Course Assessment Report Washtenaw Community College

Discipline	Course Number	Title
Auto Services (new)		ASV 134 06/13/2023- Automotive Transmissions
College	Division	Department
Advanced Technologies and Public Service Careers	e e	Transportation Technologies
Faculty Preparer		Rocky Roberts
Date of Last Filed Assessment Report		

# I. Review previous assessment reports submitted for this course and provide the following information.

1. Was this course previously assessed and if so, when?

Yes

This course was previously assessed through Winter 2021.

2. Briefly describe the results of previous assessment report(s).

The report indicated that this course is meeting the needs of the students and the NATEF Checklist was needing to be removed and replaced with a student competency rubric.

3. Briefly describe the Action Plan/Intended Changes from the previous report(s), when and how changes were implemented.

The student competency checklist/rubric was developed, but there were technical difficulties with implementing this tool starting in the Winter 22 (W22) semester. The NATEF checklist was finally removed for the W23 semester.

#### II. Assessment Results per Student Learning Outcome

Outcome 1: Recognize, diagnose and repair a basic automatic transmission.

- Assessment Plan
  - Assessment Tool: Outcome-related exam questions
  - Assessment Date: Fall 2023
  - Course section(s)/other population: All sections

- Number students to be assessed: All students
- How the assessment will be scored: Common departmental exam will be scored using an answer sheet.
- Standard of success to be used for this assessment: 70% of the students will score 70% or higher.
- Who will score and analyze the data: Departmental faculty
- 1. Indicate the Semester(s) and year(s) assessment data were collected for this report.

Fall (indicate years below)	Winter (indicate years below)	SP/SU (indicate years below)
2022, 2021	2023, 2022	

2. Provide assessment sample size data in the table below.

# of students enrolled	# of students assessed
94	51

3. If the number of students assessed differs from the number of students enrolled, please explain why all enrolled students were not assessed, e.g. absence, withdrawal, or did not complete activity.

One section from Winter 23 (11 students), one section of Fall 22 (15 students), and one section from Winter 22 (6 students) were not assessed. This left a total of 62 students. Out of these 62 students, 11 students did not complete the assessment tool or no score was recorded.

4. Describe how students from all populations (day students on campus, DL, MM, evening, extension center sites, etc.) were included in the assessment based on your selection criteria.

Students included evening students and day students and all sections were face-toface traditional lecture/lab except for Winter 2023 was Blended-MM.

5. Describe the process used to assess this outcome. Include a brief description of this tool and how it was scored.

Five (5) individual weekly assessments were used for the Automatic Transmission Unit, each assessment scored at 25 points.

6. Briefly describe assessment results based on data collected for this outcome and tool during the course assessment. Discuss the extent to which students achieved this learning outcome and indicate whether the standard of success was met for this outcome and tool.

Met Standard of Success: <u>No</u>

Overall, 34/51 (66.7%) scored 70% or higher on the five assessments. The detailed results are as follows:

Week 1: 38/51 (74.5%)

Week 2: 42/51 (82.4%)

Week 3: 39/51 (76.5%)

Week 4: 31/51 (60.8%)

Week 5: 30/43 (69.8%)

I believe the number of students who chose not to attempt these assessments had a very negative impact on this data.

For reference 13 students out of 62 chose not to complete the Week 1 assessment (20.9% of the students assessed). By Week 5, 26 students out of 62 chose not to complete the assessment (41%).

7. Based on your interpretation of the assessment results, describe the areas of strength in student achievement of this learning outcome.

Students excel in hands-on technical lab practicums. Out of the small percent of students who did not meet the 70% benchmark, most did not have a reported score; most likely an instructor error or oversight. The core strength of our department is the face-to-face technical training that we effectuate that includes proficient instructor led demonstrations, well-written and executed lab practicums, and acute flexibility of the instructor(s) and ability to relentlessly help students repair their own vehicles in an effort to make a connection and allow students another avenue to demonstrate learning.

8. Based on your analysis of student performance, discuss the areas in which student achievement of this learning outcome could be improved. If student met standard of success, you may wish to identify your plans for continuous improvement.

While the data indicates that students did not meet the learning outcome for the written exams, the individual course results of the Mixed-Mode ASV 134 from Winter 2023 showed promise towards a higher margin of participation with asynchronous coursework. The industry trend is an overwhelming use of electronic LMS platforms to effectuate e-learning modules for professional training and development. All of our instructors need to foster a higher level of student engagement with asynchronous work and completion of weekly written assessments.

Outcome 2: Recognize, diagnose and repair a basic manual transmission.

- Assessment Plan
  - Assessment Tool: Outcome-related exam questions
  - Assessment Date: Fall 2023
  - Course section(s)/other population: All sections
  - Number students to be assessed: All students
  - How the assessment will be scored: Common departmental exam will be scored using an answer sheet.
  - Standard of success to be used for this assessment: 70% of the students will score 70% or higher.
  - Who will score and analyze the data: Departmental faculty
- 1. Indicate the Semester(s) and year(s) assessment data were collected for this report.

Fall (indicate years below)	Winter (indicate years below)	SP/SU (indicate years below)
2022, 2021	2023, 2022	

2. Provide assessment sample size data in the table below.

# of students enrolled	# of students assessed
94	47

3. If the number of students assessed differs from the number of students enrolled, please explain why all enrolled students were not assessed, e.g. absence, withdrawal, or did not complete activity.

One section from Winter 23 (11 students), one section of Fall 22 (15 students), and one section from Winter 22 (6 students) were not assessed. This left a total of 62 students. Out of these 62 students, 15 students did not complete the assessment tool or no score was recorded.

4. Describe how students from all populations (day students on campus, DL, MM, evening, extension center sites, etc.) were included in the assessment based on your selection criteria.

Students included evening students and day students, all sections were face-to-face traditional lecture/lab, but Winter 2023 was Blended-MM.

5. Describe the process used to assess this outcome. Include a brief description of this tool and how it was scored.

Five (5) individual weekly assessments were used for the Manual Transmission Unit, each assessment scored at 25 points.

6. Briefly describe assessment results based on data collected for this outcome and tool during the course assessment. Discuss the extent to which students achieved this learning outcome and indicate whether the standard of success was met for this outcome and tool.

Met Standard of Success: Yes

Overall, 36/47 students (76.6%) scored 70% or higher. The detailed results were as follows:

Week 1: 43/47/62 (91.5%)

Week 2: 30/47/62 (63.8%)

Week 3: 41/47/62 (87.2%)

Week 4: 34/47 (72.3%)

Week 5: 31/47 (66%)

Many students chose not to attempt these assessments which had a very negative impact on this data.

For reference 15 students out of 62 chose not to complete the Week 1 assessment (24.2% of the students assessed). By Week 5, 17 students out of 62 chose not to complete the assessment (27.4%).

7. Based on your interpretation of the assessment results, describe the areas of strength in student achievement of this learning outcome.

Students excel with hands-on technical lab practicums. Out of the small percent of students who did not meet the 70% benchmark, most did not have a reported score; most likely an instructor error or oversight. The core strength of our department is the face-to-face technical training that we effectuate that includes proficient instructor led demonstrations, well-written and executed lab practicums, and acute flexibility of the instructor(s) and ability to relentlessly help students repair their own vehicles in an effort to make a connection and allow students another avenue to demonstrate learning.

8. Based on your analysis of student performance, discuss the areas in which student achievement of this learning outcome could be improved. If student met standard of success, you may wish to identify your plans for continuous improvement.

While the data indicates that students did not meet the learning outcome for the written exams, the individual course results of the Mixed-Mode ASV 134 from Winter 2023 showed promise towards a higher margin of participation with asynchronous coursework. The industry trend is an overwhelming use of electronic LMS platforms to effectuate e-learning modules for professional training and development. All of our instructors need to foster a higher level of student engagement with asynchronous work and completion of weekly written assessments.

Outcome 1: Recognize, diagnose and repair a basic automatic transmission.

- Assessment Plan
  - Assessment Tool: Student competency checklist
  - Assessment Date: Fall 2023
  - Course section(s)/other population: All sections
  - Number students to be assessed: All students
  - How the assessment will be scored: The student competency checklist will be scored using a departmentally-developed rubric.
  - Standard of success to be used for this assessment: 70% of the students will score 70% or higher.
  - Who will score and analyze the data: Departmental faculty
- 1. Indicate the Semester(s) and year(s) assessment data were collected for this report.

Fall (indicate years below)	Winter (indicate years below)	SP/SU (indicate years below)
2022, 2021	2022, 2023	

2. Provide assessment sample size data in the table below.

# of students enrolled	# of students assessed
94	62

3. If the number of students assessed differs from the number of students enrolled, please explain why all enrolled students were not assessed, e.g. absence, withdrawal, or did not complete activity.

One section from Winter 23 (11 students), one section of Fall 22 (15 students), and one section from Winter 22 (6 students) were not assessed.

4. Describe how students from all populations (day students on campus, DL, MM, evening, extension center sites, etc.) were included in the assessment based on your selection criteria.

Students included evening students and day students, all sections were face-to-face traditional lecture/lab, but Winter 2023 was Blended-MM.

5. Describe the process used to assess this outcome. Include a brief description of this tool and how it was scored.

A student competency checklist built into the lab book was used to score two manual grading categories in Blackboard:

- 1. Rebuild Automatic Transmission (Automatic Transmission Reassembly)
- 2. Diagnose Automatic Transmission (AT In-Vehicle Diagnosis)

The instructor gave up to 10 points for completion of each of these labs based on the lab book completion.

6. Briefly describe assessment results based on data collected for this outcome and tool during the course assessment. Discuss the extent to which students achieved this learning outcome and indicate whether the standard of success was met for this outcome and tool.

#### Met Standard of Success: Yes

The standard of success was met: 54 out of 62 students (87.1%) assessed scored 70% or higher in the first category, 55 out of 62 students scored 70% or higher (89%) in the second category. An average of 86.3% of students scored 70% or higher in both categories. Completion of this lab with the scored rubric was commiserate with the trend in our department that students are more inclined to complete technical lab practicums than asynchronous coursework, particularly because these sections assessed were immediately subsequent to the pandemic. However, in the Winter 23 mixed-mode course, student engagement with the asynchronous content improved, possibly highlighting a movement in perceived learning styles.

7. Based on your interpretation of the assessment results, describe the areas of strength in student achievement of this learning outcome.

Students excel in hands-on technical lab practicums. Out of the small percent of students who did not meet the 70% benchmark, most did not have a reported score; most likely an instructor error or oversight. The core strength of our department is the face-to-face technical training that we effectuate that includes

proficient instructor led demonstrations, well-written and executed lab practicums, and acute flexibility of the instructor(s) and ability to relentlessly help students repair their own vehicles in an effort to make a connection and allow students another avenue to demonstrate learning.

8. Based on your analysis of student performance, discuss the areas in which student achievement of this learning outcome could be improved. If student met standard of success, you may wish to identify your plans for continuous improvement.

While the data indicates that students did not meet the learning outcome for the written exams, the individual course results of the Mixed-Mode ASV 134 from Winter 2023 showed promise towards a higher margin of participation with asynchronous coursework. The industry trend is an overwhelming use of electronic LMS platforms to effectuate e-learning modules for professional training and development. All of our instructors need to foster a higher level of student engagement with asynchronous work and completion of weekly written assessments.

Outcome 2: Recognize, diagnose and repair a basic manual transmission.

- Assessment Plan
  - Assessment Tool: Student competency checklist
  - Assessment Date: Fall 2023
  - Course section(s)/other population: All sections
  - Number students to be assessed: All students
  - How the assessment will be scored: The student competency checklist will be scored using a departmentally-developed rubric.
  - Standard of success to be used for this assessment: 70% of the students will score 70% or higher.
  - Who will score and analyze the data: Departmental faculty
- 1. Indicate the Semester(s) and year(s) assessment data were collected for this report.

Fall (indicate years below)	Winter (indicate years below)	SP/SU (indicate years below)
2022, 2021	2023, 2022	

2. Provide assessment sample size data in the table below.

# of students enrolled	# of students assessed
94	62

3. If the number of students assessed differs from the number of students enrolled, please explain why all enrolled students were not assessed, e.g. absence, withdrawal, or did not complete activity.

One section from Winter 23 (11 students), one section of Fall 22 (15 students), and one section from Winter 22 (6 students) were not assessed.

4. Describe how students from all populations (day students on campus, DL, MM, evening, extension center sites, etc.) were included in the assessment based on your selection criteria.

Students included evening students and day students, all sections were face-to-face traditional lecture/lab, but Winter 2023 was Blended-MM.

5. Describe the process used to assess this outcome. Include a brief description of this tool and how it was scored.

A student competency checklist built into the lab book was used to score two manual grading categories in Blackboard:

- 1. Rebuild Manual Transmission (Manual Transmission Reassembly)
- 2. Diagnose Manual Transmission (MT In-Vehicle Diagnosis)

The instructor gave up to 10 points for completion of each of these labs based on the lab book completion.

6. Briefly describe assessment results based on data collected for this outcome and tool during the course assessment. Discuss the extent to which students achieved this learning outcome and indicate whether the standard of success was met for this outcome and tool.

#### Met Standard of Success: <u>Yes</u>

The standard of success was met: 56 out of 62 students assessed scored 70% or higher (90%) in the first category, 57 out of 62 students scored 70% or higher (92%) in the second category. An average of 89.5% of students scored 70% or higher in both categories. Completion of this lab with the scored rubric was commiserate with the trend in our department that students are more inclined to complete technical lab practicums than asynchronous coursework, particularly because these sections assessed were immediately subsequent to the pandemic. However, in the Winter 23 mixed-mode course, student engagement with the asynchronous content improved, possibly highlighting a movement in perceived learning styles.

7. Based on your interpretation of the assessment results, describe the areas of strength in student achievement of this learning outcome.

Students excel with hands-on technical lab practicums. Out of the small percent of students who did not meet the 70% benchmark, most did not have a reported score; most likely an instructor error or oversight. The core strength of our department is the face-to-face technical training that we effectuate that includes proficient instructor led demonstrations, well-written and executed lab practicums, and acute flexibility of the instructor(s) and ability to relentlessly help students repair their own vehicles in an effort to make a connection and allow students another avenue to demonstrate learning.

8. Based on your analysis of student performance, discuss the areas in which student achievement of this learning outcome could be improved. If student met standard of success, you may wish to identify your plans for continuous improvement.

While the data indicates that students did not meet the learning outcome for the written exams, the individual course results of the Mixed-Mode ASV 134 from Winter 2023 showed promise towards a higher margin of participation with asynchronous coursework. The industry trend is an overwhelming use of electronic LMS platforms to effectuate e-learning modules for professional training and development. All of our instructors need to foster a higher level of student engagement with asynchronous work and completion of weekly written assessments.

# III. Course Summary and Intended Changes Based on Assessment Results

1. Based on the previous report's Intended Change(s) identified in Section I above, please discuss how effective the changes were in improving student learning.

We have largely abandoned the use of the NATEF Task List as a metric for student performance on technical tasks, but we have been slow to integrate effective rubrics for lab tasks in Blackboard. The rubric used for this class rarely awards the students less than full credit for completing the lab so the task is essentially credit/no-credit. Despite transitioning to a new student competency checklist I still need to be more effective at rating the students' performance more accurately.

2. Describe your overall impression of how this course is meeting the needs of students. Did the assessment process bring to light anything about student achievement of learning outcomes that surprised you?

This class is meeting the needs of the students. During and immediately following the pandemic, a population of students would claim they did not "learn in front of a computer" or posit that they "were hands-on learners", but I think it is our duty

to teach them how to leverage all modalities of learning, particularly with very engaging coursework.

3. Describe when and how this information, including the action plan, was or will be shared with Departmental Faculty.

This will be shared at our August Department Meeting.

4.

Intended Change(s)

Intended Change	Description of the change	Rationale	Implementation Date
No changes intended.			

5. Is there anything that you would like to mention that was not already captured?

6.

# **III. Attached Files**

<u>Exam data</u> <u>Checklist data</u>			
Faculty/Preparer:	Rocky Roberts	Date:	06/26/2023
Department Chair:	Rocky Roberts	Date:	06/26/2023
Dean:	Jimmie Baber	Date:	07/12/2023
Assessment Committee Chair:	Jessica Hale	Date:	03/28/2025

Course Assessment Report Washtenaw Community College

Discipline	Course Number	Title
Auto Services (new)		ASV 134 07/07/2021- Automotive Transmissions
College	Division	Department
Advanced Technologies and Public Service Careers	Ũ	Transportation Technologies
Faculty Preparer		Rocky Roberts
Date of Last Filed Assessment Report		

# **I.** Review previous assessment reports submitted for this course and provide the following information.

1. Was this course previously assessed and if so, when?

Yes

Yes, this course was assessed on May 1, 2019.

2. Briefly describe the results of previous assessment report(s).

The report determined that the course was meeting the needs of the students based on the average test scores being higher than the 70% benchmark.

3. Briefly describe the Action Plan/Intended Changes from the previous report(s), when and how changes were implemented.

The action plan included the removal of the NATEF student checklist from both outcomes and adding another tool, most likely a departmental skills checklist. The change was not implemented; the previous instructor who was the owner of this course was replaced by myself.

#### **II.** Assessment Results per Student Learning Outcome

Outcome 1: Recognize, diagnose and repair a basic automatic transmission.

- Assessment Plan
  - Assessment Tool: Outcome-related exam questions
  - Assessment Date: Fall 2023
  - Course section(s)/other population: All sections

- Number students to be assessed: All students
- How the assessment will be scored: Common departmental exam will be scored using an answer sheet.
- Standard of success to be used for this assessment: 70% of the students will score 70% or higher.
- Who will score and analyze the data: Departmental faculty
- 1. Indicate the Semester(s) and year(s) assessment data were collected for this report.

Fall (indicate years below)	Winter (indicate years below)	SP/SU (indicate years below)
2020	2021, 2020	

2. Provide assessment sample size data in the table below.

# of students enrolled	# of students assessed
60	48

3. If the number of students assessed differs from the number of students enrolled, please explain why all enrolled students were not assessed, e.g. absence, withdrawal, or did not complete activity.

12 students did not complete the activity (department exam).

4. Describe how students from all populations (day students on campus, DL, MM, evening, extension center sites, etc.) were included in the assessment based on your selection criteria.

Students included evening students and day students, Winter 2020 semester finished remotely (DL via Blackboard), Fall 2020 was MM (Mixed-Mode) and Winter 2021 was MM.

5. Describe the process used to assess this outcome. Include a brief description of this tool and how it was scored.

We administered an embedded departmental exam and students completed a NATEF (ASE Education Foundation) checklist in the students' personal selfevaluation portal. The departmental exam had 46 questions and the exam was scored using an answer key. The ASE Education Foundation (Formerly NATEF) check-list does not permit the instructor to review any meaningful statistics for tasks completed or proficiency level.

6. Briefly describe assessment results based on data collected for this outcome and tool during the course assessment. Discuss the extent to which students achieved this

learning outcome and indicate whether the standard of success was met for this outcome and tool.

Met Standard of Success: Yes

Department exam: 85.4% of students passed with a score of 70% or above (41/48 students).

NATEF - 100% passed, but because the data could not yield detailed results, we need to look at a different tool such as a checklist.

7. Based on your interpretation of the assessment results, describe the areas of strength in student achievement of this learning outcome.

85.4% of the students were able to recognize, diagnose and repair automatic transmissions based on the departmental exam questions and the NATEF checklist.

8. Based on your analysis of student performance, discuss the areas in which student achievement of this learning outcome could be improved. If student met standard of success, you may wish to identify your plans for continuous improvement.

Individual student checklists that address the diagnosis aspect of this outcome need to be implemented to address all students' ability in this area. Labs have been written to improve the diagnosis process, but no current assessment tool is in effect to measure their effectiveness.

Outcome 1: Recognize, diagnose and repair a basic automatic transmission.

- Assessment Plan
  - Assessment Tool: Student competency checklist
  - Assessment Date: Fall 2023
  - Course section(s)/other population: All sections
  - Number students to be assessed: All students
  - How the assessment will be scored: The student competency checklist will be scored using a departmentally-developed rubric.
  - Standard of success to be used for this assessment: 70% of the students will score 70% or higher.
  - Who will score and analyze the data: Departmental faculty
- 1. Indicate the Semester(s) and year(s) assessment data were collected for this report.

Fall (indicate years below)	Winter (indicate years below)	SP/SU (indicate years below)
2020	2020, 2021	

2. Provide assessment sample size data in the table below.

# of students enrolled	# of students assessed
60	60

3. If the number of students assessed differs from the number of students enrolled, please explain why all enrolled students were not assessed, e.g. absence, withdrawal, or did not complete activity.

All students completed the NATEF checklist through CTE3.com.

4. Describe how students from all populations (day students on campus, DL, MM, evening, extension center sites, etc.) were included in the assessment based on your selection criteria.

Students included evening students and day students, Winter 2020 semester finished remotely (DL via Blackboard), Fall 2020 was MM (Mixed-Mode) and Winter 2021 was MM.

5. Describe the process used to assess this outcome. Include a brief description of this tool and how it was scored.

The ASE Education Foundation student checklist with rubric is accessed by students via a website called CTE3.com. The website proficiently tracks student task completion and offers meaningful data for our ASE Education Foundation renewal, but it does not provide reports or statistics on proficiency (based on rubric) per student per section per semester that would indicate the specific success of a course section.

6. Briefly describe assessment results based on data collected for this outcome and tool during the course assessment. Discuss the extent to which students achieved this learning outcome and indicate whether the standard of success was met for this outcome and tool.

#### Met Standard of Success: Yes

There is no detailed data for this tool. All students completed the checklist, but there is no other data to indicate any sense of success/failure.

7. Based on your interpretation of the assessment results, describe the areas of strength in student achievement of this learning outcome.

85.4% of the students were able to recognize, diagnose and repair automatic transmissions based on the departmental exam questions and the NATEF checklist.

8. Based on your analysis of student performance, discuss the areas in which student achievement of this learning outcome could be improved. If student met standard of success, you may wish to identify your plans for continuous improvement.

Individual student checklists that address the diagnosis aspect of this outcome need to be implemented to address all students' ability in this area. Labs have been written to improve the diagnosis process, but no current assessment tool is in effect to measure their effectiveness.

Outcome 2: Recognize, diagnose and repair a basic manual transmission.

- Assessment Plan
  - Assessment Tool: Outcome-related exam questions
  - Assessment Date: Fall 2023
  - Course section(s)/other population: All sections
  - Number students to be assessed: All students
  - How the assessment will be scored: Common departmental exam will be scored using an answer sheet.
  - Standard of success to be used for this assessment: 70% of the students will score 70% or higher.
  - Who will score and analyze the data: Departmental faculty
- 1. Indicate the Semester(s) and year(s) assessment data were collected for this report.

Fall (indicate years below)	Winter (indicate years below)	SP/SU (indicate years below)
2020	2021, 2020	

2. Provide assessment sample size data in the table below.

# of studer	nts enrolled	# of students assessed
60		40

3. If the number of students assessed differs from the number of students enrolled, please explain why all enrolled students were not assessed, e.g. absence, withdrawal, or did not complete activity.

There were 20 students who did not complete this activity.

4. Describe how students from all populations (day students on campus, DL, MM, evening, extension center sites, etc.) were included in the assessment based on your selection criteria.

Students included evening students and day students, Winter 2020 semester finished remotely (DL via Blackboard), Fall 2020 was MM (Mixed-Mode) and Winter 2021 was MM.

5. Describe the process used to assess this outcome. Include a brief description of this tool and how it was scored.

We administered an embedded departmental exam and students completed a NATEF (ASE Education Foundation) checklist in the students' personal selfevaluation portal. The departmental exam had 46 questions and the exam was scored using an answer key. The ASE Education Foundation (Formerly NATEF) check-list does not permit the instructor to review any meaningful statistics for tasks completed or proficiency level.

6. Briefly describe assessment results based on data collected for this outcome and tool during the course assessment. Discuss the extent to which students achieved this learning outcome and indicate whether the standard of success was met for this outcome and tool.

Met Standard of Success: Yes

Department exam: 95% of students passed with a score of 70% or above (38/40 students).

NATEF - 100% passed, but because the data could not yield detailed results, we need to look at a different tool such as a checklist.

7. Based on your interpretation of the assessment results, describe the areas of strength in student achievement of this learning outcome.

95% of the students could recognize, diagnose, and repair manual transmissions based on the departmental exam and NATEF checklist.

8. Based on your analysis of student performance, discuss the areas in which student achievement of this learning outcome could be improved. If student met standard of success, you may wish to identify your plans for continuous improvement.

Individual student checklists that address the diagnosis aspect of this outcome need to be implemented to address all students' ability in this area. Labs have been written to improve the diagnosis process, but no current assessment tool is in effect to measure their effectiveness. Outcome 2: Recognize, diagnose and repair a basic manual transmission.

- Assessment Plan
  - Assessment Tool: Student competency checklist
  - Assessment Date: Fall 2023
  - Course section(s)/other population: All sections
  - Number students to be assessed: All students
  - How the assessment will be scored: The student competency checklist will be scored using a departmentally-developed rubric.
  - Standard of success to be used for this assessment: 70% of the students will score 70% or higher.
  - Who will score and analyze the data: Departmental faculty
- 1. Indicate the Semester(s) and year(s) assessment data were collected for this report.

Fall (indicate years below)	Winter (indicate years below)	SP/SU (indicate years below)
2020	2021, 2020	

2. Provide assessment sample size data in the table below.

# of students enrolled	# of students assessed
60	60

3. If the number of students assessed differs from the number of students enrolled, please explain why all enrolled students were not assessed, e.g. absence, withdrawal, or did not complete activity.

All students completed the NATEF checklist through CTE3.com.

4. Describe how students from all populations (day students on campus, DL, MM, evening, extension center sites, etc.) were included in the assessment based on your selection criteria.

Students included evening students and day students, Winter 2020 semester finished remotely (DL via Blackboard), Fall 2020 was MM (Mixed-Mode) and Winter 2021 was MM.

5. Describe the process used to assess this outcome. Include a brief description of this tool and how it was scored.

The ASE Education Foundation student checklist with rubric is accessed by students via a website called CTE3.com. The website proficiently tracks student task completion and offers meaninful data for our ASE Education Foundation renewal, but it does not provide reports or statistics on proficiency (based on rubric) per student per section per semester that would indicate the specific success of a course section.

6. Briefly describe assessment results based on data collected for this outcome and tool during the course assessment. Discuss the extent to which students achieved this learning outcome and indicate whether the standard of success was met for this outcome and tool.

Met Standard of Success: Yes

There is no detailed data for this tool. All students completed the checklist, but there is no other data to indicate any sense of success/failure.

7. Based on your interpretation of the assessment results, describe the areas of strength in student achievement of this learning outcome.

95% of the students could recognize, diagnose, and repair manual transmissions based on the departmental exam and NATEF checklist.

8. Based on your analysis of student performance, discuss the areas in which student achievement of this learning outcome could be improved. If student met standard of success, you may wish to identify your plans for continuous improvement.

Individual student checklists that address the diagnosis aspect of this outcome need to be implemented to address all students' ability in this area. Labs have been written to improve the diagnosis process, but no current assessment tool is in effect to measure their effectiveness.

#### **III.** Course Summary and Intended Changes Based on Assessment Results

1. Based on the previous report's Intended Change(s) identified in Section I above, please discuss how effective the changes were in improving student learning.

The changes in the previous assessment report were not instituted because there was a change in instructor and course owner.

2. Describe your overall impression of how this course is meeting the needs of students. Did the assessment process bring to light anything about student achievement of learning outcomes that surprised you?

I believe this class is extremely effective in meeting the needs of students. The assessment process highlighted the need to move away from the use of the

'NATEF Checklist' and move towards a student checklist that can be embedded in Blackboard.

3. Describe when and how this information, including the action plan, was or will be shared with Departmental Faculty.

This report will be shared via Google Drive with all department faculty immediately upon completion.

4.

Intended Change(s)

Intended Change	Description of the change	Rationale	Implementation Date
Assessment Tool	that the number of questions matches the standard of	Checklist does not yield any meaningful data for student competency or proficiency. The	
Other: standard of success	70% of the students will score 70% or	success more	2022

5. Is there anything that you would like to mention that was not already captured?

No

# **III. Attached Files**

# ASV 134 Assessment Data

Faculty/Preparer:	Rocky Roberts	Date:	07/08/2021
Department Chair:	Rocky Roberts	Date:	07/08/2021
Dean:	Jimmie Baber	Date:	07/12/2021
Assessment Committee Chair:	Shawn Deron	Date:	09/23/2021

Course Assessment Report Washtenaw Community College

Discipline	Course Number	Title
Auto Services (inactive)	1 3/1	ASV 134 05/01/2019- Automotive Transmissions
Division	Department	Faculty Preparer
Advanced Technologies and Public Service Careers	Automotive Services	Thomas Hemsteger
Date of Last Filed Assessm	ent Report	

# I. Review previous assessment reports submitted for this course and provide the following information.

1. Was this course previously assessed and if so, when?

No

- 2. Briefly describe the results of previous assessment report(s).
  - 3.
- 4. Briefly describe the Action Plan/Intended Changes from the previous report(s), when and how changes were implemented.
  - 5.

#### II. Assessment Results per Student Learning Outcome

Outcome 1: Recognize, diagnose and repair a basic automatic transmission.

- Assessment Plan
  - Assessment Tool: Departmental exam and NATEF performance tasks
  - Assessment Date: Fall 2015
  - Course section(s)/other population: All sections
  - Number students to be assessed: All students
  - How the assessment will be scored: Common departmental exam will be scored using an answer sheet. NATEF checklist will be scored using the departmentally-developed rubric.

- Standard of success to be used for this assessment: 70% of the students will score an overall average of 70% or higher.
- Who will score and analyze the data: Departmental faculty
- 1. Indicate the Semester(s) and year(s) assessment data were collected for this report.

Fall (indicate years below)	Winter (indicate years below)	SP/SU (indicate years below)
2018	2019	

2. Provide assessment sample size data in the table below.

# of students enrolled	# of students assessed
54	24

3. If the number of students assessed differs from the number of students enrolled, please explain why all enrolled students were not assessed, e.g. absence, withdrawal, or did not complete activity.

For this assessment report, exam data was only available from one faculty member. Plans are being made to collect data from all faculty teaching sections of this course for the next assessment report.

4. Describe how students from all populations (day students on campus, DL, MM, evening, extension center sites, etc.) were included in the assessment based on your selection criteria.

All sections of this course are taught face-to-face.

5. Describe the process used to assess this outcome. Include a brief description of this tool and how it was scored.

We administered an embedded departmental exam and students completed a NATEF checklist in the students' personal self-evaluation portal. The departmental exam had 46 questions and the exam was scored using an answer key. The NATEF checklist is pass/fail and did not yield any meaningful data because it doesn't flesh out individual areas of improvement or success.

6. Briefly describe assessment results based on data collected for this outcome and tool during the course assessment. Discuss the extent to which students achieved this learning outcome and indicate whether the standard of success was met for this outcome and tool.

Met Standard of Success: <u>Yes</u>

Department exam: 96% of students passed with a score of 70% or above, which yields a 96% success rate.

NATEF - 100% passed, but because the data could not yield meaningful results, we need to look at a different tool such as a checklist.

7. Based on your interpretation of the assessment results, describe the areas of strength in student achievement of this learning outcome.

96% of the students were able to recognize, diagnose and repair automatic transmissions based on the departmental exam questions and the NATEF checklist.

8. Based on your analysis of student performance, discuss the areas in which student achievement of this learning outcome could be improved. If student met standard of success, you may wish to identify your plans for continuous improvement.

Provide more classroom review time for sample exam test questions. We will also provide more demonstrations in the lab to improve diagnosis success.

Outcome 2: Recognize, diagnose and repair a basic manual transmission.

- Assessment Plan
  - Assessment Tool: Departmental exam and NATEF performance tasks
  - Assessment Date: Fall 2015
  - Course section(s)/other population: All sections
  - Number students to be assessed: All students
  - How the assessment will be scored: Common departmental exam will be scored using an answer sheet. NATEF checklist will be scored using the departmentally-developed rubric.
  - Standard of success to be used for this assessment: 70% of the students will score an overall average of 70% or higher.
  - Who will score and analyze the data: Departmental faculty
- 1. Indicate the Semester(s) and year(s) assessment data were collected for this report.

Fall (indicate years below)	Winter (indicate years below)	SP/SU (indicate years below)
2018	2019	

2. Provide assessment sample size data in the table below.

# of students enrolled	# of students assessed
54	24

3. If the number of students assessed differs from the number of students enrolled, please explain why all enrolled students were not assessed, e.g. absence, withdrawal, or did not complete activity.

For this assessment report, exam data was only available from one faculty member. Plans are being made to collect data from all faculty teaching sections of this course for the next assessment report.

4. Describe how students from all populations (day students on campus, DL, MM, evening, extension center sites, etc.) were included in the assessment based on your selection criteria.

All sections of this course are taught face-to-face.

5. Describe the process used to assess this outcome. Include a brief description of this tool and how it was scored.

The departmental exam was administered to all students. This was a multiple choice exam. The questions were formatted to include parts and terminology recognition, diagnosis problems and repair procedures. The exam was scored using a percentage of correct responses based on the total number of questions. The NATEF checklist is pass/fail and did not provide meaningful data.

6. Briefly describe assessment results based on data collected for this outcome and tool during the course assessment. Discuss the extent to which students achieved this learning outcome and indicate whether the standard of success was met for this outcome and tool.

Met Standard of Success: Yes

92% of the students achieved a score of 70% or higher on the departmental exam.

NATEF - 100% passed, but because the data could not yield meaningful results, we need to look at a different tool such as a checklist.

7. Based on your interpretation of the assessment results, describe the areas of strength in student achievement of this learning outcome.

92% of the students could recognize, diagnose, and repair manual transmissions based on the departmental exam and the NATEF checklist.

8. Based on your analysis of student performance, discuss the areas in which student achievement of this learning outcome could be improved. If student met standard of success, you may wish to identify your plans for continuous improvement.

Provide additional classroom review time with sample exam questions. We will also provide more demonstrations to improve diagnosis success.

### **III.** Course Summary and Intended Changes Based on Assessment Results

1. Based on the previous report's Intended Change(s) identified in Section I above, please discuss how effective the changes were in improving student learning.

No previous report available

2. Describe your overall impression of how this course is meeting the needs of students. Did the assessment process bring to light anything about student achievement of learning outcomes that surprised you?

The course is meeting the needs of the students based on their readiness to pass the departmental exam (which mimics the State of MI and ASE certification exams) with a success rate of 70% or higher.

3. Describe when and how this information, including the action plan, was or will be shared with Departmental Faculty.

The report is available to all full time departmental faculty.

4.

Intended Change	Description of the change	Rationale	Implementation Date
Assessment Tool	Remove NATEF student checklist from both outcomes and add another	We are unable to access meaningful detailed data from the NATEF checklist for individual students. While the data does show the student completed each task, nothing is recorded that identifies areas of strength or weakness. Without this information, it is difficult to	2020

Intended Change(s)

identify areas for	
improvement.	

5. Is there anything that you would like to mention that was not already captured?

6.				

# III. Attached Files

### grade book

Faculty/Preparer:	Thomas Hemsteger	<b>Date:</b> 05/06/2019
Department Chair:	Justin Morningstar	<b>Date:</b> 05/17/2019
Dean:	Brandon Tucker	<b>Date:</b> 05/19/2019
Assessment Committee Chair:	Shawn Deron	<b>Date:</b> 08/19/2019