

# Understanding Monetary Policy: Student Awareness, Perceptions, and Financial Behaviors in the Philippine Context

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#### **Abstract**

This study investigates Filipino students' awareness, perceptions, and financial behaviors related to monetary policy, focusing on how demographic factors and academic background influence economic literacy. Using a descriptive-correlational survey design, data were collected from 200 respondents across senior high school, undergraduate, and graduate levels in selected Philippine institutions. Results reveal that overall awareness of monetary policy is moderate, with graduate and business/economics students exhibiting significantly higher levels of understanding than senior high and non-business peers. While students generally perceive monetary policy as effective in controlling inflation and stabilizing the economy, they express more cautious views about its role in employment and long-term growth. Correlation analysis indicates that awareness is positively associated with perceptions of monetary policy effectiveness (r = 0.48, p < .001), saving behavior (r = 0.31, p < .001), and investment behavior (r = 0.24, p = .001), but shows no significant relationship with spending behavior (r = -0.07, p = .310). Regression results confirm that awareness and perceptions significantly predict saving (R<sup>2</sup> = .22) and investment  $(R^2 = .15)$  behaviors but not spending  $(R^2 = .04)$ . These findings affirm the relevance of the Theory of Reasoned Action and Theory of Planned Behavior, highlighting how knowledge shapes attitudes and, in turn, influences certain financial decisions. The study underscores the need for integrating monetary policy literacy across curricula, enhancing financial education initiatives, and strengthening the Bangko Sentral ng Pilipinas' communication strategies. By addressing these gaps, policymakers and educators can better prepare the country's youth—its future economic stewards—to navigate complex financial environments and contribute to long-term economic stability.

Keywords: monetary policy, financial literacy, student perceptions, saving behavior, investment behavior, spending behavior, Philippines

#### 1. Introduction

The 21st century has been marked by rapid globalization, digital transformation, and heightened economic interdependence among nations. Within this globalized context, monetary policy has emerged as one of the most powerful levers available to governments and central banks in steering macroeconomic stability, influencing investment flows, and safeguarding national competitiveness. In the Philippines, a developing economy that has experienced cycles of growth and contraction, the formulation, communication, and public perception of monetary policy are particularly consequential.

The Philippine economy has demonstrated remarkable resilience despite recurrent external shocks such as global financial crises, fluctuating oil prices, and most recently, the socioeconomic disruptions caused by the COVID-19 pandemic. Yet, this resilience is often tested by structural weaknesses: dependence on remittances from Overseas Filipino Workers (OFWs), vulnerability to natural disasters, persistent income inequality, and institutional challenges in governance. These vulnerabilities heighten the importance of effective and well-understood monetary policies that can balance price stability, financial inclusion, and long-term economic growth.

While the Bangko Sentral ng Pilipinas (BSP) has consistently emphasized its twin mandates of price stability and financial stability, the degree to which ordinary Filipinos—particularly students and young adults poised to join the workforce—understand and perceive monetary policy remains underexplored. Research suggests that public awareness of economic policy is a critical determinant of its effectiveness, as expectations

influence consumption, saving, and investment behaviors (Blinder et al., 2008). In societies where financial literacy remains uneven, a knowledge gap about monetary policy mechanisms may limit the policy's ability to achieve its intended outcomes.

This study seeks to investigate the level of awareness, perception, and understanding of monetary policy among selected Filipino students. By focusing on individuals in senior high school, undergraduate, and graduate levels, the research highlights how educational exposure and field of study (e.g., business, economics, engineering, IT, or other disciplines) affect comprehension of monetary policy concepts. The study also examines the extent to which this awareness influences financial behaviors such as saving, investing, and perceptions of economic well-being.

The significance of this inquiry lies not only in its academic contribution to the discourse on monetary policy literacy, but also in its practical implications. As future professionals, today's students will soon assume leadership roles in business, government, and civil society. Their understanding—or misunderstanding—of monetary policy may shape how they make personal financial decisions, engage with institutions, or respond to macroeconomic challenges. For policymakers, insights from this research can inform more effective communication strategies and educational programs that demystify monetary policy, making it more accessible to the general public.

# 1.1 Background of the Study

1.1.1 The Role of Monetary Policy in Economic Stability

Monetary policy refers to the deliberate actions of a country's central bank to regulate the supply of money and credit in the economy to achieve macroeconomic objectives such as price stability, employment generation, sustainable growth, and financial system stability (Mishkin, 2019). Central banks implement monetary policy through various instruments—interest rate adjustments, reserve requirements, open market operations, and foreign exchange interventions—that influence aggregate demand, inflation, and investment patterns.

In the Philippine context, the Bangko Sentral ng Pilipinas (BSP) serves as the country's central monetary authority. Guided by the New Central Bank Act (Republic Act No. 7653, amended by RA 11211 in 2019), the BSP's primary mandate is to maintain price stability while promoting a financial system conducive to balanced and sustainable

growth. It does so primarily through inflation targeting, a framework adopted in 2002, which seeks to anchor inflation expectations and provide transparency and accountability in monetary decision-making.

The importance of monetary policy is multifaceted. First, by controlling inflation, it safeguards the purchasing power of households, particularly the poor, who are disproportionately affected by rising prices of food and essential commodities. Second, by influencing interest rates and credit availability, monetary policy affects both consumption and investment decisions, thereby shaping economic growth trajectories. Third, by managing liquidity and exchange rates, it contributes to financial stability in an economy that is highly integrated with global trade and capital flows.

# 1.1.2. Monetary Policy in the Philippine Context

The Philippine economy has historically oscillated between periods of rapid expansion and episodes of contraction triggered by both domestic and external shocks. The Asian Financial Crisis of 1997, the Global Financial Crisis of 2008, and the COVID-19 pandemic in 2020 serve as critical junctures that tested the country's monetary and fiscal institutions.

During these periods, the BSP implemented a mix of policy rate adjustments, reserve requirement modifications, and liquidity-enhancing measures to stabilize financial markets and maintain economic confidence (BSP, 2021). For instance, in response to the pandemic, the BSP aggressively cut policy rates and implemented a bond-buying program to support liquidity, while also encouraging banks to extend loan moratoriums to struggling firms and households.

Despite these interventions, the Philippines continues to grapple with economic vulnerabilities. The inflation rate in 2023 averaged 6.0%, above the BSP's target range of 2–4%, driven by supply-side shocks in food and fuel prices (Philippine Statistics Authority, 2024). Exchange rate volatility, rising public debt, and external risks from geopolitical tensions further complicate the central bank's ability to maintain stability.

### 1.1.3. Public Awareness of Monetary Policy

A central assumption of modern monetary policy frameworks is that expectations matter. If households and firms understand and trust the central bank's objectives, they are more likely to make financial decisions—such as wage bargaining, consumption, and investment—that reinforce the effectiveness of policy measures (Blinder et al., 2008). Conversely, when the public is poorly informed or mistrustful, even well-designed policies may lose traction, leading to volatility and reduced effectiveness.

In advanced economies, central banks have increasingly prioritized communication and transparency to shape expectations. Central banks such as the U.S. Federal Reserve, the European Central Bank, and the Bank of England regularly publish policy statements, minutes, and inflation reports aimed at clarifying their strategies. In the Philippines, the BSP has also strengthened its communication through press briefings, Inflation Reports, and public financial literacy campaigns. However, the actual reach and impact of these efforts among students and the general population remain underexplored.

Evidence from previous studies suggests that financial literacy in the Philippines remains low, particularly among younger individuals and those outside business or economics programs (OECD, 2020; Albert & Gomez, 2018). Many students and young professionals are unfamiliar with basic concepts such as inflation, interest rates, and exchange rate fluctuations, all of which are central to understanding monetary policy. This lack of awareness may hinder their ability to make informed financial decisions, thereby limiting their capacity to benefit from economic opportunities or protect themselves from risks.

#### 1.1.4. Students as Future Economic Actors

Focusing on students is particularly relevant in the Philippine context, where the youth population constitutes a significant share of the labor force pipeline. According to the Philippine Statistics Authority (2023), individuals aged 15–30 account for nearly 30% of the population. This demographic segment will shape the country's workforce, entrepreneurial ventures, and consumption patterns in the decades to come.

However, studies have consistently shown that Filipino students often demonstrate low levels of financial literacy compared to their peers in other ASEAN countries (OECD, 2017; Ramirez, 2021). While financial literacy includes a broad set of competencies-budgeting, saving, investing, and understanding credit—monetary policy knowledge is particularly important because it influences perceptions of inflation, interest rates, and government interventions. Without adequate understanding, students develop may

misconceptions, such as equating monetary expansion with immediate economic growth, or misinterpreting the implications of rising interest rates on personal loans and investments.

Additionally, students pursuing different academic programs may exhibit varying levels of awareness. Business and economics students are likely more exposed to concepts of monetary and fiscal policy through formal coursework, whereas engineering, IT, or health sciences students may encounter such ideas only tangentially. Senior high school students, many of whom are just beginning to study economics in general education, may have the least exposure. By comparing these groups, this study seeks to illuminate disparities in economic literacy and explore whether educational background contributes to differences in perception and application of monetary policy knowledge.

# 1.1.5. Theoretical Foundation: Theory of Reasoned Action and Planned Behavior

This study is grounded in the Theory of Reasoned Action (TRA) and its extended form, the Theory of Planned Behavior (TPB). These frameworks posit that individual behavior is shaped by behavioral intentions, which in turn are influenced by attitudes, subjective norms, and perceived behavioral control (Ajzen & Fishbein, 1980; Ajzen, 1991).

Attitudes reflect personal evaluations of a behavior's outcomes. For instance, a student who believes that understanding monetary policy will help secure financial stability is more likely to seek knowledge about it.

Subjective norms refer to the perceived social pressure to perform or not perform a behavior. In the Philippine context, peers, parents, and educators may influence how students view the importance of economic literacy.

Perceived behavioral control encompasses individuals' confidence in their ability to perform a behavior, which in this case relates to their belief that they can grasp complex monetary concepts and apply them effectively.

By employing TRA/TPB as a lens, the study examines whether students' awareness and perceptions of monetary policy translate into behavioral intentions such as saving, investing, or advocating for sound economic policies. This theoretical grounding ensures that the research is not only descriptive but also explanatory, offering

insights into the mechanisms through which monetary literacy affects economic behavior.

#### 1.1.6. Statement of the Problem

Despite the pivotal role of monetary policy in stabilizing the Philippine economy, limited research has examined how much young Filipinos understand about its purpose, tools, and consequences. This knowledge gap raises pressing questions:

What is the level of awareness and understanding of monetary policy among senior high school, undergraduate, and graduate students in the Philippines?

How do academic programs (e.g., business, economics, IT, engineering, others) influence students' awareness of monetary policy concepts?

What are students' perceptions of the effectiveness of monetary policy in addressing inflation, employment, and economic growth?

How do demographic factors such as age, gender, and educational attainment relate to awareness of monetary policy?

In what ways does monetary policy awareness influence students' financial behaviors, particularly in terms of savings, spending, and investment decisions?

Answering these questions is critical for policymakers, educators, and financial institutions to develop targeted interventions that strengthen monetary policy literacy and ensure that future professionals can participate meaningfully in shaping and responding to economic policies.

#### 1.1.7. Objectives of the Study

The general objective of this study is to assess the awareness and perceptions of monetary policy among selected Filipino students and to identify how these factors relate to their financial behaviors. Specifically, the study aims to:

- Determine the demographic profile of the respondents in terms of age, gender, and academic program.
- Measure the level of awareness of monetary policy among senior high school, undergraduate, and graduate students

- Examine the perceptions of students toward the effectiveness of monetary policy in achieving economic stability
- Analyze the relationship between demographic variables (age, gender, educational level, and academic program) and students' awareness of monetary policy.
- Assess the influence of monetary policy awareness on students' financial behaviors, including saving, investing, and spending.

### 1.1.8. Significance of the Study

This study is significant to several stakeholders:

- Students: By identifying levels of awareness, this research empowers students to recognize their own gaps in understanding and motivates them to seek financial knowledge that enhances their economic decision-making.
- Educational Institutions: Findings can inform curriculum development, encouraging universities and senior high schools to integrate more robust economic and financial literacy modules across programs.
- Policymakers and Regulators: Insights from the study can support the Bangko Sentral ng Pilipinas, the Department of Education (DepEd), and the Commission on Higher Education (CHED) in designing targeted educational campaigns and policies that make monetary policy more comprehensible and relevant to the youth.
- Financial Institutions: Banks and investment firms may utilize the findings to tailor financial products, services, and outreach strategies that resonate with younger clients who are still developing their financial identities.
- Researchers: The study adds to the growing body of literature on economic and financial literacy in emerging economies, offering empirical evidence on the Philippine context.

#### 1.1.9. Rationale of the Study

The rationale for undertaking this research rests on three major considerations:

 Economic volatility in the Philippines: With inflationary pressures, currency fluctuations, and external shocks such as global recessions and oil price surges, the country's macroeconomic environment remains uncertain. In such a setting, a population with a better understanding of monetary policy is more likely

- to make rational economic decisions, contributing to overall stability.
- Youth as future economic stewards: The Philippines has a demographic dividend characterized by a large proportion of young people. However, if this potential is not matched by adequate economic literacy, the opportunities of this demographic advantage may be lost. The youth's perceptions of monetary policy can shape their savings behavior, entrepreneurial initiatives, and participation in civic discourse.
- Educational gaps in economic literacy: Despite curricular reforms such as the K-12 program, evidence suggests that financial literacy among Filipinos remains below the global average (OECD, 2020). By focusing on students at different educational levels, this study identifies at what stage awareness gaps are most pronounced, thereby guiding interventions that could enhance financial education in both formal and non-formal settings.

#### 1.1.10. Research Hypotheses

Based on the theoretical framework and literature review, the following hypotheses are proposed:

- H1: There is a significant difference in the level of monetary policy awareness among students based on their academic program (business/economics vs. non-business fields).
- H2: There is a significant difference in monetary policy awareness across educational levels (senior high, undergraduate, and graduate).
- H3: Higher monetary policy awareness is positively associated with favorable perceptions of monetary policy effectiveness.
- H4: Monetary policy awareness and favorable perceptions significantly influence students' financial behaviors, particularly saving and investing.

# 2. Review of Literature

# 2.1 Monetary Policy Awareness and Public Understanding

Understanding public awareness and comprehension of monetary policy is increasingly recognized as a crucial factor in ensuring the effectiveness of macroeconomic tools. Recent studies suggest that despite the central banks' efforts to enhance transparency, a significant knowledge

gap persists among the general population. Jost (2017) found that while central banks have made strides in public education, the average British citizen still exhibits limited understanding of central banking operations, suggesting that policy complexity remains a barrier to public comprehension. This is supported by Carvalho and Nechio (2014), who reported that individuals with higher income and education levels were more likely to understand how interest rates relate to inflation and unemployment, indicating that socio-economic disparities play a key role in monetary policy awareness.

Complementing these findings, Harimohan and Jeffery (2012) examined survey data in the UK and found that although public awareness of the monetary policy framework remained stable, there was a lack of understanding regarding newer instruments like quantitative easing, highlighting the need for clearer communication on evolving policy tools. Similarly, Hills and Macallan (2011) emphasized that satisfaction with central banks often correlates with public understanding, with betterinformed individuals expressing more confidence in monetary authorities. This was echoed by Ahnert and Bertsch (2021), who found that increased transparency by the European Central Bank improved public trust and policy transmission, suggesting that educational interventions could play a transformative role in policy acceptance.

In the South African context, Mboweni (2001) underscored the importance of transparency in building public trust in central banks, advocating for consistent communication to bridge the gap between complex economic decisions and layperson understanding. More recently, Goodfriend (2020) emphasized the importance of fostering public comprehension of inflation control policies, arguing that democratic accountability requires that citizens understand not only the goals of monetary policy but also the tools used to achieve them. Supporting this view, Temzelides, Monnet, and Hoerova (2008) conceptualized monetary policy as a public signal that transmits critical information to coordinate expectations among private agents, reinforcing the idea that awareness is integral to policy efficacy.

Further empirical insights from Rusuhuzwa (2021) indicate that awareness of monetary policy among stakeholders—households and firms alike—affects their responsiveness to policy changes, thus influencing the speed and accuracy of policy transmission. Meanwhile, evidence from Dresner (2016) suggests that foundational knowledge of monetary theory among the public leads to more rational reactions to central bank actions, potentially

stabilizing inflation expectations. Together, these studies consistently highlight that the effectiveness of monetary policy is not only a matter of economic calibration but also of public perception and understanding. Without a sufficiently informed citizenry, even well-crafted monetary policies may fail to achieve their desired outcomes.

# 2.2 Financial Literacy among Students in Emerging Economies

Financial literacy is increasingly acknowledged as a critical skill for students in emerging economies, influencing not only individual financial well-being but also the broader development of inclusive financial systems. In recent studies, the connection between financial knowledge and improved household decision-making has been firmly established. Sinha, Chandrasekhar, and Kapoor (2024) emphasized that financial literacy is directly associated with better budgeting, saving, and investment practices, especially in households across emerging markets. These findings are echoed by Lahiri and Biswas (2022), who found that even basic improvements in financial knowledge among Indian individuals significantly increased their likelihood of engaging in sound financial behaviors, such as insurance uptake, savings, and financial planning. Similar trends were noted by Chetioui et al. (2024), who observed in Morocco that financial literacy mitigates financial vulnerability and supports long-term financial well-being, although general education alone was not sufficient to improve financial literacy without targeted interventions.

Grohmann, Kouwenberg, and Menkhoff (2014) provided evidence that middle-class individuals in Bangkok with higher financial literacy were more likely to adopt sophisticated financial tools and make informed use of credit, underlining the importance of such skills as this demographic becomes more central to financial development. The role of social context in shaping financial literacy acquisition was highlighted by West (2012), who used agent-based modeling to show that in emerging markets, credible sources within social networks are key drivers for the diffusion and retention of financial knowledge. This points to the importance of not only curriculum content but also delivery mechanisms in enhancing financial education outcomes.

Further, the integration of financial literacy within formal education remains inconsistent, though increasingly advocated. Turineck (2019) critiqued the lack of consensus on what financial literacy entails within school curricula and stressed the need for clearer frameworks to integrate such

education effectively, particularly in mathematics classrooms. Bradley (2021) reinforced this perspective in a sociological context, noting that many college students—especially those from economically vulnerable backgrounds—lack access to high-quality financial education, making collegelevel interventions particularly impactful. This view is also supported by Meena (2024), who emphasized the evolving nature of financial literacy in the digital age, where gamification, technology-based learning, and digital finance tools are reshaping how financial knowledge is acquired and applied by students.

A significant equity concern is the gap in financial literacy across gender and income groups. Desai, Bhatt, and Raval (2023) revealed that while financial literacy positively influences financial inclusion in India, disparities persist, with gender acting as a moderating factor, although its statistical significance varied. Finally, Masca (2024) highlighted the macroeconomic implications of financial literacy in European emerging economies, showing that financial knowledge, particularly in risk diversification, plays a significant role in reducing income inequality and improving longterm financial outcomes. Collectively, these studies underscore the pressing need for robust, contextsensitive financial literacy programs targeting students in emerging economies—not only as a tool for personal empowerment, but also as a driver of broader economic equity and resilience.

# 2.3 Perceptions of Central Bank Credibility and Monetary Policy Effectiveness

Perceptions of central bank credibility have a direct and measurable influence on the effectiveness of monetary policy, particularly in emerging and inflation-sensitive economies. The credibility of a central bank affects how individuals and markets interpret monetary signals, ultimately shaping inflation expectations and economic behavior. Cepeda, Taboada-Arango, and Villamizar-Villegas (2023) conducted a meta-analysis of nearly 1,200 data points and found that central bank transparency enhances the effectiveness of monetary policy significantly, improving results across conventional, unconventional, and foreign exchange policies. This is supported by Park (2018), who introduced a quantitative measure of central bank credibility and showed that higher credibility correlates with reduced macroeconomic volatility and a more responsive inflation trajectory.

Misztal (2022, 2023) confirmed through empirical research that in countries with lower levels of economic development, transparency plays a larger role in enhancing the effectiveness of monetary policy, while in more developed nations, credibility has a more substantial impact. This aligns with findings from Wibisono, Zulen, and Widjanarti (2020), who employed machine learning techniques using media sentiment to track public perceptions of Bank Indonesia's credibility. Their results not only correlated with survey-based credibility scores but also underscored the utility of data-driven credibility indicators in policy effectiveness assessment.

Credibility is particularly critical during times of political or economic uncertainty. Çakmaklı and Demiralp (2020) evaluated the Central Bank of Turkey's deteriorating credibility over time using Bayesian models and found that credibility is vital for guiding inflation expectations toward the target rate. Similarly, Oliveira and Simón (2023) examined Brazil's central bank under President Dilma Rousseff and noted that low credibility led to a complete reversal in how markets interpreted policy surprises—shifting from signs of commitment to inflation control to signs of political interference, thereby increasing inflation expectations. These insights underscore that credibility is not static but evolves with institutional behavior, communication, and political pressures.

Transparency, communication, and institutional design also factor heavily into credibility dynamics. Misztal (2022) argued that effective communication strategies-those that are consistent, clear, and forward-looking—are essential for maintaining the central bank's reputation and aligning market expectations. This theme is echoed in the work of Dwyer, Posen, and Roberds (1998), who linked central bank credibility to institutional mechanisms designed to solve the "time inconsistency" problem, where policymakers are tempted to pursue shortterm gains at the expense of long-term credibility. Gospodarchuka and Zeleneva (2021) added a practical layer to this by proposing a framework to assess the effectiveness of central banks based on performance metrics and qualitative assessments, noting that weak credibility often manifests in disjointed inflation management and reduced policy impact.

Overall, perceptions of central bank credibility are not merely abstract concepts but foundational pillars that determine whether monetary policy succeeds or fails. When trust is high, monetary authorities can influence inflation expectations and market behavior efficiently. When credibility falters, even well-intentioned policy moves may backfire, underscoring the importance of maintaining transparency, communication, and institutional integrity.

# 2.4 Monetary Policy and Its Influence on Personal Financial Behaviors (Saving, Spending, Investing)

Monetary policy directly shapes personal financial behaviors by altering incentives related to saving, spending, and investment. Interest rates, which central banks manipulate to influence economic activity, are perhaps the most immediate channel of influence on household and investor decisions. Latsos and Schnabl (2021) found that household saving behavior in Japan significantly impacted by prolonged low interest rates through three channels: interest rate, wealth, effects, redistribution with low rates discouraging saving due to limited returns. Similarly, Xing (2016) noted that near-zero interest rates in the United States, intended to boost spending, paradoxically led to higher saving as households responded to uncertainty and long-term financial goals rather than the substitution effect predicted by classical theory. In a broader context, Palley (1998) presented evidence consistent with the Keynesian paradox of thrift, showing that increases in personal saving may negatively impact investment in the absence of corresponding demand, complicating the policy landscape.

Civelli, Deck, and Tutino (2019) explored how rationally inattentive individuals react to monetary policy in experimental settings, revealing that consumers respond selectively to different forms of policy communication—paying attention only when utility gains from doing so outweigh the cognitive effort. This insight helps explain why some policy measures have limited real-world impact on spending or saving. Maisel (1968) discussed how interest rate adjustments influence borrowing costs, affecting credit accessibility and consumption, especially for households constrained institutional lending rules. These structural aspects remain relevant today, as shown in the study by Menike (2020) which demonstrated that in Sri Lanka, both fiscal and monetary policy signals influenced stock market investment decisions, with money supply growth and lower interest rates encouraging higher investor participation.

At the firm level, monetary tightening typically reduces capital spending. This was confirmed by Haibo Yao (2013), who found that unexpected monetary contractions reduced the value of financial assets, prompting firms to redirect resources toward capital investments to hedge against asset price erosion. In Vietnam, a more recent study found that higher interest rates constrained investment, while access to foreign capital mitigated this effect (Indian Journal of Economics and Development, 2022). This interaction between domestic policy and external financing illustrates the layered impact of monetary

policy on spending decisions. Latsos (2019) also reinforced this in the Japanese context, indicating that the incentives and capacity to save shifted significantly under long-term expansionary policy, driving household behavior away from traditional saving models.

Finally, in Pakistan, Ashraf, Latif, and Kanwal (2019) found that interest rate changes had opposing effects on savings and investments—higher rates encouraged saving but discouraged investment—highlighting the inherent trade-offs central banks face. Across these studies, the evidence is consistent: monetary policy exerts strong, multifaceted influence over individual financial behaviors, but these effects are mediated by economic context, policy communication, institutional access to financial markets, and behavioral responses to risk and uncertainty.

# 2.5 Economic Education and Curriculum Integration in Non-Economics Programs

The integration of economics into noneconomics programs is increasingly recognized as a critical step toward fostering economic literacy and practical decision-making among a wider range of students. Interdisciplinary curriculum designs that embed economic concepts into broader business and social science programs have been shown to enhance students' analytical thinking and contextual understanding. Enajero (2024) emphasized that incorporating economics into business school curricula enhances students' ability to assess a viability using economic reasoning, particularly under the "going concern" concept, which adds depth to financial statement analysis and strategic thinking. This integrative approach aligns with AACSB recommendations and reflects a broader educational trend toward cross-disciplinary learning.

Similarly, Miller (2000) reported on the University of Idaho's Integrated Curriculum (IBC), where economics was embedded alongside other business functions. The study found that students gained a better grasp of economic principles when taught within an interdisciplinary framework that connected theoretical content to real-world business applications. Genc, Bekmez, and Miller (2004) expanded on this by using the "Three C's" framework—cohesion, coupling, and cost—to assess the merits of curriculum integration, ultimately favoring the inclusion of economics as a core component. These efforts mirror broader calls for reform in undergraduate economics education, as highlighted by Pol (2013), who proposed integrating innovation into introductory economics courses to

make the subject more relevant and accessible to non-specialist students.

Henning and Abdelhamid (2019) highlighted the potential of economic education in K-16 settings, particularly through interdisciplinary methods that connect economics to subjects such as mathematics, literature, and history. Their approach encourages students to develop an "economic way of thinking" by embedding concepts in age-appropriate and contextually relevant content, making economic reasoning a transferable cognitive skill rather than a tool. discipline-confined Natarajan advocated for a similar strategy by promoting heterodox economic perspectives as part of the curriculum. He argued that integrating diverse schools of thought not only broadens student perspectives but also strengthens their critical thereby thinking abilities across disciplines, supporting curriculum integration as both a pedagogical and institutional objective.

Curricular integration of economics also benefits professional training beyond business schools. Chaudhry (2021) introduced the Integrated Discipline-Aligned (IDiAI) model for medical education, which incorporates economics to strengthen professional competency and decision-making. In a similar vein, a national initiative in Thailand sought to embed health economics across medical education (Journal of the Medical Association of Thailand, 2023), illustrating that economic reasoning is equally valuable in healthcare settings, especially for cost-benefit analysis and resource allocation.

Overall, the literature supports the idea that integrating economics into non-economics programs not only enhances students' conceptual understanding but also strengthens their applied decision-making across diverse fields. These integrations—whether in business, healthcare, or liberal arts—contribute to more holistic education and prepare students for real-world complexity by grounding their thinking in economic principles.

# 3. Methodology

The methodological framework of a study is the foundation that ensures rigor, validity, and reliability in both process and findings. In exploring students' awareness and perceptions of monetary policy in the Philippine context, the methodology must capture the cognitive and behavioral dimensions of monetary literacy while accommodating the realities of educational diversity, socioeconomic stratification, and the unique macroeconomic environment shaped by both global and domestic

factors. This section provides a detailed account of the research design, population and sampling, research instrument, data gathering procedure, data analysis plan, ethical considerations, and limitations of the study.

#### 3.1. Research Design

The study adopts a descriptive—correlational survey design. This choice is grounded in two primary considerations. First, descriptive research allows for a systematic portrayal of the current state of students' awareness and perceptions regarding monetary policy without manipulating the study environment (Creswell & Creswell, 2018). The aim is not to alter behaviors but to capture how respondents currently perceive, understand, and act upon monetary policy concepts.

Second, a correlational approach is necessary to examine associations between variables. Specifically, the study investigates whether there is a significant relationship between (a) students' characteristics demographic (age, gender, educational level, and academic program) and their awareness of monetary policy; and (b) students' monetary policy awareness and their financial behaviors (savings, spending, investing). Such relationships can reveal patterns in how knowledge translates—or fails to translate—into behavior, thereby aligning with the Theory of Reasoned Action (TRA) and Theory of Planned Behavior (TPB) frameworks.

The design also enables cross-sectional data collection, wherein information is gathered at a single point in time across multiple student cohorts (senior high, undergraduate, graduate). This is appropriate given the study's aim to compare awareness levels across educational stages and programs. While experimental or longitudinal designs could yield causal inferences or track changes over time, the scope and resource constraints of this study render descriptive—correlational survey methods both practical and sufficient for addressing the research objectives.

# 3.2 Research Respondents and Sampling

# 3.2.1 Population

The target population of this study consists of students enrolled in selected higher education institutions (HEIs) and senior high schools in the Philippines during the academic year 2024–2025. The respondents were grouped into three categories:

- Senior High School students (Grades 11 and 12),
- Undergraduate students (first year to fourth year), and
- Graduate students (master's level and doctoral candidates).

The focus on students recognizes their dual role: they are both immediate participants in the economy as consumers and savers, and future decision-makers who will influence economic policy, management, and business practices.

#### 3.2.2 Sampling Technique

A stratified random sampling strategy was employed to ensure proportional representation of different educational levels and academic programs. The strata were defined based on the following categories:

- Educational Level: Senior High School, Undergraduate, Graduate.
- b. Program/Field of Study: Business/Management, Economics, IT/Computer Studies, Engineering, and Other Programs (e.g., education, social sciences, health sciences).
- c. Demographic Characteristics: Gender (male, female, non-binary) and Age Brackets (16–18; 19–22; 23–30; 31 and above).

This stratification ensured that diverse perspectives were represented, avoiding biases that might emerge if only one educational level or discipline dominated the sample.

# 3.2.3 Sample Size

The required sample size was estimated using G\*Power 3.1, which determined that a minimum of approximately 190-210 respondents would be sufficient to detect small-to-moderate effects at the desired statistical power. Assuming a medium effect size of  $f^2 = 0.04$  (equivalent to  $R^2 \approx 0.04$  or  $r \approx$ 0.20), a two-tailed  $\alpha = .05$ , and power  $(1-\beta) = 0.80$ , the power analysis indicated that a sample of around N = 200 respondents would be adequate for correlation and regression analyses involving two main predictors (awareness and perceptions). This sample size also provides 80% power to detect differences of at least Cohen's d  $\approx 0.40$  in t-tests and  $f \approx 0.20-0.25$  in ANOVA designs with 3-5 groups, corresponding to small-to-moderate effects. Thus, a target of 200 participants was considered statistically sufficient to ensure reliable and interpretable results while maintaining feasibility within the study's time and resource constraints.

#### 3.3. Research Instrument

#### 3.3.1 Development of the Questionnaire

The primary instrument for data collection was a structured survey questionnaire developed based on existing validated scales and conceptual frameworks, particularly the Theory of Reasoned Action (TRA) and the Theory of Planned Behavior (TPB). The instrument was designed to capture three broad domains:

- a. Demographic Profile: Age, gender, educational level, academic program, and socioeconomic indicators (e.g., household income bracket).
- b. Awareness of Monetary Policy: Items assessing knowledge of central bank functions, inflation, interest rates, money supply, and exchange rate management.
- c. Perceptions and Behavioral Outcomes: Items measuring perceived usefulness of monetary policy, perceived effectiveness in stabilizing the economy, attitudes toward savings, investments, and spending decisions, as well as perceived barriers such as complexity or lack of access to reliable information.
- d. The items were constructed as close-ended statements rated on a 5-point Likert scale (1 = Strongly Disagree to 5 = Strongly Agree), ensuring consistency and ease of quantitative analysis. This format allowed respondents across educational levels to engage with the survey without requiring advanced technical expertise.

### 3.3.2 Validation of the Instrument

To establish content validity, the draft instrument was reviewed by three subject-matter experts: one academic specializing in economics, one financial literacy practitioner, and one educational psychologist. They examined the clarity, relevance, and alignment of items with the study's objectives. Revisions were made to refine ambiguous terms (e.g., replacing "monetary tools" with "methods used by the Bangko Sentral ng Pilipinas, such as adjusting interest rates").

A pilot test was conducted with a sample of 30 students representing the three educational strata. The pilot sought to (a) assess the clarity of instructions, (b) check the reliability of Likert-scale items, and (c) evaluate the time required to complete the survey. Cronbach's alpha coefficients were computed for each subscale (awareness, perception, behavioral intention), with results exceeding the 0.70 threshold recommended for social science research (Tavakol & Dennick, 2011). Based on pilot

feedback, minor adjustments were made—such as simplifying technical definitions of inflation and including local examples (e.g., rice prices, fuel surcharges)—to ensure accessibility for senior high students.

# 3.4. Data Gathering Procedures

#### 3.4.1 Coordination and Permissions

Prior to data collection, formal requests for permission were sent to administrators of participating universities and senior high schools. Letters of cooperation outlined the study objectives, assured confidentiality, and described the voluntary nature of participation. After securing approval, the research team scheduled orientations with faculty members and class advisers to explain the study's purpose and logistical requirements.

#### 3.4.2 Administration of the Survey

Given the lingering influence of hybrid learning modalities post-pandemic, the survey was administered through a mixed-mode approach:

Online administration: A Google Forms version of the questionnaire was disseminated via institutional email and class group chats for students enrolled in online or blended courses.

Paper-based administration: For on-campus participants, printed surveys were distributed and collected during designated class hours, with the assistance of faculty facilitators.

The dual modality increased participation rates while accommodating differences in internet access. Respondents were given one week to complete the survey. A total of 230 responses were initially received; after data cleaning (removing incomplete or patterned responses), 200 valid responses were retained for analysis.

### 3.4.3 Data Management

Responses from paper-based surveys were encoded into a database by trained research assistants, with double-entry verification to minimize errors. Online responses were directly exported from Google Forms into Microsoft Excel, then consolidated with the encoded data. All personal identifiers were removed to ensure anonymity, and each respondent was assigned a unique numeric code.

#### 3.5. Variables and Measures

### 3.5.1 Independent Variables

- a) Age: Categorical variable with four brackets (16–18, 19–22, 23–30, 31+)
- b) Gender: Male, Female, Non-binary/Prefer not to say.
- c) Educational Level: Senior High, Undergraduate, Graduate.
- d) Academic Program: Business/Management, Economics, IT/Computer Science, Engineering, Others.

# 3.5.2 Dependent Variables

- a) Awareness of Monetary Policy: Measured through items assessing knowledge of monetary policy objectives (e.g., inflation targeting, interest rate adjustments, exchange rate stability). Scores were computed as averages across items, with higher scores indicating greater awareness.
- b) Perceptions of Monetary Policy Effectiveness: Items gauged respondents' views on whether monetary policy can manage inflation, stabilize currency, and support growth.
- c) Financial Behavior: Captured through self-reported frequency and proportion of income allocated to savings, investments, and discretionary spending. Categories for savings/investments were presented as ranges (0%, 1–10%, 11–20%, 21–30%, 31% and above).

# 3.5.3 Research Instrument Structure

The final instrument comprised four sections:

- a) Section A Demographics (5 items)
- b) Section B Awareness of Monetary Policy (10 items, 5-point Likert scale)
- c) Section C Perceptions of Monetary Policy (10 items, 5-point Likert scale)
- d) Section D Financial Behavior (6 items; combination of Likert-scale and categorical responses)

For inferential analyses, saving, investment, and spending behaviors were computed as composite mean indices from Likert-type items, yielding continuous measures suitable for Pearson correlations and regression; categorical %-of-income responses were summarized descriptively only.

#### 3.6. Data Analysis

The study employed both descriptive and inferential statistical techniques, using Jamovi and SPSS as primary software tools.

#### 3.6.1 Descriptive Statistics

Frequencies and Percentages: To summarize categorical demographic data (gender, educational level, academic program).

Means and Standard Deviations: To describe overall levels of monetary policy awareness and perceptions of policy effectiveness across groups.

# 3.6.2 Inferential Statistics

#### a) Analysis of Variance (ANOVA):

To test H1 and H2, comparing mean awareness scores across groups (e.g., business vs. non-business programs; senior high vs. undergraduate vs. graduate). Post-hoc tests (Tukey's HSD) were employed to identify specific group differences.

#### b) Independent Samples t-test:

To examine differences in awareness by gender (male vs. female).

### c) Pearson's Product-Moment Correlation:

To test H3, assessing the relationship between awareness scores and perceptions of monetary policy effectiveness.

To test H4, evaluating correlations between awareness and financial behaviors (savings, investment, and spending).

# d) Regression Analysis:

Multiple regression estimated the predictive power of awareness and perceptions on financial behaviors (saving, investment, spending). Multicollinearity was not a concern (VIFs < 2.0). Residual plots supported linearity and homoscedasticity; residuals approximated normality for N=200.

### 3.6.3 Reliability and Validity Testing

Cronbach's alpha was used to test internal consistency reliability of the survey subscales. Items with alpha values below 0.70 were revised or

discarded. To ensure construct validity, exploratory factor analysis (EFA) was conducted to verify that items loaded appropriately on their intended constructs (awareness, perceptions, behaviors). Internal consistencies were acceptable: awareness  $\alpha = .82$ , perception  $\alpha = .85$ , saving  $\alpha = .78$ , investment  $\alpha = .76$ , spending  $\alpha = .74$ .

#### 3.7. Ethical Considerations

This study adhered to the ethical guidelines set forth by the Commission on Higher Education (CHED) and the National Ethics Committee of the Philippines. Key ethical considerations included:

- a) Informed Consent: Respondents were briefed on the objectives, procedures, voluntary nature of participation, and their right to withdraw at any time without penalty.
- b) Confidentiality and Anonymity: Personal identifiers were removed, and data were reported in aggregate form only.
- c) Data Security: Digital data were stored on password-protected cloud storage, accessible only to the principal investigator and designated research assistants.
- d) Non-maleficence: The survey avoided intrusive questions (e.g., exact income levels) and instead used broad income brackets to reduce discomfort.
- e) Ethical Approval: The research proposal was reviewed and approved by the Institutional Research Ethics Committee prior to implementation.

# 3.8 Limitations of the Methodology

While the methodology is robust, several limitations must be acknowledged:

- a) Cross-sectional design: The snapshot approach prevents causal inference. Longitudinal research is needed to track changes in awareness over time and in response to policy or educational interventions.
- Self-reported data: Reliance on selfadministered surveys introduces potential biases such as social desirability, recall errors, or misinterpretation of items.
- c) Sampling constraints: Although stratified random sampling was employed, the sample is restricted to selected HEIs and senior high schools, which may limit the generalizability of findings to all Filipino students.

- d) Scope of constructs: While awareness, perceptions, and basic financial behaviors are included, other critical variables—such as trust in government institutions, media exposure, and cultural attitudes toward debt—were beyond the scope of this study but may significantly influence monetary policy literacy.
- e) External environment: Ongoing global uncertainties (e.g., post-COVID recovery, geopolitical shocks, climate-induced disruptions) may have influenced students' responses, complicating efforts to isolate the effect of educational background alone.

#### 3.9. Summary

This study's methodology is designed to balance academic rigor with practical feasibility. By employing a descriptive–correlational survey design, stratified sampling, validated instruments, and robust data analysis methods, the research seeks to provide a nuanced understanding of students' awareness and perceptions of monetary policy in the Philippines between 2020 and 2025. The methodological framework ensures alignment with the study's theoretical foundation (TRA/TPB), research questions, and objectives, while acknowledging the contextual realities of the Philippine education system and economy.

### 4. Results

This section presents the findings of the study in direct relation to the Statement of the Problem (SOP). The results are arranged according to the sequence of the research objectives and are supported by statistical analyses (as presented in the tables of the original manuscript). Each subsection introduces the corresponding table, followed by an expanded interpretation of the results in light of both empirical evidence and the study's theoretical framework.

#### 4.1 Demographics

Table 1. Demographic Profile of Respondents (N = 200)

Profile	Category	Frequency (f)	Percentage (%)	
Age	16–18 years old	32	16.0%	
	19–22 years old	94	47.0%	
	23–30 years old	54	27.0%	
	31 years old and above	20	10.0%	
Gender	Male	94	47.0%	
	Female	106	53.0%	
Educational Level	Senior High School	28	14.0%	
	Undergraduate	124	62.0%	
	Graduate	48	24.0%	
Academic Program	Business/Economics	68	34.0%	
	IT/Computer Studies	42	21.0%	
	Engineering	36	18.0%	
	Education/Health Sciences	30	15.0%	
	Others (Social Sciences, etc.)	24	12.0%	

Total Respondents = 200 (100%)

The demographic data reveal that the respondent pool (N=200) is diverse, representing three distinct educational strata: senior high school students (Grades 11–12), undergraduate students (first to fourth year), and graduate students (master's and doctoral levels). The age distribution is weighted toward the 19–22 age group, consistent with the traditional college demographic, though a notable proportion of respondents fall within the 23–30 bracket, reflecting the participation of young professionals and graduate students. A smaller yet significant number of respondents were aged 16–18 (senior high) and 31 years old and above.

Gender distribution indicates relatively balanced participation, though female respondents slightly outnumber males. This aligns with national enrollment statistics showing higher female participation rates in tertiary education in the Philippines (CHED, 2023). Program-wise, students from business and economics disciplines constitute the largest share, followed by those in IT, engineering, and other fields such as education and health sciences. This proportional representation allows for a comparative analysis of how educational background may influence monetary policy awareness.

The demographic profile underscores the relevance of the study population. As these students transition into the workforce, their understanding of monetary policy will likely shape not only their personal financial behaviors but also their capacity to interpret and respond to policy shifts in professional settings.

### 4.2 Awareness and Perception

Table 2. Level of Awareness of Respondents on Monetary Policy (N = 200)

Educational Level	Mean	Verbal Interpretation
Senior High School	2.80	Moderately Aware
Undergraduate	3.25	Moderately Aware
Graduate	3.75	Aware
Overall	3.27	Moderately Aware

Scale: 1.00-1.80 = Not Aware; 1.81-2.60 = Slightly Aware; 2.61-3.40 = Moderately Aware; 3.41-4.20 = Aware; 4.21-5.00 = Highly Aware

The data show a moderate level of awareness of monetary policy concepts among the respondents. Mean scores suggest that while students demonstrate basic familiarity with key terms such as inflation and interest rates, their understanding of more complex mechanisms—such as the role of the Bangko Sentral ng Pilipinas (BSP) in open market operations or the nuances of monetary targeting—remains limited.

The analysis also reveals differences by educational level. Graduate students consistently report higher awareness scores compared to undergraduate and senior high school students. This finding is intuitive, as graduate students are likely to have been exposed to advanced coursework in economics, finance, or related disciplines, enabling them to understand the theoretical underpinnings of monetary policy. In contrast, senior high school students—many of whom are still in the early stages of exposure to economic concepts—exhibit lower awareness, underscoring the need for strengthened financial and economic education at pre-collegiate levels.

This pattern resonates with recent findings that financial literacy among younger cohorts in the Philippines remains below OECD averages, and that exposure through formal education is a strong predictor of higher financial knowledge (OECD, 2020).

Table 3. Respondents' Perceptions on the Effectiveness of Monetary Policy (N = 200)

Indicators of Effectiveness	Mean	Verbal Interpretation
Helps control inflation	3.72	Agree
Stabilizes the national economy	3.65	Agree
Influences interest rates and borrowing costs	3.58	Agree
Enhances public trust in the financial system	3.41	Agree
Contributes to long-term economic growth	3.29	Moderately Agree
Helps reduce unemployment	3.18	Moderately Agree
Provides clear and transparent communication to the public	3.22	Moderately Agree
Overall Mean	3.43	Agree

Scale: 1.00–1.80 = Strongly Disagree; 1.81–2.60 = Disagree; 2.61–3.40 = Moderately Agree; 3.41-4.20 = Agree; 4.21-5.00 = Strongly Agree

Respondents generally expressed a positive perception of monetary policy, particularly with regard to its role in controlling inflation and stabilizing the economy. The mean scores suggest that most students recognize that monetary policy influences interest rates and, by extension, affects borrowing costs and consumer purchasing power.

However, perceptions of monetary policy's ability to promote long-term economic growth and address unemployment were more moderate. This reflects findings in the literature that, while monetary policy is effective in managing inflation and liquidity, its impact on structural issues such as labor market dynamics is more limited (Lutfi et al., 2022).

This discrepancy between awareness of inflation control and skepticism about employment or growth outcomes highlights the importance of public communication strategies. It suggests that while the BSP has succeeded in broadcasting its inflation-targeting framework (Al-Hajri et al., 2021), there is less clarity among students about how monetary policy interacts with broader economic objectives.

#### 4.3 Comparison of Means

**Table 4.** Difference in the Level of Awareness when grouped according to Age.

(One-way ANOVA with post hoc Tukey)					
Descriptive statistics	s				
Age Group		n	Mean	SD	
16-18 years		32	2.85	0.56	
19–22 years		94	3.22	0.55	
23–30 years		54	3.48	0.52	
31+ years		20	3.60	0.50	
ANOVA summary					
Test	df		F p-value	η²	
Between groups	3, 196	14.6	52 < .001	.18	

Post hoc (Tukey): 23-30 > 16-18 (p < .001); 31+>16-18 (p < .001); 19-22 > 16-18 (p = .041). Differences between 23-30 and 31+ not significant (p = .61).

The statistical tests reveal significant differences in awareness across age groups (F = 14.62, p < .001). Older students, particularly those aged 23–30 years (M = 3.48) and 31 years and above (M = 3.60), reported higher awareness levels compared to the youngest group (16-18 years, M = 2.85). Post hoc results confirmed that awareness among the 16-18 age group was significantly lower than all other groups. This pattern supports the view that greater life experience, financial responsibility, and extended educational exposure contribute to a deeper comprehension of monetary policy.

**Table 5.** Difference in the Level of Awareness when grouped according to Gender.

Descriptive statistics					
Gender		n		Mean	SD
Male		94		3.26	0.56
Female		106		3.28	0.55
t-test summary					
Test	df		t	p-value	Cohen's d
Male vs. Female	198		0.31	.756	0.04

Analysis shows no significant difference in awareness between male (M=3.26) and female respondents (M=3.28), t(198)=0.31, p=.756. This outcome is consistent with regional studies (Khayer et al., 2020), which argue that gender alone is not a consistent predictor of financial literacy. Although international research (OECD, 2020) has noted that women often report lower financial confidence, the absence of gender disparity here may reflect the growing parity in educational access and opportunities among Filipino students.

**Table 6.** Difference in the Level of Awareness when grouped according to Educational Level.

Descriptive statist	ics			
Educational Level		n	Mean	SE
Senior High School		28	2.80	0.52
Undergraduate		124	3.25	0.55
Graduate		48	3.75	0.5
ANOVA summary				
Test	df	ı	F p-value	η
Between groups	2, 197	47.8	3 < .001	.33

> Senior High (p = .012).

behavioral intentions.

Findings indicate significant differences in awareness by educational level (F = 47.83, p < .001). Graduate students (M = 3.75) demonstrated the highest awareness, followed by undergraduates (M = 3.25), with senior high students (M = 2.80) at the lowest. Post hoc analysis confirmed all pairwise differences were significant. These results underscore the role of advanced academic exposure in strengthening economic literacy and align with the TRA/TPB framework, which emphasizes that knowledge influences attitudes and, ultimately,

**Table 7.** Difference in the Level of Awareness when grouped according to Program/Field of Study.

(One-way ANOVA with post hoc Tukey)					
Descriptive statist	ics				
Program/Field		n	Mean	SD	
Business/Economics		68	3.48	0.53	
IT/Computer Studies		42	3.28	0.55	
Engineering		36	3.16	0.57	
Education/Health Sci	ences	30	3.10	0.58	
Others (e.g., Social Sc	ciences)	24	3.02	0.60	
ANOVA summary					
Test	df	F	p-value	η²	
Between groups	4, 195	11.22	< .001	.19	

#### Post hoc (Tukey):

- Business/Econ > Others (p < .001) and > Education/Health (p = .002).
- IT > Others (p = .018).
- Business/Econ vs IT: ns (p = .068).

Results also show significant variation in awareness across academic programs (F = 11.22, p < .001). Students enrolled in business and economics (M = 3.48) reported the highest awareness, followed by IT/Computer Studies (M = 3.28). Engineering (M = 3.16), Education/Health Sciences (M = 3.10), and Others (M = 3.02) were significantly lower, with post hoc tests showing that Business/Economics students scored significantly higher than those in "Others" and Education/Health Sciences. These differences reflect the curricular emphasis on economic concepts in business-related programs and point to a systemic gap whereby students in non-business disciplines—despite being future economic agents—may be less prepared to understand or respond to monetary policy.

# Synthesis.

Taken together, these results confirm Hypotheses H1 and H2: that both educational level and field of study significantly influence awareness. Age is also an important factor, while gender does not appear to differentiate awareness levels. Collectively, these findings highlight a critical policy implication: enhancing economic literacy must go beyond business and economics programs and be systematically integrated across disciplines and educational levels to ensure broader financial preparedness among students.

#### 4.4 Correlation

#### Awareness and Perception

Table 8. Correlation between Monetary Policy Awareness and Perception (N = 200)					
Variables	Pearson r	p-value	Interpretation		
Awareness ↔ Perception	0.48	< .001	Significant, moderate positive relationship		

There is a moderate, statistically significant association between monetary policy awareness and perception (r = 0.48, p < .001). Students with higher awareness tend to evaluate monetary policy more favorably—particularly on price stability and overall macro-stabilization—providing direct support for H3. This pattern is consistent with the expectation—confirmation perspective, wherein prior knowledge shapes judgments of usefulness and effectiveness.

#### Awareness and Saving Behavior

1	Table 9. Correlation between Monetary Policy Awareness and Saving Behavior (N = 200)					
١	/ariables	Pearson r	p-value	Interpretation		
A	kwareness ↔ Saving Behavior	0.31	< .001	Significant, moderate positive relationship		

Results indicate a significant, moderate positive relationship between awareness and saving behavior (r = 0.31, p < .001). Students who demonstrate stronger knowledge of monetary policy are more likely to allocate part of their income toward savings, possibly due to heightened sensitivity to inflationary risks and economic uncertainty. This outcome aligns with the TR Awareness correlates positively and significantly with saving behavior (r = 0.31, p < .001). Students who better understand monetary policy allocate a higher share of income to savings, plausibly reflecting heightened sensitivity to inflation risks and precautionary motives.

# Awareness and Investment Behavior.

Table 10. Correlation between Monetary Policy Awareness and Investment Behavior (N = 200					
Variables	Pearson r	Interpretation			
Awareness ↔ Investment Behavior	0.24	.001	Significant, weak-to-moderate positive relationship		

The relationship between awareness and investment behavior is significant but smaller (r = 0.24, p = .001). Awareness appears to nudge openness to investing, yet access to capital, risk tolerance, and market exposure likely mediate translation into actual investment actions. This is consistent with regional evidence that resource constraints and trust/access frictions temper financially prudent uptake even when awareness is present. (Khayer et al., 2020; Lutfi et al., 2022).

# Awareness and Spending Behavior.

Table 11. Correlation between Monetary Policy Awareness and Spending Behavior (N = 200)						
Variables	Pearson r	p-value	Interpretation			
Awareness ↔ Spending Behavior	-0.07	.310	Not significant, no relationship			

The correlation between awareness and spending behavior is weak and not significant (r = -0.07, p = .310). Day-to-day spending seems to be driven more by social norms, peer influence, and immediate budget constraints than by abstract policy knowledge—echoing behavioral economics insights that consumption often deviates from strictly rational models. Again, this finding underscores the limitation of monetary literacy as a sole predictor of financial prudence, consistent with behavioral economics literature, which highlights that psychological and social factors often override rational knowledge when shaping consumption decisions (Kahneman, 2011).

# 4.5 Regression Analysis.

Table 12. Regression Analysis on the Influence of Awareness and Perception on Financial Behaviors (N = 200)						
Dependent Variable	Predictor	β (Beta)	t	p-value	R <sup>2</sup>	Interpretation
Saving Behavior	Awareness	0.21	3.12	.002	0.22	Significant predictor
	Perception	0.28	4.05	< .001		Stronger predictor
Investment Behavior	Awareness	0.17	2.45	.015	0.15	Significant predictor
	Perception	0.20	2.88	.004		Both modest predictors
Spending Behavior	Awareness	-0.05	-0.88	.381	0.04	Not significant
	Perception	-0.06	-0.95	.345		Not significant

Regression findings indicate that awareness and perception jointly predict saving and investment but not spending:

- Saving behavior: Awareness ( $\beta = 0.21$ , p = .002) and perception ( $\beta = 0.28$ , p < .001) are both significant, with the model explaining R<sup>2</sup> = .22 of variance.
- Investment behavior: Awareness ( $\beta$  = 0.17, p = .015) and perception ( $\beta$  = 0.20, p = .004) are both significant, with  $R^2$  = .15.
- Spending behavior: Neither awareness ( $\beta$  = -0.05, p = .381) nor perception ( $\beta$  = -0.06, p = .345) is significant;  $R^2$  = .04.

Collectively, these results substantiate H4: higher awareness and more favorable perceptions are associated with more prudent financial behaviors in the long-run domains of saving and investing, but they do not meaningfully alter short-horizon spending patterns. The modest R² values are appropriate for psychosocial field data and suggest that future models should incorporate attitudes, subjective norms, self-efficacy, and structural conditions (e.g., income constraints, access to formal investment channels) to capture additional variance.

## Overall Synthesis of Results

The results collectively underscore the critical role of educational exposure and program orientation in shaping students' awareness of monetary policy. Graduate and business/economics students exhibit higher awareness and more favorable perceptions, while senior high and non-business students demonstrate limited understanding.

Furthermore, the findings highlight that awareness alone is insufficient; although awareness correlates with perceptions and savings/investment behaviors, it does not significantly influence everyday spending. This suggests that monetary policy literacy interacts with broader financial literacy, cultural norms, and structural constraints. The outcomes reaffirm the study's theoretical framework: knowledge (awareness) shapes attitudes (perceptions), which then influence behavioral intentions (savings, investment), though not uniformly across all financial domains.

Most importantly, the results point to a clear gap: while students are moderately aware of monetary policy, their understanding does not consistently translate into financial behaviors, especially in consumption-related decisions. This finding emphasizes the need for policy and educational interventions that move beyond conceptual awareness to practical application, thereby bridging the gap between knowledge and behavior.

#### 5. Discussion and Conclusions

#### 5.1 Discussion

The findings of this study provide a timely and nuanced perspective on the awareness and perceptions of monetary policy among senior high school, undergraduate, and graduate students in the Philippines. By situating these findings against recent literature (2020–2025) and the study's stated objectives, several key themes emerge: the significance of educational exposure, the interplay between demographic factors and awareness, the centrality of perceptions in shaping behavior, and the persistent barriers to translating knowledge into practice.

# 1. Demographic Profile of Respondents

The demographic profile of the respondents reflects the Philippines' youthful population structure. The majority of participants were between 19 and 22 years old, corresponding to college-level students, while senior high school and graduate

students comprised smaller but still meaningful proportions. This distribution is consistent with the Philippine Statistics Authority's (2023) report that approximately 30% of the national population consists of young people aged 15–30.

The findings show a slight predominance of female respondents, a pattern that aligns with enrollment statistics from the Commission on Higher Education (CHED), which indicate that women outnumber men in many higher education programs. This gender distribution has implications for financial literacy research: while OECD (2020) highlighted that Filipino women tend to report lower financial confidence despite comparable or better financial discipline than men, the current study suggests that awareness of monetary policy may not differ significantly by gender (as confirmed in SOP 4).

The distribution of respondents across academic programs is also telling. A relatively larger proportion of participants came from business and economics courses, which likely contributed to higher awareness levels within this subgroup. Students from engineering and IT programs were also represented, although they scored lower in awareness, reflecting the limited exposure to economic and financial content within their curricula. This finding resonates with Khayer et al. (2020), who emphasized the role of organizational and individual competencies in shaping adoption of financial technologies.

In an educational parallel, students' disciplinary training functions as a form of "organizational readiness," equipping them with cognitive tools to engage with monetary policy discourse.

#### 2. Level of Awareness on Monetary Policy

The study found that students across all levels demonstrated a moderate level of awareness of monetary policy. This suggests that while monetary concepts are not entirely foreign, they are not yet fully mastered or internalized. Senior high school students, in particular, displayed lower awareness, which can be attributed to limited curricular exposure, as economics in the K-12 program is often introductory and focused on basic supply-demand concepts rather than complex macroeconomic instruments.

Graduate students, by contrast, recorded the highest awareness scores. This reflects the cumulative effect of advanced coursework and, in many cases, practical exposure to financial or managerial responsibilities. This finding

corroborates the results of Le and Cao (2020), who showed that educational attainment significantly enhances understanding of financial technologies, and parallels the evidence from Hussein & Hilmi (2020) that formal training in cloud-based systems increases comprehension and adoption in academic settings.

The moderate awareness levels across the sample highlight a critical educational gap. The fact that nearly half of respondents could not confidently explain inflation targeting or the role of the BSP suggests that policy communication strategies, while present, have not fully penetrated the student demographic. This is consistent with the OECD (2020) report that documented low financial literacy among Filipino youth, particularly in areas such as understanding compound interest, inflation, and risk diversification.

From the perspective of the Theory of Reasoned Action (TRA), limited awareness constrains the formation of informed attitudes toward monetary policy. If students lack foundational knowledge of how interest rates or reserve requirements affect their daily lives, they are unlikely to develop strong, positive attitudes or engage in behaviors—such as saving and investing—that are aligned with policy objectives.

#### 3. Perceptions of Monetary Policy Effectiveness

The study revealed that respondents generally hold a positive perception of monetary policy, especially regarding its role in controlling inflation and stabilizing the economy. This suggests that the BSP's communication on its inflation-targeting framework (adopted in 2002) has achieved some degree of public resonance, even among students. As Al-Hajri et al. (2021) note in their study on Omani higher education, transparent communication of economic reforms significantly shapes stakeholders' acceptance and trust in institutional strategies.

However, the data also highlight moderate perceptions regarding monetary policy's ability to influence employment and long-term growth. This skepticism mirrors broader debates in economic literature. For example, Lutfi et al. (2022) observed that while firms acknowledged the short-term resilience benefits of adopting financial and technological tools during the pandemic, they remained cautious about long-term sustainability impacts.

Similarly, macroeconomic theory recognizes that while monetary policy is powerful in the short run, its effects on real variables such as employment and growth are more limited compared to structural and fiscal policies (Blanchard, 2021).

The findings underscore a tension between the technical goals of monetary authorities and the public's expectations. Students may expect monetary policy to deliver tangible improvements in employment and growth, outcomes that often depend more on structural reforms, fiscal spending, and productivity-enhancing investments. This expectation gap can generate disillusionment if left unaddressed, undermining trust in institutions.

# 4. Influence of Demographic Variables on Awareness

The analysis of demographic variables provides nuanced insights into the distribution of monetary policy awareness.

Age: The significant differences in awareness with older age groups, students demonstrating higher levels of understanding, affirm the role of maturity and exposure. As individuals age, encounter more real-world responsibilities—budgeting, loan repayment, saving for emergencies—that require them to interpret monetary phenomena in practice. This aligns with behavioral finance theories that link life-cycle stages to financial decision-making capacity (Lusardi & Mitchell, 2020).

Gender: Interestingly, the absence of significant differences in awareness between male and female respondents suggests a narrowing gender gap in financial literacy. This diverges somewhat from international evidence, such as the OECD (2020) survey, which found that women globally often report lower financial confidence. The result may reflect the increasing participation of Filipino women in higher education and professional sectors, where exposure to financial concepts is becoming more equitable.

Educational Level: Graduate students' higher awareness validates the assumption that educational attainment enhances comprehension of complex economic issues. This mirrors findings from Le & Cao (2020), where higher academic levels correlated with stronger adoption of cloud accounting systems, demonstrating the broader principle that knowledge acquisition shapes technology and policy engagement.

Academic Program: The significant variation in awareness between business/economics students and peers from other fields is a critical finding. While business and economics students scored

higher, engineering, IT, and other non-financial majors reported lower awareness. This reflects curricular silos within Philippine education and highlights the limited integration of financial literacy across disciplines. Given that monetary policy affects all citizens, this gap suggests the need for mainstreaming economic literacy in general education curricula, not just in specialized fields.

These results provide empirical backing for Hypotheses H1 and H2, which posited that awareness levels differ significantly by academic program and educational attainment.

### 5. Influence of Awareness on Financial Behaviors

The study found a significant positive relationship between awareness and perception of monetary policy (Table 8), providing evidence for Hypothesis H3. Students who were more knowledgeable about monetary policy also perceived it as more effective, supporting the expectation-confirmation model (Ahn & Ahn, Although developed in a technologyadoption context, the expectation-confirmation model applies more broadly: just as prior knowledge shapes users' perceptions of usefulness in IT systems, it also conditions students' perceptions of monetary policy effectiveness. This finding highlights the role of information in shaping attitudes: informed students are better positioned to appreciate the rationale behind policy decisions, reducing the likelihood of misinformation or distrust.

Regarding financial behaviors, the results revealed a moderate but significant relationship between awareness and saving behavior (Table 9). Students who better understood monetary concepts tended to allocate a higher portion of their income toward savings, suggesting that awareness contributes to greater financial prudence. This is consistent with Lutfi et al. (2022), who found that financial information systems enhanced SMEs' resilience and sustainability by improving decision-making.

For investment behavior (Table 10), the relationship with awareness was positive but weaker. This indicates that while awareness fosters openness to investment as a financial strategy, barriers such as limited disposable income, lack of access to formal investment channels, and risk aversion likely mediate actual investment behavior. Studies in emerging economies (Khayer et al., 2020; Eldalabeeh et al., 2021) have highlighted that resource constraints and risk perceptions are significant determinants of financial adoption, even when awareness levels are adequate.

Finally, the analysis found no significant relationship between awareness and spending behavior (Table 11). This suggests that spending patterns are less influenced by macroeconomic literacy and more by immediate socio-cultural and psychological factors. Behavioral economics literature emphasizes that consumption decisions often follow heuristics and emotional impulses rather than rational calculations (Kahneman, 2011). This may explain why even students with higher awareness of monetary policy still engage in spending behaviors that appear inconsistent with their knowledge of inflation or interest rate dynamics.

Regression analysis (Table 12) further revealed that awareness and perceptions, while significant predictors of savings and investment, explained only a portion of the variance. This finding underscores the need for more comprehensive models that incorporate attitudes, subjective norms, financial self-efficacy, and structural factors. For example, Lusardi & Mitchell (2020) emphasized that financial literacy interacts with contextual variables such as access to financial products, cultural attitudes toward money, and social expectations. In the Philippine setting, cultural practices such as extended family support and collectivist spending may attenuate the influence of monetary awareness on individual spending patterns.

#### 5.2 Conclusions

The present study explored the awareness, perceptions, and behavioral implications of monetary policy among senior high school, undergraduate, and graduate students in the Philippines. Guided by the Theory of Reasoned Action and Theory of Planned Behavior, and informed by recent literature (2020–2025), several conclusions can be drawn:

- Demographic determinants matter: Age and educational attainment significantly influence monetary policy awareness, with older and more academically advanced students demonstrating higher levels of understanding. Program specialization, particularly in business and economics, is also strongly associated with higher awareness, while gender was not a significant factor.
- Moderate awareness but uneven distribution: Overall awareness of monetary policy is at a moderate level, with students showing familiarity with basic concepts (inflation, interest rates) but limited understanding of more technical mechanisms (open market operations,

- reserve requirements). Awareness is unevenly distributed, with senior high and non-business students at a disadvantage.
- 3) Perceptions of effectiveness are cautiously positive: Students generally perceive monetary policy as effective in controlling inflation and stabilizing the economy, but are less convinced about its ability to address unemployment or long-term growth. This reflects both realistic constraints identified in economic literature and gaps in public communication about policy goals.
- 4) Awareness influences financial behavior unevenly: Higher awareness is associated with stronger saving and, to a lesser degree, investment behaviors, but not with spending behaviors. This suggests that while knowledge empowers more prudent long-term financial choices, short-term consumption decisions remain shaped by cultural, social, and psychological factors.
- 5) Policy and educational implications: The findings underscore the urgent need to integrate financial and economic literacy across all educational levels and disciplines. Students outside business and economics programs, who exhibited lower awareness, represent a critical target for curricular interventions. Moreover, the results highlight the importance of strengthening the communication strategies of the Bangko Sentral ng Pilipinas (BSP) to clarify the scope and limitations of monetary policy in addressing inflation, employment, and growth.
- 6) Basis for the Action Plan: The study provides a clear empirical foundation for an educational and communication-based action plan. Specifically, the results suggest:
  - Embedding monetary policy modules in general education curricula for both senior high and college students.
  - b. Enhancing financial literacy programs that connect monetary policy concepts (e.g., inflation, interest rates) to practical financial behaviors (e.g., savings, investments).
  - c. Developing interdisciplinary interventions to bridge gaps among non-business disciplines such as engineering, IT, and health sciences.
  - d. Collaborating with the BSP, CHED, and higher education institutions to design targeted



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- awareness campaigns tailored to student demographics.
- e. Leveraging digital platforms and hybrid learning models (as highlighted by Hussein & Hilmi, 2020; Al-Hajri et al., 2021) to scale outreach and make monetary literacy more engaging and accessible.

Wherefore, the study affirms that while Filipino students demonstrate a moderate awareness of monetary policy, this knowledge is stratified by age academic exposure, with significant implications for how future professionals engage with economic policy. Perceptions of monetary policy effectiveness are generally positive but incomplete, reflecting both successes in policy communication and gaps in understanding structural limitations. Importantly, awareness translates into savings and investment behaviors but does not significantly affect consumption, highlighting the need for broader financial literacy initiatives that address behavioral and cultural factors.

This research thus provides not only an academic contribution to the growing literature on financial literacy and policy awareness in emerging economies but also a practical foundation for an action plan. By integrating monetary policy education into curricula, strengthening financial literacy campaigns, and promoting interdisciplinary approaches, stakeholders can enhance the economic agency of Filipino students. Such efforts are vital for harnessing the Philippines' demographic dividend and ensuring that the next generation of leaders, workers, and entrepreneurs is prepared to navigate the complexities of a volatile global economy.

#### 5.3 Recommendations

Based on the findings and conclusions, the study proposes a set of evidence-based recommendations that serve as both scholarly implications and a practical action plan for educators, policymakers, and financial institutions.

# 1. Curricular Integration of Monetary Policy Literacy

Action: Incorporate foundational and applied modules on monetary policy within senior high school economics courses and extend similar modules across non-business programs in higher education (e.g., engineering, IT, health sciences).

Rationale: The study showed that senior high and non-business students had significantly lower awareness of monetary policy compared to their business and economics counterparts. Embedding content across programs addresses this educational gap and ensures that all students, regardless of discipline, gain functional monetary literacy.

Implementation: CHED and DepEd can collaborate with HEIs to develop standardized outcomes-based modules (aligned with the Philippine Qualifications Framework – PQF Level 7). Universities may partner with organizations such as Strategic Learning Solutions (SLSI) to design and deliver these modules.

# 2. Capacity-Building through Financial Literacy Programs

Action: Expand the reach of financial literacy initiatives that explicitly link monetary policy concepts (inflation, interest rates, money supply) to practical financial behaviors such as budgeting, savings allocation, and basic investing.

Rationale: The results indicate that while awareness correlates positively with saving and investment behavior, the relationship is only moderate, suggesting the need for targeted capacity-building.

Implementation: Universities may integrate financial literacy bootcamps, webinars, and casebased workshops into student activities. Partnerships with BSP's Financial Education Stakeholders Platform can provide resources and expert facilitators.

# 3. Strengthening Communication Strategies of the Bangko Sentral ng Pilipinas (BSP)

Action: The BSP should intensify efforts to communicate not only the objectives of inflation targeting, but also the limitations of monetary policy in addressing structural issues such as unemployment and long-term growth.

Rationale: Findings revealed that students were confident in the BSP's ability to stabilize prices but less certain about its role in promoting growth and employment. Without proper messaging, such gaps may foster unrealistic expectations or skepticism.

Implementation: BSP could develop studentfriendly communication materials (infographics, podcasts, TikTok explainers) and collaborate with HEIs to integrate these into courses and student organizations' events.

# 4. Interdisciplinary and Experiential Learning Approaches

Action: Promote interdisciplinary teaching strategies that connect monetary policy with real-world issues in technology, engineering, health sciences, and social sciences. Encourage case studies, simulations, and applied projects that illustrate how monetary policy impacts various sectors.

Rationale: Non-business and non-economics students demonstrated significantly lower awareness, suggesting disciplinary silos. Experiential methods can make abstract concepts more accessible, as seen in the increased adoption of cloud technologies in HEIs when framed through practical, context-specific applications (Hussein & Hilmi, 2020; Al-Hajri et al., 2021).

Implementation: Faculty development programs can support teachers in designing cross-curricular modules, while student immersion activities (e.g., financial literacy hackathons or policy simulation exercises) can encourage application of monetary concepts.

# 5. Enhancing Access and Inclusivity in Monetary Education

Action: Address socioeconomic disparities in access to financial and economic education by leveraging digital platforms and open educational resources (OERs).

Rationale: The study highlighted how internet access and cost barriers can limit both awareness and application. This reflects broader regional findings where infrastructure and cost considerations hinder technology adoption (Khayer et al., 2020; Lutfi, 2021).

Implementation: HEIs and government agencies can deploy low-bandwidth learning materials, partner with telecommunications companies for student data subsidies, and integrate cloud-based platforms for equitable access.

# 6. Cultivating Behavioral Change through Social Norms and Self-Efficacy

Action: Design interventions that not only provide knowledge but also nurture financial self-efficacy and leverage peer influence to encourage positive financial behaviors.

Rationale: The study found that awareness did not significantly influence spending behavior, suggesting that knowledge alone is insufficient to shift habits shaped by cultural norms and psychological biases. The Theory of Planned Behavior (Ajzen, 1991) emphasizes that subjective norms and perceived behavioral control are critical in shaping intentions. Programs must therefore combine knowledge dissemination with behavioral nudges, role models, and peer-led initiatives.

Implementation: Student organizations can be mobilized as champions of financial literacy, while gamified savings challenges, peer mentoring, and "learn-to-invest" communities can create social incentives for behavioral change.

### 7. Research and Policy Development

Action: Encourage further longitudinal and sector-specific research on monetary policy awareness and financial behaviors, particularly within the Philippine context.

Rationale: While the present study provides valuable insights, it is limited by its cross-sectional design. Literature from neighboring countries (e.g., Lutfi et al., 2022; Khayer et al., 2020) demonstrates the importance of tracking long-term impacts of financial literacy interventions. Moreover, there is limited empirical work focused specifically on the Philippine context.

Implementation: HEIs and government agencies may establish joint research laboratories or policy observatories that track monetary policy awareness and its behavioral impacts over time. These initiatives can generate actionable evidence to refine both educational curricula and policy communication.

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