



Cycle: 2018-2021

CERTIFICATE IN APPLIED SCIENCE WITH A MAJOR IN INDUSTRIAL MAINTENANCE TECHNOLOGY

Program Mission Statement:

The Industrial Maintenance Technology program provides students with fundamental mechanical skills associated with entry-level maintenance positions and prepares students for careers in large manufacturing companies as industrial machinery and maintenance technicians. Industrial maintenance technicians keep machinery and equipment in the plant up and running so that production can continue

Division: Technical and General Education

AVP: Dan Averette

Department Chair: Shawn Reed

Director:

SACSCOC Standard: 8.2A

Accrediting Agency: Yes No

Name: NA

Certification Exam(s): Yes No

Agency Name: NA

Credential:

Program Student Learning Outcome	Monitoring Year
Determine the proper publication for guidance in the performance of the specific task assigned.	2018-2019
Combine basic theoretical knowledge and understanding of the Industrial Maintenance Field and practical laboratory experience to set up and repair industrial equipment and facilities.	2019-2020
Compare various electrical and hydraulic circuits and outline the differences between them.	2019-2020
Apply theory and the functionality of metering tools to troubleshoot mechanical, electrical, and electromechanical systems and repair them.	2020-2021

STUDENT LEARNING OUTCOMES FOR 47.0303 2018-2019

A. Program Student Learning Outcomes	B. What courses are PSLOs Assessed	C. Methods for Outcomes Assessment	D. Expected Level of Program Performance	E. Data Collection	F. Results	G. Plan For Improvement
What should the graduates of your program be able to do?	Where do you see evidence that the student can do these things?	How does your program evaluate student/graduate skills/abilities?	What is the expected level of student performance <u>for the program</u> ?	When will you collect the data needed to evaluate the performance of the program?	What are the results of the evaluation? NOTE: include student ratio with all results.	How will you use this information to improve the program
Determine the proper publication for guidance in the performance of the specific task assigned.	IMT 233	The IMT student will install, edit, and troubleshoot Programmable Logic Controllers.	100% of the student will score a 70% or greater on the PLC final lab assessment. (IMT 233)	Spring 2019	12 out of 12 students scored a 70 or greater, Class average 79.17%.	The expected learning outcome was met but we will add additional lab projects to reinforce this outcome.

STUDENT LEARNING OUTCOMES FOR 47.0303 2019-2020

A. Program Student Learning Outcomes	B. What courses are PSLOs Assessed	C. Methods for Outcomes Assessment	D. Expected Level of Program Performance	E. Data Collection	F. Results	G. Plan For Improvement
What should the graduates of your program be able to do?	Where do you see evidence that the student can do these things?	How does your program evaluate student/graduate skills/abilities?	What is the expected level of student performance <u>for the program</u> ?	When will you collect the data needed to evaluate the performance of the program?	What are the results of the evaluation? NOTE: include student ratio with all results.	How will you use this information to improve the program
Combine basic theoretical knowledge and understanding of the Industrial Maintenance Field and practical laboratory experience to set up and repair industrial equipment and facilities.	IMT 161	The IMT student will be introduced to typical equipment failure areas and how preventive maintenance can reduce those failures.	100% of IMT graduates will score a 70% or above on class exercise 4 IMT 161.	Fall 2019	Class average was 86.9% and all 18 of 18 students made a 70% or above.	The benchmark was exceeded. The faculty would like to investigate a different assessment tool to evaluate this PSLO in the future.

STUDENT LEARNING OUTCOMES FOR 47.0303 2019-2020

A. Program Student Learning Outcomes	B. What courses are PSLOs Assessed	C. Methods for Outcomes Assessment	D. Expected Level of Program Performance	E. Data Collection	F. Results	G. Plan For Improvement
What should the graduates of your program be able to do?	Where do you see evidence that the student can do these things?	How does your program evaluate student/graduate skills/abilities?	What is the expected level of student performance <u>for the program</u> ?	When will you collect the data needed to evaluate the performance of the program?	What are the results of the evaluation? NOTE: include student ratio with all results.	How will you use this information to improve the program
Compare various electrical and hydraulic circuits and outline the differences between them.	IMT 131	The IMT student will design, install, and test basic pneumatic and hydraulic circuits.	100% of IMT graduates will score a 70% or above on hydraulic lab project 3 IMT 131.	Spring 2020	Class average was 82.6% and 14 of 15 students made a 70% or above.	The benchmark for this PSLO was not met. The faculty will enforce remediation for students with high absenteeism before allowing them to take the test.

STUDENT LEARNING OUTCOMES FOR 47.0303 2020-2021

A. Program Student Learning Outcomes	B. What courses are PSLOs Assessed	C. Methods for Outcomes Assessment	D. Expected Level of Program Performance	E. Data Collection	F. Results	G. Plan For Improvement
What should the graduates of your program be able to do?	Where do you see evidence that the student can do these things?	How does your program evaluate student/graduate skills/abilities?	What is the expected level of student performance <u>for the program</u> ?	When will you collect the data needed to evaluate the performance of the program?	What are the results of the evaluation? NOTE: include student ratio with all results.	How will you use this information to improve the program
Apply theory and the functionality of metering tools to troubleshoot mechanical, electrical, and electromechanical systems and repair them.	IMT 140	Students will construct series and parallel circuits.	100% of the graduates will score a 70% or higher on lab exercise 7 series and parallel circuits in IMT 140.	FALL 2020	Class average was as follows: 96.6% for parallel circuits and a lower value of 80% for series circuits. However, the benchmark was met with 21 of 21 students scoring at 70% or above.	The faculty will enforce remediation for students with high absenteeism before allowing them to take the laboratory tests on Parallel and Series Circuits.

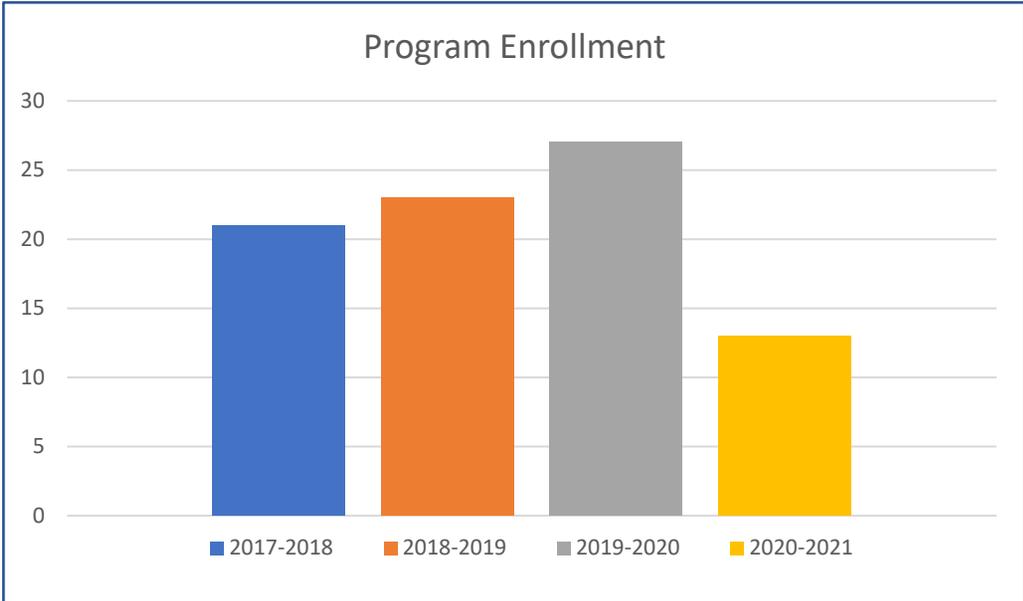
CONTINUOUS STUDENT IMPROVEMENT

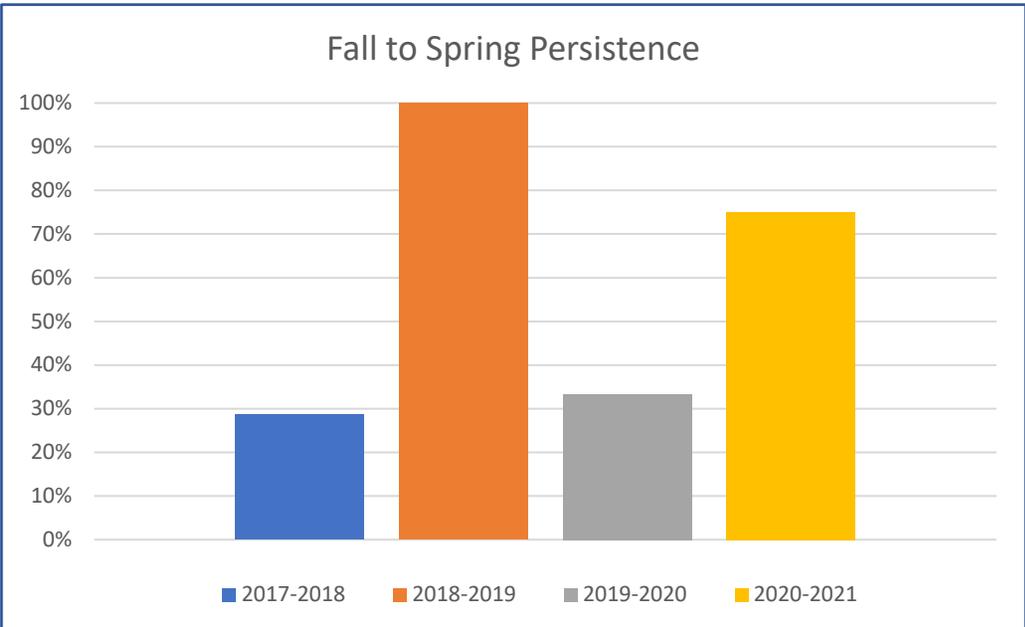
In comparison to the last cycle the IMT department has been able to identify the short falls in tracking student improvement. The program in this cycle has been focusing on more hands-on projects to evaluate student learning outcomes because we feel this approach gives us a more accurate method to determine mastery of the concept.

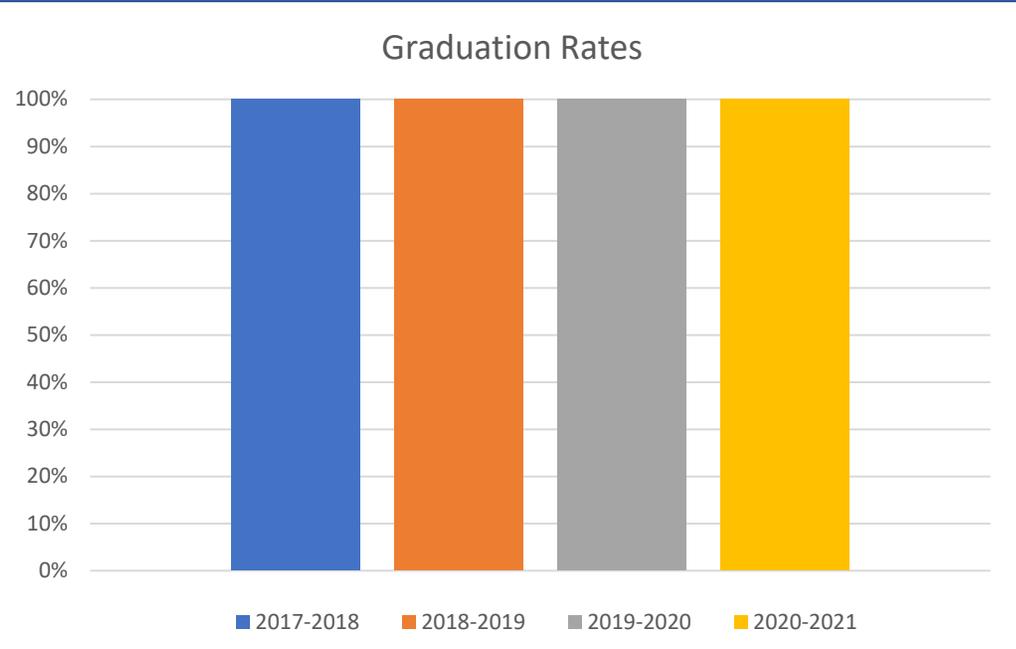
The program's one major shortfall from last cycle to this would be in the IMT 131 hydraulic lab project 3. The IMT students did struggle with the design, install, and test basic pneumatic and hydraulic circuits. The program has started to address this issue by requiring the students to inform the instructor the steps of completing the project before the first attempt.

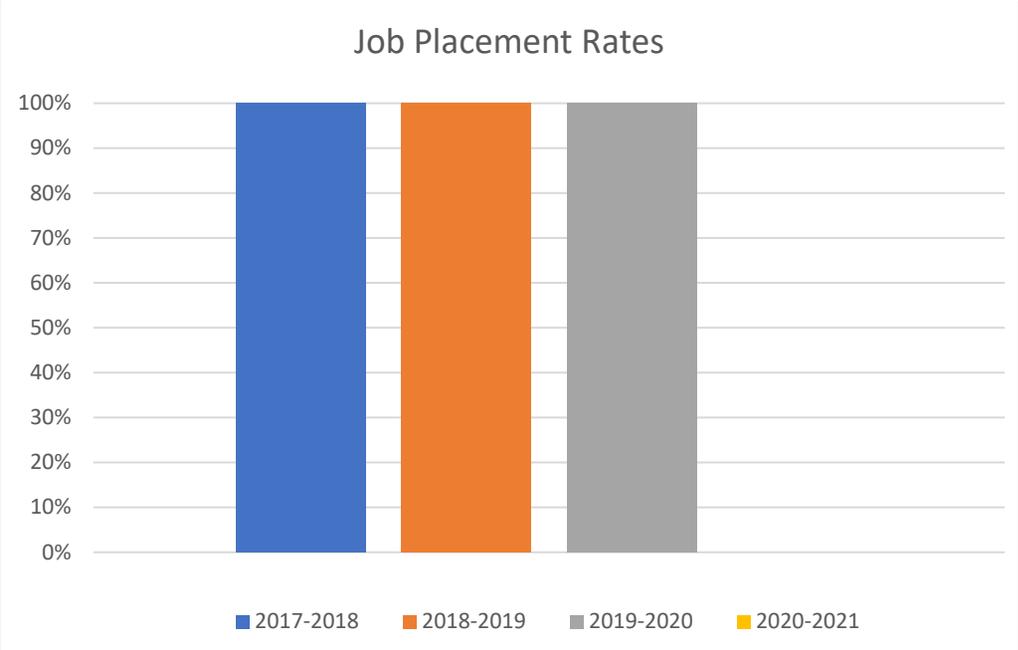
Overall, the IMT program feels that performance will continue to improve. All the IMT students from these different cohorts are working in the field.

PROGRAM VITAL STATISCS

Indicator	Trend Analysis	Action Plans										
<p style="text-align: center;">Program Enrollment</p>  <table border="1" data-bbox="142 154 1165 755"> <caption>Program Enrollment Data</caption> <thead> <tr> <th>Year</th> <th>Enrollment</th> </tr> </thead> <tbody> <tr> <td>2017-2018</td> <td>21</td> </tr> <tr> <td>2018-2019</td> <td>23</td> </tr> <tr> <td>2019-2020</td> <td>27</td> </tr> <tr> <td>2020-2021</td> <td>13</td> </tr> </tbody> </table>	Year	Enrollment	2017-2018	21	2018-2019	23	2019-2020	27	2020-2021	13	<p>The IMT program has a healthy enrollment for one instructor we did see a dip in enrollment for the 2020-2021 but those degree students and certificate students are in the same IMT cohort.</p>	<p>Will continue to reach out to local industry and high schools in hopes of increasing enrollment.</p>
Year	Enrollment											
2017-2018	21											
2018-2019	23											
2019-2020	27											
2020-2021	13											

Indicator	Trend Analysis	Action Plans										
<p style="text-align: center;">Fall to Spring Persistence</p>  <table border="1" data-bbox="142 181 1167 808"> <caption>Fall to Spring Persistence Data</caption> <thead> <tr> <th>Year</th> <th>Persistence Rate</th> </tr> </thead> <tbody> <tr> <td>2017-2018</td> <td>28%</td> </tr> <tr> <td>2018-2019</td> <td>100%</td> </tr> <tr> <td>2019-2020</td> <td>33%</td> </tr> <tr> <td>2020-2021</td> <td>75%</td> </tr> </tbody> </table>	Year	Persistence Rate	2017-2018	28%	2018-2019	100%	2019-2020	33%	2020-2021	75%	<p>The decrease in persistence in the 2019-2020 year could be related to the change of instructor and the increase of rigor added to the program.</p>	<p>Faculty will try to identify those students who are struggling in the Fall semester earlier and use both online and face to face tutoring methods to increase the fall to spring persistence rate.</p>
Year	Persistence Rate											
2017-2018	28%											
2018-2019	100%											
2019-2020	33%											
2020-2021	75%											

Indicator	Trend Analysis	Action Plans										
<p style="text-align: center;">Graduation Rates</p>  <table border="1" data-bbox="113 175 1129 824"> <caption>Graduation Rates Data</caption> <thead> <tr> <th>Year</th> <th>Graduation Rate</th> </tr> </thead> <tbody> <tr> <td>2017-2018</td> <td>100%</td> </tr> <tr> <td>2018-2019</td> <td>100%</td> </tr> <tr> <td>2019-2020</td> <td>100%</td> </tr> <tr> <td>2020-2021</td> <td>100%</td> </tr> </tbody> </table>	Year	Graduation Rate	2017-2018	100%	2018-2019	100%	2019-2020	100%	2020-2021	100%	<p>Graduation Rates shown are misleading since we have students that may start out in the certificate program and then change curriculum to the degree mid-year and all degree student also receive this certificate</p>	<p>The IMT faculty will make sure curriculum changes are done in a timelier manner.</p>
Year	Graduation Rate											
2017-2018	100%											
2018-2019	100%											
2019-2020	100%											
2020-2021	100%											

Indicator	Trend Analysis	Action Plans										
<p style="text-align: center;">Job Placement Rates</p>  <p>The chart displays job placement rates for three academic years. The y-axis represents the percentage of graduates placed in jobs, ranging from 0% to 100% in 10% increments. The x-axis lists the academic years: 2017-2018, 2018-2019, 2019-2020, and 2020-2021. The bars for 2017-2018, 2018-2019, and 2019-2020 all reach the 100% mark. The 2020-2021 bar is not visible, suggesting a 0% placement rate.</p> <table border="1" data-bbox="147 162 1165 812"> <thead> <tr> <th>Academic Year</th> <th>Job Placement Rate</th> </tr> </thead> <tbody> <tr> <td>2017-2018</td> <td>100%</td> </tr> <tr> <td>2018-2019</td> <td>100%</td> </tr> <tr> <td>2019-2020</td> <td>100%</td> </tr> <tr> <td>2020-2021</td> <td>0%</td> </tr> </tbody> </table>	Academic Year	Job Placement Rate	2017-2018	100%	2018-2019	100%	2019-2020	100%	2020-2021	0%	<p>Placement rates for this program has always been outstanding and the faculty does not see any reason for this to change.</p>	<p>The IMT faculty will continue to work closely with our local industries to insure placement of our graduates.</p>
Academic Year	Job Placement Rate											
2017-2018	100%											
2018-2019	100%											
2019-2020	100%											
2020-2021	0%											