

## Summary

This is a report for Outcome 3 of Programming Languages (CMPS 450)

Total number of students in this class was 34.

This course maps to Outcomes 3 and 5.

Outcome 3 is defined as:

*“Be proficient in more than one programming language on more than one computing platform”*

Percentage of students who fulfilled Outcome 3 in different levels:

- 8.57% of students between 0 – 49 (Amateur)
- 34.28% of students between 50 – 69 (Developing)
- 28.57% of students between 70 – 84 (Developed)
- 22.85 of students between 85 – 100 (Exemplary)

Rubric for evaluating Outcome 3 of CMPS 450

Term: Fall 2016			Instructor: Mohsen Amini Salehi			
Outcome: Be proficient in more than one programming language on more than one computing platform						
Performance Criteria	1 Amateur	2 Developing	3 Developed	4 Exemplary	SCORE	How Measured
Explain different programming languages paradigms	X				33	Midterm 1 (Q 1 – 2),
Develop programs in functional programming language paradigm	X				23	Assignment 1, Midterm 1 (Q 3 – 5), Final (Q 5)
Develop programs in logical programming paradigm		X			65	Assignment 2, Midterm 2 (Q 2, 4, 5), Final (Q 3)
Develop and Extend objects in ObjectOriented Programming			X		71	Assignment 3, Midterm 2 (Q 1, 3) Final (Q 2)
Apply knowledge obtained in learning a new programming language			X		73	Assignment 4, Midterm 2 (Q 6) Final (Q 1, 4, 6)

Score: 0 – 49 Amateur, 50 – 69 Developing, 70 – 84 Developed, 85 – 100 Exemplary

Rubric for evaluating Outcome 3 of CMPS 450

Term: Fall 2016			Instructor: Mohsen Amini Salehi			
Outcome: Be proficient in more than one programming language on more than one computing platform						
Performance Criteria	1 Amateur	2 Developing	3 Developed	4 Exemplary	SCORE	How Measured
Explain different programming languages paradigms		X			66	Midterm 1 (Q 1 – 2),
Develop programs in functional programming language paradigm			X		80	Assignment 1, Midterm 1 (Q 3 – 5), Final (Q 5)
Develop programs in logical programming paradigm		X			65	Assignment 2, Midterm 2 (Q 2, 4, 5), Final (Q 3)
Develop and Extend objects in Object Oriented Programming				X	99	Assignment 3, Midterm 2 (Q 1, 3) Final (Q 2)
Apply knowledge obtained in learning a new programming language			X		78	Assignment 4, Midterm 2 (Q 6) Final (Q 1, 4, 6)

Score: 0 – 49 Amateur, 50 – 69 Developing, 70 – 84 Developed, 85 – 100 Exemplary

Rubric for evaluating Outcome 3 of CMPS 450

Term: Fall 2016			Instructor: Mohsen Amini Salehi			
Outcome: Be proficient in more than one programming language on more than one computing platform						
Performance Criteria	1 Amateur	2 Developing	3 Developed	4 Exemplary	SCORE	How Measured
Explain different programming languages paradigms			X		76	Midterm 1 (Q 1 – 2),
Develop programs in functional programming language paradigm			X		77	Assignment 1, Midterm 1 (Q 3 – 5), Final (Q 5)
Develop programs in logical programming paradigm				X	86	Assignment 2, Midterm 2 (Q 2, 4, 5), Final (Q 3)
Develop and Extend objects in Object Oriented Programming				X	93	Assignment 3, Midterm 2 (Q 1, 3) Final (Q 2)
Apply knowledge obtained in learning a new programming language			X		78	Assignment 4, Midterm 2 (Q 6) Final (Q 1, 4, 6)

Score: 0 – 49 Amateur, 50 – 69 Developing, 70 – 84 Developed, 85 – 100 Exemplary

Rubric for evaluating Outcome 3 of CMPS 450

Term: Fall 2016			Instructor: Mohsen Amini Salehi			
Outcome: Be proficient in more than one programming language on more than one computing platform						
Performance Criteria	1 Amateur	2 Developing	3 Developed	4 Exemplary	SCORE	How Measured
Explain different programming languages paradigms	X				16	Midterm 1 (Q 1 – 2),
Develop programs in functional programming language paradigm				X	89	Assignment 1, Midterm 1 (Q 3 – 5), Final (Q 5)
Develop programs in logical programming paradigm		X			65	Assignment 2, Midterm 2 (Q 2, 4, 5), Final (Q 3)
Develop and Extend objects in Object Oriented Programming			X		84	Assignment 3, Midterm 2 (Q 1, 3) Final (Q 2)
Apply knowledge obtained in learning a new programming language				X	88	Assignment 4, Midterm 2 (Q 6) Final (Q 1, 4, 6)

Score: 0 – 49 Amateur, 50 – 69 Developing, 70 – 84 Developed, 85 – 100 Exemplary

Rubric for evaluating Outcome 3 of CMPS 450

Term: Fall 2016			Instructor: Mohsen Amini Salehi			
Outcome: Be proficient in more than one programming language on more than one computing platform						
Performance Criteria	1 Amateur	2 Developing	3 Developed	4 Exemplary	SCORE	How Measured
Explain different programming languages paradigms			X		66	Midterm 1 (Q 1 – 2),
Develop programs in functional programming language paradigm				X	89	Assignment 1, Midterm 1 (Q 3 – 5), Final (Q 5)
Develop programs in logical programming paradigm			X		71	Assignment 2, Midterm 2 (Q 2, 4, 5), Final (Q 3)
Develop and Extend objects in Object Oriented Programming		X			68	Assignment 3, Midterm 2 (Q 1, 3) Final (Q 2)
Apply knowledge obtained in learning a new programming language		X			67	Assignment 4, Midterm 2 (Q 6) Final (Q 1, 4, 6)

Score: 0 – 49 Amateur, 50 – 69 Developing, 70 – 84 Developed, 85 – 100 Exemplary

Rubric for evaluating Outcome 3 of CMPS 450

Term: Fall 2016			Instructor: Mohsen Amini Salehi			
Outcome: Be proficient in more than one programming language on more than one computing platform						
Performance Criteria	1 Amateur	2 Developing	3 Developed	4 Exemplary	SCORE	How Measured
Explain different programming languages paradigms	X				33	Midterm 1 (Q 1 – 2),
Develop programs in functional programming language paradigm		X			52	Assignment 1, Midterm 1 (Q 3 – 5), Final (Q 5)
Develop programs in logical programming paradigm	X				47	Assignment 2, Midterm 2 (Q 2, 4, 5), Final (Q 3)
Develop and Extend objects in Object Oriented Programming			X		72	Assignment 3, Midterm 2 (Q 1, 3) Final (Q 2)
Apply knowledge obtained in learning a new programming language		X			58	Assignment 4, Midterm 2 (Q 6) Final (Q 1, 4, 6)

Score: 0 – 49 Amateur, 50 – 69 Developing, 70 – 84 Developed, 85 – 100 Exemplary

Rubric for evaluating Outcome 3 of CMPS 450

Term: Fall 2016			Instructor: Mohsen Amini Salehi			
Outcome: Be proficient in more than one programming language on more than one computing platform						
Performance Criteria	1 Amateur	2 Developing	3 Developed	4 Exemplary	SCORE	How Measured
Explain different programming languages paradigms	X				30	Midterm 1 (Q 1 – 2),
Develop programs in functional programming language paradigm				X	92	Assignment 1, Midterm 1 (Q 3 – 5), Final (Q 5)
Develop programs in logical programming paradigm		X			68	Assignment 2, Midterm 2 (Q 2, 4, 5), Final (Q 3)
Develop and Extend objects in Object Oriented Programming				X	86	Assignment 3, Midterm 2 (Q 1, 3) Final (Q 2)
Apply knowledge obtained in learning a new programming language			X		80	Assignment 4, Midterm 2 (Q 6) Final (Q 1, 4, 6)

Score: 0 – 49 Amateur, 50 – 69 Developing, 70 – 84 Developed, 85 – 100 Exemplary

Rubric for evaluating Outcome 3 of CMPS 450

Term: Fall 2016			Instructor: Mohsen Amini Salehi			
Outcome: Be proficient in more than one programming language on more than one computing platform						
Performance Criteria	1 Amateur	2 Developing	3 Developed	4 Exemplary	SCORE	How Measured
Explain different programming languages paradigms		X			60	Midterm 1 (Q 1 – 2),
Develop programs in functional programming language paradigm			X		78	Assignment 1, Midterm 1 (Q 3 – 5), Final (Q 5)
Develop programs in logical programming paradigm		X			54	Assignment 2, Midterm 2 (Q 2, 4, 5), Final (Q 3)
Develop and Extend objects in Object Oriented Programming		X			69	Assignment 3, Midterm 2 (Q 1, 3) Final (Q 2)
Apply knowledge obtained in learning a new programming language			X		70	Assignment 4, Midterm 2 (Q 6) Final (Q 1, 4, 6)

Score: 0 – 49 Amateur, 50 – 69 Developing, 70 – 84 Developed, 85 – 100 Exemplary

Rubric for evaluating Outcome 3 of CMPS 450

Term: Fall 2016			Instructor: Mohsen Amini Salehi			
Outcome: Be proficient in more than one programming language on more than one computing platform						
Performance Criteria	1 Amateur	2 Developing	3 Developed	4 Exemplary	SCORE	How Measured
Explain different programming languages paradigms	X				6	Midterm 1 (Q 1 – 2),
Develop programs in functional programming language paradigm		X			61	Assignment 1, Midterm 1 (Q 3 – 5), Final (Q 5)
Develop programs in logical programming paradigm	X				45	Assignment 2, Midterm 2 (Q 2, 4, 5), Final (Q 3)
Develop and Extend objects in Object Oriented Programming				X	71	Assignment 3, Midterm 2 (Q 1, 3) Final (Q 2)
Apply knowledge obtained in learning a new programming language			X		66	Assignment 4, Midterm 2 (Q 6) Final (Q 1, 4, 6)

Score: 0 – 49 Amateur, 50 – 69 Developing, 70 – 84 Developed, 85 – 100 Exemplary

Rubric for evaluating Outcome 3 of CMPS 450

Term: Fall 2016			Instructor: Mohsen Amini Salehi			
Outcome: Be proficient in more than one programming language on more than one computing platform						
Performance Criteria	1 Amateur	2 Developing	3 Developed	4 Exemplary	SCORE	How Measured
Explain different programming languages paradigms			X		75	Midterm 1 (Q 1 – 2),
Develop programs in functional programming language paradigm				X	87	Assignment 1, Midterm 1 (Q 3 – 5), Final (Q 5)
Develop programs in logical programming paradigm		X			65	Assignment 2, Midterm 2 (Q 2, 4, 5), Final (Q 3)
Develop and Extend objects in Object Oriented Programming			X		78	Assignment 3, Midterm 2 (Q 1, 3) Final (Q 2)
Apply knowledge obtained in learning a new programming language		X			59	Assignment 4, Midterm 2 (Q 6) Final (Q 1, 4, 6)

Score: 0 – 49 Amateur, 50 – 69 Developing, 70 – 84 Developed, 85 – 100 Exemplary

Rubric for evaluating Outcome 3 of CMPS 450

Term: Fall 2016			Instructor: Mohsen Amini Salehi			
Outcome: Be proficient in more than one programming language on more than one computing platform						
Performance Criteria	1 Amateur	2 Developing	3 Developed	4 Exemplary	SCORE	How Measured
Explain different programming languages paradigms		X			50	Midterm 1 (Q 1 – 2),
Develop programs in functional programming language paradigm			X		83	Assignment 1, Midterm 1 (Q 3 – 5), Final (Q 5)
Develop programs in logical programming paradigm		X			69	Assignment 2, Midterm 2 (Q 2, 4, 5), Final (Q 3)
Develop and Extend objects in Object Oriented Programming		X			55	Assignment 3, Midterm 2 (Q 1, 3) Final (Q 2)
Apply knowledge obtained in learning a new programming language		X			68	Assignment 4, Midterm 2 (Q 6) Final (Q 1, 4, 6)

Score: 0 – 49 Amateur, 50 – 69 Developing, 70 – 84 Developed, 85 – 100 Exemplary

Rubric for evaluating Outcome 3 of CMPS 450

Term: Fall 2016			Instructor: Mohsen Amini Salehi			
Outcome: Be proficient in more than one programming language on more than one computing platform						
Performance Criteria	1 Amateur	2 Developing	3 Developed	4 Exemplary	SCORE	How Measured
Explain different programming languages paradigms	X				40	Midterm 1 (Q 1 – 2),
Develop programs in functional programming language paradigm		X			50	Assignment 1, Midterm 1 (Q 3 – 5), Final (Q 5)
Develop programs in logical programming paradigm	X				44	Assignment 2, Midterm 2 (Q 2, 4, 5), Final (Q 3)
Develop and Extend objects in Object Oriented Programming	X				32	Assignment 3, Midterm 2 (Q 1, 3) Final (Q 2)
Apply knowledge obtained in learning a new programming language		X			50	Assignment 4, Midterm 2 (Q 6) Final (Q 1, 4, 6)

Score: 0 – 49 Amateur, 50 – 69 Developing, 70 – 84 Developed, 85 – 100 Exemplary

Rubric for evaluating Outcome 3 of CMPS 450

Term: Fall 2016			Instructor: Mohsen Amini Salehi			
Outcome: Be proficient in more than one programming language on more than one computing platform						
Performance Criteria	1 Amateur	2 Developing	3 Developed	4 Exemplary	SCORE	How Measured
Explain different programming languages paradigms		X			53	Midterm 1 (Q 1 – 2),
Develop programs in functional programming language paradigm		X			65	Assignment 1, Midterm 1 (Q 3 – 5), Final (Q 5)
Develop programs in logical programming paradigm		X			62	Assignment 2, Midterm 2 (Q 2, 4, 5), Final (Q 3)
Develop and Extend objects in Object Oriented Programming		X			63	Assignment 3, Midterm 2 (Q 1, 3) Final (Q 2)
Apply knowledge obtained in learning a new programming language		X			69	Assignment 4, Midterm 2 (Q 6) Final (Q 1, 4, 6)

Score: 0 – 49 Amateur, 50 – 69 Developing, 70 – 84 Developed, 85 – 100 Exemplary

Rubric for evaluating Outcome 3 of CMPS 450

Term: Fall 2016			Instructor: Mohsen Amini Salehi			
Outcome: Be proficient in more than one programming language on more than one computing platform						
Performance Criteria	1 Amateur	2 Developing	3 Developed	4 Exemplary	SCORE	How Measured
Explain different programming languages paradigms				X	90	Midterm 1 (Q 1 – 2),
Develop programs in functional programming language paradigm		X			52	Assignment 1, Midterm 1 (Q 3 – 5), Final (Q 5)
Develop programs in logical programming paradigm		X			62	Assignment 2, Midterm 2 (Q 2, 4, 5), Final (Q 3)
Develop and Extend objects in Object Oriented Programming			X		83	Assignment 3, Midterm 2 (Q 1, 3) Final (Q 2)
Apply knowledge obtained in learning a new programming language		X			63	Assignment 4, Midterm 2 (Q 6) Final (Q 1, 4, 6)

Score: 0 – 49 Amateur, 50 – 69 Developing, 70 – 84 Developed, 85 – 100 Exemplary

Rubric for evaluating Outcome 3 of CMPS 450

Term: Fall 2016			Instructor: Mohsen Amini Salehi			
Outcome: Be proficient in more than one programming language on more than one computing platform						
Performance Criteria	1 Amateur	2 Developing	3 Developed	4 Exemplary	SCORE	How Measured
Explain different programming languages paradigms	X				46	Midterm 1 (Q 1 – 2),
Develop programs in functional programming language paradigm			X		75	Assignment 1, Midterm 1 (Q 3 – 5), Final (Q 5)
Develop programs in logical programming paradigm		X			66	Assignment 2, Midterm 2 (Q 2, 4, 5), Final (Q 3)
Develop and Extend objects in Object Oriented Programming			X		81	Assignment 3, Midterm 2 (Q 1, 3) Final (Q 2)
Apply knowledge obtained in learning a new programming language		X			68	Assignment 4, Midterm 2 (Q 6) Final (Q 1, 4, 6)

Score: 0 – 49 Amateur, 50 – 69 Developing, 70 – 84 Developed, 85 – 100 Exemplary

Rubric for evaluating Outcome 3 of CMPS 450

Term: Fall 2016			Instructor: Mohsen Amini Salehi			
Outcome: Be proficient in more than one programming language on more than one computing platform						
Performance Criteria	1 Amateur	2 Developing	3 Developed	4 Exemplary	SCORE	How Measured
Explain different programming languages paradigms	X				43	Midterm 1 (Q 1 – 2),
Develop programs in functional programming language paradigm			X		77	Assignment 1, Midterm 1 (Q 3 – 5), Final (Q 5)
Develop programs in logical programming paradigm		X			50	Assignment 2, Midterm 2 (Q 2, 4, 5), Final (Q 3)
Develop and Extend objects in Object Oriented Programming			X		74	Assignment 3, Midterm 2 (Q 1, 3) Final (Q 2)
Apply knowledge obtained in learning a new programming language		X			60	Assignment 4, Midterm 2 (Q 6) Final (Q 1, 4, 6)

Score: 0 – 49 Amateur, 50 – 69 Developing, 70 – 84 Developed, 85 – 100 Exemplary

Rubric for evaluating Outcome 3 of CMPS 450

Term: Fall 2016			Instructor: Mohsen Amini Salehi			
Outcome: Be proficient in more than one programming language on more than one computing platform						
Performance Criteria	1 Amateur	2 Developing	3 Developed	4 Exemplary	SCORE	How Measured
Explain different programming languages paradigms				X	96	Midterm 1 (Q 1 – 2),
Develop programs in functional programming language paradigm			X		76	Assignment 1, Midterm 1 (Q 3 – 5), Final (Q 5)
Develop programs in logical programming paradigm		X			62	Assignment 2, Midterm 2 (Q 2, 4, 5), Final (Q 3)
Develop and Extend objects in Object Oriented Programming				X	86	Assignment 3, Midterm 2 (Q 1, 3) Final (Q 2)
Apply knowledge obtained in learning a new programming language			X		76	Assignment 4, Midterm 2 (Q 6) Final (Q 1, 4, 6)

Score: 0 – 49 Amateur, 50 – 69 Developing, 70 – 84 Developed, 85 – 100 Exemplary

Rubric for evaluating Outcome 3 of CMPS 450

Term: Fall 2016			Instructor: Mohsen Amini Salehi			
Outcome: Be proficient in more than one programming language on more than one computing platform						
Performance Criteria	1 Amateur	2 Developing	3 Developed	4 Exemplary	SCORE	How Measured
Explain different programming languages paradigms			X		83	Midterm 1 (Q 1 – 2),
Develop programs in functional programming language paradigm				X	90	Assignment 1, Midterm 1 (Q 3 – 5), Final (Q 5)
Develop programs in logical programming paradigm		X			68	Assignment 2, Midterm 2 (Q 2, 4, 5), Final (Q 3)
Develop and Extend objects in Object Oriented Programming				X	92	Assignment 3, Midterm 2 (Q 1, 3) Final (Q 2)
Apply knowledge obtained in learning a new programming language				X	90	Assignment 4, Midterm 2 (Q 6) Final (Q 1, 4, 6)

Score: 0 – 49 Amateur, 50 – 69 Developing, 70 – 84 Developed, 85 – 100 Exemplary

Rubric for evaluating Outcome 3 of CMPS 450

Term: Fall 2016			Instructor: Mohsen Amini Salehi			
Outcome: Be proficient in more than one programming language on more than one computing platform						
Performance Criteria	1 Amateur	2 Developing	3 Developed	4 Exemplary	SCORE	How Measured
Explain different programming languages paradigms	X				33	Midterm 1 (Q 1 – 2),
Develop programs in functional programming language paradigm		X			63	Assignment 1, Midterm 1 (Q 3 – 5), Final (Q 5)
Develop programs in logical programming paradigm		X			60	Assignment 2, Midterm 2 (Q 2, 4, 5), Final (Q 3)
Develop and Extend objects in Object Oriented Programming		X			59	Assignment 3, Midterm 2 (Q 1, 3) Final (Q 2)
Apply knowledge obtained in learning a new programming language		X			57	Assignment 4, Midterm 2 (Q 6) Final (Q 1, 4, 6)

Score: 0 – 49 Amateur, 50 – 69 Developing, 70 – 84 Developed, 85 – 100 Exemplary

Rubric for evaluating Outcome 3 of CMPS 450

Term: Fall 2016			Instructor: Mohsen Amini Salehi			
Outcome: Be proficient in more than one programming language on more than one computing platform						
Performance Criteria	1 Amateur	2 Developing	3 Developed	4 Exemplary	SCORE	How Measured
Explain different programming languages paradigms	X				43	Midterm 1 (Q 1 – 2),
Develop programs in functional programming language paradigm				X	92	Assignment 1, Midterm 1 (Q 3 – 5), Final (Q 5)
Develop programs in logical programming paradigm		X			61	Assignment 2, Midterm 2 (Q 2, 4, 5), Final (Q 3)
Develop and Extend objects in Object Oriented Programming				X	93	Assignment 3, Midterm 2 (Q 1, 3) Final (Q 2)
Apply knowledge obtained in learning a new programming language				X	80	Assignment 4, Midterm 2 (Q 6) Final (Q 1, 4, 6)

Score: 0 – 49 Amateur, 50 – 69 Developing, 70 – 84 Developed, 85 – 100 Exemplary

Rubric for evaluating Outcome 3 of CMPS 450

Term: Fall 2016			Instructor: Mohsen Amini Salehi			
Outcome: Be proficient in more than one programming language on more than one computing platform						
Performance Criteria	1 Amateur	2 Developing	3 Developed	4 Exemplary	SCORE	How Measured
Explain different programming languages paradigms		X			60	Midterm 1 (Q 1 – 2),
Develop programs in functional programming language paradigm				X	90	Assignment 1, Midterm 1 (Q 3 – 5), Final (Q 5)
Develop programs in logical programming paradigm			X		70	Assignment 2, Midterm 2 (Q 2, 4, 5), Final (Q 3)
Develop and Extend objects in Object Oriented Programming				X	96	Assignment 3, Midterm 2 (Q 1, 3) Final (Q 2)
Apply knowledge obtained in learning a new programming language		X			69	Assignment 4, Midterm 2 (Q 6) Final (Q 1, 4, 6)

Score: 0 – 49 Amateur, 50 – 69 Developing, 70 – 84 Developed, 85 – 100 Exemplary

Rubric for evaluating Outcome 3 of CMPS 450

Term: Fall 2016			Instructor: Mohsen Amini Salehi			
Outcome: Be proficient in more than one programming language on more than one computing platform						
Performance Criteria	1 Amateur	2 Developing	3 Developed	4 Exemplary	SCORE	How Measured
Explain different programming languages paradigms			X		76	Midterm 1 (Q 1 – 2),
Develop programs in functional programming language paradigm			X		80	Assignment 1, Midterm 1 (Q 3 – 5), Final (Q 5)
Develop programs in logical programming paradigm				X	86	Assignment 2, Midterm 2 (Q 2, 4, 5), Final (Q 3)
Develop and Extend objects in Object Oriented Programming				X	88	Assignment 3, Midterm 2 (Q 1, 3) Final (Q 2)
Apply knowledge obtained in learning a new programming language		X			64	Assignment 4, Midterm 2 (Q 6) Final (Q 1, 4, 6)

Score: 0 – 49 Amateur, 50 – 69 Developing, 70 – 84 Developed, 85 – 100 Exemplary

Rubric for evaluating Outcome 3 of CMPS 450

Term: Fall 2016			Instructor: Mohsen Amini Salehi			
Outcome: Be proficient in more than one programming language on more than one computing platform						
Performance Criteria	1 Amateur	2 Developing	3 Developed	4 Exemplary	SCORE	How Measured
Explain different programming languages paradigms	X				30	Midterm 1 (Q 1 – 2),
Develop programs in functional programming language paradigm				X	92	Assignment 1, Midterm 1 (Q 3 – 5), Final (Q 5)
Develop programs in logical programming paradigm			X		81	Assignment 2, Midterm 2 (Q 2, 4, 5), Final (Q 3)
Develop and Extend objects in Object Oriented Programming				X	92	Assignment 3, Midterm 2 (Q 1, 3) Final (Q 2)
Apply knowledge obtained in learning a new programming language			X		79	Assignment 4, Midterm 2 (Q 6) Final (Q 1, 4, 6)

Score: 0 – 49 Amateur, 50 – 69 Developing, 70 – 84 Developed, 85 – 100 Exemplary

Rubric for evaluating Outcome 3 of CMPS 450

Term: Fall 2016			Instructor: Mohsen Amini Salehi			
Outcome: Be proficient in more than one programming language on more than one computing platform						
Performance Criteria	1 Amateur	2 Developing	3 Developed	4 Exemplary	SCORE	How Measured
Explain different programming languages paradigms	X				23	Midterm 1 (Q 1 – 2),
Develop programs in functional programming language paradigm	X				18	Assignment 1, Midterm 1 (Q 3 – 5), Final (Q 5)
Develop programs in logical programming paradigm	X				12	Assignment 2, Midterm 2 (Q 2, 4, 5), Final (Q 3)
Develop and Extend objects in Object Oriented Programming	X				35	Assignment 3, Midterm 2 (Q 1, 3) Final (Q 2)
Apply knowledge obtained in learning a new programming language	X				38	Assignment 4, Midterm 2 (Q 6) Final (Q 1, 4, 6)

Score: 0 – 49 Amateur, 50 – 69 Developing, 70 – 84 Developed, 85 – 100 Exemplary

Rubric for evaluating Outcome 3 of CMPS 450

Term: Fall 2016			Instructor: Mohsen Amini Salehi			
Outcome: Be proficient in more than one programming language on more than one computing platform						
Performance Criteria	1 Amateur	2 Developing	3 Developed	4 Exemplary	SCORE	How Measured
Explain different programming languages paradigms		X			53	Midterm 1 (Q 1 – 2),
Develop programs in functional programming language paradigm			X		78	Assignment 1, Midterm 1 (Q 3 – 5), Final (Q 5)
Develop programs in logical programming paradigm			X		71	Assignment 2, Midterm 2 (Q 2, 4, 5), Final (Q 3)
Develop and Extend objects in Object Oriented Programming				X	86	Assignment 3, Midterm 2 (Q 1, 3) Final (Q 2)
Apply knowledge obtained in learning a new programming language				X	86	Assignment 4, Midterm 2 (Q 6) Final (Q 1, 4, 6)

Score: 0 – 49 Amateur, 50 – 69 Developing, 70 – 84 Developed, 85 – 100 Exemplary

Rubric for evaluating Outcome 3 of CMPS 450

Term: Fall 2016			Instructor: Mohsen Amini Salehi			
Outcome: Be proficient in more than one programming language on more than one computing platform						
Performance Criteria	1 Amateur	2 Developing	3 Developed	4 Exemplary	SCORE	How Measured
Explain different programming languages paradigms		X			66	Midterm 1 (Q 1 – 2),
Develop programs in functional programming language paradigm		X			55	Assignment 1, Midterm 1 (Q 3 – 5), Final (Q 5)
Develop programs in logical programming paradigm		X			60	Assignment 2, Midterm 2 (Q 2, 4, 5), Final (Q 3)
Develop and Extend objects in Object Oriented Programming				X	86	Assignment 3, Midterm 2 (Q 1, 3) Final (Q 2)
Apply knowledge obtained in learning a new programming language			X		69	Assignment 4, Midterm 2 (Q 6) Final (Q 1, 4, 6)

Score: 0 – 49 Amateur, 50 – 69 Developing, 70 – 84 Developed, 85 – 100 Exemplary

Rubric for evaluating Outcome 3 of CMPS 450

Term: Fall 2016			Instructor: Mohsen Amini Salehi			
Outcome: Be proficient in more than one programming language on more than one computing platform						
Performance Criteria	1 Amateur	2 Developing	3 Developed	4 Exemplary	SCORE	How Measured
Explain different programming languages paradigms	X				10	Midterm 1 (Q 1 – 2),
Develop programs in functional programming language paradigm	X				19	Assignment 1, Midterm 1 (Q 3 – 5), Final (Q 5)
Develop programs in logical programming paradigm	X				36	Assignment 2, Midterm 2 (Q 2, 4, 5), Final (Q 3)
Develop and Extend objects in Object Oriented Programming		X			52	Assignment 3, Midterm 2 (Q 1, 3) Final (Q 2)
Apply knowledge obtained in learning a new programming language	X				38	Assignment 4, Midterm 2 (Q 6) Final (Q 1, 4, 6)

Score: 0 – 49 Amateur, 50 – 69 Developing, 70 – 84 Developed, 85 – 100 Exemplary

Rubric for evaluating Outcome 3 of CMPS 450

Term: Fall 2016			Instructor: Mohsen Amini Salehi			
Outcome: Be proficient in more than one programming language on more than one computing platform						
Performance Criteria	1 Amateur	2 Developing	3 Developed	4 Exemplary	SCORE	How Measured
Explain different programming languages paradigms	X				50	Midterm 1 (Q 1 – 2),
Develop programs in functional programming language paradigm		X			64	Assignment 1, Midterm 1 (Q 3 – 5), Final (Q 5)
Develop programs in logical programming paradigm		X			54	Assignment 2, Midterm 2 (Q 2, 4, 5), Final (Q 3)
Develop and Extend objects in Object Oriented Programming		X			61	Assignment 3, Midterm 2 (Q 1, 3) Final (Q 2)
Apply knowledge obtained in learning a new programming language			X		75	Assignment 4, Midterm 2 (Q 6) Final (Q 1, 4, 6)

Score: 0 – 49 Amateur, 50 – 69 Developing, 70 – 84 Developed, 85 – 100 Exemplary

Rubric for evaluating Outcome 3 of CMPS 450

Term: Fall 2016			Instructor: Mohsen Amini Salehi			
Outcome: Be proficient in more than one programming language on more than one computing platform						
Performance Criteria	1 Amateur	2 Developing	3 Developed	4 Exemplary	SCORE	How Measured
Explain different programming languages paradigms			X		83	Midterm 1 (Q 1 – 2),
Develop programs in functional programming language paradigm			X		84	Assignment 1, Midterm 1 (Q 3 – 5), Final (Q 5)
Develop programs in logical programming paradigm			X		75	Assignment 2, Midterm 2 (Q 2, 4, 5), Final (Q 3)
Develop and Extend objects in Object Oriented Programming				X	96	Assignment 3, Midterm 2 (Q 1, 3) Final (Q 2)
Apply knowledge obtained in learning a new programming language			X		82	Assignment 4, Midterm 2 (Q 6) Final (Q 1, 4, 6)

Score: 0 – 49 Amateur, 50 – 69 Developing, 70 – 84 Developed, 85 – 100 Exemplary

Rubric for evaluating Outcome 3 of CMPS 450

Term: Fall 2016			Instructor: Mohsen Amini Salehi			
Outcome: Be proficient in more than one programming language on more than one computing platform						
Performance Criteria	1 Amateur	2 Developing	3 Developed	4 Exemplary	SCORE	How Measured
Explain different programming languages paradigms	X				40	Midterm 1 (Q 1 – 2),
Develop programs in functional programming language paradigm		X			68	Assignment 1, Midterm 1 (Q 3 – 5), Final (Q 5)
Develop programs in logical programming paradigm	X				33	Assignment 2, Midterm 2 (Q 2, 4, 5), Final (Q 3)
Develop and Extend objects in Object Oriented Programming	X				42	Assignment 3, Midterm 2 (Q 1, 3) Final (Q 2)
Apply knowledge obtained in learning a new programming language			X		78	Assignment 4, Midterm 2 (Q 6) Final (Q 1, 4, 6)

Score: 0 – 49 Amateur, 50 – 69 Developing, 70 – 84 Developed, 85 – 100 Exemplary

Rubric for evaluating Outcome 3 of CMPS 450

Term: Fall 2016			Instructor: Mohsen Amini Salehi			
Outcome: Be proficient in more than one programming language on more than one computing platform						
Performance Criteria	1 Amateur	2 Developing	3 Developed	4 Exemplary	SCORE	How Measured
Explain different programming languages paradigms	X				33	Midterm 1 (Q 1 – 2),
Develop programs in functional programming language paradigm			X		71	Assignment 1, Midterm 1 (Q 3 – 5), Final (Q 5)
Develop programs in logical programming paradigm		X			58	Assignment 2, Midterm 2 (Q 2, 4, 5), Final (Q 3)
Develop and Extend objects in Object Oriented Programming			X		70	Assignment 3, Midterm 2 (Q 1, 3) Final (Q 2)
Apply knowledge obtained in learning a new programming language		X			54	Assignment 4, Midterm 2 (Q 6) Final (Q 1, 4, 6)

Score: 0 – 49 Amateur, 50 – 69 Developing, 70 – 84 Developed, 85 – 100 Exemplary

Rubric for evaluating Outcome 3 of CMPS 450

Term: Fall 2016			Instructor: Mohsen Amini Salehi			
Outcome: Be proficient in more than one programming language on more than one computing platform						
Performance Criteria	1 Amateur	2 Developing	3 Developed	4 Exemplary	SCORE	How Measured
Explain different programming languages paradigms	X				43	Midterm 1 (Q 1 – 2),
Develop programs in functional programming language paradigm		X			69	Assignment 1, Midterm 1 (Q 3 – 5), Final (Q 5)
Develop programs in logical programming paradigm		X			56	Assignment 2, Midterm 2 (Q 2, 4, 5), Final (Q 3)
Develop and Extend objects in Object Oriented Programming		X			69	Assignment 3, Midterm 2 (Q 1, 3) Final (Q 2)
Apply knowledge obtained in learning a new programming language			X		71	Assignment 4, Midterm 2 (Q 6) Final (Q 1, 4, 6)

Score: 0 – 49 Amateur, 50 – 69 Developing, 70 – 84 Developed, 85 – 100 Exemplary

Rubric for evaluating Outcome 3 of CMPS 450

Term: Fall 2016			Instructor: Mohsen Amini Salehi			
Outcome: Be proficient in more than one programming language on more than one computing platform						
Performance Criteria	1 Amateur	2 Developing	3 Developed	4 Exemplary	SCORE	How Measured
Explain different programming languages paradigms				X	96	Midterm 1 (Q 1 – 2),
Develop programs in functional programming language paradigm				X	88	Assignment 1, Midterm 1 (Q 3 – 5), Final (Q 5)
Develop programs in logical programming paradigm		X			62	Assignment 2, Midterm 2 (Q 2, 4, 5), Final (Q 3)
Develop and Extend objects in Object Oriented Programming			X		73	Assignment 3, Midterm 2 (Q 1, 3) Final (Q 2)
Apply knowledge obtained in learning a new programming language			X		77	Assignment 4, Midterm 2 (Q 6) Final (Q 1, 4, 6)

Score: 0 – 49 Amateur, 50 – 69 Developing, 70 – 84 Developed, 85 – 100 Exemplary

Rubric for evaluating Outcome 3 of CMPS 450

Term: Fall 2016			Instructor: Mohsen Amini Salehi			
Outcome: Be proficient in more than one programming language on more than one computing platform						
Performance Criteria	1 Amateur	2 Developing	3 Developed	4 Exemplary	SCORE	How Measured
Explain different programming languages paradigms	X				6	Midterm 1 (Q 1 – 2),
Develop programs in functional programming language paradigm	X				48	Assignment 1, Midterm 1 (Q 3 – 5), Final (Q 5)
Develop programs in logical programming paradigm			X		79	Assignment 2, Midterm 2 (Q 2, 4, 5), Final (Q 3)
Develop and Extend objects in Object Oriented Programming		X			63	Assignment 3, Midterm 2 (Q 1, 3) Final (Q 2)
Apply knowledge obtained in learning a new programming language		X			65	Assignment 4, Midterm 2 (Q 6) Final (Q 1, 4, 6)

Score: 0 – 49 Amateur, 50 – 69 Developing, 70 – 84 Developed, 85 – 100 Exemplary