

# BS Economics Major and Minor AY 24-25 Aggregate Assessment Report

Aggregate Major and Minor Assessment Report for AY 2024-2025

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## Mission Statement

No recent changes

*“With a particular focus on international issues of globalization and poverty, the mission of our department is to equip undergraduate and graduate students with the character and rigorous intellectual foundation in economics to help our students foster a more just and humane world and to carry out a research agenda that contributes at the highest levels to micro and macroeconomics issues related to poverty, economic growth, and globalization. “*

## Program Learning Outcomes

No recent changes to PLO's

### 1. Economic literacy

Students will engage in the systematic study of foundational economic concepts and relate them to economic problems and phenomena faced by people and firms.

### 2. Economic theory

Students will use mathematical models, relational diagrams, and optimization techniques from microeconomic and macroeconomic theory to analyze real-world economic problems and generate testable predictions about economic phenomena.

### 3. Empirical economics

Students will apply quantitative statistical analysis and experimental methods to conduct data-driven inference, interpret figures and statistical tables, test theories, and identify causal relationships.

### 4. Economic citizenship

Students will employ economic reasoning and quantitative techniques to evaluate and critique economic policies, arguments, and social problems, with a particular emphasis on the role economics plays in advancing human well-being for the poor and disadvantaged.

## Curricular Map

The curricular map is being updated to show the role of the new 4-unit ECON 110 course, which is an alternative to the sequence of ECON 111 and ECON 112 (Principles of Macroeconomics) when accompanied by a 200-level ECON course.

The curricular map shown below is the same for the major and minor. However, since minor students are not required to follow a particular path through the curriculum, and may choose electives from a variety of topics, they may not necessarily achieve “mastery” or “application” status for any particular outcome.

### Curricular Map

Key: I = Introduction of Concept; C = Comprehensive Coverage of the Concept; M = Mastery and Application of Concept

**Foundation Major Courses (Students compete 110 or 111+112, and all other courses listed here)**

<b>Courses</b>	<b>PLO 1: Economic Literacy</b>	<b>PLO 2: Economic Theory</b>	<b>PLO 3: Empirical Economics</b>	<b>PLO 4: Economic Citizenship</b>
ECON 110 Introductory Economics	I	I	I	I
ECON 111 Principles of Microeconomics	I	I	I	I
ECON 112 Principles of Macroeconomics	I	I	I	I
MATH 101 or 106 Statistics			I	
ECON 120 Economic Methods (or MATH 109)			C	
ECON 311 Intermediate Microeconomics	C	C	C	C
ECON 312 Intermediate Macroeconomics	C	C	C	C
ECON 320 Econometrics		C	C	C
Capstone Course ECON 425 Financial Econometrics OR ECON 427 Applied Econometrics	M	M	M	M

**200 – Level Elective Courses (Students Choose 1, No Prerequisites)**

<b>Courses</b>	<b>PLO 1: Economic Literacy</b>	<b>PLO 2: Economic Theory</b>	<b>PLO 3: Empirical Economics</b>	<b>PLO 4: Economic Citizenship</b>
ECON 230 Environmental Economics				
ECON 261 Economics of Life and Death				
ECON 280 The Global Economy				
ECON 283 Economies of East Asia				

**300 – Level Elective Courses (Students Choose 8 units, 100-level prerequisites)**

<b>Courses</b>	<b>PLO 1: Economic Literacy</b>	<b>PLO 2: Economic Theory</b>	<b>PLO 3: Empirical Economics</b>	<b>PLO 4: Economic Citizenship</b>
ECON 300 US Economic History	C	C	C	C
ECON 318 Game Theory	C	C	C	C
ECON 350 Financial Markets and Institutions	C	C	C	C
ECON 365 Behavioral Economics	C	C	C	C
ECON 368 Politics, Economics and Culture	C	C	C	C
ECON 370 International Economics	C	C	C	C
ECON 372 Economic Development	C	C	C	C

**400 – Level Elective Courses (Students Choose 4 units, 300-level prerequisites)**

<b>Courses</b>	<b>PLO 1: Economic Literacy</b>	<b>PLO 2: Economic Theory</b>	<b>PLO 3: Empirical Economics</b>	<b>PLO 4: Economic Citizenship</b>
ECON 415 Mathematics for Economists	I	I	M	
ECON 451 Monetary Economics	C	M	C	C
ECON 455 Options & Futures	C	M	M	C
ECON 463 Experimental Economics	M	M	M	M
ECON 465 Law and Economics	M	M	C	M
ECON 471 International Finance	M	M	M	M
ECON 477 Intl. Political Economy	M	M	M	M

**Assessment Schedule / History**

<b>Year</b>	<b>PLO Assessed with Direct Methods</b>
AY 2017-18 (First Year of New PLO's)	PLO #3 Empirical Economics
AY 2018-19	PLO #2 Economic Theory
AY 2019-20	Alternate Remote Reflections Report
AY 2020-21	PLO #1 Economic Literacy
AY 2021-22	PLO #4 Economic Citizenship
AY 2022-23	APR
AY 2023-24	APR
AY 2024-25	PLO #1 Economic Literacy
AY 2025-26	PLO #2 Economic Theory
AY 2026-27	<i>Alternative Assessment on Grade Distributions and Inflation</i>
AY 2027-28	PLO #3 Empirical Economics
AY 2028-29	PLO #4 Economic Citizenship

## **Description of Direct Assessment Methodology of PLO #1 “Economic Literacy”**

### 1. Economic literacy

Students will engage in the systematic study of foundational economic concepts and relate them to economic problems and phenomena faced by people and firms.

The student work products used for direct assessment are the empirical research “capstone” projects assigned in ECON 425 (Financial Econometrics) and ECON 427 (Applied Econometrics Capstone), both of which require students to ground their theoretical approach and empirical findings in existing economic literature.

Work products were taken from ECON 425 in Fall 2024 and ECON 427 in Spring 2025. All students in each section were Economics Majors.

### Rubric For Assessment of PLO #1

The rubric applied breaks up the elements of the PLO being assessed into component parts, each of which is directly assessed using the associated element of the student work product.

The requirement to achieve the given level (Inadequate, Introductory, Developing, Mastery) are clearly articulated within the rubric.

**Rubric: PLO #1 Economic Literacy (Advanced Econometrics Research Papers)**

<u>Dimension</u>	<u>Introductory Level</u>	<u>Developing Level</u>	<u>Mastery Level</u>
<b>Understanding of Economic Concepts</b>	<ul style="list-style-type: none"> <li>Identifies basic economic terms but uses them inconsistently or inaccurately.</li> <li>Limited understanding of how concepts (e.g., supply/demand, incentives, market structure) relate to the research topic.</li> <li>Theoretical discussion is descriptive rather than analytical.</li> </ul>	<ul style="list-style-type: none"> <li>Uses foundational economic concepts correctly and consistently.</li> <li>Demonstrates moderate understanding of relevant economic theories and their connection to the empirical model.</li> <li>Shows emerging ability to apply theory to motivate analysis.</li> </ul>	<ul style="list-style-type: none"> <li>Demonstrates deep and precise command of relevant concepts and theory.</li> <li>Integrates economic models into the empirical framework.</li> <li>Uses theory to structure hypotheses and interpret results.</li> </ul>
<b>Connection to Economic Problems</b>	<ul style="list-style-type: none"> <li>Mentions an economic problem but does not clearly explain its relevance.</li> <li>Research motivation appears superficial or weakly connected to economic reasoning.</li> <li>Limited articulation of how the empirical question relates to real-world phenomena.</li> </ul>	<ul style="list-style-type: none"> <li>Clearly identifies an economically meaningful problem and explains its importance.</li> <li>Research question is grounded in appropriate economic motivation.</li> <li>Interprets findings with some attention to economic implications.</li> </ul>	<ul style="list-style-type: none"> <li>Develops a compelling, well-contextualized economic problem with clear real-world relevance.</li> <li>Demonstrates insight into the magnitude, direction, and economic significance of empirical results.</li> <li>Situates findings within broader economic debates or policy contexts.</li> </ul>
<b>Use of Economic Logic</b>	<ul style="list-style-type: none"> <li>Relies on informal or incomplete economic intuition.</li> <li>Limited cause-and-effect reasoning grounded in economic theory.</li> <li>Economic interpretation of results is minimal or absent.</li> </ul>	<ul style="list-style-type: none"> <li>Uses coherent economic logic, though analysis may miss some nuances.</li> <li>Translates empirical results into reasonable economic interpretations.</li> <li>Begins to articulate underlying mechanisms or competing explanations.</li> </ul>	<ul style="list-style-type: none"> <li>Employs rigorous, well-structured economic reasoning throughout.</li> <li>Connects empirical estimates to clear economic mechanisms, counterfactuals, and implications.</li> <li>Considers alternative theoretical explanations and evaluates them thoughtfully.</li> </ul>

### Direct Assessment Results

Below are the frequency tables associated with student outcomes based on the rubric above. Assessment was completed by course instructor Michael Jonas.

The "Overall" category measures level of mastery of the three outcome components in total.

#### **ECON 425 Fall 2024 (17 Students)**

<b>PLO #1 Component</b>	<b>Introductory</b>	<b>Developing</b>	<b>Mastery</b>
<b>Understanding of Economic Concepts</b>	1/17	7/17	9/17
<b>Connection to Economic Problems</b>	2/17	5/17	10/17
<b>Use of Economic Logic</b>	1/17	6/17	10/17
<b>Overall</b>	1/17 = 5.9%	7/17 = 41.2%	10/17 = 52.9%

#### **ECON 427 SPRING 2025 (18 Students)**

<b>PLO #1 Component</b>	<b>Introductory</b>	<b>Developing</b>	<b>Mastery</b>
<b>Understanding of Economic Concepts</b>	2/18	6/18	10/18
<b>Connection to Economic Problems</b>	2/18	7/18	9/18
<b>Use of Economic Logic</b>	2/18	6/18	10/18
<b>Overall</b>	2/18 = 11.1%	7/18 = 38.9%	10/18 = 50%

### ***Results Discussion and Closing the Loop:***

Assessment of the Program Learning Outcome (PLO) — *Economic literacy: Students will engage in the systematic study of foundational economic concepts and relate them to economic problems and phenomena faced by people and firms* — indicates that **57.1% (20/35 across two sections) of students achieved mastery-level understanding**, with the remaining students distributed between developing and introductory levels.

Overall, these results provide evidence that a majority of students in the advanced econometrics course are able to apply core economic concepts to empirical research questions and interpret their findings through an economic lens. Students demonstrating mastery were able to articulate clear economic mechanisms, situate their empirical results within established theoretical frameworks, and meaningfully connect statistical relationships to real-world economic behavior.

These students consistently provided coherent narratives linking models to policy-relevant insights or firm- and household-level decisions.

Students who did not reach mastery generally displayed partial understanding: they could execute empirical methods correctly but struggled to fully integrate economic reasoning into their interpretation of results. Common challenges included insufficient explanation of causal mechanisms, limited discussion of economic intuition behind coefficients, and difficulty linking statistical patterns to broader economic phenomena.

Taken together, the results suggest that the program is largely successful in fostering economic literacy, though there is room to strengthen students' ability to apply economic theory when interpreting empirical findings.

### **Recommended Future Actions**

To further improve mastery rates and support students in developing deeper economic reasoning, the program may consider the following actions:

#### **1. Expand Scaffolded Instruction in Theory-to-Empirics Integration**

Integrate more structured classroom activities and assignments that explicitly require students to connect empirical estimates to economic concepts, such as elasticity, opportunity cost, market structure, and incentives. This could include short reflection memos or guided "economic intuition" exercises embedded within econometrics labs.

#### **2. Incorporate More Applied Case Studies**

Introduce additional case-based modules that show how professional economists use theory to interpret data in applied contexts (e.g., labor markets, housing, environmental economics). These examples can help students internalize the process of relating models to real-world economic decisions.

#### **3. Increase Targeted Feedback on Economic Interpretation**

Ensure students receive formative feedback focused not only on statistical execution but also on the strength of economic narrative and reasoning. Rubric revisions or comment templates may help instructors deliver more consistent guidance.

#### **4. Provide Supplemental Workshops**

Offer optional workshops or peer-led study sessions aimed at reinforcing foundational microeconomic and macroeconomic concepts for students who may need additional support before entering upper-division empirics-heavy courses.

#### **5. Strengthen Vertical Integration Across the Curriculum**

Review prerequisites and sequencing to make sure earlier courses sufficiently prepare students to reason systematically about economic mechanisms. Better alignment may help reduce the proportion of students who reach advanced coursework without a fully solidified theoretical foundation.

### **Conclusion**

The assessment demonstrates encouraging progress toward achieving the program's learning goals. A majority of students are indeed demonstrating high-level economic literacy. With targeted improvements in instruction, feedback, and curricular alignment, the program is well positioned to raise mastery rates further and deepen students' ability to connect economic theory with empirical evidence.

