none"> <li>- Adherence to professional ethics and the ability to demonstrate high professional competence.</li> </ul>	<ul style="list-style-type: none"> <li>- Establishing social and ethical responsibility.</li> <li>- Serving the community and meeting its requirements.</li> </ul>
<ul style="list-style-type: none"> <li>- The student must believe in the principles of integrity and transparency, and have the ability to apply the concepts of quality management.</li> </ul>	<ul style="list-style-type: none"> <li>- Integrity and transparency.</li> <li>- Quality.</li> </ul>

### 9. Teaching and learning strategies

1. Active learning: Encouraging students' active participation in learning processes, such as discussions, group activities, and problem solving, to enhance their deep understanding of mathematical concepts.
2. Cooperative learning: Encouraging students to work together in small groups to solve problems related to their studies and sharing ideas, which contributes to enhancing interaction and knowledge exchange between them.
3. Use of Technology: Leveraging technology to provide interactive learning tools such as computer software and online resources to enhance student understanding and motivation.

4. Problem-based learning: presenting specific problems and motivating students to think critically and use skillsAdministrativeTo solve it.
5. Multiple Instructional Strategies: Providing a variety of instructional strategies, such as interactive lectures, practical lessons, and hands-on exercises, to meet the diverse needs of students.
6. Promote thinkingAdministrativeEncourage students to develop thinking skills.AdministrativeSuch as analysis, planning and inference, by providing stimulating questions and applied problems.
7. Provide immediate feedback: Provide mechanisms to provide immediate feedback to students on their performance and understanding of concepts.Administrative, whether through periodic assessments or direct interaction with the teacher.

## 10. Evaluation methods

1. Classroom performance assessment: This includes assessing students' performance during lessons, lectures and workshops, whether through written tests or continuous assessment of their participation and understanding of the material.
2. Participation in discussions and activities: Students' participation in class discussions, group activities, and individual projects can be assessed to assess their understanding and engagement with the material.
3. Tests and assignments: Students may be given regular tests and assessment assignments to assess their problem-solving skills.related to their field of expertiseAnd their understanding of the concepts presented.
4. Evaluating participation in research: The extent to which students participate in research activities and scientific projects can be assessed, and an evaluation can be provided of their presentation style and analysis of their results and conclusions.
5. Practical Performance Evaluation: Students can be evaluated in practical performance through:VisitsProcess and participation in applied activities.
6. Evaluation of external participation: This includes evaluation of the extent of students' participation in external activities such as conferences, seminars, and

sports competitions.

7. Evaluation of Personal and Professional Development: Students' personal, professional and academic development can be evaluated during their participation in the faculty mentoring program.

## 11. Faculty

### Faculty members

Faculty preparation		Requirements/Skills (if any)	Specialization		Academic Rank
lecturer	angel		private	general	
	angel		International Economy	economy	Prof. Dr. Abdul Razzaq Hamad Hussein Khalaf
	angel		Economic development	economy	Prof. Dr. Makhif Jassim Hamad Ali
	angel		Public Finance	economy	Prof. Dr. Khalaf Mohammed Hamad Abdul-Jubouri
	angel		Monetary policies	economy	Asst. Prof. Dr. Khalil Ismail Aziz Bazawi
	angel		International Economy	economy	Asst. Prof. Dr. Ibrahim Abdullah Jassim Issa
	angel		Macroeconomics	economy	A.M.D. Anmar Ghaleb Kleib Mutlaq
	angel		Public Finance	economy	Asst. Prof. Dr. Amer Sami Munir Dawood Al-Ani
	angel		Economic development	economy	A.M.D. Fouad Farhan Hussein Mukhlef
	angel		International Economy	economy	A.M.D. Khattab Imran Saleh Daman
	angel		Macroeconomics	economy	Asst. Prof. Dr. Ziad Ezz El-Din Taha Talib
	angel		International Economy	economy	Asst. Prof. Dr. Yasra Salem Nayef Abdul Janabi



	angel		Monetary policies	economy	Asst. Prof. Dr. Omar Abdullah Mohammed Hejeij
	angel		Finance and Banking	economy	Asst. Prof. Dr. Kilan Ismail Abdullah Mohammed
	angel		Macroeconomics	economy	Dr. Khader Jassim Hamad Fahal Al-Jabouri
	angel		Finance and Credit	economy	Dr. Alaa Abdul Jabbar Hussein Hamad
	angel		Public Finance	economy	Dr. Jamal Hussein Ali Abdullah
	angel		International Economy	economy	Dr. Mustafa Mahmoud Mahdi Saleh
	angel		Standard Economics	economy	A.M. Bushra Abdel-Bari Ahmed Abdullah
	angel		Critical	economy	Dr. Hamid Hassan Khalaf Mashaal
	angel		Critical	economy	Asst. Prof. Dr. Ghassan Ibrahim Ahmed
	angel		Financial policies	economy	A.M. Mohamed Emad Abdel Aziz Mahdi
	angel		Standard Economics	economy	A.M. Samer Mohammed Fakhri Darar
	angel		Public Finance	economy	A.M. Muthanna Mayouf Mahmoud Alawi
	angel		International Economy	economy	Dr. Mohammed Ahmed Mohammed Hassan Al-Jabouri
	angel		International Economy	economy	M. Bilal Abdel Haq Abdel Karim Mustafa
	angel		Standard Economics	economy	Dr. Zuhair Hamed Turki Zaiter
	angel		International	economy	A.M. Mustafa Ismail Khalil

			Economy		Abdel
	<b>angel</b>		International Economy	economy	Mr. Bakr Hamid Jasoum Aziz
	<b>angel</b>		Macroeconomi cs	economy	M. Naaman Munther Younis Fadel
	<b>angel</b>		Economic development	economy	M. Hamoud Saad Muhaimid Al-Helou
	<b>angel</b>		Macroeconomi cs	economy	Ms. Zeina Tariq Ali Ne'meh
	<b>angel</b>		economy	economy	M.M. Abeer Abbas Hammadi Saleh
	<b>angel</b>		economy	economy	Mr. Adi Tais Ibrahim Musa
	<b>angel</b>		economy	economy	M.M. Lujain Aref Ali Mustafa
	<b>angel</b>		economy	economy	M.M. Reem Saeed Shihab Ahmed Al-Dulaimi
	<b>angel</b>		economy	economy	Mr. Hassan Zidane Khalaf Hamad
	<b>angel</b>		economy	economy	M.M. Jihad Badou Hamad Hussein Al-Jabouri
	<b>angel</b>		economy	economy	Mr. Ghazwane Shaker Ismail Ibrahim
	<b>lectur er</b>		English language	English language	A.M. Abdul Khalaf Saleh
	<b>lectur er</b>		Educational and psychological sciences	Education al and psycholog ical sciences	Dr. Louay Karim Latif
	<b>lectur er</b>		English language	English language	M. Alaa Ahmed Abdullah
	<b>lectur er</b>		English language	English language	Mr. Osama Mohammed Abdullah

	lecturer		English language	English language	Mr. Marwan Abdel Moneim Tawfik
	lecturer		Educational and psychological sciences	Education al and psychological sciences	M.M. Duaa Turki Abdel

### Professional development

#### Orientation of new faculty members

- 1- Determining the needs of the university and the department: The needs of the university and the department are determined in terms of the required educational cadres. And preferred majors.
- 2- Orientation Programs: Customized orientation programs are designed for new, visiting, full-time and part-time members based on their needs and specialties.
- 3- Introduction to the University Environment: A comprehensive introduction is provided about the university and the department. General Administration, including About the Department And the vision And the message The objectives and services available.
- 4- Providing support resources: New members are provided with the necessary resources and support, including training courses, workshops, and technical assistance.
- 5- Academic Orientation: New members are oriented regarding the curricula, research areas and teaching methods used in the department.
- 6- Administrative Orientation: New members are oriented to administrative procedures, responsibilities, university policies and code of conduct.
- 7- Ongoing Support: Ongoing support is provided to new, visiting, full-time and part-time faculty members through advisory sessions, workshops and periodic evaluations.

#### Professional development for faculty members

1. Identifying needs and setting goals: Faculty needs are identified through surveys and performance evaluations, and then specific goals to be achieved within the

program are identified.

2. **Development Program Design:** Based on the specific needs and objectives, a comprehensive development program is designed that includes a set of activities, training courses, workshops, and educational resources.
3. **Program Implementation:** The development program is implemented in a regular and organized manner, including organizing workshops, conducting training courses, and providing appropriate educational resources.
4. **Use effective teaching strategies:** Faculty members learn to use and apply modern and effective teaching strategies, such as cooperative learning, active learning, and educational technology.
5. **Evaluation of learning outcomes:** The effectiveness of the development program is evaluated by evaluating the learning outcomes of faculty members, such as increased levels of knowledge, teaching skills, and interaction with students.
6. **Continuous Development:** Ongoing feedback and support is provided to faculty members to promote ongoing professional and academic development.
7. **Participation in scientific research and publication:** Faculty members are encouraged to participate in scientific research and publish the results in prestigious academic journals, which enhances their academic standing and contributes to the development of knowledge in their fields.

## **12. Acceptance Criteria**

- 1- Central acceptance.
- 2- Accepting exceptions (martyrs' families, children of faculty, distinguished employees, top students in institutes, foreign students).
- 3- Private government education
- 4- Accepting evening studies.

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

- 1- University, college and electronic department website.
- 2- Priorities for establishing the department.
- 3- Project to develop and update the curricula of the faculties of management and economics in Iraqi universities for the year 2017.

## **14. Program Development Plan**

- 1- Developing curricula for each subject by the instructor.
- 2- Opening a branch of the third stage (economic teachers) and opening postgraduate studies, a higher diploma equivalent to a master's and doctorate.
- 3- Developing teaching and administrative staff through courses, seminars and workshops in areas of specialization.
- 4- Supporting scientific research efforts by encouraging faculty members to publish, especially in international journals.
- 5- Conducting training programs to develop students' capabilities in technical and information technology fields.
- 6- Organizing field visits and scientific trips for students to government institutions.

### Program Skills Chart

#### Required learning outcomes of the program

Values				Skills				Knowledge				Essential or optional?	Course name	Course code	Year/Level
A4	A3	A2	A1	B4	B3	B2	B1	A4	A3	A2	A1				
✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓		Management principles		First year
✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓		Principles of Economics 1		
✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓		Principles of Statistics		
✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓		Computer 1		
✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓		Arabic		
✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓		Human rights and democracy		
✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓		Economic Reading 1 English		
✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓		Principles of mathematics		
✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓		Accounting principles		

✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	Economic Reading s 2 English		
✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	Principles of Economics 2		
✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	English language		
✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	Microeconomic theory 1		Second year
✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	Baath crimes		
✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	Economic statistics 1		
✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	National Accounts 1		
✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	Economic facts history		
✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	Economics of money		
✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	Human Resource Economics		
✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	Computer 1		
✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	Mathematics for Economists		
✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	Microeconomic Theory 2		
✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	Economic Statistics 2		
✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	English language		

✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	History of Economic Thought 2		
✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	Banking Economics		
													Mathematics for Economists 2		
✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	National Accounts 2		
✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	Computer 2		
✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	Mathematical Economics 1		
✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	International Economy		
✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	Economic development		
✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	Public Finance		
✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	Macroeconomics 1		Third year/ General Economy
✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	Agricultural economics		
✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	Environmental Economics		
✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	Industrial economy		
✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	Knowledge Economics		
✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	English language		

													e		
✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	Develo pment policy		
✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	Financi al policy		
✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	Industri al policy		
✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	Agricult ural policy		
✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	Internat ional Policy		
✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	Mathe matical Econom ics 2		
✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	Macro economi cs 2		
✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	Econom ic develop ment		
✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	Sports econom ics		
✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	Public Finance		
✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	Industri al econom y		
✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	Educati onal guidanc e		
✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	Macro economi cs 1		
✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	English languag e		
✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	Educati onal manage ment		
✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	Develo pment policy		
✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	Internat ional Econom y		
															Third year/ Econ omic teach ers





✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	Economic Project Evaluation
✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	Financial institutions
✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	Operations Research 2
✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	English language
✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	Planning policy
✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	✓	Energy Economics

\*Please tick the boxes corresponding to the individual learning outcomes of the programme being assessed.

### Course Description Form

<b>1. Course name</b>
Mathematics for Economists 2
<b>2. Course code</b>
<b>3. Semester/Year</b>
2023-2024
<b>4. Date this description was prepared</b>
1/28/2024
<b>5. Available forms of attendance</b>
Approval of attendance list
<b>6. Number of study hours (total) / Number of units (total)</b>
Number of hours 30 / Number of units 30
<b>7. Name of the course supervisor (if more than one name is mentioned)</b>
Asst. Prof. Dr. Omar Abdullah Mohammed
<b>8. Course objectives</b>

1- Introducing the student to the concept of Mathematics for Economists Through the historical developments it has gone through  
 2- Student definition Importantly the Mathematics at the economics level.  
 3- Introducing the student to the Relationship at Economy Sports  
 4- Recognizing the importance of a Mathematics for Economists To develop economic sectors.  
 5- Introducing the student to the most important sources of collecting data and information about mathematics  
 6- Introducing the student to how to solve the problems facing the economy. Using mathematical methods.

Subject objectives

**9. Teaching and learning strategies**

- Delivering in-person and online lectures
- Discussions with students
- Oral questions for students
- Blended learning (classroom)

Strategy

**10. Course Structure**

Evaluation method	Learning method	Name of the unit or topic	Required learning outcomes	Watches	The week
Oral questions	Giving the lecture	Understand the different concepts of mathematical functions.	theoretical knowledge	2 hours	the first
Questions and share	Lecture/Discussions	Identify the most common types of mathematical functions.	theoretical knowledge	2 hours	the second
Oral questions	Lecture/Discussions	Learn how to graph mathematical functions.	theoretical knowledge	2 hours	the third
Student participation	Lecture/Discussions	Learn how to add, subtract, multiply and divide mathematical functions.	theoretical knowledge	2 hours	Fourth
Oral questions	Lecture/Discussions	Learn how functions are used in economic applications.	theoretical knowledge	2 hours	Fifth
-	-	Understand the concept of derivation	-	2 hours	Sixth

Oral questions	Lecture/Discussions	Identify the rules used in derivation.	theoretical knowledge	2 hours	Seventh
Oral questions	Lecture/Discussions	Learn how to use derivatives of functions to extract the economic marginal cost.	theoretical knowledge	2 hours	The eighth
Questions and share	Lecture/Discussions	Learn how to use derivatives of functions to extract the economic marginal revenue.	theoretical knowledge	2 hours	Ninth
Oral questions	Lecture/Discussions	Learn how to use derivatives of functions to extract marginal economic profit.	theoretical knowledge	2 hours	tenth
Oral questions	Lecture/Discussions	Understanding logarithmic functions in terms of concept and importance	theoretical knowledge	2 hours	eleventh
Questions and share	Lecture/Discussions	Learn the rules for differentiating logarithmic functions.	theoretical knowledge	2 hours	twelfth
Oral questions	Lecture/Discussions	Learn about the economic uses of logarithmic functions.	theoretical knowledge	2 hours	thirteenth
Questions and share	Lecture with oral questions	Custom on maximum and minimum ends and economic applications of it	-	2 hours	fourteenth
		Discussion and test	theoretical knowledge	2 hours	fifteenth

## 11. Course Evaluation

The final grade for the evaluation is 100 points, and the minimum for success is 50 points, and the grade is distributed. Evaluation on the end of the course is 30 points and the end of the course exam is 70 points. As follows:

- First month exam 10 marks
- Second month exam 10 marks
- Daily preparation 5 degrees
- Posts 5 points

End of course exam 70 points

## 12. Learning and teaching resources

Dr. Athir Abdul Jabbar Al-Jumard (Introduction to Economic Mathematics)	Required textbooks (methodology if any)
Dr. Mahmoud Mahdi Al-Bayati and Dr. Dalal Al-Qadi	Main References (Sources)
Mathematics and its applications in administrative and economic sciences	Recommended supporting books and references (journals)
Dr. Hakim Meliati (Applications of Mathematics in the Economics Branch)	Electronic references, websites