Logistics PUR 2023-24 Self Study Latest Version

Dean's review completed ASA review completed VPAA review completed

I. PROGRAM/UNIT OVERVIEW

1.A. Program or Unit Description: Version by Williams, Amy on 12/14/2023 21:38

Briefly describe (1 paragraph) the program/unit, including but not limited to the following: academic division that the program/unit belongs to, the academic area(s) represented, degrees/certificates offered, average student enrollment, number of full-time faculty, type of curriculum or pedagogical approaches, and any other pertinent aspect of the program/unit.

Our Business and Social Sciences Division offers a range of degree subject areas which will fully transfer to a university, as well as exciting certificate and degree programs to prepare you for a career. Your future job depends on the skills you learn as a student. TMCC works closely with industry partners to create new degree programs when local employers demand new skills from our students. In recent years, advisory board members from the community have helped shape a Bachelor of Applied Science degree in Logistics Operations Management, as well as an Associate of Science in Hospitality and Tourism, both in our Business Department.

The Logistics Operations Management Certificate, Associates, and Bachelor of Applied Science degrees provide students with the technical expertise and knowledge needed to meet the Northern Nevada operations and logistics industry technical workforce needs. The program is designed to offer one, two, and four-year degree options focused on the critical skills needed in the logistics workforce. This program prepares students in the areas of logistics and supply chain through an industry-driven curriculum encompassing such areas as manufacturing processes, quality principles, warehousing, sustainability, and safety. Students in the program are given the skills and knowledge to manage both material and information flows in complex environments. The Logistics Management certificate and AAS are feeder degrees to the Logistics Operations Management BAS program. All three degrees respond to employers' expressed needs to have a well-qualified logistics operations workforce trained and ready to meet workforce demand, thus ensuring long-term economic success for the region. The recent addition of the BAS degree completed the educational pathway for this important business sector workforce. A full-time tenure track instructor was hired in August 2015. There is a strong part-time instructor pool consisting of subject matter experts identified by the Advisory Board.

TMCC has acquired several Library resources that are specifically relevant to the Logistics program, including a new database (ABI/Inform in 2016) and many new logistics hard copy printed books. Supplies and operating expenses are funded equally by state funds and industry philanthropic giving. Administrative support is provided by existing administrative positions in the Dean of the Division of Business and Social Sciences' office. Courses are taught online or online/lecture hybrid (asynchronous/in person) with evening lectures to accommodate the working adult student population. In person lectures are held at the Meadowood Campus which is a preferred location for working students due to proximity to the bus depot at the Meadowood Mall with many convenient routes and schedules to support their class and work schedules. The Center for Applied Logistics Management (CALM) is also located at the Meadowood Campus. The mission for CALM is detailed in Section 1.B.

1.B. Program or Unit Mission: Version by Williams, Amy on 12/14/2023 21:38

State the department's or unit's mission. Describe how it aligns to the College's Mission (https://www.tmcc.edu/about), and how program learning outcomes (PLOs) for degrees and certificates offered, or for the unit, align to the department/unit mission. If your department or unit does not currently have a mission statement, please discuss among your colleagues and develop one.

The logistics industry business community requested an applied four-year degree option with the aim to up-skill their current workforce and from which to hire their future workforce. This program met that request and is structured to fill the workforce educational/training gap forecast for northern Nevada. The Division of Business and Social Sciences is committed to working with the business community to ensure a well prepared, pertinent workforce is available. This program responds to the goal of providing programs that reflect the current workforce requirements and anticipate future workforce needs of the northern Nevada community.

NSHE highlights a number of goals, which are aligned with the overall state goals, in its Master Plan. This program will continue to contribute to many of these goals, including:

- · Producing more graduates who are workforce ready,
- · Creating closer ties to the business community, which may result in more external funding and internship/career pathways for students,
- · Affordability as more students will have a bachelor's degree option that costs significantly less than degrees offered at the universities.

The 2021-2027 Strategic Master Plan states that the institutional vision, mission and values are:

Vision

TMCC is a leader in innovative education, meeting student and community needs.

The logistics program has several innovations to meet the needs of the student and the community. To meet the needs of full-time working students the program now offers the ability for the certificate, AAS, and BAS to be completed fully online. To meet the community needs the program has two capstone courses: a field research project, and an internship during a student's senior year. These capstone courses connect the business community directly with our students. The program also meets community needs through the Center for Applied Logistics Management (CALM) by sponsoring an annual Logistics Leadership Conference every Spring.

Mission

Create a future you will love with accessible, innovative educational opportunities at TMCC. Together we can make it happen.

Values

The values upon which Truckee Meadows Community College bases its mission and vision statements are the principles, standards and qualities the College considers worthwhile and desirable. Truckee Meadows Community College is committed to:

- · Student access and success
 - The program further meets students' needs thanks to a generous gift from the Frank N. Bender family which invested in an endowment for TMCC Logistics student scholarships. To date, this endowment provides about \$10,000 in scholarships each year.
- Excellence in teaching and learning
- Evidence of student progress through assessment of student outcomes
 - This program continues to provide students the opportunity to be successful in their educational endeavors as well as their career goals. The structure of the programs allows
 for students who earned their certificate and AAS degrees to return and further their educational pursuits.
- · Nurturing a climate of innovative and creative thought
 - This program has two capstone courses the senior year of the BAS where students use innovation and creativity in the Field Research course where they survey the business committee on a logistics operations topic and write a research paper. They also can participate in an Internship where they get exposure to the industry.

- · Collaborative decision making
 - The Center for Applied Logistics Management is a collaboration between industry, academia, and community dedicated to leading and coordinating education and training efforts to build
 - and enhance a competitive northern Nevada workforce in a global economy. The program has a very active and involved business advisory board that meets once each semester
- · Community development through partnerships and services
 - The program has the Center for Applied Logistics Management (CALM) and the annual logistics conference as well as an active, vibrant, and growing community industry advisory board.
 - The Center for Applied Logistics Management (CALM) bridges the gap between the academic and professional realms of logistics. It provides a center where all pertinent parties collaborate to respond to government and industry stakeholders' need for the creation and dissemination of practical, cutting-edge, interdisciplinary knowledge and technologies to advance logistics, trade, transportation, and warehousing/distribution and foster economic development. The center provides practical industry/academic applied logistics knowledge through the annual Logistics Leadership Conference and for establishing and coordinating logistics internships.

1.C. Program Learning Outcomes: Version by Clifford, Donna on 09/06/2023 15:45

Logistics BAS Logistics Operations Management (13) PSLO1: Identify the underlying principles of the role of logistics operations management within business. (Active from Fall 2010) PSLO2: Will be prepared to work as logistics operations professionals within one or more of the job categories related to this field. (Active from Spring 2020) PSLO3: Apply the concepts of the professional skills and competency in logistics operations management, such as transportation, procurement, operations design, supervision and management, safety, and warehousing. (Active from Spring 2020) AAS Logistics Management (10) PSLO1: Identify the underlying theories and principles of the role of logistics management within business that is associated with the applied utilization of logistics knowledge. (Active from Fall 2010) PSLO2: Identify, explain, and practice the tools that are used in entry to mid-level logistics positions, including Total Quality Management, Six Sigma, Lean and others. (Active from Fall 2010)

CoA Logistics (17)

PSLO1: Identify the key components of the logistics discipline (including supply chain management, production planning and scheduling, reverse logistics) and analyze their integral function. (Active from Fall 2010)

PSLO2: Analyze the appropriate use of the software and hardware for logistics application. (Active from Fall 2010)

PSLO3: Identify the characteristics, uses, and purposes of the software used in the logistics industry. (Active from Fall 2010)

II. CURRENT STATUS OF THE PROGRAM

2.A. Progress on Previous Findings and Recommendations: Version by Williams, Amy on 12/14/2023 21:38

Describe your progress on the major findings and recommendations for the program/unit from the last PUR, any annual progress reports (APRs), and if applicable, external reviews, (e.g. advisory boards, articulation committees, and program accreditors).

- Which findings and recommendations have the program/unit addressed?
- Which have yet to be accomplished? Which are no longer relevant, and why?
- Has the program/unit undergone any major changes as a result or that would impact the findings and recommendations since the last PUR?

2017 ASA Curriculum Findings

- Recommendation #1 Curriculum conflict/issues with new course schedule
 - \circ Review was completed by Dean and Lead Faculty and approved with multiple CRC approvals and completed by Fall of 2022.
 - Lead Faculty created a spreadsheet with all Prerequisites and Sequences identified and met with the Advising Team to review all the changes in the COA, AAS, and BAS degrees.
- Recommendation #2 Research Online Degree
 - With changes implemented with CRC approval to meet the 2023-2024 catalog all three degree options (COA, AAS, BAS) can now be completed 100% online.
- Recommendation #3 increase use of CALM center
 - $\,\circ\,$ Center is used for Advisory Board meetings each semester.
 - $\circ\,$ Center is also listed for facilities to be used as a conference room and as a small classroom.
 - Center has been utilized as a classroom for smaller LGM courses.
- Recommendation #4 Make explicit the prerequisite of ENG 101/113
 - Completed at the same time as recommendation #1.
- 2017 ASA Demographics and Enrollment Findings
 - $\,\circ\,$ Recommendation #2 Research 100% online option for BAS
 - Completed as of 2023-2024 catalog
- 2017 ASA Resource Findings
 - Recommendation #1 Continue channeling resources for a marketing/media campaign, public relations, and future fundraising events to continue promoting the program.
 - The advisory board has not been impressed with the return on investment and inability to determine if any enrollment increase was attributable to the two major marketing campaigns (Radio, Geofencing) and as a result requested to use CALM Foundation account resources to implement an Annual Logistics Leadership Conference to increase awareness and raise funds for the CALM center and student scholarships. The CALM Finance Board has approved about \$10,000 for conference expenses each year. Expenses include: facilities, catering, speaker gifts, supplies, etc.

- The first conference was held in April 2018 and again in April 2019 and then discontinued in 2020 and 2021 due to Covid. We then had very successful conferences in April 2022 and April 2023 which attracted about 125 attendees. The last conference raised almost \$14,000 in revenue and contributed about \$6,000 after expenses to the Foundation CALM account for program sustainability in the future.
- o Recommendation #2 Clarify if scholarships are featured in promotion of program
 - The Frank N. Bender scholars are recognized in the Annual Logistics Conference and advertised on Facebook and Twitter social media accounts during the Fall semester.
- o Recommendation #3 CALM workstation completed Fall 2018
- o Recommendation #4 Plan to address the need for more full-time faculty
 - Grant approved for a temporary full-time instructor to begin in Spring 2024.
 - Hiring committee established and final candidate interviews completed December 11, 2023.

Which have yet to be accomplished? Which are no longer relevant, and why?

- 2017 ASA Curriculum Findings
 - o Recommendation #5 Consider ENG 107
 - Not needed with revamp of COA, AAS, and BAS per CRC
 - o Recommendation #6 Background on why UNR dropped
 - Not necessary for program sustainability
- 2017 ASA Demographics and Enrollment Findings
 - o Recommendation #1 survey to determine barriers to LGM students completing a full load
 - This is now incorporated into the end-of-semester student survey. The last two Spring semesters (2022, 2023) reviewed question #2 How many hours do you work outside of school? Over 70% of students replied that they are working 31 plus hours per week
 - o Recommendation # 3 Strategies to increase female enrollment
 - According to the PUR enrollment demographic dashboard enrollment for females has increased from a low of 26.5% in 2019 to 44.4% in Fall of 2022.



- We have three active female board members on the advisory board and are recruiting more females to join the board.
- o Recommendation # 4 Strategies to attract 18-24 year olds
 - According to the PUR enrollment demographic dashboard the enrollment for the age group of 18-24 has increased from 57.7% in the Fall of 2018 to 61.6% in the Fall of 2022.

JI 2022.					ogram.
Program Majors by Age Range Term: Fall Program: Business:	9			0.2%	62.6%
	Fall 18	Fall 19	Fall 20	Fall 21	Fall 22
<18	0.2%	0.396	0.2%	0.3%	0.4%
18-24	57.7%	57.3%	57.1%	62.6%	61.6%
25-34	25.0%	26.9%	28.1%	23.2%	21.8%
35-49	12.9%	12.1%	11.3%	11.1%	11.5%
50+	4.2%	3.496	3.4%	2.8%	4.6%
TMCC by Age Range				T	MCC
Term: Fall				2.496	54.6%
	Fall 18	Fall 19	Fall 20	Fall 21	Fall 22
<18	7.196	12.7%	15.0%	11.8%	13.6%
18-24	54.6%	52.9%	51.4%	52.8%	52.2%
25-34	23.9%	22.2%	22.8%	23.6%	21.4%
35-49	10.5%	9.0%	8.4%	9.3%	9.8%
50+	3.9%	3.396	2.4%	2.5%	3.0%

- Lead Faculty, Brian Addington, worked with Kristina Carey at the Nevada Department of Education and participated in drafting an Office and Logistics Management Standards for High School Students. This now allows for Nevada high schools interested in offering Logistics courses to have an educational standard, along with proposed resources. Nevada CTE Logistics Management Standards (nv.gov) (https://doe.nv.gov/uploadedFiles/ndedoenvgov/content/
 Boards_Commissions_Councils/State_Board_of_Education/2022/September/Logistics_Management_STDS_SBE.pdf) See Page 4 for acknowledgement.
- 2017 ASA Resource Findings

All 2017 resource recommendations and findings completed.

Has the program/unit undergone any major changes as a result of the recommendations, or that would impact the findings and recommendations since the last PUR?

- The biggest changes/impacts are:
 - The significant success of the Annual Frank N. Bender Logistics Leadership Conference. This conference has become a great marketing tool for the program and has raised funds for the CALM Center and Student Scholarships. It has also been a great facility for attracting more advisory board members and company sponsorships.
 - The 2023 Conference brought in \$13,800 in revenue.
 - This brings the total raised by all the conferences to date to over \$63,000.
 - This has also brought media coverage. Examples below
 - TMCC hosts annual Logistics Leadership Conference (kolotv.com) (https://www.kolotv.com/2023/04/29/tmcc-hosts-annual-logistics-leadership-conference/)
 - TMCC hosts 2019 Logistics Leadership Conference | KRNV (mynews4.com) (https://mynews4.com/news/local/tmcc-hosts-2019-logistics-leadership-conference)



- All logistics degree options (COA, AAS, BAS) can now be completed 100% online as of Fall 2023. For example:
 - Logistics Operations Management, BAS Truckee Meadows Community College Catalog (tmcc.edu) (https://catalog.tmcc.edu/degrees-certificates/logistics-operations-management-bas/)

2.B. Workforce Needs (AAS degrees and certificates, allied health programs only): Version by Williams, Amy on 12/14/2023 21:38

Describe how your program(s) are meeting workforce needs, especially in the northern Nevada region, by answering the accompanying questions. The following are potential resources for labor market data, though other sources may be referenced.

Nevada Department of Employment Training and Rehabilitation (DETR) (https://www.nevadaworkforce.com/Home/DS-Results-Projections2 (https://www.nevadaworkforce.com/Home/DS-Results-Projections2))

Nevada Governor's Office of Economic Development (GOED) Data Portal (https://goed.nv.gov/why-nevada/data-portal/ (https://goed.nv.gov/why-nevada/data-portal/)

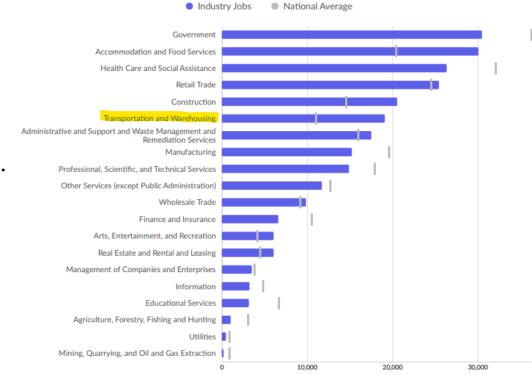
U.S. Bureau of Labor Statistics (http://www.bls.gov/) (http://www.bls.gov/)

- What is the evidence for the regional need for the program (DETR and EDAWN data)?
- · What is the evidence that the program curriculum meets the latest industry trends or workforce needs?
- What are advisory boards suggesting about workforce needs in your program area(s)?

According to the Governor's Office of Economic Development Data Portal the Washoe County Overview indicates the following (Nevada Governor's Office of Economic Development (GOED) Data Portal (https://goed.nv.gov/why-nevada/data-portal/))

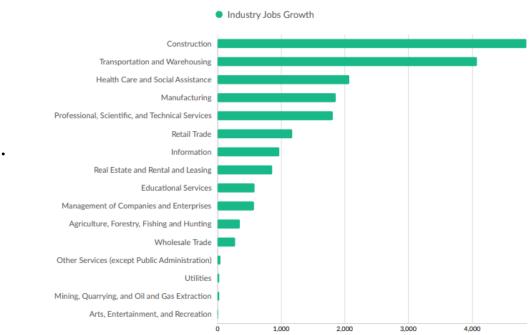
• Transportation and Warehousing is the 6th largest industry in the county (p. 18).

Largest Industries



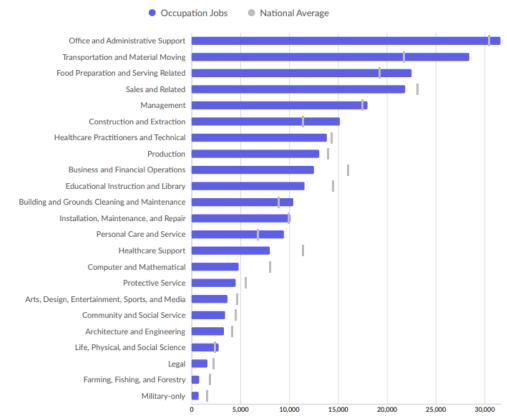
• Transportation and Warehousing is the 2nd fastest growing industry (p. 19).

Top Growing Industries



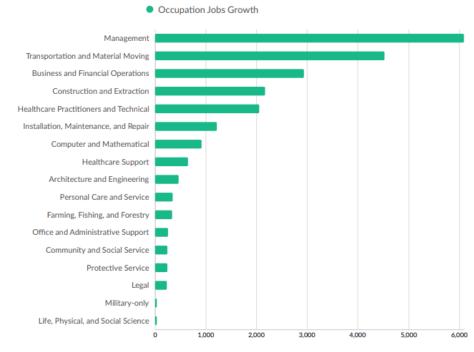
• Transportation and Warehousing is the 2nd largest industry occupation in the county and this well exceeds the national average. (p. 25).

Largest Occupations



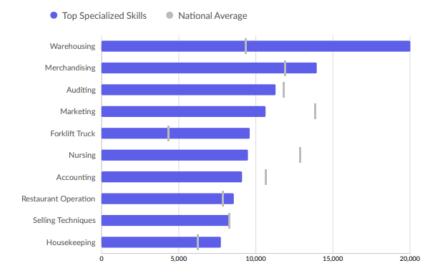
• Transportation and Warehousing is projected to have the 2nd largest occupation job growth in the region (p. 26).

Top Growing Occupations



• Warehousing is the top in-demand skills in the region (p. 32).

In-Demand Skills



This is also echoed in the DETR Industry and Occupational Projections with average employment growth expected to be 10.8% on average across NAIC Job Codes (240 job codes selected for this analysis) related to Logistics Operations Management in all of Nevada (Nevada Department of Employment Training and Rehabilitation (DETR). This represents an increase of over 275,000 jobs from 2018 to 2028 (https://www.nevadaworkforce.com/Home/DS-Results-Projections2) (https://www.nevadaworkforce.com/Home/DS-Results-Projections2)) (http://www.nvdetr.org/)).

What is the evidence that the program curriculum meets the latest industry trends or workforce needs?

- Large and active advisory board consisting of local logistics business leaders.
- Steadily increasing attendance at annual Logistics Leadership Conference.
- Many students are currently working in the industry (e.g. Geodis, Panasonic, Patagonia, Leach Logistics, Sierra Army Depot) and going to TMCC to take the next step in their careers.



What are advisory boards suggesting about workforce needs in your program area(s)?

• Received advisory board input in 2021 to create a Project Management Senior level course. LGM 440 Project Management for Logistics was created and approved by CRC in 2022.

LGM 440 - Logistics Project Management

Units: 3

In this course students will learn to organize, plan, implement, and control project tasks to achieve a logistics organization's schedule, budget, and performance objectives. Students will learn to use and apply tools and concepts such as project charter, scope statement, work breakdown structure, project estimating, and scheduling methodologies.

Enrollment Requirements: Pre-requisite: LGM 340 and LGM 352.

2.C. Accessibility and Cost of Instructional Materials: Version by Williams, Amy on 12/14/2023 21:38

- What are faculty in the department/unit currently doing to help ensure that instructional materials are accessible to students with disabilities? Examples include
 attending Professional Development accessibility sessions, running accessibility checkers on materials, completing accessibility workshops, and working with
 publishers to ensure textbooks and materials are accessible.
- What are faculty in the department/unit currently doing to offer more affordable instructional materials to students. Examples include internal development of
 educational materials or utilization of low cost materials that our TMCC librarians are happy to assist you with finding (e.g. open educational resources (OER), archival
 materials, journal articles).
- Accessibility
 - Lead instructor has attended Professional Development Workshops on Accessibility from Web College and utilizes the accessibility checker built into Canvas each semester
 to identify and resolve accessibility issues such as captioning and broken links.
 - o Lead instructor implements all DRC recommendations to meet student accessibility needs.
 - Will continue to review and research options as some may become available as the growth of Logistics programs in colleges in the United States increase. Currently, logistics
 is considered a subsection of Supply Chain Management and while there are a few OER resources for Supply Chain Management, logistics specific topics usually are only
 covered in one or two chapters.
- · Cost of Instructional Materials
 - The Logistics courses belong to a very narrow field of knowledge and OER resources tend to be available for broader subjects in the business field (Human Resources, Operations Management, etc.)
 - o Several courses have moved to fully online interactive textbooks which are less than the cost of traditional physical textbooks (LGM 201, 210, and 352).

2.D. Catalog Review: Version by Addington, Brian on 11/28/2023 17:09

- Is the program information in the catalog correct, including program descriptions, PLOs, course offerings, course descriptions, and semesters that courses are offered?
- Does the program's suggested course sequence in the catalog allow for completion of degrees within 2 years and/or certificates within 2 semesters for full-time students? Are there any hidden prerequisites?
- Excluding special topics courses, are there any courses that the department has not offered in 4 or more years? Please list them and indicate whether you plan to update and offer, or deactivate the(se) course(s) in the next academic year.

Catalog review was completed as the entire program was aligned for the COA, AAS, and BAS to move to 100% completed online. This review process was reviewed by the Dean and Lead Instructor and completed through the CRC by December 2022 for the 2023-2024 catalog.

There are currently no courses that have not been offered in 4 or more years.

III. PROGRAM/UNIT LEARNING OUTCOMES ASSESSMENT

3.A. Curriculum Mapping: Version by Williams, Amy on 12/14/2023 21:38

All of these questions were considered when we aligned the CoA, AAS, and BAS degrees between 2021-2022. In 2021, all degree curriculum maps were completed with assessment day processes. During this review it was discovered that LGM 440 was not included in the BAS map. On contacting the assessment office it was noted that all the ancillary courses were not included in the BAS map. These 18 additional courses have had their curriculum maps updated as of this review. The assessment office added the additional course maps into eLumen. All curriculum maps (CoA, AAS, and BAS) are now up-to-date.

- PLOs: Do all PLOs reflect what you want students to demonstrate once they complete the program? Are there any PLOs that need to be updated? Are all PLOs measurable?
- Potential gaps and scaffolding: Are there any PLOs that are not addressed across the program curriculum? Are PLOs reflected in multiple courses in a way that scaffolds learning?
- CLO alignment: Is there a need to modify any course learning outcomes so that courses better support PLOs?
- Course sequencing: Is there a need to modify the course sequencing so that learning is scaffolded throughout the program? In other words, courses taken earlier in the program sequence should introduce PLOs, and courses taken later in the sequence should reinforce PLOs by offering students additional opportunities to practice.
- Curriculum and learning opportunities: Is it necessary to introduce new opportunities to reinforce learning? These could be modules or assignments in specific courses, additional courses, and/or co-curricular opportunities that would be required of all students in the program.
- Do you need to make any changes to your curriculum map after this analysis?

BAS Logistics Opera Map Origin: BAS Logistics Operation		ment	
Map Origin: BAS Logistics Operati Map Target: BAS Logistics Operati	ons Management (13)		
	PSLO1: Identify the underlying principles of the role of logistics operations management within business.	Stics Operations Manager PSLO2: : Apply the concepts of the professional skills and competency in logistics operations management, such as transportation, procurement, operations design, supervision and management, safety, and	PSLO3: Will be prepared to work as logistics operations professional within one or more of the job categories related to this field.
CSLOs ACC135		warehousing.	
Students will accurately analyze, record and review accounting transactions.		X (IP)	
2. Students will demonstrate the ability to prepare standard financial statements.		X (IP)	
Students will demonstrate the ability to process transactions and use features and capabilities of a commonly available general ledger software program.			
ACC201 1. Students will accurately analyze, record, and review accounting transactions.			
Students will locate, interpret an apply Generally Accepted Accounting Principles to individual accounts and formulate adjustments based on the Matching Principle.			X (IP)
Students will use Generally Accepted Accounting Principles to prepare Financial Statements.			X (IP)
BUS108			
Students will be able to access, identify and evaluate major sources of electronic information. They will also be able to browse and search the internet, evaluate the quality of the electronic data they gather and share electronic information.	X (IP)		
Students will be able to compose persuasive messages promoting an idea, requesting a favor, settling a claim or closing a sale.	X (IP)		
Students will complete the reporting process by planning, gathering and analyzing data, and writing a final report.		X (IP)	
BUS225			
 Students will calculate and interpret measures of descriptive statistics and apply these measures to decision-making in business. 			
Students will calculate and interpret measures of probability and probability distributions and apply these measures to decision-making in business.			
Students will compile, summarize, interpret, and report data in a format that facilitates informed business decisions.	X (PR)		
Students will identify goals, strengths, and weaknesses of various statistical and probability methods.			
Students will use statistical software to summarize data, analyze data, and prepare reports. BUS325			X (IRD)
Students will analyze the advantages and disadvantages of litigation, mediation, and arbitration.			

Students will apply laws and regulations to case studies.				
Students will identify and evaluate ethical issues faced by businesses.			X (DM)	
Students will locate and accurately interpret laws and regulations.			X (DM)	
BU\$330				
Students will analyze and evaluate presentations for effectiveness and are able to adapt their presentation to meet audience needs.	X (IPD)			
Students will design and deliver business presentations by applying the design principles and techniques		X (IPD)		
Students will explain the basic principles of designing and delivering business presentations. ECON103			X (IRD)	
Students will apply economic indicators to assess the state of a financial market and analyze changes in the mraket in order to forecast the amount of funds loaned or borrowed at the market rate.				
Students will apply graphic analysis in order to determine the effect of changes in prices, wages and interst on GDP, employment and investment for an economy.		X (IP)		
 Students will know the merits and risks associated with fiscal, monetary and free market economic policies and be able to explain how they can be implemented. 		X (IP)		
EMHS429				
Analyze the characteristics of multiple modes of transportation and the economic effects of multiple-modal transportation disasters.	X (IRD)			
Analyze the security effects of multiple- modal transportation disasters.			X (IPD)	
Define major security components relative to transportation, geography and the transportation networks.			X (IPD)	
IS101				
Students will demonstrate the ability to analyze and report data using spreadsheet software		X (IP)		
Students will demonstrate the ability to use presentation software to create and expert-level slide presentation.		X (I)	X (P)	
Students will demonstrate the ability to use word processing software to create a professional-quality document.		X (IP)		
LGM201				
Demonstrate an ability to define the function of the supply chain and the attendant vocabulary.	X (IRD)			
Students will demonstrate the ability to provide holistic supply chain solutions to real world challenges.		X (IRD)		
Students will develop a conceptual understanding of the linkages with the Supply Chain.			X (IPD)	
LGM202				
Define international logistics vocabulary and technology. Understand and elucidate the	X (IR)			
differences between domestic and international logistics and the attendant complexities.	V	Х		
Understanding if industry international supply chains	X			

вирру спань.	(irt)			
LGM208				
Diagnose problems and select appropriate tools for quality and continuous improvement.		X (IRD)		
Students will identify and explain quality and continuous improvement in the logistics discipline.	X (IRD)			
Students will understand and apply tools used in logistics management including Lean, Theory of Constraints and Total Quality Management.		X (IRD)	X (IRD)	
LGM209 1. Students use six sigma techniques and			X	
tools.			(IRD)	
Students will diagnose problems and develop appropriate solutions.		X (DM)		
Students will sythesize and utilize the tools from Tech I and Tech II.		X (DM)		
LGM210				
Define the procurement cycle and the vocabulary related to procurement.	X (IR)			
Understand and elucidate the issues related to commodity planning.				
Understanding of supplier relationship management and negotiation.	X (IRD)		X (RM)	
LGM212	X			
Define the principles of carrier management.	X (IR)			
Understand and elucidate the public policy issues and vocabulary associated with transport management.	X (IR)			
Understanding of carrier management and transportation problem solving.	X (IR)			
LGM320				
Students will assess and evaluate the challenges of providing logistics security in the supply chain.	X (PR)			
Students will assess and evaluate the impact of government oversight on logistics security.	X (PR)			
Students will evaluate the differences of security threats for passenger versus cargo and appraise and evaluate current topics on threats, counter terrorism, and new technology.			X (PR)	
Students will research a logistics security topic, then develop interview questions, and interview a security professional.		X (PR)		
LGM330				
 Students will apply mathematical models such as the Center of Gravity and Load- Distance calculations to make recommendations for site selection, facility design, and facility size with applied business case studies. 			X (IPD)	
Students will evaluate how the principles of warehousing impact the efficiency and effectiveness of the product flow to the customer.		X (PR)		
Students will work in a group to assess and evaluate the use of warehouse automation and advanced technology tools in a final applied business case study and/or warehouse site visit.	X (DM)			
LGM340				
Students will analyze and assess a logistics case study on the strategic use of information technology and appraise if the company will achieve a competitive advantage.		X (PR)		
Students will appraise how logistics information technology is applied in			X	

different enterprise business subsystems.			(FR)	
Students will examine how the concepts of information technology meet the needs of management.				
Students will interpret the challenges of managing information technology and evaluate a case study of a business information system implementation.		X (PR)		
LGM352				
Students will compare, contrast, and conclude how decision making models are used in operations management.				
Students will demonstrate proficiency using analytical spreadsheets, simulation programs, and other computer assisted mediums.			X (DM)	
Students will identify, explain, and summarize operations management concepts and terminology				
Students will integrate the understanding of decision making models by assessing examples and evaluating results.			X (DM)	
LGM410				
Students will analyze and interpret financial statements.			X (DM)	
Students will apply basic principles of cost accounting and budgeting to create budgets.				
Students will apply basic principles of cost accounting and other analytical tools to create financial reports for internal decision making purposes.				
Students will identify the goals, strengths, and weaknesses of various performance evaluation methods.				
5 Students will use financial reports and other analytical tools to evaluate performance.		X (DM)		
LGM420				
Students will apply advanced qualitative and quantitative tools and methods of risk assessment.	X (IRD)			
Students will apply the concepts of safety and risk assessment to a past or present workplace experience.		X (DM)		
Students will compare and contrast the appropriate role of risk analysis in public versus private settings.		X (DM)		
 Students will explain the different approaches to managing environmental risk. 				
Students will identify a workplace setting on campus or a current workplace, with permission assess the current safety culture and practices, and design a Safety Management System plan.				
LGM440				
Develop effective approaches for managing high-performance project teams, communication strategies, and best practice closeout strategy that maximizes the value of the project experience.	X (IPD)			
Critique the impacts of schedule, cost, and scope elements in projects and analyze different techniques for managing risks.	X (IPD)			
Create project Charters, Scope statements, Work Breakdown Structures (WBS), Project Network Diagrams, and Responsibility Assignment Matrix (RAM).		X (IPD)		

Apply project management methodologies, processes, and tools to	X		
projects in complex organizations.	(IPD)		
LGM450			
Students will assess the economic impact of sustainable investments by calculating the return on investment using financial calculations such as: payback, net present value, and the internal rate of return.		X (PR)	
Students will critically examine environmental policy issues and discuss and evaluate the impact of human population on the environment.		X (PR)	
Students will evaluate and assess new sources of energy, air and water quality, waste treatment, reclamation, and conservation efforts.			
Students will evaluate supply chain decisions to identify ways to improve the sustainability of the company.	X (DM)		
LGM460			
Students will analyze risks and evaluate the elements of risk management.			
Students will apply transportation laws and regulations to case studies.		X (DM)	
 Students will evaluate contract formation under the Uniform Commercial Code ,(UCC) and Contracts for International Sales of Goods ,(CISG). 	X (PR)		
Students will locate and interpret transportation laws and regulations.	X (PR)		
LGM470			
Students will analyze different export management strategies and compare and contrast the advantages and disadvantages of these strategies in meeting the challenges of international trade.			
Students will assess and evaluate a supply chain to identify and address import/export risk.	X (PR)		
Students will evaluate a supply chain and identify and characterize the documentation required to import or export goods.	X (PR)		
 Students will evaluate and compare approaches to export and import compliance and assess how new technology reduces freight costs. 		X (PR)	
LGM490			
Create a research project by investigating, researching, analyzing, and developing a hypothesis for a logistics operations management problem.		X (DM)	
Develop a survey and send it to logistics companies to analyze the data, test the hypothesis, and reach a conclusion of whether the hypothesis was supported or not.			
LGM491			
Students will create a learning agreement plan with their supervisor that will identify three learning objectives.		X (DM)	
Students will create a journal that reflects on the professional behavior of the site supervisor and other employees at the site, as well as through interaction with customers or clients. The student also practices proper business etiquette while fulfilling his or her internship responsibilities.			

	<u> </u>	į	1	I II
Students will create a journal of the dynamics of an organization's culture through observing and reflecting on how decisions are made, how work is structured, how power is shared, how colleagues interact, how an organization's mission/vision are implemented, and to what degree accountability and feedback are present in the organization.				
4. Students will develop a learning agreement with their supervisor at the beginning of the semester. The student sets goals for what he or she would like to learn, and will measure progress against those goals. The intern will assess to what degree he or she was able to meet the expressed goals and learning outcomes, and identify new areas for growth.			X (DM)	
Students will receive professional feedback through ongoing individual meetings with the supervisor and an evaluation at the end of the internship experience. These opportunities provide objective feedback to help the student examine him or herself from another vantage point. The student will reflect critically on the comparisons and differences in perception of the intern's work.			X (DM)	
MGT171				
Students will identify the five stages of conflict and explain how the five-stage model can be helpful to a supervisor.	X (1)			
Students will explain how organizational, interpersonal and language barriers affect supervisory communication.	X (I)			
Students will explain what is involved in the delegation process including authority responsibility and accountability.	X (1)			
MGT212				
 Students will demonstrate an understanding of the importance of ethics and ethical actions as they relate to professional behavior in the workplace. 		X (IR)		
2. Students will describe techniques to both optimize, as well as resolve, conflict.		X (IR)		
Students will explain the role that culture plays in the formation and maintenance of leader / follower relationships.				
MKT210				
Students will apply marketing systems including sensing, serving and satisfying consumer wants/needs, using marketing vocabulary.		X (IR)		
Students will design advertising campaigns including: market analysis, evaluation, pricing, distribution means, and use of new technologies.				
Students will implement global marketing strategies including horizontal and vertical distribution systems; market segmentation/positioning; target marketing in a diverse global market; and describe supply chain management and conduct global marketing.				
MPT110				
Students will describe the core concepts of Manufacturing and Production Systems and how the flow of turning raw resources into finished products.	X (IR)			
	ı	I	ı	I

Students will describe modern business practices, planning, and enterprise systems utilization in manufacturing. Apply mathematical analysis used in various enterprise planning systems.	X (IR)			
Students will describe the importance of automation in modern manufacturing, how automation is implemented, and the various control systems.				
Students will apply human relations concepts of interpreting, transcribing, and communicating information, data, and observations from a written document for use in an actual situation.		X (IR)		
S. Students will describe the importance of manual manufacturing and assembly and manufacturing and demonstrate the ability to read technical documents and construct/assemble an item from components to completion.				
 Students will identify the various instrumentation used in process control and describe the importance of process control. 				
Students will use mathematics in: analyzing production planning and control, manually assembly products, and process control.			X (DP)	
MPT135 1. Apply active listening skills to obtain and			X	
clarify information.			(IPD)	
Students will explain and differentiate between the functions of various types of material handling equipment within an industrial/warehousing environment.				
Students will operate industrial material handling equipment in accordance with industry practice and governmental safety regulations.			X (IPD)	
OSH222				
 Students will apply OSHA rules and regulations while developing safe work habits in an industrial environment. 		X (IPD)		
Students will demonstrate a positive personal safety attitude.			X (IR)	
SCM474 1. Students will assess the global sourcing				
strategies used and risks encountered by companies engaging in international business.			X (DM)	
Students will evaluate sourcing decisions that companies make in an international context.		X (PR)		
 Students will practice and apply the procurement steps by role-playing a purchasing negotiation scenario. 				
Attainment Levels:	0	0	0	
Attainment Levels: M: Mastered RM: Reinforced/Mastered IR: Introduced/Reinforced DM: Demonstrate/Mastery PR: Practiced/Reinforced IRD: Introduced/Reinforced/Demonstrate/ IPD: Introduced/Practiced/Demonstrated D: Demonstrated IP: Introduced/Practiced P: Practiced R: Reinforced I: Introduced				

Map Origin: Associate of Applied Scien Map Target: Associate of Applied Scien	ce, Logistics Manageme	nt	
	Associate of A	Applied Science, Logistics	Management
CSLOs	PSLO1: Identify the underlying theories and principles of the role of logistics management within business that is associated with the applied utilization of logistics knowledge.	PSLO2: Identify, explain, and practice the tools that are used in entry to mid- level logistics positions, including Total Quality Management, Six Sigma, Lean and others.	PSLO3: Identify the characteristics, uses, and purposes of the software used in the logistics industry.
ACC135			
Students will accurately analyze, record and review accounting transactions.			X (IP)
Students will demonstrate the ability to prepare standard financial statements.			X (IP)
Students will demonstrate the ability to process transactions and use features and capabilities of a commonly available general ledger software program.			X (IP)
ACC201		X	
 Students will accurately analyze, record, and review accounting transactions. 		X (IP)	
Students will locate, interpret an apply Generally Accepted Accounting Principles to individual accounts and formulate adjustments based on the Matching Principle.		X (IP)	
Students will use Generally Accepted Accounting Principles to prepare Financial Statements.		X (IP)	
BUS108			
Students will be able to access, identify and evaluate major sources of electronic information. They will also be able to browse and search the internet, evaluate the quality of the electronic data they gather and share electronic information.			X (IP)
Students will be able to compose persuasive messages promoting an idea, requesting a favor, settling a claim or closing a sale.			X (IP)
Students will complete the reporting process by planning, gathering and analyzing data, and writing a final report.			X (IP)
BU\$225			
Students will calculate and interpret measures of descriptive statistics and apply these measures to decision-making in business.		X (IRD)	
Students will calculate and interpret measures of probability and probability distributions and apply these measures to decision-making in business.		X (IRD)	
Students will compile, summarize, interpret, and report data in a format that facilitates informed business decisions.		X (IRD)	
Students will identify goals, strengths, and weaknesses of various statistical and probability methods.		X (IRD)	
Students will use statistical software to summarize data, analyze data, and prepare reports.			X (IPD)
ECON102			

torecast the amount of the good to be produced	I	I	I .
and price to be charged.			
Students will apply graphic analysis in order to determine the effect of changes in prices, wages and interest on output, employment and investment for a typical firm.			X (IPD)
Students will know the basic differences among the major industrial organizations in a market oriented economy including competitive, monopoly and monopolistic firms.	X (IP)		
ECON103			
Students will apply economic indicators to assess the state of a financial market and analyze changes in the mraket in order to forecast the amount of funds loaned or borrowed at the market rate.			
Students will apply graphic analysis in order to determine the effect of changes in prices, wages and interst on GDP, employment and investment for an economy.			X (IP)
Students will know the merits and risks associated with fiscal, monetary and free market economic policies and be able to explain how they can be implemented.			
LGM201 1. Demonstrate an ability to define the function			
of the supply chain and the attendant vocabulary.	X (DP)		
Students will demonstrate the ability to provide holistic supply chain solutions to real world challenges.	X (DP)		
Students will develop a conceptual understanding of the linkages with the Supply Chain.		X (IP)	
LGM202			
Define international logistics vocabulary and technology.	X (IRD)		
Understand and elucidate the differences between domestic and international logistics and the attendant complexities.	X (IRD)		
3. Understanding if industry international supply chains.	X (IRD)		
LGM208	()		
Diagnose problems and select appropriate tools for quality and continuous improvement.		X (IPD)	
Students will identify and explain quality and continuous improvement in the logistics discipline.	X (IPD)		
Students will understand and apply tools used in logistics management including Lean, Theory of Constraints and Total Quality Management.		X (IPD)	
LGM209		X	
Students use six sigma techniques and tools.		X (IPD)	
Students will diagnose problems and develop appropriate solutions.		X (IPD)	
Students will sythesize and utilize the tools from Tech I and Tech II.		X (IPD)	
1. Define the procurement cycle and the	V		
Define the procurement cycle and the vocabulary related to procurement.	X (IP)		
Understand and elucidate the issues related to commodity planning.		X (IRD)	
Understanding of supplier relationship management and negotiation. LCM242	X (IP)		
LGM212	Y		

Define the principles of carrier management.	(IP)		
Understand and elucidate the public policy issues and vocabulary associated with transport management.	X (IP)		
Understanding of carrier management and transportation problem solving.		X (IPD)	
MGT212			
Students will demonstrate an understanding of the importance of ethics and ethical actions as they relate to professional behavior in the workplace.			
Students will describe techniques to both optimize, as well as resolve, conflict.		X (IP)	
Students will explain the role that culture plays in the formation and maintenance of leader / follower relationships.	X (I)		
MKT210			
Students will apply marketing systems including sensing, serving and satisfying consumer wants/needs, using marketing vocabulary.		X (IP)	
Students will design advertising campaigns including: market analysis, evaluation, pricing, distribution means, and use of new technologies.			
Students will implement global marketing strategies including horizontal and vertical distribution systems; market segmentation/positioning; target marketing in a diverse global market; and describe supply chain management and conduct global marketing.	X (IP)		
	0	0	0
Attainment Levels: M: Mastered RM: Reinforced/Mastered IR: Introduced/Reinforced DM: Demonstrate/Mastery PR: Practiced/Reinforced IRD: Introduced/Reinforced/Demonstrated IPD: Introduced/Practiced/Demonstrated DP: Practiced/Demonstrated DP: Demonstrated IP: Introduced/Practiced P: Practiced IP: Introduced/Practiced IP: Introduced/Practiced IP: Introduced III Introduced III Introduced III Introduced	i		

CoA Logistics Curriculum Ma	ар	
Map Origin: CoA Logistics (17) Map Target: CoA Logistics (17)		
wap rarget. COA Logistics (17)	CoA Logistics (1	7)
	PSLO1: Identify the key components of the logistics discipline (including supply chain management, production planning and scheduling, reverse logistics) and analyze	PSLO2: Analyze the appropriate use of the software and hardware fo logistics application.
CSLOs	their integral function.	logistics application.
LGM201		
Demonstrate an ability to define the function of the supply chain and the attendant vocabulary.	X (P)	
Students will demonstrate the ability to provide holistic supply chain solutions to real world challenges.		X (IRD)
Students will develop a conceptual understanding of the linkages with the Supply Chain.	X (P)	
LGM202	V	
Define international logistics vocabulary and technology.	X (IRD)	
Understand and elucidate the differences between domestic and international logistics and the attendant complexities.	X (IRD)	
3. Understanding if industry international supply chains.	X (IRD)	
LGM208	(nw)	
Diagnose problems and select appropriate tools for quality and continuous improvement.		X (IPD)
2. Students will identify and explain quality and continuous improvement in the logistics discipline.	X (IPD)	
Students will understand and apply tools used in logistics management including Lean, Theory of Constraints and Total Quality Management.		X (IPD)
LGM209		
Students use six sigma techniques and tools.		X (IRD)
Students will diagnose problems and develop appropriate solutions.	X (IRD)	
Students will sythesize and utilize the tools from Tech I and Tech II. LGM210		X (IRD)
Define the procurement cycle and the vocabulary related to procurement.	X (PR)	
Understand and elucidate the issues related to commodity planning.	X (PR)	
Understanding of supplier relationship management and negotiation. LGM212	X (PR)	
Define the principles of carrier management.	X	
Understand and elucidate the public policy issues and vocabulary associated with transport management.	(IPD) X (IPD)	
Understanding of carrier management and transportation problem solving.	\/	X (IPD)
	0	0
Attainment Levels: M: Mastered RM: Reinforced/Mastered IR: Introduced/Reinforced DM: Demonstrate/Mastery PR: Practiced/Reinforced		

IND. Introduced/Remiorced/Demonstrated		
IPD: Introduced/Practiced/Demonstrated		
DP: Practiced/Demonstrated		
D: Demonstrated		
IP: Introduced/Practiced		
P: Practiced		
R: Reinforced		
I: Introduced		

3.B. Evidence of Program Learning Outcomes Assessment: Version by Williams, Amy on 12/14/2023 21:38

Summarize the most significant program assessment results since your last PUR. These will come from past CARS, APRs, and Action Plans and assessment data within eLumen. Please discuss course assessment findings as they apply to the program and program learning outcomes.

As the program has moved from in person to hybrid (2018) to 100% online (2023) the greatest feedback we received from the course assessments was student engagement in the online discussion format. These class-based discussion assignments apply across all the PLSO's for the CoA, AAS, and BAS. Students would answer the initial discussion-based questions but were failing to reply to their fellow students. After having "close the loop" discussions with other faculty in the department it was determined that students needed more time between the initial post and the replies. Several methods were tried, and the most successful option was to require the initial post on Wednesday and then have until the following Sunday evening to reply to at least three other students. This was implemented in all of the LGM courses from 200 to 300 and 400 level courses so that students had consistency between all the courses and understood the expectations. These requirements were also updated and reflected in a grading rubric known to all students at the beginning of the semester and reinforced in the syllabus and syllabus quiz at the very beginning of each semester. This change in 2018 has increased student completion of these assignments. The PLSO's were not changed but the assessment method requiring class-based discussions was changed to increase completion rates and successful learning outcomes.

Describe how department faculty implemented plans to improve students' achievement of program learning outcomes. What changes did you make to the program based on assessment results and improvement plans?

After reviewing the current PSLO's this committee recommends going to the CRC and changing the following:

- Current PSLO #2: Will be prepared to work as logistics operations professionals within one or more of the job categories related to this field. (Active from Spring 2020)
- Recommended change PSLO #2 to "Develop skills as logistics operations professionals within one or more of the job categories related to this field."

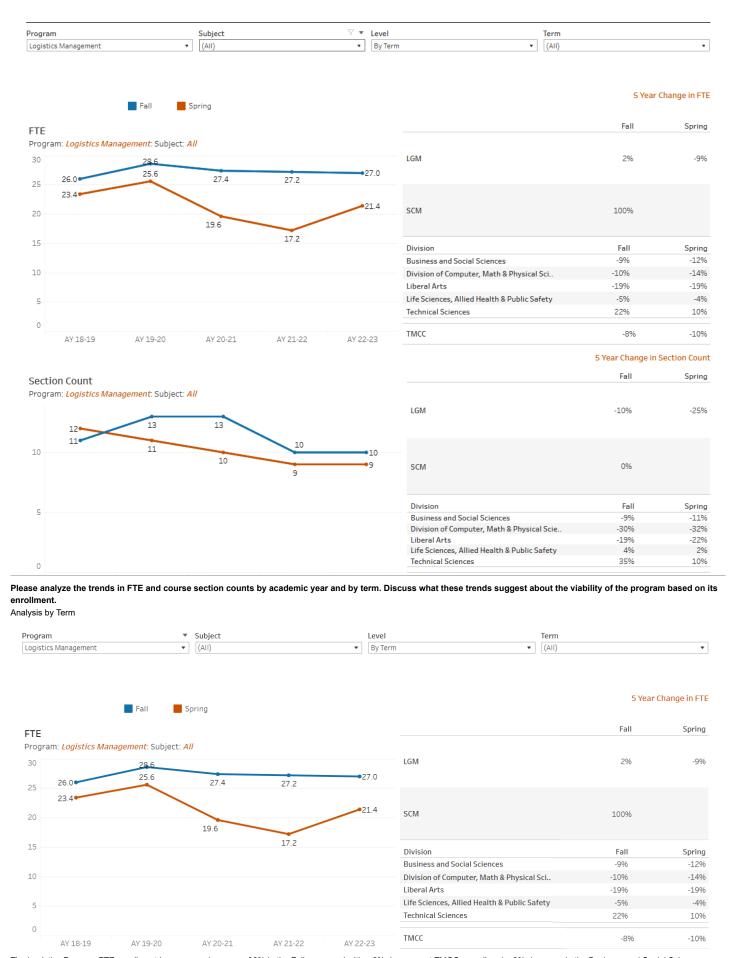
3.C. General Education Outcomes Assessment (if applicable): Version by Addington, Brian on 11/28/2023 17:09

- Describe which general education learning outcomes (GELOs) you assessed in your department/unit and summarize the most significant assessment results.
- Describe how department faculty implemented plans to improve students' achievement of GE learning outcomes. What changes did you make to general education based on assessment results and improvement plans? Do any CLOs need to be changed to align with GELOs?

Not applicable to this program

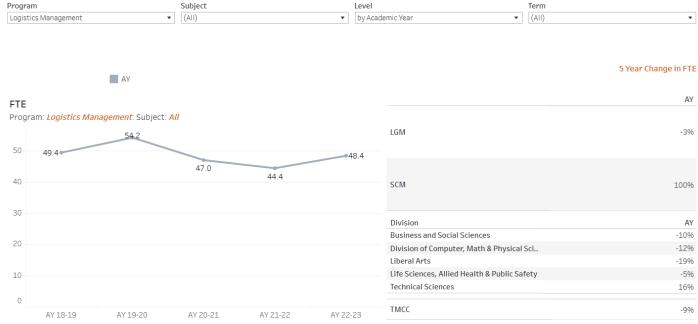
IV. ENROLLMENT AND DEMOGRAPHICS

4.A. FTE and Section Count: Version by Clifford, Donna on 01/29/2024 17:52



The Logistics Program FTE enrollment has seen an increase of 2% in the Fall compared with a 8% decrease at TMCC overall and a 9% decrease in the Business and Social Science division over the past five years.

LGM has a 9% decrease in the Spring which is in line with the 10% decrease experienced by TMCC and the 12% decrease the division has experienced.



Analysis by Academic Year

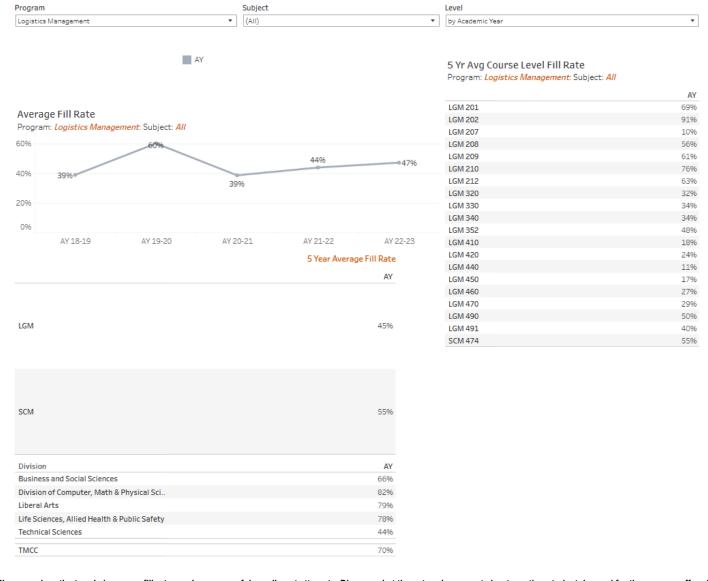
The Logistics Program FTE enrollment has seen a decrease of 3% in the past five years compared with a 9% decrease at TMCC overall and a 10% decrease in the Business and Social Science division over the past five years.

This program has bucked the national, state, TMCC, and division trends in a positive manner. Covid negatively impacted community college enrollment in 2021 and 2022. And when the economy recovered, unemployment was low, and many community colleges continue to struggle to attract full-time students. Community college enrollment tends to do better when unemployment is higher.

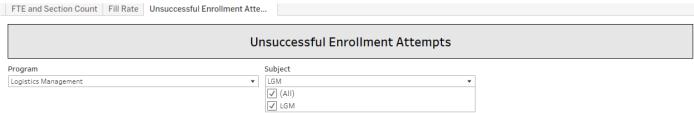
- The unemployment rate, community college enrollments, and tough choices (essay) | Inside Higher Ed. (n.d.). www.insidehighered.com. https://www.insidehighered.com/views/2015/08/27/unemployment-rate-community-college-enrollments-and-tough-choices-essay
- Community College Enrollment and Unemployment The EvoLLLution. (2020, January 17). Evolllution.com, https://evolllution.com/attracting-students/enrollment_strategies/community-college-enrollment-and-unemployment

According to the past two Spring semester student course surveys (Spring 2022, Spring 2023) over 70% of students self-reported working 31 or more hours each week. This makes it difficult to go to school full time. Many of our students report they have families to raise and need to work for the health benefits.

4.B. Course Fill Rates and Unsuccessful Enrollment Attempts: Version by Williams, Amy on 12/14/2023 21:38



Please analyze the trends in course fill rates and unsuccessful enrollment attempts. Discuss what these trends suggest about meeting student demand for the courses offered in your program(s).



5 Yr Average Unsuccessful Enrollment Attempts

An enrollment attempt is considered unsuccessful if the student tried to enroll in one or more sections of a course but could not because the section was full, and who ultimately did not take the course that term. If they eventually enrolled in another section, they are not counted as unsuccessful. And a student is only counted once per course no matter how many section-level attempts they had.

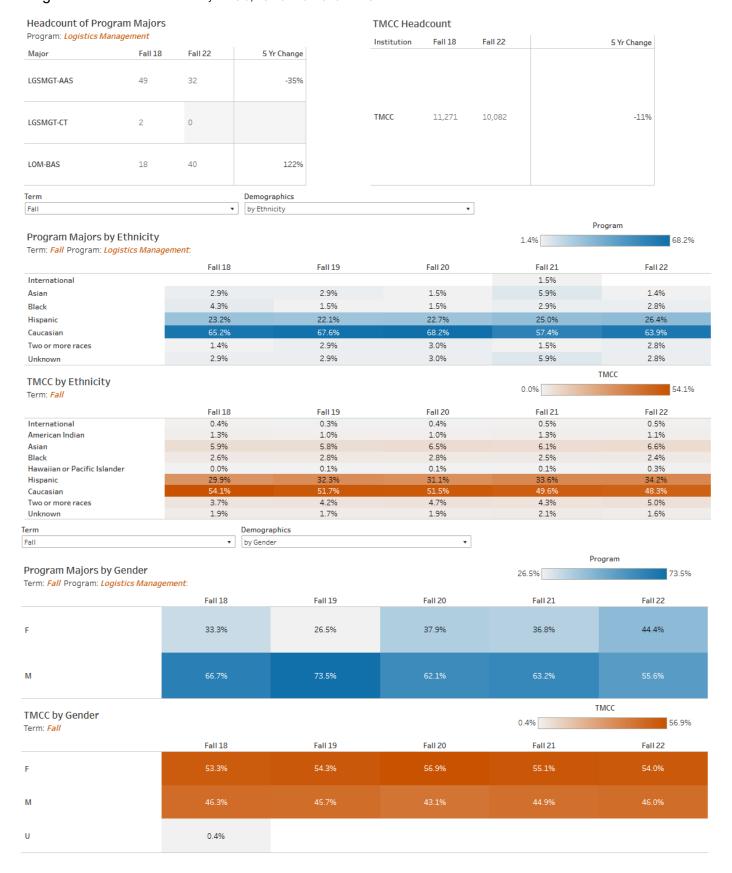
Course Level

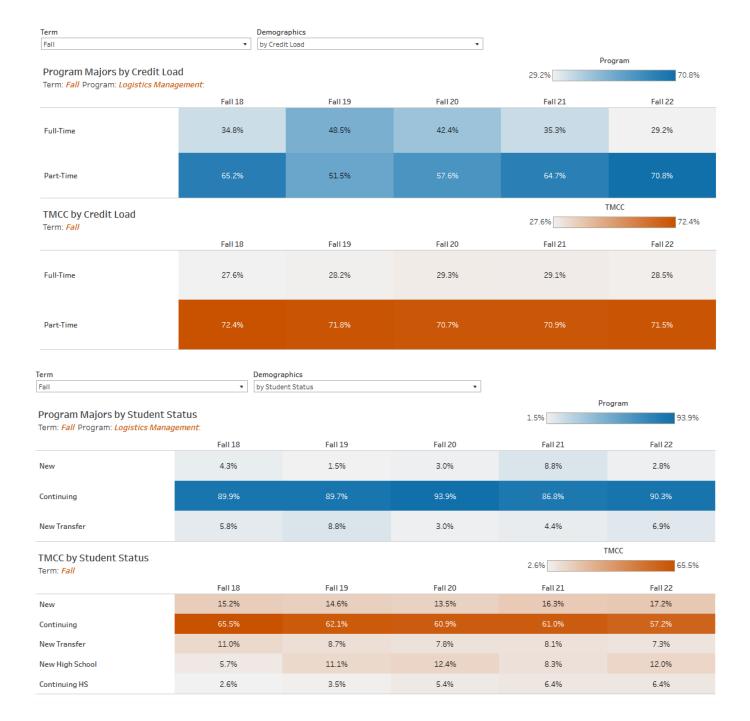
Program: Logistics Management Division & College Wide 1.00 **Business and Social Sciences** 4.08 IGM 202 3.33 Division of Computer, Math & Physical Sciences LGM 210 4.00 LGM 490 1.00 Life Sciences, Allied Health & Public Safety 7.01 Technical Sciences 2.96 TMCC 7.53

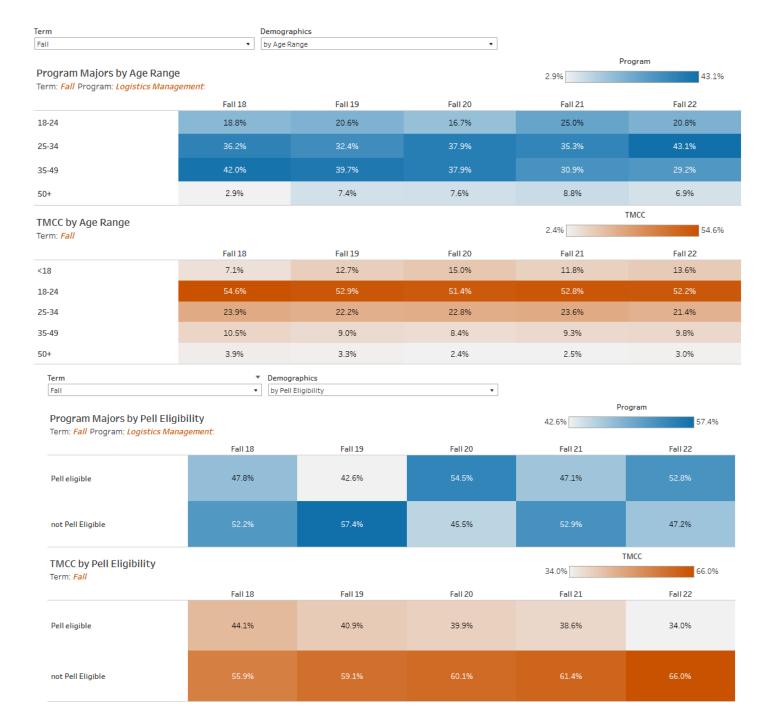
It is difficult to draw any conclusions on fill rate and unsuccessful enrollment attempts in a program with such a small number of students. The fill rate is low as the program is relatively new to TMCC but also the BAS is new to TMCC. The only course we have offered with two sections is LGM 201 which is the only course offered in both the Fall and Spring semesters. When the

course reaches 35 students, we have offered a second section. With the expected hiring of a new LGM instructor in Spring 2024 we are going to be offering second sections of the online course in person at Dandini in the daytime and Meadowood in the evenings so as to offer working students more options. This should bring the unsuccessful attempts down but may also decrease the fill rate due to lower student class enrollment as the majority of logistics students prefer the 100% online mode.

4.C. Student Demographics: Ethnicity, Gender, Credit Load, Student Status, Age Range, Pell-eligibility, and First-generation status: Version by Clifford, Donna on 01/29/2024 17:54



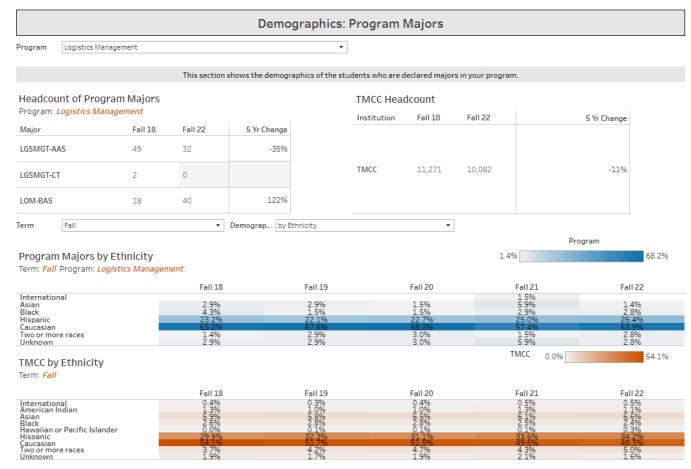




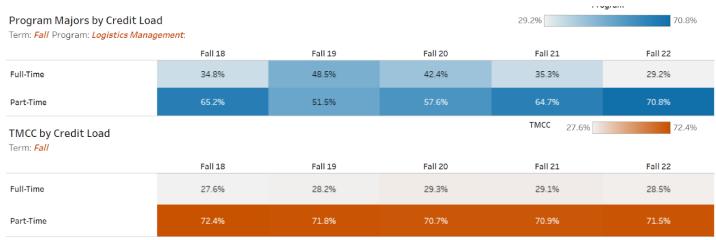


- Briefly describe the typical student in terms of ethnicity, gender, credit load, student status, first-generation students, age range, Pell-eligibility and first-generation status, including how they compare to demographics of the college. Please note any potential equity gap and discuss your plans for closing them. An equity gap is where there is a significant and persistent disparity in access or achievement between different groups of students.
- Describe the demographics of the program's faculty compared to the demographics of the program's students.
- Discuss teaching methods and other practices used by the program's faculty to cultivate a welcoming, safe, and inclusive learning environment.
- Hispanic student enrollment increased from a low of 22.1% to 26.4% but is lower than the TMCC overall population of 34.2%.
 - o Recommendation: develop and offer marketing materials and social media posts in Spanish in coordination with and recommendations from the advisory committee.
- Caucasian student enrollment has decreased from 65.2% to 63.9% but is higher than the TMCC overall population of 48.3%.
- All other ethnicities are also lower in the program than the TMCC overall population percentages.
 - Recommendation: make sure marketing materials show a diverse population of people and genders in coordination with and recommendations from the advisory committee.

Program Majors by Gender				26.5%	73.5%
Term: Fall Program: Logistics Manag	rement.				
	Fall 18	Fall 19	Fall 20	Fall 21	Fall 22
F	33.3%	26.5%	37.9%	36.8%	44.4%
М	66.7%	73.5%	62.1%	63.2%	55.6%
TMCC by Gender Term: <i>Fall</i>				TMCC 0.4%	56.9%
	Fall 18	Fall 19	Fall 20	Fall 21	Fall 22
F	53.3%	54.3%	56.9%	55.1%	54.0%
M	46.3%	45.7%	43.1%	44.9%	46.0%
U	0.4%				



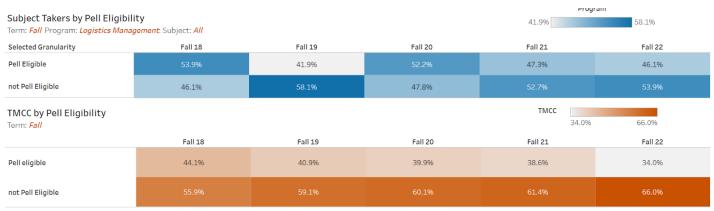
- Female student enrollment increased from a low of 26.5% to 44.4% but is lower than the TMCC overall population of 54%.
- Male student enrollment decreased from a high of 73.5% to 55.6% but is higher than the TMCC overall population of 46%.
- With a low overall student population numbers from 50 to 70 students these numbers tend to fluctuate more than larger, more established programs. The question is how large of a sample size is needed to draw any statistically significant conclusions.
- But the overall trend is clear that this program has a larger male population than most programs and TMCC in general.
- This may be due to the fact that the Logistics Industry tends to have very physically demanding job roles and a harsh physical environment (warehousing, trucking) which does not attract as many females.
- This is evident in industry articles:
 - $\circ\,$ Breaking through Barriers: Women in Logistics Industry Today Leader in Manufacturing & Industry News
 - \circ Why should women work in logistics? Logistics Management (logisticsmgmt.com)
- To increase the visibility of women in this industry we look to recruit to our advisory board and logistics conference speakers.
 - We currently have three active female advisory board members and will have added another three to the advisory board this Fall 2023.
 - Shanel Pistorious, Distribution Manager Nature's Way
 - Lindsay Bradley, Founder of Guided Arrows
 - Shannon Legace, SAIA LTL Freight Business Development Executive
 - · We also have several female speakers participating in the annual conference including our upcoming April 2024 conference line up including:
 - · Lindsay Bradley, Founder of Guided Arrows
 - Guided Arrows. People & Culture Support for Small Business.
 - Cathy Norris, Leadership Coach
 - About Emotional Wellbeing at Work
 - Amber Barnes, Founder and CEO of Start Human
 - StartHuman



- The program population of full-time to part-time students is roughly equal to the overall TMCC population course load.
- This is more of a community college or two-year institution trend than a TMCC or Logistics Program trend. These colleges tend to attract the non-traditional student who is working, often full time, and going to school part time and trying to balance work/school/family commitments. This meets a real need in the community for folks wanting to improve their economic situation but cannot afford to go to school full time.
- We reviewed the last two student course evaluations in Spring (2022, 2023) and over 70% indicated they are working 31 plus hours per week while taking logistics courses.
- To promote students taking more credit hours the Frank N. Bender scholarship committee gives a higher scoring weight to students taking a full credit load versus part time.
- As a program that offers a one-year certificate, two-year AAS, and the four-year BAS, students can continue in the program and declare for their BAS so we expect to have a high proportion of students continuing in the program.
- Some of the AAS students are transferring to a four-year institution like UNR to complete their bachelor's degree in Supply Chain Management or similar degrees
- The lead instructor has written letters of recommendation for two students who have gone on to UNR's Graduate School (Masters, Doctorate) after completing their BAS in LOM at TMCC

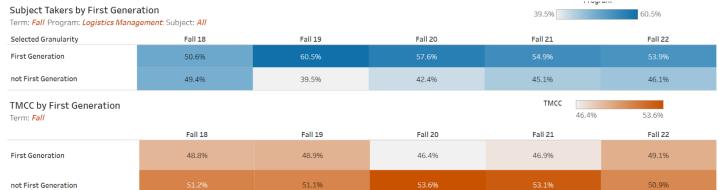
				Pro	gram
Program Majors by Age Range)			2.9%	43.1%
Term: Fall Program: Logistics Manag	ement.				
	Fall 18	Fall 19	Fall 20	Fall 21	Fall 22
18-24	18.8%	20.6%	16.7%	25.0%	20.8%
25-34	36.2%	32.4%	37.9%	35.3%	43.1%
35-49	42.0%	39.7%	37.9%	30.9%	29.2%
50+	2.9%	7.4%	7.6%	8.8%	6.9%
TMCC by Ago Dongo				TMCC 2.4%	54.6%
TMCC by Age Range					
Term: Fall					
	Fall 18	Fall 19	Fall 20	Fall 21	Fall 22
<18	7.1%	12.7%	15.0%	11.8%	13.6%
18-24	54.6%	52.9%	51.4%	52.8%	52.2%
25-34	23.9%	22.2%	22.8%	23.6%	21.4%
35-49	10.5%	9.0%	8.4%	9.3%	9.8%
50+	3.9%	3.3%	2.4%	2.5%	3.0%

- While the 18-24 year old range has increased from 18.8% to 20.8% this program tends to attract a much older student population than TMCC's overall student population. Many of our program students are already working in the logistics industry and are looking to take the next step in their career. With our stackable degree options this program is well suited for this type of student. For example, an entry level picker and packer on the warehouse floor may decide they would like to become a shift lead or quality inspector. They find the position to be somewhat competitive and so they choose to get the one-year certificate. They then work as a lead for a year or so and they, or their manager, determines they would be a good candidate for a supervisory position; however, that position requires an associate degree to be considered for an interview. They then decide to go back to TMCC to get their AAS. They can then apply all of the credits from their certificate and only have one more year to complete their AAS. Then after being a supervisor for a few years they would like to get into management and would need a bachelor's degree to interview. They can then apply their credits from their AAS to the BAS and only have to take 2 more years to complete their bachelor's degree. We call this the "step in step out" degree and many students have done exactly this. This is why our students tend to be older than the typical inexperienced TMCC student.
- Many of our students are Veterans with experience coming out of the logistics arms of all the branches of service and need the diploma in order to apply to managerial positions inside of companies they are already working for.
- Several efforts are being made to attract the 18-24 cohort:
 - The Nevada Department of Education now has an Office and Logistics Management Standard so that Nevada High Schools can offer Logistics courses in the Junior and Senior Year of High School students. https://doe.nv.gov/uploadedFiles/ndedoenvgov/content/Boards_Commissions_Councils/State_Board_of_Education/2022/September/ Logistics Management STDS SBE.pdf
 - This will help to create a greater awareness of Logistics as a career path and can lead some high school students to want to continue their academic career in Logistics.
 - TMCC was also chosen as a backbone organization for the Federal and State Good Jobs Northern Nevada Grant. The Logistics Career Navigator, Neil Oscarson, works for the Business and Social Science Dean, Amy Williams, and is tasked with building the CTE Workforce Development requirements for Logistics Companies in Northern
 - o GJNN Home Nevadaworks (goodjobsnorthernnevada.org)
 - This will develop a pipeline of employees taking logistics related CTE training including: OSHA, Forklift Training, and a Supply Chain Introduction Course that will enable
 employers to hire logistics professionals. We expect some of these employees to want to continue their educational career with TMCC after getting these entry-level logistics
 jobs.



- It appears that the program has more Pell eligible students than the general population at TMCC.
- It appears that the students can be well-served by the Frank N. Bender Scholarship which has awarded around \$10,000 in scholarships each year. One of the criteria is weighted based on expected family contribution (EFC score) in the scoring formula used by the scholarship committee:

	Ameliana ID	CDA C	FECC	Degree Program and	Average Essay	Weighted	Carrie Bank	Recommended Award (for full
	Applicant ID	GPA Score	EFC Score	Credits Score	Score 💌	Score 💌	Score Rank	year, 1/2 each semester)
	1002249741	2.959	20	15	16.0	54.0	1	\$ 1,000.00
	8001042822	3.2	2	12	16.7	33.9	6	\$ 1,000.00
•	1002900183	3.41	10	15	17.3	45.7	3	\$ 2,000.00
	1002835391	3.69	8	12	18.2	41.9	4	\$ 2,000.00
	5005640518	3.98	20	12	15.2	51.1	2	\$ 500.00
	1000802386	3.46	2	15	16.2	36.6	5	\$ 1,500.00
								\$ 8,000.00



- It appears that the program has more first generation students than the general population at TMCC.
- It is recommended that the scholarship committee consider this as a possible scoring factor in the scholarship weighted score now that this can be identified in the system.
- Describe the demographics of the program's faculty compared to the demographics of the program's students.
 - o Currently there is one full-time tenured faculty member who is a Caucasian male.
 - o Only two candidates qualified for the full-time temporary logistics faculty position (Spring 2024) and were interviewed. Both were male.
 - o One of the interviewed candidates was a minority ethnicity.
 - The interview committee considered both the pros and cons of both candidates and chose to extend the job offer to the non-minority candidate with the caveat that if he did not accept the offer then the offer will be extended to the minority candidate. Both received job offers and both were turned down due to salary and mode (one only wanted to teach online).
 - o A reposted opening drew an additional two while male candidates qualified for interview and the job was offered and accepted by one of them.
- . Discuss teaching methods and other practices used by the program's faculty to cultivate a welcoming, safe, and inclusive learning environment.
 - Lead instructor was nominated by students as a career champion:

It's official: you are a Career Champion! Since 2020, we have asked students to nominate their Career Champions, and you were nominated previously as supporting your students in their academic and career goals. Congratulations!

Here is what your nominator(s) had to say about you:

"I am proud to nominate Professor Brian Addington as a Career Champion. His support, influence, and inspiration have been invaluable to me as I pursue a graduate degree. He has always gone above and beyond in his commitment to his students, demonstrating an unparalleled level of care and attention to their individual needs. He has taught me invaluable lessons about the importance of hard work and dedication, and I am incredibly grateful for the knowledge he has shared with me. Professor Addington is a truly remarkable mentor and deserves to be recognized as a Career Champion." ~Michelle Ramirez

We have attached your Career Champion certificate(s).

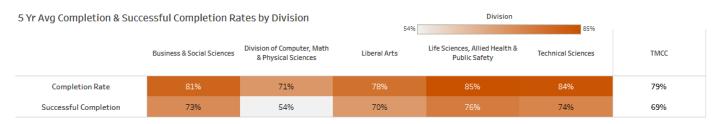
Thanks for all you do to support our students and campus community.

• As the lead instructor in the program I care deeply about my students and their ability to feel included at TMCC and the program. I gladly meet with students to discuss not only their academic journey but also their personal journey and challenges and understand that life can be difficult and students need to be heard as human beings and not just as students as they have many roles to fulfill. I try to help them with all of the wrap-around services that TMCC offers and make all of our part-time instructors that I mentor aware of all these services as well to ensure students know of all the support they can receive at TMCC.

V. STUDENT SUCCESS

5.A. Course Completion Rates: Version by Williams, Amy on 12/14/2023 21:38

	Outcomes: Course Completion Rates											
Program	Program Subject Level											
Logistics	Management				▼ (AII)			• L	y Acade	mic Year		•
The tables below show the percent of students completing your courses. These numbers are compared to all divisions and to TMCC as a whole. The metrics can be disaggregated by the demographics below. **Completion Rate:** The number of students who remain in a class until the end of the semester and receive A, B, C, D, Pass (P), Satisfactory (S), In Progress (X), Incomplete (I) or Audit (AD) grade notations. **Successful Completion:** The number of students who completed a course with a C or better (A, B, C).												
Gender		Ethnicity		Credit Load		Age Ra	inge	Student Status	Fir	rst Generation	Pell Eligible	
(AII)	•	(AII)	•	(AII)	•	(AII)	•	(AII)	· (/	All) •		•
_		& Successfu Management S	I l Completion R Subject: All	Rates by S	Subject			74%	Pro	gram 100%	6	
Subject			AY 18-19 AY		AY 19-20 AY		AY 20-21 AY	AY 21-22 AY		AY 22-23 AY	5 yr Avg	
LGM	Completion	Rate	83%		85%		92%	93%		90%	88%	
	Successful	Completion	74%		79%		86%	82%		83%	81%	
SCM	Completion	Rate	100%		100%		100%	100%		100%	100%	
	Successful	Completion	100%		100%		100%	100%		100%	100%	



Please discuss any trends or shifts that you see in the overall course completion rate, and successful completion (C or better). What might these trends or shifts mean?

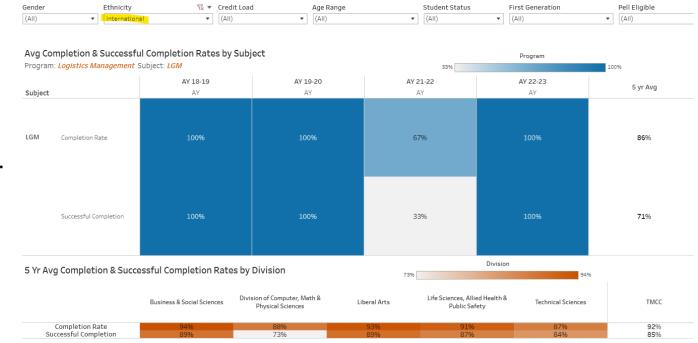
Next, disaggregate the data by student demographics. Discuss any potential equity gaps and your plans for closing these gaps. An equity gap is where there is a significant and persistent disparity in access or achievement between different groups of students.

Please discuss any trends or shifts that you see in the overall course completion rate, and successful completion (C or better). What might these trends or shifts mean?

• Completion rate trends are positive for the program (88% and 81%) and above the TMCC overall completion rates (79% and 69%).

Next, disaggregate the data by student demographics. Discuss any potential equity gaps and your plans for closing these gaps. An equity gap is where there is a significant and persistent disparity in access or achievement between different groups of students.

· All ethnicities are performing above their TMCC overall population peers except for international students which has a very small sample size of seven over the past five years.



- International students are a very small sample size of seven over five years so it may be difficult to draw any conclusions at this time.
- · All other demographics (gender, credit load, age range, first generation, and Pell eligible) are performing above their TMCC overall population peers.
- The only demographic which appears to be performing below their TMCC peers is new student status:

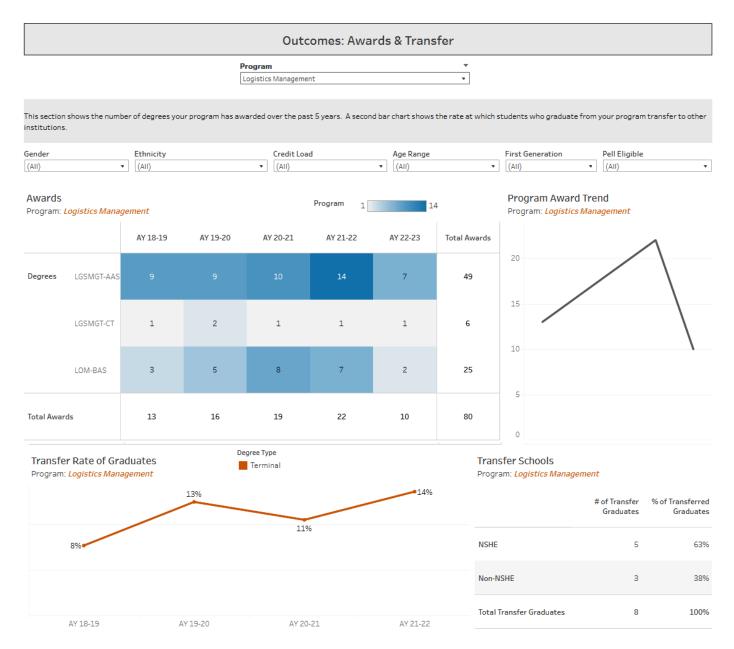


New and first generation students in the program are performing below their TMCC peers.



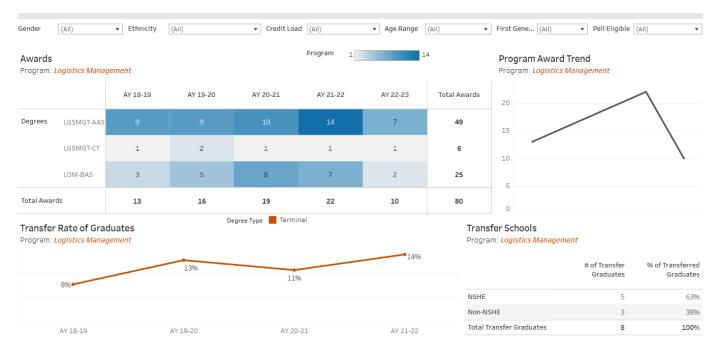
- New and Pell eligible students in the program are performing below their TMCC peers.
- It appears that new, first generation, and Pell eligible students are performing well below their TMCC peers in this program.
- It is recommended that students in these demographic groups (new, first generation, Pell eligible) be identified as early as possible in their academic journey and made aware of (tutoring center class visits, etc. and given the opportunity for support such as:
 - o The Learning Commons and the Tutoring Center
 - o Academic Advising
 - o Disability Resource Center
 - Veteran's Services
 - o TMCC Counseling Center
 - Financial Aid
 - Student Services and Organizations
 - o Faculty advisors and mentors
- This committee feels that the sample size of this data is too small to draw confidence in any conclusions.

5.B. Graduation and Transfer: Version by Addington, Brian on 11/28/2023 17:09



Please discuss any trends or shifts that you see in the number of graduates and graduates who have transferred in the past 5 years.

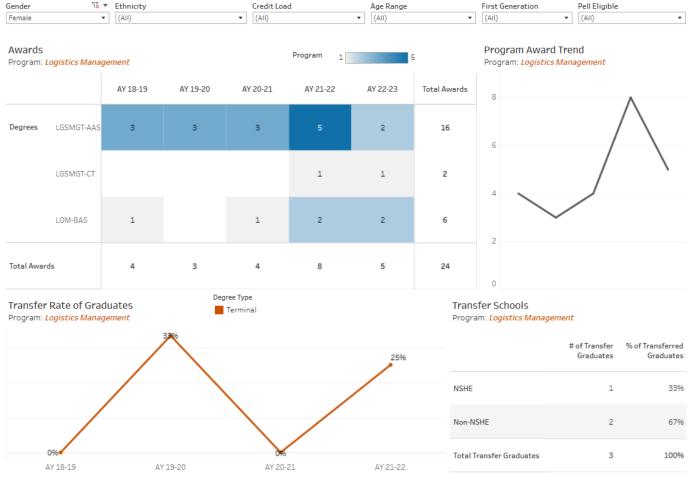
Next, disaggregate the data by student demographics, and discuss any potential equity gaps: Which student populations are earning degrees or certificates compared to the demographic makeup of the program? Do graduates resemble the student demographics of the program? If not, discuss ideas to mitigate potential equity gaps.



Gaps

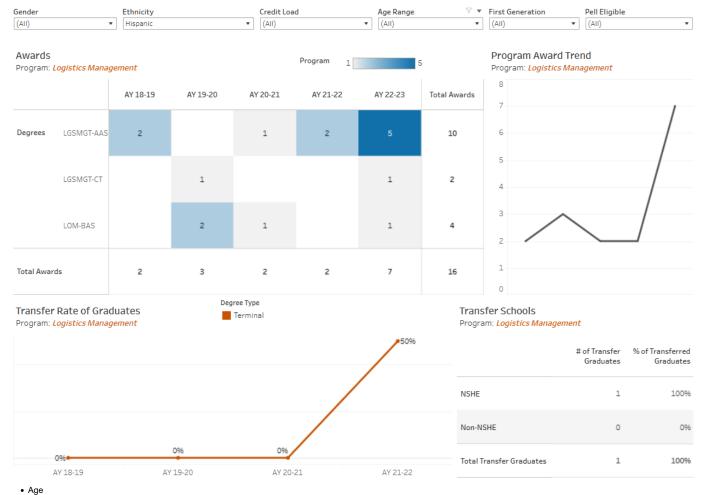
Gender

While females make up 44% of the enrolled population they only achieved 30% (24 out of 80) of the awards (CoA, AAS, BAS).

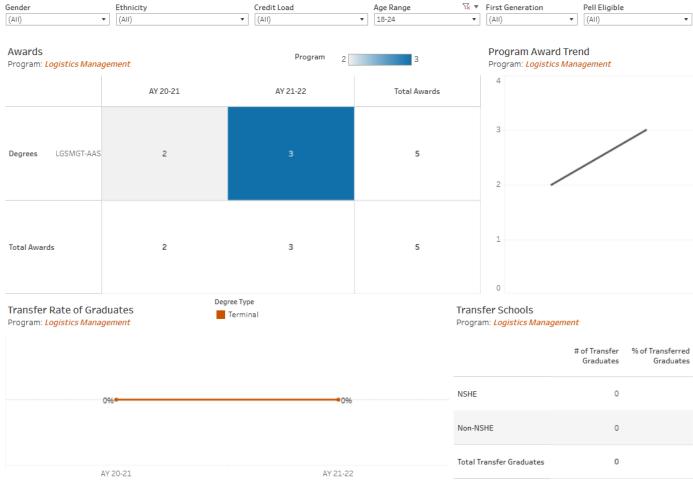


Ethnicity

[•] While Hispanics make up 24% (16 out of 80) of the enrolled population they only achieved 20% of the awards (CoA, AAS, BAS).



o While students aged 18-24 make up 20% (5 out of 80) of the enrolled population they only achieved 6% of the awards (CoA, AAS, BAS).



Recommendation:

- Determine why certain student populations are underperforming.
- . To determine what needs to be done to support these student populations first we need to determine why they are underperforming.
- · May need institutional research department's help in surveying these identified populations to ask why they are not completing:
 - Female
 - Hispanic
 - o 18-24 years old
- This committee feels that the sample size of this data is too small to draw confidence in any conclusions

VI. RESOURCES

6.A. Faculty Achievement: Version by Williams, Amy on 12/14/2023 21:38

Describe the program/unit's full-time (FT) faculty credentials, experience, and highlights of significant activities and/or contributions to TMCC. Please use the format below for each FT faculty member.

- Faculty Name, FTE
- Degree(s) or professional certification(s) awarded, discipline, awarding institution
- Number of years teaching at TMCC
- Total number of years in academia
- · Primary courses taught
- Significant activities or contributions made to TMCC (Please limit to 3)
- Substantial accomplishments or contributions to the community, especially those related to education or your discipline (e.g. mentoring, community service) (Please limit to 3)
- Faculty Name, FTE
 - ∘ Brian Addington, MBA MPM
 - https://www.linkedin.com/in/baddington (https://www.linkedin.com/in/baddington)
- Degree(s) or professional certification(s) awarded, discipline, awarding institution
 - o 2009-2012 Washington University in St. Louis
 - MPM, Masters in Project Management
 - Project Management | Sever Institute at WashU (wustl.edu) (https://sever.wustl.edu/degree-programs/project-mgmt/index.html)
 - 1999-2001 Washington State University College of Business and Economics
 - MBA, Management Information Systems
 - Management, Information Systems, and Entrepreneurship Dept. | Carson College of Business | Washington State University (wsu.edu) (https://business.wsu.edu/departments/mise/)
 - 1986-1991 Oregon State University

- Bachelor of Science (B.Sc.), Business Administration, Operations Management
- College of Business | Oregon State University (https://business.oregonstate.edu/)
- Number of years teaching at TMCC
 - 8 years at TMCC
- · Total number of years in academia
 - o Teaching in academia 9 years
 - One semester teaching Business Management at University of Idaho
 - One semester teaching Introduction to Inventory Management at Washington State University
- · Primary courses taught
 - Logistics Management Courses at TMCC: LGM 201, 202, 208, 209, 210, 320, 330, 340, 352, 420, 440, 450 470, 490, 491 and BUS 330 and SCM 474
- Significant activities or contributions made to TMCC (Please limit to 3)
 - o (#1) Director of the Frank N. Bender Center for Applied Logistics Management
 - Promote and manage student internships with local companies
 - Plan and execute the annual Logistics Leadership Conference every Spring (Except Covid)
 - Manage Frank N. Bender Endowment for Student Scholarships awarded each year
 - Use Frank N Bender gift funds to promote the TMCC Logistics program including developing marketing materials, videos, and marketing campaigns.
 - Developed a very active Logistics Business Advisory Board which supports fundraising and promotion of the program and TMCC.
 - o (#2) Participated on the Web College Faculty Committee for the past six years and helped develop the online teaching faculty standards.
 - (#3) Asked by TMCC President Karin Hilgersom to participate on the Vice President of Finance budget recommendation committee during Covid to analyze and propose the impact of removing the office of the VPFA.
- Substantial accomplishments or contributions to the community, especially those related to education or your discipline (e.g. mentoring, community service) (Please limit to 3)
 - o Asked in 2021-2022 by the Nevada Department of Education to help develop the High School education standard for Office and Logistics Management.
 - Nevada CTE Logistics Management Standards (https://doe.nv.gov/uploadedFiles/ndedoenvgov/content/Boards_Commissions_Councils/ State_Board_of_Education/2022/September/Logistics_Management_STDS_SBE.pdf)
 - See Page 4 for acknowledgement
 - o Asked to participate on the national Advance CTE Industry Advisory Group as a subject matter expert for the Transportation and Logistics Council.



Jeffrey Alexander < jalexander@tmcc.edu>

Fri, Aug 18, 8:23 AM

☆ ←

1

to Jared, Julie, Stephanie, me, Natalie, John, Julie, Amber, Amy, Anne, Araceli, Melissa, Kimberley, Kyle, Karin, Gretchen, Stuart 🕶

Hello Jared, Julie, Stephanie, and Brian,

Vice Chancellor Davis has sent her thanks and congrats to you on being selected to serve on your respective CTE Industry Advisory Groups within the Advance CTE "Career Clusters Framework." Craig Statucki at NDE shared the good news with CTE leaders at NSHE, GOED, and DETR yesterday. The four of you comprise half of Nevada's reps to these national CTE groups!

Thank you for representing your disciplines and workforce sectors on these national groups, and thanks for participating in their upcoming workshops.

The announcement from the Career Clusters Framework with a link to the full IAG member listings appears below.

Thank you and have a great weekend,

Jeff

Jeffrey Alexander, Ph.D. Vice President of Academic Affairs Truckee Meadows Community College LinkedIn profile

6.B. FT/PT Faculty and Student Credit Hours Taught: Version by Williams, Amy on 12/14/2023 21:38

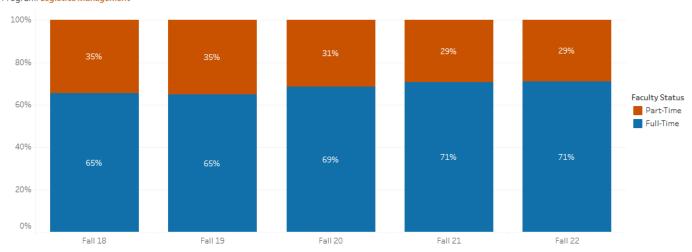
Describe the trends or shifts in the number of full-time (FT) and part-time (PT) faculty, and the number of student credit hours (SCH) taught by FT and PT faculty since the last program/unit review. What Impact, if any, have these trends or shifts had on the program/unit?

Faculty Workload

Program	√× ▼	Term	
Logistics Management	•	Fall	•

Student Credit Hours

Program: Logistics Management



The above section shows the percent of student credit hours that were taught by Full-Time vs Part-Time faculty within your program's subject area. These student credit hours are not necessarily enrollments of your declared majors, they are enrollments by all students taking your courses. Student credit hours are defined as the sum of (enrolled students x units).

Headcount & FTE

Program: Logistics Management

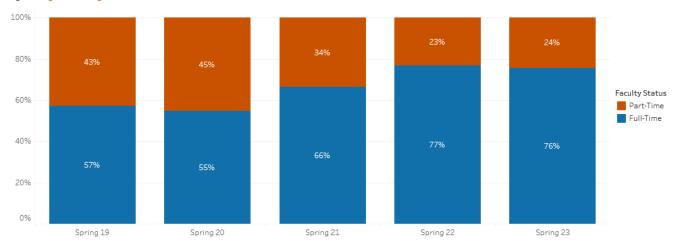
	Full-Time		Part-	Time
	Headcount	FTE	Headcount	FTE
Fall 18	2	1.8	1	0.4
Fall 19	2	2.2	1	0.4
Fall 20	2	2.0	2	0.6
Fall 21	2	1.6	1	0.4
Fall 22	2	1.6	1	0.4

Faculty Workload

Program		Term	•
Logistics Management	•	Spring	•

Student Credit Hours

Program: Logistics Management



The above section shows the percent of student credit hours that were taught by Full-Time vs Part-Time faculty within your program's subject area. These student credit hours are not necessarily enrollments of your declared majors, they are enrollments by all students taking your courses. Student credit hours are defined as the sum of (enrolled students x units).

Headcount & FTF

Program: Logistics Management

	Full-T	ime	Part-Time		
	Headcount	FTE	Headcount	FTE	
Spring 19	2	1.6	3	0.8	
Spring 20	1	1.4	3	0.8	
Spring 21	1	1.4	2	0.6	
Spring 22	1	1.4	2	0.4	
Spring 23	1	1.4	2	0.4	

While there is only one full time faculty member dedicated to Logistics, full-time faculty teach the majority of course hours with Brian Addington tenured faculty teaching the majority of logistics classes along with Lisa Buehler tenured faculty teaching the finance classes. We expect that with the hiring of a full-time temporary logistics instructor in the Spring 2024 that this percentage of full-time hours will continue to increase.

6.C. Support Staff: Version by Williams, Amy on 12/14/2023 21:38

Describe the program/unit's support staff, including their FTE, major duties, and any specialized credentials necessary to carry out their duties. Is the number of staff adequate to support the program/unit? Explain.

The logistics program is located in the Business Department and is well supported by the Dean, Amy Williams, and Chair Fred Lokken. In addition, the program is supported full time by the Business Department Admin Jean Lampson and part time by Dean Amy Williams Admin Sara Gill. For the current size of the program we feel support is adequate at this time.

Also, the marketing and marketing material for the Annual Logistics Leadership Conference is fully supported by the TMCC Marketing program with graphic design, web design, social media, media referrals, video, and brochures.

6.D. Facilities and Technology : Version by Williams, Amy on 12/14/2023 21:38

Describe the facilities and technology used by the program/unit, and discuss any unique requirements. These may include labs, studios, off-campus sites, computer classrooms, specialized equipment, etc. Are program/unit facilities and technology adequate to support the program? Explain.

This program has adequate facilities and technology for its needs, including the conference room suite location at Meadowood North Suite 201A for advisory board meetings and small classroom if needed. With the program moving to 100% online completion the technology needs are very dependent on TMCC Web College implementation of its LMS system Canvas and its add-ons. Key technologies being used and explored for online courses are:

- DesignPLUS utilizing design templates and forms to make online classes more professional and easier for students to navigate.
- UDOIT for accessibility features and providing more accessible online classes.
- Kaltura Capture to capture faculty lectures and feedback for students. And to increase retention rate by providing more connection between students and instructors.
- Utilizing synchronous discussions and online meeting rooms (Zoom, Canvas Collaboration Tools, Big Blue Button)

VII. FUTURE DIRECTIONS

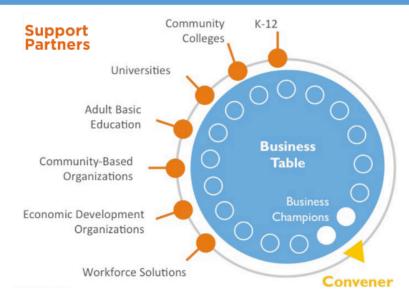
7.A. Five-Year Plan: Version by Williams, Amy on 12/14/2023 21:38

Using your analyses from previous sections, develop a 5-year plan for the program(s). Include an estimated timeline of goal completion. Please address the following questions:

- Using the most significant curriculum and assessment findings, describe strategies to sustain or improve student learning.
- After considering the most significant enrollment findings, discuss strategies, if needed, to improve enrollment and close equity gaps. These may include more efficient
 scheduling, streamlining pathways to completion, outreach to underserved students, addressing internal or external factors anticipated to impact future enrollment, etc.
- With respect to course completion rate, graduation, and transfer, discuss strategies to enhance student success and close equity gaps. These may include curriculum changes, pedagogical changes, streamlining pathways to completion, improving advising, mentoring, retention efforts, etc.
- Considering the above strategies, what are the major goals that the department/unit hopes to accomplish in the next 5 years? Include an estimated timeline for
 completing goals. How does the department or unit plan align with the Academic Affairs Strategic Plan (https://www.tmcc.edu/flipbook/master-plan/vpaa/) or the
 College's Strategic Master Plan (https://www.tmcc.edu/accreditation/strategic-master-plan)?
- (#1) Increase program enrollment with new student pipelines
 - Development of two new student pipelines.
 - Good Jobs Northern Nevada Grant TMCC was designated the Logistics Education Backbone with Neil Oscarson being hired in 2023 as grant manager reporting to Dean Amy Williams.
 - This program is focused on Workforce Development non-credit courses such as Forklift Training, CDL, Occupational and Material Handling Safety, and an Introduction to Supply Chain and other subjects as identified by the business roundtables.



INDUSTRY-DRIVEN, COMMUNITY-SUPPORTED SECTOR PARTNERSHIP



- These programs are in development for Spring 2024 with Neil Oscarson the Grant Manager working with TMCC EPIC and other partners and will help employers develop entry-level workers to the logistics industry (warehousing, distribution) and we expect a certain percentage of those students who have had a positive experience with TMCC to want to continue their education and pursue the next level with a Logistics certificate, AAS or BAS.
- Goal: as these courses will not begin until 2024 we do not expect to see these students until 2025 or 2026 at the soonest.
- Nevada Department of Education Office and Logistics Education Standard
 - $\circ \ \ \text{Logistics courses can now be offered in Nevada High Schools using the recently published Logistics standard.}$
 - This will expose students to the Logistics field as a career option and will increase high school student inquiry into Logistics educational opportunities including TMCC.
 - Goal: by 2025/2026 reach out to local high schools and schools across the state to see if they are interested in adopting the standard and implementing Logistics courses for their students.
- (#2) Market the online degree program to students outside of the region and the state.
 - The online program can be offered to students in Las Vegas or other areas of the state.
 - The online program can be offered to students outside of Nevada.
 - A study will need to be conducted to determine how affordable the online degree option can be. (Goal 2026)
 - A study will need to be conducted to determine what advertising options are available in industry magazines and websites such as the following: (Goal 2026):

Find a Logistics Education Program - Inbound Logistics (https://www.inboundlogistics.com/find-a-logistics-education-program/)

- o Audience AGiLE Business Media (https://www.agilebusinessmedia.com/dcv/audience/)
- (#3) Continue to Increase active business engagement in the program
 - Continue to increase the number of advisory board members.
 - By Fall 2023, we have increased the number of board members from 14 to 23 and have moved to a larger conference room for our board meetings
 - Active business members engage their companies to help raise funds for student scholarships by sponsoring the Annual Logistics Leadership conference by buying tables and sponsoring events like the networking wine and cheese event.
 - · Active board members engage with our students by supporting their research surveys and by providing internships.
 - The best recruiting tool for board members has been the Logistics Conference.

(#4) Determine why certain student populations are underperforming.

- · To determine what needs to be done to support these student populations first we need to determine why they are underperforming.
- · May need institutional research department's help in surveying (Goal 2026/2027) these identified populations to ask why they are not completing:
 - Female
 - Hispanic
 - o 18-24 years old

VIII. RESOURCE REQUESTS

8.A. Resource Requests: Version by Williams, Amy on 12/14/2023 21:38

Identify any resource requests. For each request, please indicate whether the request is for an additional faculty and/or staff position, capital improvements (facilities), technology or specialized instructional resources, or professional development. Address the following items:

- · Request (Additional faculty/staff, capital improvements, technology or other specialized instructional resources, or professional development)
- Estimated time to hire or time the request will be made.
- Projected measurable outcomes. Which PLOs and/or student success metrics does the department hope to improve as a result of the request?
- Alignment to the Academic Affairs (https://www.tmcc.edu/flipbook/master-plan/vpaa/) or College's Strategic Plan (https://www.tmcc.edu/accreditation/strategic-master-plan)

Resource Request for Goal #1- New student pipelines

- Continued Good Jobs grant funding for TMCC as a backbone agency and Neil Oscarson as the grant manager.
- Funding and support resources from the TMCC EPIC department for Neil Oscarson to develop the non-credit courses identified by the business roundtables and TMCC facilities to hold the courses.
- · Help needed in engaging Nevada High School administrators to gauge interest in holding logistics courses in their high school.

Resource Request for Goal #2- Market online degree program

- Resource to help to develop studies of affordability and appropriate marketing channels.
- The Advisory Board will be approached after studies completed above to approve a marketing budget to place advertising identified. CALM Foundation Account funds are available and may be used as approved by the CALM Finance Committee.
- TMCC Web Design will be needed to help design an online program landing page that can be used to advertise the affordability of the degree and be referenced by the marketing campaign ads and social media to direct online students for enrollment and program information.

Resource Request for Goal #3 - Business engagement

- Funds will need to continue to be made available by the CALM Finance Committee to support the Annual Logistics Leadership Conference.
- CALM Finance Committee has agreed to increase funding for the 2024 Conference to \$12,000.
- Facilities will need to continue to have TMCC Facilities help setting up the Student Center for the conference and parking.
- Marketing will need to continue to have TMCC Marketing help for materials, web design, video, and press releases.

Resource Request for Goal #4 - Underperforming student populations

- Will need help from institutional research to survey the following student populations in the logistics program to ask what the barriers or challenges for these students are to completion:
 - Female
 - o Hispanic
 - 18-24 years old
- Will need a resource to help translate certain marketing material into Spanish.

FINDINGS AND RECOMMENDATIONS

Dean's Findings and Recommendations: Version by Williams, Amy on 12/14/2023 21:38

Academic Dean's Findings:

This Program Unit Review for Logistics has been done well with time spent on analyzing the program and sharing the strengths, weaknesses, goals and needs of the program. I appreciate the work of the committee, and the leadership of Brian Addington in this review. The field of logistics is one of the largest in our area and continues to grow. The demand for educated employees is very high and is not expected to do anything but grow in the coming years. As such, this program is an essential program at TMCC and by having three stackable awards we meet the education needs in our community through our offerings. The challenge is that though the need is great, we have struggled to get large numbers of students into this program. I have always believed that part of the problem is a lack of awareness of what Logistics is and what one can do with a degree in this field. As a CTE program as well as a high demand career industry, the program is eligible for grants which help with community awareness, instructional support and tuition costs for students.

Strengths:

Some of the many strengths of this program include:

- High demand industry in both our region and our state
- · High pay industry
- Three stackable awards
- Active advisory board
- · Successful annual conference
- Community awareness from industry, state and economic development authorities

- · Qualified and dedicated lead faculty member and part time faculty
- · Grants to support program, faculty and tuition are available

Areas for Improvement:

Areas that I see room for improvement include:

- Need to ensure part time instructors are also using accessibility resources and training opportunities
- The CALM center is not really being used for its intended purpose. There may be a need to explore if the original concept is not needed or if it just has not been prioritized.
- LGM 202 is a GE diversity class so GELOs are applicable to this program and need to be assessed. In this review it is marked as not applicable but it is.
- The program struggles to grow both enrollment and completions. Focus needs to be placed on both as there is a great need in our community.
- Younger students have a wide gap in success rates. Effort needs to be focused on helping them through. Is the content not resonating with the younger students in ways that they
 understand?
- OER is not being used so there is opportunity to find OER to replace some textbooks in the program and save students money.

Summary Action Recommended (Continue program(s), significantly revise, discontinue, etc. followed by explanation):

There is no doubt that this program should be continued and that there is value and need for all three awards. The program meets an urgent and ongoing need in our community and is recognized as the primary training provider in this industry in Nevada.

Recommendations and Implementation Timeline:

I agree with five year plan recommendations proposed by the committee and have provided comments on each area.

(#1) Increase program enrollment with new student pipelines (ongoing, starting immediately)

Although I am still hopeful, I do not think the Good Jobs Northern Nevada grant is going to bring a large new student pipeline into TMCC. However, as the non-credit short term certificate starts being offered in early 2024 it will be very important to use those classes as an opportunity to market the program to these students as it may bring a few in. We could possibly explore giving credit for prior learning to these completers for at least an elective course and seek out grant funding to support them through the next step of the education pathway. I do agree that targeting high school students and working with high schools to consider a logistics component will be important in developing a continuous pipeline of students into the program.

(#2) Market the online degree program to students outside of the region and the state. (ongoing, starting 2024)

It is very important to do everything possible to market the program in and outside of our community. There is no need to delay this as now is our best opportunity, before UNR has a fully developed degree to compete with. There is no research that needs to be done to determine costs of the program. All costs are always available on our website. We have some funds to cover marketing of this program in the current and coming academic year.

(#3) Continue to Increase active business engagement in the program (ongoing, starting 2024)

Continually engaging with industry and creating partners is essential for success. Advisory board members who will actively contribute and help are needed so culling those who are not active and adding new members who wish to really contribute is ideal. Continuing to grow the conference will keep industry involved with TMCC and aware of our programs as well. This gives us additional marketing opportunities through business leaders to employees who wish to grow their career opportunities as well.

(#4) Determine why certain student populations are underperforming. (analysis of problem 2024, pilot and evaluate solutions 2025, implement changes by 2026)

The gaps in women and Hispanic students are smaller and appear to be improving so the gap I find of most concern is the very large gap in the success rate of our youngest students. An analysis of why this may be and development of tools to improve the success rates of these students should be piloted and implemented as we determine what works best.

Resources Necessary for Implementation of Recommendations:

There are no resources requested outside of what is already available at TMCC and/or in this program. I have provided details below more for the benefit of the committee as there are no resource requests that need to be made that will cost additional funds or people support that we do not already have.

#1 No financial resources requested.

None of the resources requested for #1 require anything new. We already have the Good Jobs Grant funds through June 30, 2025 and state money should cover any needed funding beyond that to support these programs and students going through them. There are no additional funds needed for Neil as he is creating and teaching the program as part of his current full time job on the grant. For the help with the high school connections we will be able to use Kyle Cassinelli who works with CTE programming development and promotion.

#2 No financial resources requested.

All of the things requested can be done by marketing and web services at TMCC. Costs for tuition and fees are not flexible and so those can be quickly determined by anyone involved in working on this. We have a small amount of grant funds designated already for Logistics. As this is a CTE program it is fairly easy to get more as needed in addition to the fund that the program possesses.

#3 No financial resources requested.

The CALM Finance Committee, Facilities and Marketing can continue to provide the support needed as they always have.

#4 No financial resources requested.

Institutional Research and Marketing can facilitate a survey as requested. We have the resources to translate some marketing materials into Spanish if this is determined to be needed. This should be explored first as students do have to be able to communicate in and proficiently read English to be successful in the program as it is currently taught.

Impact of Recommendations on Division Planning:

There is no significant impact on division planning.

Impact of Recommendations on Program/Unit Faculty:

There is no significant impact on program faculty. Spring 2024-Summer 2025 a grant funded full time faculty member will join the Logistics program and can help support some of the discussed initiatives.

Academic Standards and Assessment Committee Findings and Recommendations : Version by Reddick-Lau, Jonathan on 05/17/2024 22:59

Academic Standards and Assessment Committee's Findings:

The Logistics Management program at TMCC provides students with the technical expertise and knowledge needed to meet the Northern Nevada operations and logistics industry technical workforce needs. The need for a regional logistics management workforce is clear as demonstrated by a 10.8% projected growth rate between 2018-2028. The LGM program has done an excellent job of working with community leaders and an advisory board to meet these workforce needs. These partnerships have resulted in a well attended annual logistics leadership conference held at TMCC. Implemented advisory board recommendations include the creation and approval of a new course - Logistics Project Management (LGM 440). The LGM programs focus on meeting workforce needs is further evidenced in many of their students finding jobs in the industry.

Student course completion rates and program FTE exceed those of the college and division. This trend is exemplified in high total numbers of AAS degrees awarded (49 total awards over a 5-year period). Well documented increases in the Hispanic, female and 18-24 y/o student populations reflect an inclusive program focused on access.

Course fill rates, especially in the upper-division courses for the BAS, are, however, low compared to the college and division. Responding to these low fill rates is a clear objective of the LGM program's 5-year plan. In order for the LGM program to continue on its current trajectory, while implementing plans to increase fill rates, the ASA committee recommends supporting all resource requests in the self-study.

Program Strengths:

- The program's FT Faculty member has been selected to participate on the national CTE Industry Advisory Group as a subject matter expert for the Transportation and Logistics
- The program has made remarkable progress towards the previous PUR recommendations.
- The program is now offering their CoA, AAS, and BAS degrees 100% online.
- The implementation of an annual logistics leadership conference has increased awareness of the program and generated revenue.
- There are well documented increases in the Hispanic, female and 18-24 y/o student population in the program.
- · Course completion rates surpass the division and college.

Areas of Concern or Improvement:

- Many PLOs have not been updated since 2010 and may need to be updated.
- · No assessment data is presented on student achievement of PLOs.
- Course fill rates are low (45%) relative to the college (70%) and division (66%).
- No actionable, assessment driven plan(s) to sustain or improve student learning is presented in the 5-year plan.
- · Per the dean, student interest does not match regional employee demand. This could be due to a lack of understanding about what Logistics is.

Recommendations:

- Revisit PLOs to ensure they are actionable and measurable. Example: BAS PLO 2 and 3 should be reviewed and possibly revised. Revisit PLOs from 2010 to ensure that they still
 reflect the program curriculum.
- · Please show PLO assessment data and discuss how these results are being used to improve student learning at the program level.
- The ASA Committee would like to see assessment driven actionable plans to improve student achievement in the 5-year plan.
- Identify strategies to increase student awareness of and interest in logistics to meet regional employee demand.
- The ASA committee recommends supporting all resource requests in the self-study. Particularly salient requests are those support goal #1 and goal #4. These are focused on increasing the LGM pipeline and narrowing achievement gaps.

Other comments:

No Value

Vice President of Academic Affairs' Findings and Recommendations: Version by Alexander, Jeffrey on 09/06/2024 23:23

VPAA's Findings and Conclusions:

(Include which of the ASA Committee's and Dean's findings and recommendations were upheld or not upheld.)

Logistics suffers from its own name -- Logistics, which few people understand. Still, the training it provides is invaluable and very much in demand. Our stackable credentials are useful, but may require some modification in order to maximize recruiting and enrollment. The BAS is a young program, and it has much potential. With some added marketing, recruiting materials and efforts, and student supports, this program has the ability to grow to a scale commensurate with the need in our community.

Strengths:

This program's key strength is its sole FT faculty member, Professor Addington, who is the pillar holding it all up. I am grateful to him for his work and his interest in meeting this vital workforce need. The students generally complete and pass their courses at rates above those of the entire college, but first-year and Pell-eligible students do struggle. The other key strengths are online access and the support of a robust advisory board. Finally, the CALM center is important and its annual Logistics Leadership conference is a very important means to promote the program, our role in this space, and the value of recruiting students and workers to the field.

Areas for Improvement

Firstly, the completion rate for the Certificate of Achievement is extremely low -- just one completer in each of the last several years. This suggests that the attractiveness and perceived utility of the CT is poor, and that it should be replaced by something more appealing, accessible, and completable -- a Skills Certificate. An SKC can be used as a recruiting tool, and also as a complementary job skill that students in other programs can earn, like Business. I recommend that the 30-credit CT be eliminated and a 15 to 21 credit SKC be added and marketed aggressively.

Next, this program needs to market itself robustly, statewide and beyond Nevada. I have seen online programs fare very well when they do this, particularly when they meet unusual or specialized training needs, like Library Science. Logistics is another example that can get real traction with students near and far. Professor Addington should meet with our new Marketing and Communications lead, Kylie Rowe, who is very eager to help promote programs to our community. Another effort that can be taken is to showcase Logistics for the WCSD population and teach them young what the term and the industry means.

Another area for improvement is the support needed by first-year and Pell-eligible students, who require much more help than their peers, and who appear to struggle in an online environment. Early and concerted outreach to them is needed, perhaps in partnership with Advising.

Finally, the program needs to expand the use of OER in order to bring down costs and help students to enroll and persist in their studies.

(Include whether the program should be continued, significantly revised, or discontinued, followed by a rationale.)

This program should certainly be continued. It is an area of significant need in our region, and by right-sizing the certificate and marketing it regionally and nationally, it can be a better recruiting tool for the AAS and ultimately the BAS. It can also serve as a complementary skill set for students in other programs, or who already have a degree. Upskilling is very important in this economy, but the shorter-term certs are carrying the day.

Resources Needed to Implement Recommendations Towards Program Improvement or Enhancement:

No major resources are requested here, but funds for marketing are needed and should be aligned to help promote this program regionally and nationally. Funds may also be needed to pay an interested PT instructor to help market the program to area schools. The CALM center can be an asset if its purpose is reexamined and its resources and efforts are better focused.