March 2026 Academic & Student Affairs Committee

Schedule	Wednesday, March 4, 2026 8:30 AM — 8:45 AM CST
Organizer	Colton Cockrum

Agenda

1. Call to Order and Opening Remarks

Presented by Jeffrey Marchetta

2. Roll Call & Declaration of Quorum

For Approval

Presented by Jeffrey Marchetta

3. Approval of Academic & Student Affairs Committee Meeting Minutes from December 3, 2025

For Approval

University of Memphis Board of Trustees
Academic and Student Affairs Committee Meeting
December 3, 2025

Meeting Minutes

Agenda Item 1: Call to Order and Opening Remarks

Trustee Marchetta called the meeting to order and welcomed everyone to the Academic & Student Affairs Committee meeting.

Agenda Item 2: Roll Call and Declaration of Quorum

Trustee Marchetta requested a roll call. Secretary Cockrum called the roll. Trustees Marchetta, Johnson, McKinney, Gregory, and Bailey were in attendance in-person. Several trustees who were not on the committee were also in attendance and those included Trustees Edwards, Carter, Keeney, and Springfield. Secretary Cockrum declared a quorum.

Agenda Item 3: Approval of Academic & Student Affairs Committee Meeting Minutes from September 3, 2025

Trustee Marchetta called for a motion and a second to approve the meeting minutes from September 3, 2025. Trustee Johnson provided the motion and a second was provided by Trustee McKinney. There was no discussion on the meeting minutes. Secretary Cockrum called a voice vote, and the meeting minutes were approved.

Agenda Item 4: Establishment of Two Free-Standing Departments

Trustee Marchetta recognized Executive Vice President for Academic Affairs and Provost, David Russomanno. Provost Russomanno explained how the Fogelman College of Business and Economics is proposing to split the current department of Marketing and Supply Chain Management into two separate academic departments. The Department of Marketing would contain several academic programs that include the BBA in Marketing; minors in Marketing Management, Professional Selling, and Social Media Marketing; and a PhD in Business Administration with a concentration in Marketing. The Department of Supply Chain Management would contain the following programs: BBA in Supply Chain Management, a minor in Supply Chain Management, an MBA with a concentration in Supply Chain Management, and a graduate certificate in Supply Chain Management. The proposed implementation date would be July 1, 2026.

This item was for information purposes only and did not require a vote of the Board.

Agenda Item 5: Student Affairs Update

Trustee Marchetta recognized Melinda Carlson, Vice President of Student Affairs. Melinda Carlson provided an update on the division of student affairs. Her update included that she had recently hired two new AVP positions that play a critical role in the division. Dr. Antwone Cameron is the new AVP and Dean of Students and Dr. Ryan-Jasen Henne is the AVP for Student Engagement. Also, Melinda explained key organizational changes that will help better support student success. Additionally, Melinda provided retention and graduation data that showed that students who are involved on campus have a great likelihood of persisting to graduation, compared to those students who do not get involved. Finally, Melinda provided several slides that showed how intentional initiatives and effort within Student Affairs were helping students to achieve a successful outcome.

This item was for information purposes and did not require a vote of the Board.

Agenda Item 6: Additional Business

Trustee Marchetta asked for additional business. President Hardgrave stated that he had recently been asked what efforts the university makes in reaching and recruiting students. President Hardgrave asked Executive Vice President Michele Ehrhart to explain those efforts. EVP Ehrhart explained the marketing approach the university uses to reach potential students and its impact on recruitment.

Agenda Item 7: Adjournment

Trustee Marchetta called for a motion and second for adjournment. A motion and second was properly made and the meeting was adjourned.

4. Approval of MS in Applied Artificial Intelligence

For Approval

Presented by David Russomanno

Academic and Student Affairs Committee

Dr. David J. Russomanno
Executive Vice President for Academic Affairs and Provost

Dr. Russell Deaton
Executive Director, The Polytechnic @ UofM

March 4, 2026
The University of Memphis (Memphis Campus)

THE UNIVERSITY OF MEMPHIS | Board of Trustees

M.S. Applied Artificial Intelligence (MSAAI)

•**Market Reality** – 78% of organizations use AI; 92% plan to increase AI investments (McKinsey, 2024)

•**Critical Workforce Gap** – Shortage of professionals who can strategically apply AI, bridge technical-organizational divides, and ensure ethical deployment

•**Target Audience** – Domain experts seeking to lead and manage AI adoption within their professional fields

•**Strategic Positioning** – Addresses national need for AI-literate leaders who translate organizational needs into implementable, responsible AI strategies

•**Interdisciplinary Concentrations** – Fogelman College of Business and Economics, School of Public Health, Herff College of Engineering, and College of Arts and Sciences

Alignment with Ascend Strategic Plan

•**Student Success** – Prepares graduates for AI-enabled workforce across healthcare, business, and engineering sectors

•**Access & Flexibility** – Hybrid delivery (on-campus + online) expands access to working professionals and adult learners

•**Research & Innovation** – Leverages UofM's R1 AI research leadership in transportation, logistics, and health analytics

•**Institutional Impact** – Deepens interdisciplinary identity across five Colleges and bridges technical AI expertise with professional workforce development

Program Learning Outcomes

• **Master AI Communication** – Articulate AI principles effectively to both technical and non-technical stakeholders

• **Apply Strategic AI Solutions** – Design and implement AI-assisted workflows using no-code/low-code platforms to solve real-world professional challenges

• **Develop Advanced Prompt Engineering** – Create and refine prompts to generate reliable, high-quality AI outputs

• **Ensure Ethical AI Practice** – Critically evaluate AI solutions for bias, accuracy, and responsible implementation

• **Lead AI Adoption** – Bridge the gap between technical capabilities and organizational decision-making while managing professional AI integration

Curriculum: 30 Credit Hours | Hybrid & Online

- **Core Curriculum (12 credits)** – Applied AI Tools & Prompt Engineering, Computational Thinking & LLM Fundamentals, AI Ethics & Risk Mitigation, Capstone Project

- **Five Concentrations (12 credits each)**
  - ➤ Business, Public Health, Smart Cities, Electrical & Computer Engineering, Language & Literacy

- **Flexible Electives (6 credits)** – Cross-disciplinary AI applications selected with advisor approval

- **Program Structure** – Code-light curriculum accessible to non-CS professionals | Existing courses + new AI core | No programming prerequisites required

MSAAI Fiscal Resources and Projections

• **Program Fiscal Resources** – funded from reallocation and strategic investment funds: Core Courses, Admissions, Assessment, and Concentration Coordination

• **Program Core Courses** – Supported by existing faculty in The Polytechnic @ UofM and Arts and Sciences

• **Program Concentrations** – Supported by existing faculty in collaborating Colleges/Schools

• **Program Enrollment** – Anticipate ~20 incoming students per year with ~60 enrolled and 20 graduates per year by year 5

• **Program Projected Revenue** – $760,000 by year 5

• **Program Scale** – Opportunity for scale through UofM Global

The University of Memphis Board of Trustees

Approval

Date: March 4, 2026

Committee: Academic and Student Affairs Committee

Presentation: Master of Science in Applied Artificial Intelligence

Presented by: David Russomanno, Executive Vice President for Academic Affairs and Provost

Background:

The University of Memphis proposes to establish a Master of Science in Applied Artificial Intelligence (MS-AAI), a distinctive 30-credit-hour graduate program designed to prepare professionals to lead AI implementation and strategy across diverse industries. The program's curriculum makes advanced AI education accessible to professionals without computer science or engineering backgrounds, addressing a critical workforce gap identified by regional employers and state and national workforce development initiatives. Eight of the program's 19 primary occupations appear on Tennessee's High-Demand Occupations List, demonstrating statewide workforce alignment

Students may complete the degree in 12-24 months. In addition to an interdisciplinary set of core courses, the program requires a concentration, with choices from five different UofM colleges. Choices include Smart Cities, Electrical and Computer Engineering, Public Health, Business, and Language and Literacy Technologies

The MS-AAI uniquely targets working professionals seeking to lead AI adoption initiatives within their sectors—bridging the gap between technical AI development and strategic organizational implementation. The program aligns directly with THEC's 2025-2035 Master Plan priorities while supporting the University's Ascend strategic plan through student success, research innovation, and interdisciplinary collaboration initiatives.

Motion to be Made:

The Academic and Student Affairs committee recommends a motion to approve the Master of Science in Applied AI degree program with concentrations in Public Health, Business, Electrical and Computer Engineering, Language and Literacy Technologies, and Smart Cities.

Academic and Student Affairs Committee

Dr. David J. Russomanno
Executive Vice President for Academic Affairs and Provost

Dr. Russell Deaton
Executive Director, The Polytechnic @ UofM

March 4, 2026
The University of Memphis (Memphis Campus)

THE UNIVERSITY OF MEMPHIS® | Board of Trustees

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Alignment with Ascend Strategic Plan

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Labor Market Analysis

- **Regional Market Transformation** – Digital Delta: xAI, Google

    ➢ Job postings for MSAAI related occupations increased 18% (Q3 2024 to Q1 2026)

- **Economic Independence** – All concentrations exceed Memphis living wage ($44,803) by 56-246%

- **Tennessee Workforce Alignment** – 8 of 19 program occupations designated "In-Demand in TN" (THEC) and Addresses THEC AI Advisory Council workforce mandate

- **Competition** – No comparable programs in TN (i.e., master's-level code-light applied AI)

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Letter of Notification (LON)

University of Memphis

Master of Science in Applied Artificial Intelligence

(MS-AAI)

January 27, 2026

Table of Contents

Section I: Overview

Program Information

Field	Information
Institution Name	University of Memphis
Proposed Academic Program	Applied Artificial Intelligence
Concentrations	Smart Cities; Electrical and Computer Engineering; Public Health; Business; Language and Literacy Technologies
Degree Name	Master of Science
Degree Designation	M.S. (Master of Science)
Proposed CIP Code	11.0102
CIP Code Title	Artificial Intelligence
Proposed Implementation Date	August 2026

CIP Code Definition

A program that focuses on the symbolic inference, representation, and simulation by computers and software of human learning and reasoning processes and capabilities, and the computer modeling of human motor control and motion. Includes instruction in computing theory, cybernetics, human factors, natural language processing, and applicable aspects of engineering, technology, and specific end-use applications.

Standard Occupational Classification (SOC) Codes

The MS-AAI program prepares graduates for occupations spanning multiple SOC codes. The program's applied, interdisciplinary nature—emphasizing AI literacy, strategic implementation, and sector-specific applications—aligns with both technical AI roles and managerial/analytical positions across various industries.

Primary SOC Codes (Directly Crosswalked to CIP 11.0102)

SOC Code	Occupation Title	Justification

15-2051	Data Scientists	Core alignment: Graduates apply AI/ML tools for data analysis, predictive modeling, and business intelligence
15-1299	Computer Occupations, All Other	Includes emerging AI implementation specialists and AI integration roles
15-2041	Statisticians	Program emphasizes statistical modeling and predictive analytics using AI tools
11-9199	Managers, All Other	Graduates prepared to manage AI adoption and strategy across organizations

Additional SOC Codes by Concentration

Each concentration prepares graduates for specific sectoral applications:

Smart Cities Concentration:

SOC Code	Occupation Title
19-3051	Urban and Regional Planners
11-3071	Transportation, Storage, and Distribution Managers
17-2051	Civil Engineers
13-1081	Logisticians

Public Health Concentration:

SOC Code	Occupation Title
21-1091	**Health Education Specialists**
21-1094	**Community Health Workers**
11-9111	**Medical and Health Services Managers**
19-1041	**Epidemiologists**

SOC Code	Occupation Title
19-2041	**Environmental Scientists Including Health**
21-1022	Healthcare Social Workers
19-5011	Occupational Health and Safety Specialists

Business Concentration:

SOC Code	Occupation Title
11-1021	General and Operations Managers
13-1111	Management Analysts
13-1082	Project Management Specialists
11-3071	Transportation, Storage, and Distribution Managers
13-1071	Human Resources Specialists
13-1081	Logisticians

Electrical and Computer Engineering Concentration:

SOC Code	Occupation Title
11-9041	Architectural and Engineering Managers
17-2071	Electrical Engineers
17-2072	Electronics Engineers, Except Computer
15-1252	Software Developers
17-2061	Computer Hardware Engineers
15-1253	Software Quality Assurance Analysts and Testers
15-1241	Computer Network Architects

Language and Literacy Technologies Concentration:

SOC Code	Occupation Title
27-3042	Technical Writers
27-3091	Interpreters and Translators
25-9031	Instructional Coordinators
27-3041	Editors
27-3031	Public Relations Specialists
25-4022	Librarians and Media Collections Specialists
27-3043	Writers and Authors

Justification for SOC Code Alignment

The MS-AAI program's unique positioning as an applied, code-light program justifies alignment with both technical and managerial occupations:

- Data Scientists and Statisticians (15-2051, 15-2041): The program emphasizes practical application of AI/ML tools, prompt engineering, and predictive modeling without requiring deep programming expertise. Graduates can implement AI solutions using modern low-code/no-code platforms.

- Computer Occupations, All Other (15-1299): This SOC code encompasses emerging roles in AI implementation, integration, and deployment—precisely the skill set developed through this program.

- Managers, All Other (11-9199): The curriculum explicitly includes AI strategy, executive decision-making, and organizational leadership courses (MGMT 7500, MGMT 6462), preparing graduates to lead AI transformation initiatives.

- Concentration-Specific SOCs: Each concentration directly aligns with domain-specific occupations. For example, the Public Health concentration includes courses on AI applications in epidemiology, health outcomes prediction, and community health—directly preparing graduates for roles as Health Education Specialists (21-1091) and Epidemiologists (19-1041).

The Public Health concentration prepares graduates to apply AI tools in community health assessment, workplace safety analytics, and social determinants of health research (Healthcare Social Workers (21-1022) and Occupational Health and Safety Specialists (19-5011). Coursework in AI applications for health outcomes and population health analytics directly supports these occupations' increasing use of predictive models and data-driven intervention strategies.

The Business Concentration prepares graduates for AI-augmented roles across Management (SOC 11-0000) and Business and Financial Operations (SOC 13-0000) occupation groups. These occupations are characterized by substantial exposure to AI-enabled cognitive tasks, as documented by the Tennessee AI Advisory Council and MIT's Project Iceberg. The concentration's focus on AI strategy, prompt engineering, and data-driven decision-making aligns with the growing integration of AI tools across management functions including operations, human resources, project management, cost estimation, and supply chain logistics. Graduates will be equipped to lead AI adoption initiatives, interpret AI-generated insights, and manage AI-enhanced business processes rather than develop AI systems themselves.

The Electrical and Computer Engineering concentration emphasizes AI integration in embedded systems, quality assurance automation, and intelligent network management and prepares graduates for positions such as Computer Hardware Engineers (17-2061), Software Quality Assurance Analysts and Testers (15-1253), and Computer Network Architects (15-1241). Graduates learn to apply AI tools for hardware-software integration, automated testing frameworks, and network optimization—directly supporting these occupations' evolution toward AI-enhanced design and validation processes.

The Language and Literacy Technologies concentration prepares graduates to apply AI tools for content generation, automated translation, information organization, and audience analysis. It will prepare students for careers as Public Relations Specialists (27-3031), Librarians and Media Collections Specialists (25-4022), and Writers and Authors (27-3043). Coursework in natural language processing applications, AI-enhanced writing tools, and automated content management systems directly aligns with these occupations' increasing adoption of AI for content creation, curation, and dissemination.

Academic Program Liaison

Name	Dr. Russell Deaton
Title	Executive Director of the Polytechnic
Email	polytechnic@memphis.edu
Phone	(901) 678-3258

Section II: Background

Purpose and Nature of the Academic Program

Artificial Intelligence (AI) is no longer a niche technical domain; rather, it is a strategic asset reshaping healthcare systems, business models, logistics, public policy, and more. The accelerating demand for AI in industry and government highlights a critical workforce gap: there are too few professionals trained to thoughtfully apply AI tools in their fields, ask the right

questions of data, ensure ethical and effective deployment, and bridge the gap between technical developers and organizational decision-makers.

To address this need, the University of Memphis proposes a Master of Science in Applied Artificial Intelligence (MS-AAI). MS-AAI is envisioned as a code-light, interdisciplinary program that equips students with the knowledge to use AI tools responsibly and strategically within their professional sectors. The program is designed for learners from public health, business, policy, and other non-computer science backgrounds who wish to lead and manage AI adoption.

This aligns with national labor trends. According to McKinsey & Company, 78% of organizations were using AI as of 2024, and 92% expect to increase investments in AI integration. Demand is no longer limited to AI developers. There is a growing need for professionals who can bridge the technical-organizational divide: domain experts who can evaluate AI solutions, manage deployments, ensure ethical use, and translate organizational needs into implementable AI strategies. AI-related job postings have surged by over 20% since 2018, and professionals who understand how to integrate AI into public-facing sectors are commanding wage premiums and have broader career mobility.

Nature of the Program

The Master of Science in Applied Artificial Intelligence is a 30-credit hour program available in **both on-ground and fully online formats**, allowing for maximum flexibility. The curriculum balances foundational understanding of AI systems with applied case studies, ethical analysis, and domain-specific knowledge.

Importantly, the program is designed as **to not require programming expertise or higher level mathematics, like calculus and discrete math**. While students will engage with AI tools and data platforms, the emphasis will be on **conceptual understanding**, **interpretation of results**, **strategic implementation**, and **effective communication**, rather than writing complex code or developing algorithms.

The proposed Master of Science in Applied Artificial Intelligence positions the University of Memphis as a national leader in graduate education that is **practical, inclusive, and forward-thinking**. This code-light program meets the needs of professionals in healthcare, business, and public policy who want to apply AI tools in their fields, without becoming software developers.

The MS-AAI offers flexibility, workforce alignment, and a strong return on investment, all while supporting the state and institutional priorities as described below. With strong demand, clear institutional fit, and a curriculum designed for impact, this program will empower the next generation of AI-informed leaders who can bridge technology and society.

Program Structure

The MS-AAI is a 30 credit hour program consisting of:

- Core Curriculum (12 credit hours): Foundational courses in AI tools, prompt engineering, computational thinking, AI ethics and risk mitigation, and a culminating capstone project

- Concentration (12 credit hours): Students select from five concentrations: Smart Cities, Electrical and Computer Engineering, Public Health, Business, or Language and Literacy Technologies

- Electives (6 credit hours): Students may select from AI-relevant graduate courses across the university, excluding courses from their concentration discipline

Total Credit Hours: 30

Delivery Method: Hybrid (on-ground and online components)

Delivery Location: University of Memphis Main Campus (Memphis, TN) and online via UofM Global

Target Audience: Working professionals, career changers, and recent graduates from non-CS backgrounds seeking to apply AI in their domains

Alignment with THEC State Master Plan

The MS-AAI program aligns with both the concluding priorities of Tennessee's 2015-2025 'Drive to 55' Master Plan and the emerging framework of the 2025-2035 Master Plan currently under development. As THEC transitions from credential quantity to credential quality and economic mobility, this program directly addresses the state's evolving workforce needs.

THEC developed a State Master Plan for postsecondary education in Tennessee which covers the period of 2015-2025. A major component of the plan is the Drive to 55, which sets an ambitious goal of 55% attainment of a postsecondary credential by Tennesseans by 2025. As a master's degree with the requirement of undergraduate degree completion for admission, the MS-AAI does not impact the Drive to 55 and so does not address this component of the THEC State Master Plan. However, the degree proposed does address other key outcomes which are important to the development of higher education in Tennessee and which are included in the Master Plan.

In particular, THEC convened the Future of Work task force in 2019, with the objective of determining how higher education and industry needs could be aligned to address the state's workforce needs in the next decades. Findings of this task force were presented in the 2020 update to the Master Plan. Notably, the task force identified artificial intelligence as a critical issue confronting the Tennessee economy.

> *Tennessee's economy is at great risk for disruption resulting from automation and artificial intelligence... [All] individuals employed in Tennessee must learn to interact with artificial intelligence using critical thinking, data analysis, and diverse communication skills rather than simply rely on artificial intelligence to complete a variety of tasks.*
>
> – THEC Master Plan Update 2020

The MS-AAI is specifically designed to address this challenge head-on. A key feature of the degree is its flexibility and applicability to many different industries where artificial intelligence will become ubiquitous in the next decade.

The forthcoming Master Plan emphasizes qualitative outcomes over quantitative attainment. The MS-AAI program directly addresses each of the five key focus areas:

1. Economic Independence and Living Wage Careers

Alignment: Graduate occupations significantly exceed Tennessee living wage thresholds. For Memphis MSA (single adult), the MIT Living Wage Calculator indicates $21.54/hour ($44,803 annually). Median wages for program-aligned occupations:

Occupation (SOC)	National Median Wage	Memphis MSA Est.	Above Living Wage?
Data Scientists (15-2051)	$108,020/yr	$92,000-98,000/yr*	Yes (205-218%)
Statisticians (15-2041)	$104,110/yr	$88,000-94,000/yr*	Yes (196-210%)
Management Analysts (13-1111)	$99,410/yr	$84,000-90,000/yr*	Yes (187-201%)
Computer Occupations, All Other (15-1299)	$97,970/yr	$83,000-89,000/yr*	Yes (185-199%)
Healthcare Social Workers (21-1022)	$63,030/yr	$53,500-57,000/yr*	Yes (119-127%)
Occupational Health and Safety Specialists (19-5011)	$83,910/yr	$71,000-76,000/yr*	Yes (158-170%)
Chief Executives (11-1011)	$206,420/yr	$175,000-186,000/yr*	Yes (391-415%)
Transportation, Storage, and Distribution Managers (11-3071)	$102,010/yr	$87,000-92,000/yr*	Yes (194-205%)
Logisticians (13-1081)	$80,880/yr	$69,000-73,000/yr*	Yes (154-163%)
Human Resources Specialists (13-1071)	$72,910/yr	$62,000-66,000/yr*	Yes (138-147%)
Computer Hardware Engineers (17-2061)	$155,020/yr	$132,000-140,000/yr*	Yes (295-312%)
Software Quality Assurance Analysts and Testers (15-1253)	$102,610/yr	$87,000-92,000/yr*	Yes (194-205%)

Computer Network Architects (15-1241)	$130,390/yr	$111,000-117,000/yr*	Yes (248-261%)
Public Relations Specialists (27-3031)	$72,280/yr	$61,000-65,000/yr*	Yes (136-145%)
Writers and Authors (27-3043)	$77,400/yr	$66,000-70,000/yr*	Yes (147-156%)

Memphis wages estimated at 85-90% of national median based on BLS regional adjustment factors

2. Emerging Workforce Needs and Industry Alignment

Alignment: The program addresses Tennessee's documented shortage of AI-literate professionals. Key evidence:

- THEC Supply & Demand Dashboard: AI-related occupations appear on the High-Demand Occupations List for Tennessee, with data analytics and information technology showing persistent supply shortages.

- Memphis Digital Delta Initiative: The Greater Memphis Chamber's 2024 Annual Report highlights xAI's investment (one of Tennessee's largest) and positions Memphis as the 'Digital Delta.' This initiative created 3,800+ technology jobs with $2.2 billion capital investment (plus $12 billion from xAI), demonstrating urgent demand for AI-skilled workers.

- Greater Memphis Workforce Development Board: The Chamber's role as fiscal agent for workforce development emphasizes regional need for AI integration across healthcare, logistics, manufacturing, and administrative sectors.

- O*NET Projections: Data Scientists show +36% growth (2023-2033), categorized as 'much faster than average' and flagged as a 'Bright Outlook' occupation.

3. Access and Student Success

Alignment: The program expands equitable access through:

- Hybrid delivery enabling working adults and geographically dispersed students to participate

- Code-light curriculum accessible to professionals from non-technical backgrounds, reducing barriers for career changers

- Concentrations addressing Tennessee's diverse economic sectors (healthcare, logistics, engineering, education)

- 30-credit structure enabling completion in 12-24 months, minimizing time-to-degree and opportunity costs

4. State Investment and Affordability

Alignment: Program design maximizes efficiency and affordability:

- Leverages existing courses: 80%+ of concentration courses already exist, minimizing new resource demands

- Cross-college collaboration reduces redundancy and maximizes institutional capacity

- No new tenure-track positions required for initial launch

- High return on investment: rapid completion + high-wage outcomes reduce student debt burden

5. Evidence Building and Continuous Improvement

Alignment: The program incorporates systematic assessment:

- Program-specific and student learning outcomes aligned with workforce competencies

- Quality Assurance Funding (QAF) program evaluation scheduled for Year 3

- Post-graduation employment tracking to measure economic mobility outcomes

- Industry advisory board providing continuous feedback on curriculum relevance

Alignment with Institutional Mission

The mission of the University of Memphis is to **produce well-rounded, successful graduates and cutting-edge research for the enrichment of our ever-changing society**. The institution has adopted **Ascend**, its strategic plan for 2023-2028, which outlines 7 goals and associated metrics by which the University is working to accomplish its mission.

The MS-AAI program supports *Ascend* by advancing key priorities:

- **Student Success**: The program offers practical, in-demand training tailored to applied fields, preparing graduates for meaningful leadership roles in the AI-enabled workforce. In particular, the program leverages several high-impact educational practices identified in *Ascend*, including integration of research opportunities and collaborative and capstone project requirements.

- **Access and Flexibility**: By offering both on-campus and online delivery, it expands educational opportunities for adult learners, working professionals, and underrepresented communities. This flexibility meets several identified priorities in the institutional strategic plan, including permitting diversified student sourcing outside of the immediate Memphis region. The UofM has also prioritized increasing enrollment within UofM Global online programs, a goal to which the MS-AAI would contribute.

- **Research and Innovation**: The curriculum incorporates applied project work and partnerships with health, nonprofit, and corporate sectors to position UofM as a leader in ethical and impactful AI. The UofM is a national leader in AI research in diverse fields including transportation and logistics, health data analytics, autonomous vehicles, and many others. MS-AAI leverages this technical expertise to prepare professionals to work in an increasingly AI-driven workplace.

This graduate program will deepen the university's interdisciplinary identity and strengthen its standing as an R1 institution known for accessible innovation.

Institutional Capacity to Deliver the Proposed Program

The MS-AAI program will be housed in the Polytechnic@UofM within the Herff College of Engineering. The Polytechnic has administrative staff to support the program, including a coordinator, budget officer, director, and executive director. In addition, the program will leverage resources in the Herff College of Engineering (HCOE), including admissions, program coordination, advising, recruiting, and career services. Other resources are funded by reallocation from other units and strategic investment funds of the University, including a Director of Applied AI, which is a faculty position who will be responsible for coordination among participant programs, admissions, assessment, and development and teaching of the core courses.

The THEC financial projection form is included and summarizes the costs and revenue for the program.

The University of Memphis has substantial capacity to deliver the MS-AAI program:

Faculty Capacity

- The core courses will be developed by a Director of Applied AI, which will initially be funded by reallocation and strategic investment funds. Thereafter, revenue from the program will fund the position.

- Core courses will be taught by tenure-track, teaching, and clinical faculty in the College of Arts and Sciences, Herff College of Engineering, Fogelman College of Business, and School of Public Health

- Concentration courses leverage graduate-level offerings in the participating departments, requiring no new faculty hires for initial implementation

- All participating faculty meet SACSCOC credentialing standards for graduate instruction

Infrastructure and Support

- UofM Global provides robust online delivery infrastructure and student support services

- UM3D Instructional Design team supports faculty in developing online and hybrid course components

- University Libraries maintain subscriptions to relevant databases (EBSCO, JSTOR, BLS datasets, etc.) and computational resources

- No new facilities required; existing computer labs and classrooms are adequate

Impact on Existing Programs

The MS-AAI program targets a distinct student population (working professionals and career changers from non-CS backgrounds) and is not expected to substantially affect enrollment in existing programs. The program complements rather than competes with:

- MS in Computer Science: Remains the pathway for students seeking deep technical expertise in algorithms, systems, and software engineering

- MBA and other business programs: MS-AAI serves students specifically interested in AI strategy and implementation, while MBAs provide broader business administration training

- MPH programs: MS-AAI Public Health concentration complements MPH by adding AI/ML competencies to traditional public health training

- MS in EECE and MS in Civil Engineering: This program serves a population of students than the MS programs in EECE and Civil Engineering, which are focused on advanced technical knowledge.

Existing Programs Offered at Public and Private Tennessee Institutions

Table X. Existing Programs Offered in Tennessee with the Same CIP Code

Institution	Program	CIP	Award Level	Credit Hours	3-Yr Graduates
University of Tennessee, Chattanooga	Artificial Intelligence for STEM	11.0102	2.1 C3 Undergraduate Certificate	12	0
	Artificial Intelligence Knowledge Engineering	11.0102	4.1 C4 Graduate Certificate	12	0
University of Tennessee, Knoxville	Applied Artificial Intelligence	11.0102	2.1 C3 Undergraduate Certificate	12	0
	Applied Artificial Intelligence	11.0102	2.5 BS	120	0
	Applied Artificial Intelligence	11.0102	4.1 C4 Graduate Certificate	15	0
	Artificial Intelligence Integration in Music	11.0102	2.1 C3 Undergraduate Certificate	12	0
	Artificial Intelligence and Medicine	11.0102	2.1 C3 Undergraduate Certificate	12	0
	Artificial Intelligence and Machine Learning	11.0102	4.1 C4 Graduate Certificate	15	0

Completion data reflect publicly available records from the 2021-22, 2022-23, and 2023-24 academic years from institutional dashboards and IPEDS. All listed programs above have effective start dates of 08/01/2024 or later except the certificate in Artificial Intelligence and Machine Learning offered by UTK.

Table X. Existing Programs Offered in Tennessee with the Similar CIP Codes

Institution	Program	CIP	Award Level	Credit Hours	3-Yr Graduates
Austin Peay University	MBA, Artificial	52.0201	4.2 MBA	30	104*

Institution	Program	CIP	Degree	Credits	Completions
	Intelligence in Business				
East Tennessee State University	Computer Science, AI and Machine Learning	11.0101	4.2 MS	33	35†
Lipscomb University	Applied Artificial Intelligence		4.2 MS	30	8‡
	Applied Artificial Intelligence		4.1 C4 Graduate Certificate	12	0‡
Middle Tennessee State University	Computer Science, Artificial Intelligence	11.0701	2.5 BS	120	268§
	Using Artificial Intelligence	30.7001	2.1 C3 Undergraduate Certificate	10	0
Tennessee Technological University	Computer Science, Data Science and Artificial Intelligence	11.0701	2.5 BS	120	16
University of Memphis	Computer Science, Artificial Intelligence	11.0701	2.5 BS	120	5
University of Tennessee Chattanooga	Computer Science, Data Science and Artificial Intelligence	11.0701	4.2 MS	33	14

Completion data reflect publicly available records from the 2021-22, 2022-23, and 2023-24 academic years from institutional dashboards and IPEDS. Where noted, degree conferral numbers in AI concentrations are not available, and total degrees conferred in the overall major are listed instead. * Includes all graduates of MBA program. † Includes all concentrations in MS in CS. ‡ Lipscomb University does not list CIP codes for their programs and did not respond to an inquiry, therefore IPEDS completion data for all 11-series CIP codes are listed for each program. § Includes all concentrations in BS in CS.

Related Programs and Distinctiveness

While no institution currently offers a program under CIP 11.0102 at the master's level, the following related programs exist:

- University of Tennessee, Knoxville: MS in Computer Science with AI specialization (CIP 11.0701) – Requires strong CS background; focuses on algorithm development and theoretical foundations

- Middle Tennessee State University: MS in Data Science (CIP 11.0801) with ML emphasis – Focuses on statistical methods and programming; requires substantial coding proficiency

- Vanderbilt University: MS in Data Science (private institution) – Research-intensive program targeting technical specialists

How MS-AAI Avoids Unnecessary Duplication

Our proposed program is distinct from the above-mentioned degrees and certificates. The most important difference is the non-code/low-code nature of the MS-AAI, which is unique compared to the technical programs above. The MS-AAI is intended to produce graduates who are well-versed in AI and equipped to manage teams with technical responsibilities related to artificial intelligence. The other AI programs in Tennessee are primarily oriented towards producing graduates who will contribute to the development and implementation of AI systems and require significant experience in computer science, mathematics, or related disciplines.

The MS-AAI program fills a distinct niche not served by existing programs:

Feature	Existing TN Programs	UofM MS-AAI
Target Audience	CS/Engineering majors	Non-technical professionals
Prerequisites	Programming required	No coding prerequisite
Focus	Algorithm development, research	Strategic application, deployment
Approach	Code-intensive	Code-light, tool-focused
Concentrations	Single discipline	Five interdisciplinary options
Delivery	Primarily on-campus	Hybrid (on-ground + online)

The MS-AAI program serves unmet demand from working professionals in healthcare, business, urban planning, and education who need AI literacy and strategic implementation skills but lack CS backgrounds. This complementary positioning enhances Tennessee's overall AI workforce capacity without duplicating existing technical programs.

Accreditation

The MS-AAI program does not have a discipline-specific accrediting body. The program falls under the University of Memphis's institutional accreditation by the Southern Association of Colleges and Schools Commission on Colleges (SACSCOC).

Substantive Change Review: The MS-AAI program will be reviewed under SACSCOC substantive change procedures. The program uses approximately 20% new curricular content (4 new core courses) with 80% existing courses, qualifying for expedited review.

Quality Assurance Funding (QAF): The program will undergo comprehensive program review in Year 3 following THEC's QAF schedule. Assessment will include student learning outcomes, program-specific outcomes, and employment placement data.

Section III: Feasibility

This section provides comprehensive evidence of workforce need, employment opportunities, and program feasibility based on multiple authoritative data sources including O*NET, Bureau of Labor Statistics, EAB market analysis, THEC dashboards, and regional economic indicators.

Evidence of Local and Regional Workforce Need

The University of Memphis commissioned a feasibility study for the MS-AAI from EAB. Feasibility was focused on relevant regional labor market growth, student demand for master's-level training in artificial intelligence, and availability of competitive programs.

Regional Labor Market

The regional job market for master's-level artificial intelligence professionals is robust, with nearly 12,500 jobs posted between Sept 2024 and Aug 2025. Over the previous two years of data, job postings for master's-level artificial intelligence professionals more than doubled (Figure X), demonstrating an accelerating demand for employees in this area despite an overall contraction of the job market for M.S.-trained professionals both regionally and nationally.
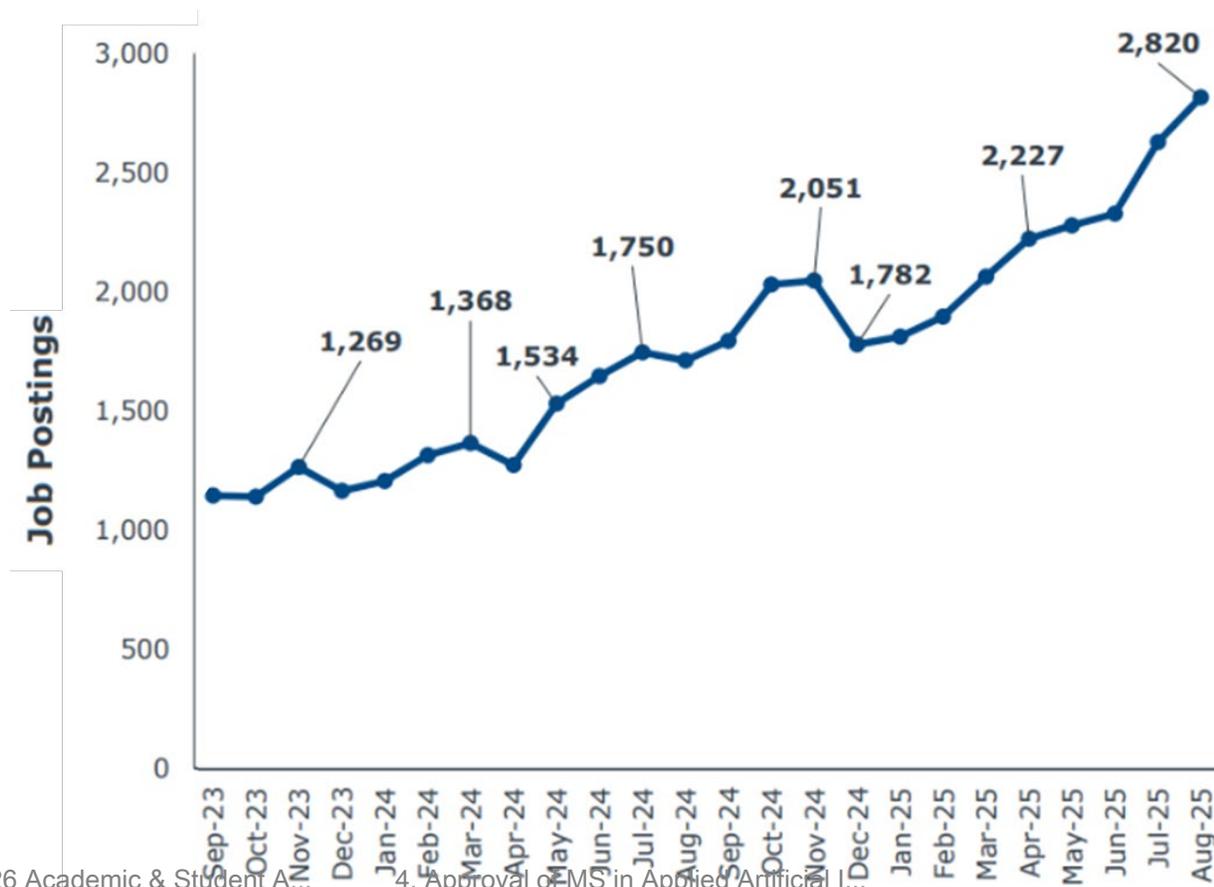
Figure X. Job postings per month for master's level applied artificial intelligence professionals in the regional market. Adapted from data provided by EAB.

Student Demand and Competitive Programs

Regional and national demand for master's level training in artificial intelligence have grown in recent years. Degree completions in regional M.S. programs with CIP code 11.0102 (artificial intelligence) grew from 11 in the 2018-2019 academic year to 25 in the 2022-2023 academic year, reflecting an annual increase of nearly 30% on average.

Nationally, enrollment in M.S. degrees in AI has grown significantly in the past few years, with 261 reported completions in 2018-2019 compared to 936 reported completions in 2022-2023. Student demand (40% annual increase in completions) was higher than program expansion (34% annual increase in institutions offering M.S. degrees in AI), suggesting space in the existing market for new programs such as the MS-AAI. Notably, less than 25% of existing programs offered 100% online degrees nationally.

Data in Table X and Table X showcase the lack of M.S. degrees dedicated to applied AI in Tennessee, with the closest analogues being technical computer science degrees with an AI track. Only two regional universities (St. Louis University and the University of Georgia) offer M.S. degrees in AI under CIP code 11.0102 according to information provided by EAB, and no regional institutions offer an AI degree entirely remotely.

Notably, St. Louis University introduced their M.S. program in AI in 2020 and reported 13 completions in the 2022-2023 academic year, suggesting rapid enrollment in the program. Market share between the two active programs in the region was essentially equal (13 and 12 completions respectively in 2022-2023), and growing demand along with relatively even market distribution among existing programs suggest ample space for the MS-AAI to attract students.

Other Supporting Information

As part of the planning process for AI program development, the University of Memphis convened an industry exchange workshop with regional industry leaders in order to understand the workforce needs for graduates in this field. Both preliminary surveys and interactive workshops were used to identify core competencies needed in employees engaged in AI work in the next 3-5 years.

Most employers identified their companies as in the early exploration phase of AI adoption. Lack of technical expertise and AI-competent leadership were identified as critical barriers to more widespread adoption of AI tools within many companies. Priority skills for future employees included project management, AI literacy, prompt engineering, data interpretation, and technical fluency with emerging AI tools. These skills match well with proposed outcomes of the MS-AAI, suggesting strong concordance between program goals and industry needs.

EAB Regional Market Analysis (Sept 2024 - Aug 2025)

The University of Memphis commissioned an independent feasibility study from EAB (Education Advisory Board), a leading higher education research firm. The study analyzed regional labor market demand for master's-level applied artificial intelligence professionals across a seven-state region (Alabama, Arkansas, Georgia, Kentucky, Mississippi, Missouri, and Tennessee).

Key Findings:

Metric	Regional Data	National Comparison
Job Postings (Sept 2024-Aug 2025)	12,499 postings	162,843 postings
Average Monthly Demand Growth	+0.88% (+9 postings/month)	+1.08% (+226 postings/month)
Comparison to All Master's-level Jobs	Regional master's jobs: -0.68%	National master's jobs: -0.66%
Market Trend	Strong growth against declining general market	Exceptional growth trajectory

Source: EAB Market Insights Brief, October 2025

Significance: AI-related job postings are growing rapidly while overall demand for master's-level professionals is declining, indicating a specific and urgent workforce gap that the MS-AAI program directly addresses.

Memphis Digital Delta Initiative: Local Demand Indicators

Memphis has emerged as a technology hub, branded as the 'Digital Delta' by the Greater Memphis Chamber. Recent investments demonstrate extraordinary local demand for AI-skilled professionals:

- xAI Supercomputer (2024): One of Tennessee's largest investments, establishing Memphis as an AI computational center. Initial announcement planned 100,000+ GPUs; expansion announced within 6 months targeting over 1 million GPUs.

- Economic Impact (2024): $2.2 billion in capital investment + $12 billion from xAI; 3,800+ new jobs created

- Workforce Development Board: Greater Memphis Chamber designated as fiscal agent for regional workforce development, emphasizing critical need for AI-literate professionals across healthcare, logistics, manufacturing, and administrative sectors

- Regional Employers Hiring AI Professionals: Deloitte, Lumen Technologies, General Motors, Amazon, FedEx, CVS Health, Ford, Walmart, HCA Healthcare (per EAB regional job posting analysis)

Source: Greater Memphis Chamber 2024 Annual Report; EAB Market Analysis

O*NET Occupational Projections (2023-2033)

The U.S. Department of Labor's O*NET database provides 10-year employment projections for occupations aligned with the MS-AAI program:

SOC Code	Occupation	2023 Employment	2033 Projected	10-Yr Growth	Growth Rate	Annual Openings
15-2051	Data Scientists	168,900	229,900	+61,000	+36.0%	20,800
15-2041	Statisticians	43,100	51,400	+8,300	+19.3%	5,500
15-1299	Computer Occup., All Other	541,100	622,000	+80,900	+15.0%	74,000
13-1111	Management Analysts	1,017,600	1,123,600	+106,000	+10.4%	113,000
11-9199	Managers, All Other	3,118,800	3,323,700	+204,900	+6.6%	279,000
11-1011	Chief Executives	309	322	+13	+4.3%	22,200
11-3071	Transportation, Storage, and Distribution Managers	216	229	+13	+6.1%	18,500
13-1051	Cost Estimators	221	212	-9	-4.2%	16,900
13-1071	Human Resources Specialists	944	1,002	+58	+6.2%	81,800
13-1081	Logisticians	241	281	+40	+16.7%	26,400
15-1241	Computer Network Architects	179	200	+21	+11.9%	11,200
15-1253	Software Quality Assurance	201	221	+20	+10.0%	14,000

SOC Code	Occupation	2023	2033	Change	% Change	Openings
	Analysts and Testers					
17-2061	Computer Hardware Engineers	76	82	+5	+7.3%	4,700
19-5011	Occupational Health and Safety Specialists	131	148	+16	+12.5%	14,900
21-1022	Healthcare Social Workers	214	236	+22	+10.3%	24,400
25-4022	Librarians and Media Collections Specialists	127	126	-1	-1.4%	11,700
27-3031	Public Relations Specialists	328	341	+12	+3.9%	37,900
27-3043	Writers and Authors	156	168	+12	+7.8%	19,100

Note: All primary program SOC codes show faster than average growth (average occupational growth: ~5%)

Source: O*NET Online, accessed January 2026; BLS Employment Projections 2023-2033

Bright Outlook Occupations

O*NET designates Data Scientists (15-2051) as a 'Bright Outlook' occupation, indicating:

- Expected employment growth much faster than average

- Large number of job openings annually

- New and emerging occupation with expanding applications

Living Wage Comparison and Economic Independence

Graduate earning potential significantly exceeds Tennessee living wage thresholds, demonstrating the program's alignment with THEC Master Plan priorities for economic independence:

Location/Metric	Living Wage (Single Adult, No Children)	Calculation
Memphis, TN MSA	$44,803/year ($21.54/hour)	MIT Living Wage Calculator
Tennessee Statewide	$46,363/year ($22.29/hour)	MIT Living Wage Calculator

Occupation (SOC)	National Median Wage (BLS)	Memphis Est. (85-90% of National)*	Above Living Wage?
Data Scientists (15-2051)	$108,020/year	$91,817-97,218/year	Yes (205-217%)
Statisticians (15-2041)	$104,110/year	$88,494-93,699/year	Yes (198-209%)
Computer Occupations, All Other (15-1299)	$97,970/year	$83,275-88,173/year	Yes (186-197%)
Management Analysts (13-1111)	$99,410/year	$84,499-89,469/year	Yes (189-200%)
Average Across Primary SOCs	$102,378/year	$87,021-92,140/year	Yes (194-206%)
Chief Executives (11-1011)	$206,420/year	$175,457-185,778/year*	Yes (391-414%)
Transportation, Storage, and Distribution Managers (11-3071)	$102,010/year	$86,708-91,809/year*	Yes (193-204%)
Cost Estimators (13-1051)	$77,070/year	$65,509-69,363/year*	Yes (146-154%)
Human Resources Specialists (13-1071)	$72,910/year	$61,973-65,619/year*	Yes (138-146%)
Logisticians (13-1081)	$80,880/year	$68,748-72,792/year*	Yes (153-162%)
Computer Network Architects (15-1241)	$130,390/year	$110,831-117,351/year*	Yes (247-261%)
Software Quality Assurance Analysts and Testers (15-1253)	$102,610/year	$87,218-92,349/year*	Yes (194-206%)
Computer Hardware Engineers (17-2061)	$155,020/year	$131,767-139,518/year*	Yes (294-311%)

Occupational Health and Safety Specialists (19-5011)	$83,910/year	$71,323-75,519/year*	Yes (159-168%)
Healthcare Social Workers (21-1022)	$63,030/year	$53,575-56,727/year*	Yes (119-126%)
Librarians and Media Collections Specialists (25-4022)	$65,540/year	$55,709-58,986/year*	Yes (124-131%)
Public Relations Specialists (27-3031)	$72,280/year	$61,438-65,052/year*	Yes (137-145%)
Writers and Authors (27-3043)	$77,400/year	$65,790-69,660/year*	Yes (146-155%)

Memphis wage estimates based on BLS regional adjustment factors showing Memphis wages at 85-90% of national median for professional occupations

Sources: Bureau of Labor Statistics Occupational Employment and Wage Statistics (May 2024); MIT Living Wage Calculator (2026)

Conclusion: Even at the lower bound of Memphis wage estimates, graduates earn nearly double the regional living wage, providing substantial economic mobility and financial security.

Concentration-Specific Employment Opportunities

Each concentration addresses documented workforce needs in specific sectors:

Public Health Concentration:

SOC Code	Occupation	10-Year Growth	Annual Openings
21-1091	Health Education Specialists	+11.2%	11,000
11-9111	Medical/Health Services Managers	+28.4%	54,700
19-1041	Epidemiologists	+7.5%	800
21-1094	Community Health Workers	+11.0%	6,000
21-1022	Healthcare Social Workers	+10.3%	24,400
19-5011	Occupational Health and Safety Specialists	+12.5%	14,900

Local Context: Methodist Le Bonheur Healthcare, Baptist Memorial Health Care, St. Jude Children's Research Hospital, and Regional One Health represent major employers with growing health informatics and AI needs. Shelby County Health Department implementing data-driven public health initiatives.

Smart Cities Concentration:

SOC Code	Occupation	10-Year Growth	Annual Openings
19-3051	Urban and Regional Planners	+5.9%	3,900
11-3071	Transportation/Logistics Managers	+8.0%	15,700
13-1081	Logisticians	+6.6%	13,300

Local Context: Memphis is America's distribution capital (FedEx global hub, multiple Fortune 500 logistics operations). Growing smart city initiatives in transportation management, urban planning, and supply chain optimization. Recent infrastructure investments including America's River Crossing project.

Business Concentration:

SOC Code	Occupation	10-Year Growth	Annual Openings
13-1111	Management Analysts	+10.4%	113,000
13-1082	Project Management Specialists	+6.5%	65,000
11-1021	General and Operations Managers	+5.7%	201,000
11-1011	Chief Executives	+4.3%	22,200
11-3071	Transportation, Storage, and Distribution Managers	+6.1%	18,500
13-1081	Logisticians	+16.7%	26,400
13-1071	Human Resources Specialists	+6.2%	81,800
13-1051	Cost Estimators	-4.2%	16,900

Local Context: Major employers (AutoZone, International Paper, ServiceMaster, First Horizon) expanding AI-driven business operations. Greater Memphis Chamber actively recruiting technology companies; EAB regional analysis shows Deloitte, Accenture, KPMG among top AI professional employers.

Electrical and Computer Engineering Concentration:

SOC Code	Occupation	10-Year Growth	Annual Openings
15-1252	Software Developers	+17.1%	153,000
17-2071	Electrical Engineers	+3.3%	11,000
11-9041	Architectural/Engineering Managers	+4.0%	14,400
17-2061	Computer Hardware Engineers	+7.3%	4,700
15-1253	Software Quality Assurance Analysts and Testers	+10.0%	14,000
15-1241	Computer Network Architects	+11.9%	11,200

Local Context: xAI's massive investment establishes Memphis as AI infrastructure hub. Memphis has robust aerospace/defense sector (SAFB), growing advanced manufacturing, and established engineering firms requiring AI integration capabilities.

Language and Literacy Technologies Concentration:

SOC Code	Occupation	10-Year Growth	Annual Openings
27-3042	Technical Writers	+7.2%	4,700
27-3091	Interpreters and Translators	+4.0%	6,300
25-9031	Instructional Coordinators	+4.5%	23,000
27-3031	Public Relations Specialists	+3.9%	37,900
25-4022	Librarians and Media Collections Specialists	-1.4%	11,700
27-3043	Writers and Authors	+7.8%	19,100

Local Context: Memphis has substantial educational infrastructure (Memphis-Shelby County Schools, multiple higher education institutions, education technology companies) with growing need for AI-enhanced educational content, curriculum development, and language technologies.

The Tennessee Higher Education Commission maintains dashboards tracking high-demand occupations and workforce supply-demand gaps. Analysis indicates:

- Computer and Mathematical Occupations (including Data Scientists, Statisticians) appear on THEC's High-Demand Occupations List

- Management Occupations requiring analytical and technical skills show persistent supply shortages across Tennessee

- Healthcare informatics and public health analytics identified as priority workforce development areas

Additional Occupations: The MS-AAI program prepares graduates for expanded occupational opportunities across multiple sectors. Healthcare occupations including Healthcare Social Workers and Occupational Health and Safety Specialists address growing workplace safety and community health needs. Engineering and technical occupations such as Computer Hardware Engineers, Software Quality Assurance Analysts, and Computer Network Architects reflect Tennessee's expanding technology sector and AI infrastructure investments. Communication and education roles including Public Relations Specialists, Technical Writers, and Instructional Coordinators support the state's knowledge economy growth.

- STEM and technology education needs emphasized across K-12 and higher education sectors

Source: THEC In-Demand Occupations Dashboard; THEC Supply and Demand Report 2024

Summary: Unmet Workforce Need

The MS-AAI program addresses a documented workforce gap that existing Tennessee programs do not serve:

- Growing Regional Demand: 12,499 relevant job postings annually (EAB) with +0.88% monthly growth, against -0.68% decline for overall master's-level jobs

- Exceptional National Growth: Data Scientists (+36%), Statisticians (+19%), Computer Occupations (+15%) all significantly exceed average occupational growth

- Economic Mobility: Median wages 185-217% above Memphis living wage, supporting THEC Master Plan economic independence goals

- Local Infrastructure Investment: xAI's $12+ billion investment and Digital Delta initiative creating immediate demand for AI-literate workforce

- Unfilled Niche: No existing Tennessee program offers code-light, applied AI education for non-CS professionals—creating opportunity rather than duplication

- Concentration-Specific Demand: Each concentration aligns with documented Tennessee workforce needs in healthcare, logistics, business, engineering, and education

Artificial Intelligence Usage Disclosure

This Letter of Notification includes content generated with the assistance of artificial intelligence (AI) tools, specifically:

- Tool Used: Claude (Anthropic) for document formatting, summarization, and synthesis of data from multiple sources

- AI Contribution: Drafting narrative sections, formatting tables, synthesizing labor market data from O*NET, BLS, EAB reports, and institutional sources

- Human Review: All AI-assisted content has been reviewed, verified, and approved by University of Memphis faculty and administrators. All data sources have been independently verified. All substantive content decisions made by human personnel.

— END OF LETTER OF NOTIFICATION (SECTIONS I-III) —

Masters of Science in Applied AI

Upon successful completion of the MS in Applied Artificial Intelligence program, graduates will be prepared to:

1. Foundational & Conceptual Understanding
   Explain Core AI Concepts: Apply and clearly articulate the core principles of artificial intelligence, including computational thinking and the mechanics of modern hybrid AI architectures such as Large Language Models (LLMs) and Retrieval-Augmented Generation (RAG) systems, for effective communication with both technical and non-technical stakeholders.
2. Strategic Application and Workflow Design
   - Apply AI Tools: Navigate, compare, and apply various categories of AI tools (text, image, data analysis, agentic systems) across diverse professional domains.
   - Design AI Workflows: Design and implement strategic, AI-assisted workflows using no-code or low-code platforms to address real-world problems in areas like process automation, decision support, or data-assisted communication.
   - Master Prompt Engineering: Design, test, and iteratively refine effective prompts to elicit reliable reasoning, transformation, and generative outputs from AI systems.
3. Ethical Governance and Risk Mitigation
   - Analyze Ethical Implications: Critically analyze the ethical, legal, and social implications of AI, focusing on central issues such as fairness, privacy, accountability, and transparency.
   - Propose Responsible Solutions: Identify ethical risks in AI systems, evaluate mitigation strategies, and propose responsible approaches to the deployment of AI solutions,

including assessing the effectiveness of governance frameworks across different jurisdictions.

4. Critical Evaluation and Communication

- Evaluate AI Outcomes: Critically evaluate the outputs, effectiveness, usability, and limitations of AI solutions, including assessing outputs for bias and accuracy.
- Communicate Professionally: Effectively communicate AI fundamentals and project insights to both technical and non-technical audiences, thereby bridging the gap between developers and organizational decision-makers.

5. Leadership and Capstone Synthesis

- Lead AI Adoption: Demonstrate the ability to lead and manage AI adoption within a professional sector, reflecting on the broader professional and social implications of applied AI solutions.
- Complete a Capstone Project: Design, execute, and present a culminating, domain-specific capstone project that integrates conceptual understanding with practical, low-code AI workflow implementation to demonstrate real-world value.

Curriculum

Core Course – The following courses are required:

TECH 6701 Applied AI Tools and Prompt Engineering

TECH 7701 Computational Thinking and Language Model Fundamentals

TECH 7702 Capstone Project in Applied Artificial Intelligence

PHIL 6001 AI Ethics and Risk Mitigation

Business Concentration

MIS 7624 AI-Assisted Analytics for Business

MIS 7623 AI-Assisted Application Development for Business

MGMT 7162 Strategy and the AI Industry MGMT 6462 AI Infused Leadership

Electrical and Computer Engineering Concentration (choose 4 from the following)

EECE 6720 Intro Artificial Intelg

EECE 6731 Data Analytics and Visualization

EECE 6741 Introduction to Neural Networks and Deep Learning

EECE 6745 Introduction to Machine Learning

EECE 7216 Computer Vision

EECE 7219 Pattern Recognition

EECE 7269 Machine Learning & Applicatns

EECE 7720 Artificial Intelligence

EECE 7740 Neural Networks

Language and Literacy Technologies

The following courses are required:

ENGL 7511 Survey of Linguistics **

ENGL 7508 Corpus Linguistics Or ENGL 7528 Language Learning and Technology

ENGL 7809 Technical Editing ** Or ENGL 7818 Collaborative Writing **

ENGL 6620 Digital Rhetoric and Writing Or ENGL 7486 AI and Publishing

Public Health Concentration

The following courses are required:

PUBH 7626 Generative AI-Assisted Machine Learning
Programming

PUBH 7652 Large Language Models in Public Health

PUBH 7627 Predictive Modeling in Social, Behavioral,
and Health Outcomes

PUBH 6110 Responsible AI for Public Health

Smart Cities

The following courses are required:

CIVL 7263 Intro. to Num. Opt. for Eng **

CIVL 7269 Quant Meth for Engr Dec Making

CIVL 7xxx Big Data for Smart Cities

CIVL 7xxx Introduction to Smart Cities

Electives

Six credit hours chosen from the list of courses above or with approval of advisor. Students in the
Business Concentration cannot take additional business courses as electives.

THEC

Financial Projections Form

Institution	University of Memphis
Program Name	Polytechnic _ Masters of Applied AI

Projected One-Time Expenditures

Category	Planning	Year 1	Year 2	Year 3	Year 4	Year 5	Year 6*	Year 7*
Faculty & Instructional Staff	$100,000	$ -	$ -	$ -	$ -	$ -		
Non-Instructional Staff	$ -	$ -	$ -	$ -	$ -	$ -		
Graduate Assistants	$ -	$ -	$ -	$ -	$ -	$ -		
Accreditation	$ -	$ -	$ -	$ -	$ -	$ -		
Consultants	$ -	$ -	$ -	$ -	$ -	$ -		
Equipment	$ -	$ -	$ -	$ -	$ -	$ -		
Information Technology	$ -	$ -	$ -	$ -	$ -	$ -		
Library resources	$ -	$ -	$ -	$ -	$ -	$ -		
Marketing	$ -	$ -	$ -	$ -	$ -	$ -		
Facilities	$ -	$ -	$ -	$ -	$ -	$ -		
Travel	$ -	$ -	$ -	$ -	$ -	$ -		
Other	$ -	$ -	$ -	$ -	$ -	$ -		
Total One-Time Expenditures	*$0*	*$0*	*$0*	*$0*	*$0*	*$0*		

Projected Recurring Expenditures

Category	Planning	Year 1	Year 2	Year 3	Year 4	Year 5	Year 6*	Year 7*
Faculty & Instructional Staff		$103,000	$106,090	$109,273	$112,551	$115,927		
Non-Instructional Staff								
Graduate Assistants	$ -	$ -	$ -	$ -	$ -	$ -		
Accreditation	$ -	$ -	$ -	$ -	$ -	$ -		
Consultants	$ -	$ -	$ -	$ -	$ -	$ -		
Equipment	$ -	$ -	$ -	$ -	$ -	$ -		
Information Technology	$ -	$ -	$ -	$ -	$ -	$ -		
Library	$ -	$ -	$ -	$ -	$ -	$ -		
Marketing	$ -	$ -	$ -	$ -	$ -	$ -		
Facilities	$ -	$ -	$ -	$ -	$ -	$ -		
Travel	$ -	$ -	$ -	$ -	$ -	$ -		
Other	$ -	$ -	$ -	$ -	$ -	$ -		
Total Recurring Expenditures	*$100,000*	*$103,000*	*$106,090*	*$109,273*	*$112,551*	*$115,927*		
Grand Total (One-Time and Recurring)	**$100,000**	**$103,000**	**$106,090**	**$109,273**	**$112,551**	**$115,927**		

Projected Revenue

Category	Planning	Year 1	Year 2	Year 3	Year 4	Year 5	Year 6*	Year 7*
Tuition	$0	$424,420	$740,460	$875,900	$875,900	$875,900		
Grants								
Other								
Total Revenues	**-$100,000**	**$321,420**	**$634,370**	**$766,627**	**$763,349**	**$759,973**		

Years 6 and 7 should only be included for doctoral programs

5. Approval of Institutional Mission Profile

For Approval

Presented by David Russomanno

The University of Memphis Board of Trustees

Approval

Date: March 4, 2026

Committee: Academic and Student Affairs Committee

Presentation: Institutional Mission Profile (approval)

Presented by: Dr. David Russomanno, Executive Vice President for Academic Affairs and Provost

Background:

Tennessee state law requires the Board of Trustees to approve and submit an annual institutional mission profile to THEC that contains the following information:

- Characterize distinctiveness in degree offerings by level, focus, and student characteristics, including, but not limited to, nontraditional students and part-time students; and

- Address institutional accountability for the quality of instruction, student learning, and, when applicable, research and public service to benefit Tennessee citizens.

Motion to be Made:

The Academic and Student Affairs committee seeks a motion to approve the Institutional Mission Profile.

University of Memphis

Institutional Mission Profile

The University of Memphis (UofM) is a comprehensive, internationally recognized, urban public research university preparing students for success in an evolving, innovative and global environment. Student success, service, innovation, knowledge discovery and dissemination, commitment to an inclusive academy, collaboration and accountability are core values at the University of Memphis.

The University is classified as "Carnegie R1" or "Doctoral: Very High Research Activity and Community Engaged" per the Carnegie Classification of Institutions of Higher Learning. With a focus on research and service benefitting communities locally and across the globe, the UofM is home to nationally designated centers of excellence in cybersecurity research and education, transportation workforce development, mobile health data and five Tennessee centers of research excellence.

The UofM is dedicated to providing the highest quality of education to its students. Academic degree programs at the undergraduate, masters, doctoral and professional levels, as well as certificate programs are offered on the Central and Park Avenue campuses in Memphis, the Lambuth Campus in Jackson and through UofM Global. The UofM awards approximately 5,000 degrees and certificates annually. Talented and innovative faculty have developed both undergraduate and graduate programs that are ranked in the top 25 nationally. Our metropolitan setting has enabled us to build a nationally recognized internship program that facilitates the placement of undergraduate and graduate students throughout the community in nonprofit and for-profit organizations that specialize in healthcare, government, transportation and logistics, music and entertainment, medical devices, banking and the arts.

6. Approval of Tenure & Academic Freedom Policy Revision

For Approval

Presented by David Russomanno

The University of Memphis Board of Trustees

Approval

Date: March 4, 2026

Committee: Academic and Student Affairs Committee

Presentation: Tenure and Academic Freedom Policy Revision

Presented by: David Russomanno, Executive Vice President for Academic Affairs and Provost

Background:

A revision was made to give the Board flexibility to recruit and retain distinguished faculty and senior academic leaders (e.g., deans, vice presidents) as well as align the Board policy with University processes.

Motion to be Made:

The Academic and Student Affairs Committee recommends that the Board approve revisions to the Tenure and Academic Freedom Policy as reflected in the meeting materials.

Purpose

The Board of Trustees is authorized by Tennessee Code Annotated § 49-8-301 to promulgate a tenure policy or policies which shall ensure academic freedom and provide sufficient professional security to attract the best quality faculty available for the institution. Pursuant to this authority, the board defines the nature of tenure and institutions and the rights and responsibilities of faculty in this policy. In the event of any conflict or inconsistency between this board policy and the Faculty Handbook, this board policy will apply.

1. ACADEMIC FREEDOM

Academic freedom is essential to fulfill the ultimate objectives of an educational university/college – the free search for and exposition of truth – and applies to participation in shared governance as well as teaching and research. Freedom in research is fundamental to the advancement of truth, and academic freedom in teaching is fundamental for the protection of the rights of the faculty member in teaching and of the student to freedom in learning. Freedom in shared governance is fundamental to the development and maintenance of effective academic policies, national and regional accreditation, and shared responsibility for the redelivery of educational products and services to students.

Implicit in the principle of academic freedom are the corollary responsibilities of the faculty who enjoy that freedom. Incompetence, indolence, intellectual dishonesty, failure to carry out assigned duties, serious moral dereliction, arbitrary and capricious disregard of standards of professional conduct as well as other grounds as set forth in applicable law or policy may constitute adequate cause for dismissal or other disciplinary sanctions against faculty members.

The right to academic freedom imposes upon the faculty an equal obligation to take appropriate professional action against faculty members who are unable or unwilling to discharge their professional responsibilities. The faculty member has an obligation to participate in tenure and promotion review of colleagues as specified in university policy. Thus, academic freedom and academic responsibility are interdependent, and academic tenure is adopted as a means to protect the former while promoting the latter. While academic tenure is essential for the protection of academic freedom, all faculty members, tenured or non-tenured, have an equal right to academic freedom and bear the same academic responsibilities implicit in that freedom.

Board policy recognizes the principle of academic freedom and accordingly states:

- Faculty members are entitled to freedom in the classroom in discussing materials relevant to the course.
- Faculty members are entitled to freedom in research and in the publication of the results, subject to adequate performance of their other academic duties; but all research, including research for pecuniary gain, must be performed in an ethical manner and in compliance with all applicable policies and standards in the field and must be based upon an understanding with the authorities of the university.
- Faculty members are citizens, members of a learned profession, and officers of an educational institution. Academic freedom includes the freedom to speak or write without institutional discipline or restraint on matters of public concern, as well as on matters related to professional

duties, and on matters involving the academic and administrative functioning of the educational institution. When faculty members speak or write as citizens, they should be free from institutional censorship or discipline, but their special position in the community imposes special obligations. As persons of learning and as educational officers, they should remember that the public may judge the profession and the university by their utterances. Hence, faculty members should at all times strive to be accurate, should exercise appropriate restraint, should show respect for the opinions of others, and should make every effort to indicate that they do not speak for the university.

2. TENURE

Tenure

Tenure appointments are appointments of full-time faculty who have been awarded tenure by the Board of Trustees upon recommendation of the president. Tenure appointments include the assurance of continued employment during the academic year, subject to the conditions described in the Faculty Handbook. Faculty members who hold a tenured appointment in a department or other academic unit, and then are transferred to another department or academic unit retain their tenure status. A faculty member cannot be compelled to relinquish tenure as a condition of the transfer.

An internal or external search is required for the appointment of all tenure-track and tenured faculty positions, except for the specific circumstances described in the Waiver of Search policy. The university policy and procedures for recruitment, application, and selection of faculty can be found on the **university website**. There are two types of appointments for tenured and tenure-track faculty: full-time academic year(nine-month) appointments and full-time 12-month appointments, typically applicable to some faculty holding administrative appointments.

Minimum Qualifications for Tenure

- Documented evidence of ability in instruction, service, and research.
- Documented evidence of high-quality professional productivity which is leading to national recognition in the academic discipline.
- Professional comportment consistent with the Faculty Code of Conduct

3. POST-TENURE REVIEW

Post-tenure Review is an expanded and in-depth performance evaluation conducted by a committee of tenured peers and administered by the provost. Procedures for conducting a Post-tenure Review are set forth in the Faculty Handbook.

This policy recognizes that the work of a faculty member is not neatly separated into academic or calendar years. To ensure that performance is evaluated in the context of ongoing work, the period of performance subject to Post-tenure Review is the five most recent Annual Performance Review cycles.

Post-tenure Review will be initiated by the provost according to Annual Performance metrics defined in the Faculty Handbook. Post-tenure review will follow procedures defined in the Faculty Handbook.

4. PROBATIONARY PERIOD

A tenure-track faculty member must serve a probationary period prior to being considered for tenure. Except as otherwise stated in the Faculty Handbook, the probationary period will be six years.

Before beginning the sixth (or final) probationary year, a faculty member with the rank of assistant professor or higher must make application for tenure. Absent an approved exception, application and all supporting documentation for tenure should be submitted before the sixth or final probationary year in accordance with the tenure and promotion calendar maintained by the provost. Candidates for tenure must meet eligibility requirements for promotion to associate professor or have already attained that rank. A tenure-track assistant professor recommended for tenure must also be recommended for promotion.

Tenure applications receive one of two responses: tenure may be granted; or tenure may be denied. Re-application for tenure is not possible and the seventh year, or other final year following application for tenure, will be terminal if tenure is denied.

A. **TENURE UPON APPOINTMENT**

No faculty member shall be granted tenure upon initial appointment except by positive action of the Board of Trustees upon the recommendation of the president. In exceptional cases, a distinguished faculty member, dean, provost, or president may be awarded tenure upon her or his initial appointment in accordance with the procedures described in the Faculty Handbook.

The Board of Trustees will only grant tenure upon initial appointment if the proposed appointee (1) holds tenure at another higher education institution and the Board determines that the president has documented that the proposed appointee cannot be successfully recruited to the university without being granted tenure upon initial appointment, or (2) the Board determines that the president has documented other exceptional circumstances- supported by a recommendation from the provost- that justify granting tenure upon initial appointment to a senior academic leadership position (e.g. dean, vice-president of research, etc.).

B. **CREDIT FOR PRIOR SERVICE**

Credit toward completion of the probationary period may be permitted for previous full-time service at other universities provided that the prior service is relevant to the needs and criteria of the university. All credit for prior service shall be approved by the provost upon the recommendations of the department chair and dean. Any credit for prior service that is approved must be confirmed in writing at the time of the initial appointment.

C. **CREDIT FOR TRANSFER**

If a faculty member serving a probationary period is transferred to another academic unit or department, time spent in the first appointment will count toward the probationary period unless a request from the faculty member to begin a new probationary period is approved in writing by the provost.

5 CRITERIA FOR TENURE

Full-time, tenure-track faculty appointments at the academic rank of assistant professor, associate professor, or professor are eligible for tenure consideration. A faculty member appointed to an administrative position must attain or retain tenure in a particular unit, department, or approved center/institute. Faculty holding temporary appointments are not eligible for tenure.

Tenure is awarded after a thorough review, which culminates in the university acknowledging a reasonable presumption of the faculty member's professional excellence and the likelihood that this excellence will continue to contribute to the mission and anticipated needs of the academic unit in which tenure is granted.

Professional excellence is reflected in the faculty member's

- teaching (which includes advising and mentoring),
- research/scholarship/creative work (according to the terms of the candidate's appointment),
- service, and,
- professional comportment consistent with the Faculty Code of Conduct.

It is the responsibility of departments and academic units to define professional excellence in terms of their respective disciplines. Criteria for tenure and/or promotion shall be established by each department. These criteria may be more restrictive than the criteria of the academic unit and the university, but they must be consistent with those criteria. Criteria for tenure and/or promotion shall be established by the academic unit. These criteria may be more restrictive than the criteria of the university, but they must be consistent with those criteria. Criteria for the tenure and/or promotion shall be established by the university. Academic unit criteria for tenure and/or promotion shall become effective upon approval by the provost. Departmental criteria for tenure and/or promotion shall become effective upon approval by the dean and the provost.

In addition to the criteria for tenure and/or promotion stated in university, academic unit, and department guidelines, administrative criteria such as enrollment patterns and trends, curricular changes, program development, financial consideration, and rank distribution, are considered in tenure and/or promotion decisions. Therefore, a decision to deny tenure or deny promotion does not necessarily mean that a faculty member's work or conduct has been unsatisfactory.

6 CONDITIONS PRECEDENT TO THE AWARD OF TENURE BY THE BOARD OF TRUSTEES

All candidates applying for tenure and/or promotion are required to submit a dossier unless an exception is granted as specified in the Faculty Handbook Tenure Upon Appointment.

The dossier should reflect the faculty member's cumulative performance in satisfying the requirements for the award of tenure regarding teaching, research / scholarship / creative activity, and service. The

dossier contents are described in the Faculty Handbook. The dossier will be reviewed as described in the Faculty Handbook. Appeals of a negative tenure recommendation are described in the Faculty Handbook.

REVIEW AND RECOMMENDATION BY THE PRESIDENT:

After receiving recommendations from the provost and the Faculty Appeals Committee (if there was an appeal), the president makes final recommendations to the Board of Trustees and notifies the candidate, provost, dean, and department chair of this recommendation. In the case of a negative recommendation, the president will provide the candidate written reason(s) for the decision. The recommendation made by the president on tenure and/or promotion is not subject to an appeal.

ACTION BY THE BOARD OF TRUSTEES:

Only the Board of Trustees is authorized to grant tenure and/or promotion. The provost will present a list of the positive recommendations for tenure and/or promotion for board approval. The board will notify the president of its decision and the president will provide the faculty member, provost, dean, and department chair written notice of the board's decision. For positive action by the Board of Trustees to grant tenure and/or promotion, the president shall give the faculty member written notice of the effective date of tenure and/or promotion.

7 TERMINATION OF TENURE

Grounds for Termination

A. **RELINQUISHMENT OR FORFEITURE OF TENURE:**

A tenured faculty member relinquishes tenure upon resignation or retirement from the university.

B. **EXTRAORDINARY CIRCUMSTANCES:**

Extraordinary circumstances warranting termination of tenure may involve financial exigency or program discontinuance.

1. In the case of financial exigency, tenured faculty may be terminated because of financial exigency at the university if the Board of Trustees declares such a condition. Personnel decisions (including those related to tenured faculty) resulting from a declaration of financial exigency at the university must comply with the procedures in this handbook and Board of Trustees policy.

2. In the case of program discontinuance, tenured faculty may be terminated if:

a. A program, such as degree major, concentration, and/or other curricular component, is discontinued by formal action of the Board of Trustees.

b. Student enrollment in a program has decreased over a period of at least three years at a rate which is considerably higher than that of the institution as a whole and/or in comparison with similar institutions as determined by the president.

c. An approved center/institute with tenured faculty lines is dissolved by action of the president.

Procedures for termination due to extraordinary circumstances will follow procedures defined in the Faculty Handbook.

C. **ADEQUATE CAUSE:**

Adequate cause for terminating a tenured faculty member defined by Tennessee Code Annotated §49-8-302, means the following:

1. Incompetence or dishonesty in teaching or research

2. Willful failure to perform the duties and responsibilities for which the faculty member was employed; or refusal or continued failure to comply with the policies of the university, academic unit, or department; or to carry out specific assignments, when these policies or assignments are reasonable and nondiscriminatory

3. Conviction of a felony or a crime involving moral turpitude

4. Improper use of narcotics or intoxicants which substantially impairs fulfillment of departmental or institutional duties and responsibilities.

5. Capricious disregard of accepted standards of professional conduct.

6. Falsification of information on an employment application, curriculum vitae, or other information concerning qualifications for a position.

7. Failure to maintain the level of professional excellence and ability demonstrated by other members of the faculty in the department or division of the university.

Procedures for termination due to adequate cause will follow procedures defined in the Faculty Handbook.

7. Additional Business

Presented by Jeffrey Marchetta

8. Adjournment

Presented by Jeffrey Marchetta