Program Outcome and Assessment(s)
2019-2020 Program Outcome Assessments Year-End Reporting Form
Program Review Cycle - 2018-19

In response to SACSCOC 8.2, *"The institution identifies expected outcomes, assesses the extent to which it achieves these outcomes, and provides evidence of seeking improvement based on analysis of the results …"*

Name of Program:

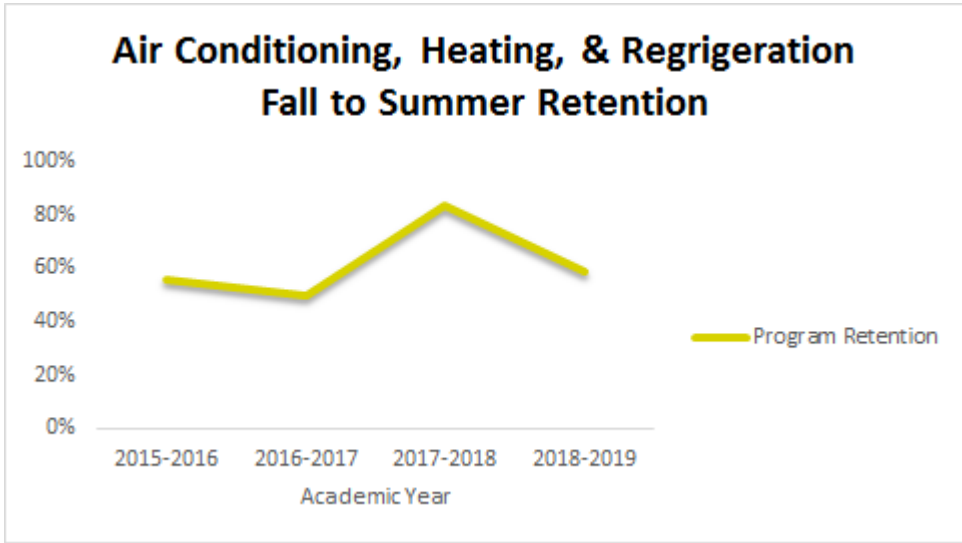> Air Conditioning, Heating, and Refrigeration

Program Outcome #1: Program Retention, Fall to Summer

Baseline: 63 % (*Average of three years – 2015-16; 2016-17; 2017-18; <u>fall-to-summer</u> program retention*)
Standard: 65 % Fall to Summer
Target: 70 % Fall to Summer

2019-2020 Action / Strategy Items:

Item #	Action / Strategy Items: (*Actions / strategies identified in the 2018-19 program review.*)	Results / Use of Results: (*Provide results of the action / strategy identified. Was the action / strategy successful? If not, did you want to continue this action / strategy going forward? If so, please include this action / strategy in the 2020-21 action / strategies table below.*)
1	Faculty will have conversations with local employers to stress the importance of students completing the program before being hired. Faculty will also stress the importance to students, as well.	Retention rates have decreased. We will continue to encourage employers and students to the importance of completing the program
2	Use Fall to summer Program Retention Data for a more comprehensive analysis of Program Assessment	Continue to use Fall to Summer Retention Data

Year (Fall to Summer)	Program Fall Enrollment Cohort	Program Completers	Program Returners	Program Non-Completers	Program Transfers	Program Retention
FA 2015-SU 2016	18	0	10	8	0	56%
FA 2016-SU 2017	14	0	7	6	1	50%
FA 2017-SU 2018	18	1	14	3	0	83%
FA 2018-SU 2019	17	8	2	3	4	59%

Air Conditioning, Heating, & Regrigeration Fall to Summer Retention

Provide narrative for analysis of program retention data *(Based on the data, provide a narrative of your analysis of fall to summer retention. Indicate factors that may have affected your retention. State any changes you plan to address for next year that may affect retention.)*

Continue to emphasize the long-term career benefits of remaining in the program and completing the Diploma

Provide narrative for analysis of program retention standard/target *(As a result of the data analysis, indicate changes to the standard or target. Did you meet your standard/target? If you met your standard/target, what percentage would you like to increase your standard/target?)*

Did not meet retention standard/target. Will continue with current standard/target.

2020-2021 Action / Strategy Items:
(Identify and address outcome assessments that fall below the established standard and/or target and additional recommendations resulting from the review.)

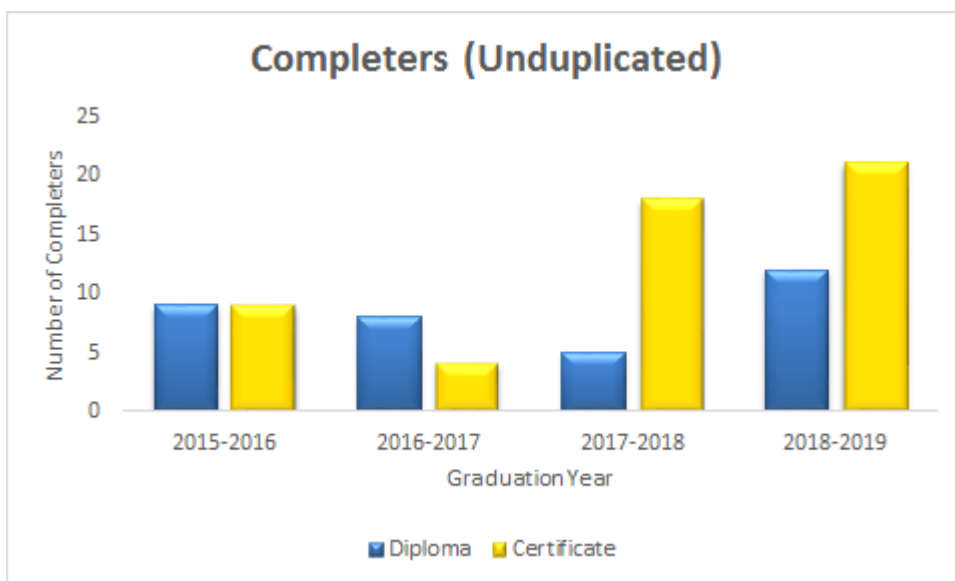| Item	Action / Strategy Items *(Identify action items as a result of your program outcome assessment.)*	Target Date *(Identify your projected target date for completion of action items.)*	Assessment of Action Items *(State the method of assessment; how you plan to evaluate/assess the results of the action items.)*
1	We will continue to encourage employers and students to the importance of completing the program	Summer 2021	use Fall to Summer Retention Data
2	Use Fall to Summer Program Retention Data for analysis of Program Assessment	Summer 2021	use Fall to Summer Retention Data for analysis

Program Outcome #2: Completions (Graduation) (*unduplicated*)

Baseline: 17 # (*Average of three years – 2015-16; 2016-17; 2017-18*)
Standard: 20 #
Target: 25 #

2019-2020 Action / Strategy Items:

Item #	Action / Strategy Items: (*Actions / strategies identified in the 2018-19 program review.*)	Results / Use of Results: (*Provide results of the action / strategy identified. Was the action / strategy successful? If not, did you want to continue this action / strategy going forward? If so, please include this action / strategy in the 2020-21 action / strategies table below.*)
1	Will compare three-year Fall to Summer Program Completion Data	Certificates added were successful in program completions

Number of Completers (*unduplicated*) – Graduation Year – Summer, Fall, Spring			
Graduation Year	**Diploma**	**Certificate**	**Total**
2015-2016	9	9	18
2016-2017	8	4	12
2017-2018	5	18	23
2018-2019	12	21	33

Provide narrative for analysis of completion data *(Based on the data, provide a narrative of your analysis of completions. Indicate factors that may have affected your completions. How might you increase the number of completers in your program?)*

Certificates added were successful in program completions.

Provide narrative for analysis of completion standard/target *(As a result of the data analysis, indicate changes to the standard or target. Did you meet your standard/target? If you met your standard/target, what percentage would you like to increase your standard/target?)*

Completion rates have improved. We will continue with these strategies as positive results are observed.

2020-2021 Action / Strategy Items:
(Identify and address outcome assessments that fall below the established standard and/or target and additional recommendations resulting from the review.)

Item	Action / Strategy Items *(Identify action items as a result of your program outcome assessment.)*	Target Date *(Identify your projected target date for completion of action items.)*	Assessment of Action Items *(State the method of assessment; how you plan to evaluate/assess the results of the action items.)*
1	Completion rates have improved. We will continue with these strategies as positive results are observed.	Summer 2021	use Fall to Summer Retention Data for analysis
2	We will continue to encourage employers and students to the importance of completing the program to increase retention data	Summer 2021	use Fall to Summer Retention Data for analysis

Program Outcome #3: Job Placement / Employment

Baseline: 61 % *(Average of three years – 2015-16; 2016-17; 2017-18 employed/seeking more education)*
Standard: 65 %
Target: 70 %

2019-2020 Action / Strategy Items:

Item #	Action / Strategy Items: *(Actions / strategies identified in the 2018-19 program review.)*	Results / Use of Results: *(Provide results of the action / strategy identified. Was the action / strategy successful? If not, did you want to continue this action / strategy going forward? If so, please include this action / strategy in the 2020-21 action / strategies table below.)*

1	Coordinate student/employer communication/relationships. Track student completers who are employed after graduation to ensure job placement. Track students who continue his/her education. Compare to three-year data.	Adding "Diploma" and "Certificates" for Completer Data lowers the job placement/employment ratio significantly. Certificate and Diploma completions are the same students and should not be added together for job placement/employment data

Employment Demand						
Year	Graduates	# Employed (within 1 Yr)	# Seeking More Education (within 1 Yr)	% Employed & Seeking More Education *(add # employed and # seeking more education and divide by # of graduates)*	Unknown	Other/Comments
2015-16	18	8	5	72%	5	
2016-17	12	6	3	75%	3	
2017-18	23	5	3	35%	15	
2018-19	33	5	11	48%	17	

Provide narrative for analysis of job placement/employment data *(Based on the data, provide a narrative of your analysis of job placement / employment. Indicate factors that may have affected job placement / employment. How can your program promote higher employment of students in the field?)*

Coordinate student/employer communication/relationships. Track student completers who are employed after graduation to ensure job placement. Track students who continue his/her education. Compare to three-year data

Provide narrative for analysis of job placement/employment standard/target *(As a result of the data analysis, indicate changes to the standard or target. Did you meet your standard/target? If you met your standard/target, what percentage would you like to increase your standard/target?)*

Did not meet standard or target. Adding "Diploma" and "Certificates" for Completer Data lowers the job placement/employment ratio significantly. Certificate and Diploma completions are the same students and should not be added together for job placement/employment data

2020-2021 Action / Strategy Items:
(Identify and address outcome assessments that fall below the established standard and/or target and additional recommendations resulting from the review.)

Ite m	Action / Strategy Items (Identify action items as a result of your program outcome assessment.)	Target Date (Identify your projected target date for completion of action items.)	Assessment of Action Items (State the method of assessment; how you plan to evaluate/assess the results of the action items.)
1	Use Graduate data only	Summer 2021	Use Graduate data only
2	Track student completers who are employed after graduation to ensure job placement.	Summer 2021	Compare to three-year data.

Program Outcome #4: Licensure and Certification Passing Rates (if applicable) *Not applicable*

Baseline: N/A % (*Average of three years – identify last three licensure years*)
Standard: N/A %
Target: N/A %

2019-2020 Action / Strategy Items:

Item #	Action / Strategy Items: (Actions / strategies identified in the 2018-19 program review.)	Results / Use of Results: (Provide results of the action / strategy identified. Was the action / strategy successful? If not, did you want to continue this action / strategy going forward? If so, please include this action / strategy in the 2020-21 action / strategies table below.)
1	Not applicable.	Not applicable.

Licensure / Certification Exam – Title

NCCCS Report	Exam Year	# Tested	# Passed	% Passing	Index Score
2016	2014-15				
2017	2015-16				
2018	2016-17				
2019	2017-18				

Provide narrative for analysis of licensure / certification passing rates data (*Based on the data, provide a narrative of your analysis of licensure / certification. Are you satisfied with your program licensure rates? State any changes you plan to address for licensure/certification passing rates.*)

Not applicable.

Provide narrative for analysis of licensure / certification passing rates standard/target *(As a result of the data analysis, indicate changes to the standard or target. Did you meet your standard/target? If you met your standard/target, what percentage would you like to increase your standard/target?)*

Not applicable.

2020-2021 Action / Strategy Items:
(Identify and address outcome assessments that fall below the established standard and/or target and additional recommendations resulting from the review.)

Item	Action / Strategy Items *(Identify action items as a result of your program outcome assessment.)*	Target Date *(Identify your projected target date for completion of action items.)*	Assessment of Action Items *(State the method of assessment; how you plan to evaluate/assess the results of the action items.)*
1	Not applicable.		

Program Outcome #5: Third-Party Credentials (if applicable)

Baseline: 14 # *(Average of three years – 2014-15; 2015-16; 2016-17)*
Standard: 17 #
Target: 20 #

2019-2020 Action / Strategy Items:

Item #	Action / Strategy Items: *(Actions / strategies identified in the 2018-19 program review.)*	Results / Use of Results: *(Provide results of the action / strategy identified. Was the action / strategy successful? If not, did you want to continue this action / strategy going forward? If so, please include this action / strategy in the 2020-21 action / strategies table below.)*
1	Track online third-party credentials available for students. Encourage students to obtain third-party credentials in order to make them job-ready for employment.	Students who are enrolled in AHR 160 "sit" for the certification. Those who earn a grade of "A" also earn the certification. This is how the data are tracked.

Third-Party Credentials

Academic Year Fall, Spring, Summer	Credentials for Program of Study	# Tested *(duplicated)*	# Passed
2014-2015	EPA Certification (40 CFR Part 82, subpart F)	9	8
2015-2016	EPA Certification (40 CFR Part 82, subpart F)	17	15
2016-2017	EPA Certification (40 CFR Part 82, subpart F)	18	18
2017-2018	EPA Certification (40 CFR Part 82, subpart F)	17	5

2018-2019	EPA Certification (40 CFR Part 82, subpart F)	18	18

Provide narrative for analysis of third-party credentials data *(Based on the data, provide a narrative of your analysis of third-party credentials. Are there other industry-recognized credentials that need to be addressed for the program of study? What are other means to promote program third-party credentials.)*

Overall, adding third-party certificates has been successful for the program (except for 2017-18, which seems to be an anomaly).

Provide narrative for analysis of third-party credentials standard/target *(As a result of the data analysis, indicate changes to the standard or target. Did you meet your standard/target? If you met your standard/target, what percentage would you like to increase your standard/target?)*

In 2016-2017 and 2018-2019, the standard was met, but not the target. We will continue to strive to reach the target of 20 third party credentials earned.

2020-2021 Action / Strategy Items:
(Identify and address outcome assessments that fall below the established standard and/or target and additional recommendations resulting from the review.)

Ite m	Action / Strategy Items *(Identify action items as a result of your program outcome assessment.)*	Target Date *(Identify your projected target date for completion of action items.)*	Assessment of Action Items *(State the method of assessment; how you plan to evaluate/assess the results of the action items.)*
1	We will continue to enroll students in the AHR 160 course and stress the importance of the EPA certification	Summer 2021	Assessment will be based on the number of students who earn an "A" in the course and an EPA certification

Program Outcome #6: Other Assessment (if applicable)

2019-2020 Action / Strategy Items:

Item #	Action / Strategy Items: *(Actions / strategies identified in the 2018-19 program review.)*	Results / Use of Results: *(Provide results of the action / strategy identified. Was the action / strategy successful? If not, did you want to continue this action / strategy going forward? If so, please include this action / strategy in the 2020-21 action / strategies table below.)*
1	Use Moodle as a supplemental instruction resource. Monitor Participants in each module of Moodle.	Students are utilizing and embracing Moodle program
2	Submit mini-split refrigeration trainers planning objective in the 2019-20.	Planning Objective has been approved but not received

2020-2021 Action / Strategy Items:
(Identify and address outcome assessments that fall below the established standard and/or target and additional recommendations resulting from the review.)

Item	Action / Strategy Items *(Identify action items as a result of your program outcome assessment.)*	Target Date *(Identify your projected target date for completion of action items.)*	Assessment of Action Items *(State the method of assessment; how you plan to evaluate/assess the results of the action items.)*
1	Continue to incorporate Moodle as a supplemental instruction resource	Summer 2021	Monitor student participation in each module of Moodle.
2	Utilize mini-split refrigeration trainer planning objective when on site	Summer 2021	Lab participation and quizzes