

Outcomes Mapping

TECHNOLOGY & HEALTH DIVISION

Program:	Commercial Flight	# Courses: (if applicable)	9	Updated:	6/30/15	Submitted by:	Robert Rogus
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Institutional Level Outcomes (ILOs): *As a result of an educational experience with any aspect of the college, students will develop the following knowledge, skills, abilities, and attitudes:*

1. Communication		2. Critical Thinking		3. Information and Technology Literacy		4: Personal, Social, Civic, and Environmental Responsibility			
Connect PLOs with an I, P, or M (see Key in Footer) identifying the level to which knowledge or a skill can be demonstrated following the completion of the program or educational experience.						PLO to ILO Alignment			
PLO Name		PLO Defined: Upon successful completion of this program, students will be able to:				1	2	3	4
1. Aviation Industry and Career Planning		Students will recognize and comprehend terms and vocabulary associated with piloting and air traffic control; early federal legislation that was influential in shaping the aviation industry; the function of government in regulating the aviation industry; airline economics and demand; and career planning skills and resources.				P	M	M	P
2. Aviation Safety and Human Factors		Students will recognize and comprehend physiology limitations humans experience in flight; comprehend the skills, techniques, and procedures of advanced crew resource management (ACRM), and applying ACRM principles in problem-solving scenarios; analyze aircraft accident case-studies and identify key factors leading to aircraft accidents.				P	M	P	M
3. Aviation Weather and Aeronautical Decision Making		Students will identify and determine the characteristics of North American continental and worldwide weather systems; encode and decode hourly surface weather observations and pilot reports; encode and decode aviation weather forecasts and meteorological advisories; and summarize aviation weather conditions and forecasts using a variety of charts, observations, and forecasts with the goal of demonstrating good decision-making and problem-solving skills.				P	M	M	P
4. Flight Operations and Flight Planning		Students will comprehend the skills, techniques, and procedures for safely operating aircraft in primary, instrument, and commercial flight operations. Students will be able to explain the principles of flight and aerodynamics as they relate to airplanes, helicopters, and other high-performance aircraft; analyze aircraft performance data necessary for takeoff and landing and evaluate problem-solving scenarios for “go” and				M	M	M	P

Key for Level of Learning

(Use for Mapping SLOs/MOs to PLOs to ILOs)

I = Knowledge/Skill Introduced

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Outcomes Mapping

	“no-go” decisions; analyze and apply weight and balance principles in problem-solving scenarios.				
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Outcomes Mapping

See the Outcomes Assessment website for definitions and examples of Mt. SAC's ILOs: <http://www.mtsac.edu/instruction/outcomes/ilos.html>

Student Learning Outcomes (SLOs), Measureable Objectives (MOs), Administrative Unit Objectives (AUOs)														
Course: AERO 100 Primary Pilot Ground School	Connect Outcomes with an I , P , or M (see Key in Footer) identifying the level to which knowledge or a skill can be demonstrated in that portion of the course or service.													
SLOs, MOs, AUOs	PLO 1	PLO 2	PLO 3	PLO 4							ILO 1	ILO 2	ILO 3	ILO 4
Students will be able to compute safe limits of aircraft weight and balance on light aircraft.	I	I	I	P							I	P	I	
Students will demonstrate their understanding of the various procedures and techniques utilized in cross-country flight navigation	I	I	P	P							P	P	I	I
Identify terms and vocabulary associated with piloting and air traffic control.	P	I	I	I							P	P	I	I
Calculate and complete a flight planning log using aircraft performance data, aeronautical charts, navigation plotter, and manual flight computer.	P	I	I	P							P	P	I	
Analyze the fundamentals of airplane and helicopter aerodynamics and flight characteristics.	P	P		I							P	P	I	
Recognize symbols and decode data from aeronautical charts.	P	P		P							P	P	I	I
Interpret radio navigation instruments and determine the aircraft line of position.	I	I		I							P	P	I	I
Use and read six basic flight instruments.	P	P	I	P							P	P	I	

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Student Learning Outcomes (SLOs), Measureable Objectives (MOs), Administrative Unit Objectives (AUOs)														
Course: AERO 102 Aviation Weather	Connect Outcomes with an I, P, or M (see Key in Footer) identifying the level to which knowledge or a skill can be demonstrated in that portion of the course or service.													
SLOs, MOs, AUOs	PLO 1	PLO 2	PLO 3	PLO 4							ILO 1	ILO 2	ILO 3	ILO 4
Students will be able to decipher Federal Aviation Administration hourly airport weather observations (METAR) and terminal aerodrome forecasts (TAF).	I	P	M	P							M	M	M	
Students will be able to distinguish the various types of air masses and fronts that affect the weather of the United States.	I	I	M	I							M	M	M	I
Identify layers of earth's atmosphere and determine height and at least one characteristic of each layer.	I		M								M	M	M	I
Determine effect of earth's uneven heat distribution on atmospheric pressure and weather.		I	M								M	M	M	I
Relate differences in true altitude, actual altitude, indicated altitude, and pressure altitude.	P		M	P							M	M	M	
Appraise cause and effect of evaporation, saturation, condensation, and precipitation on atmosphere's water cycle.			M								M	M	M	I
Encode and decode hourly surface weather observations; and decode pilot reports, terminal forecasts, area forecasts, winds aloft forecasts, and meteorological advisories.	I	I	M	M							M	M	P	
Correlate and summarize the aviation	I	P	M	M							M	M	M	I

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weather conditions and forecast for a specific location on a particular day using U.S. Low-Level Significant Weather Prognostic Chart, High-Level Significant Weather Prognostic Chart, and the Radar Summary Chart.

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Student Learning Outcomes (SLOs), Measureable Objectives (MOs), Administrative Unit Objectives (AUOs)														
Course: AERO 104 Federal Aviation Regulations	Connect Outcomes with an I, P, or M (see Key in Footer) identifying the level to which knowledge or a skill can be demonstrated in that portion of the course or service.													
SLOs, MOs, AUOs	PLO 1	PLO 2	PLO 3	PLO 4							ILO 1	ILO 2	ILO 3	ILO 4
Students will be able to identify, classify, and describe FAA airspace by the operational differences and equipment requirements.	P	I	I	I								P	I	
Students will be able to identify FAA eligibility requirements and aeronautical experience requirements for each FAA pilot certificate and rating.	M	I		I								I	I	I
Identify the terms and vocabulary associated with aviation terminology and federal aviation regulations.	M	I	I								I	I	I	
Classify airspace by operational differences and equipment requirements.	M	I	I	I								I	I	
Analyze requirements for Visual Flight Rules operations, including weather minimums in a variety of airspace scenarios.	P	P	P	P							I	I	I	
Identify the FAA eligibility requirements, aeronautical knowledge requirements and aeronautical experience requirements for each FAA pilot certificate and rating.	M			I								P	I	
Examine the variety of planning requirements for cross-country flights including an analysis of FAR Part 1 regulations.	P	I	P	P							I	P	I	

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Student Learning Outcomes (SLOs), Measureable Objectives (MOs), Administrative Unit Objectives (AUOs)														
Course: AERO 150 Commercial Pilot Ground School	Connect Outcomes with an I, P, or M (see Key in Footer) identifying the level to which knowledge or a skill can be demonstrated in that portion of the course or service.													
SLOs, MOs, AUOs	PLO 1	PLO 2	PLO 3	PLO 4							ILO 1	ILO 2	ILO 3	ILO 4
Students will be able to identify the Practical Test Standards for Commercial Maneuvers.	I	I		P								P	I	
Students completing the course will be able to compute takeoff and landing data.	P	I		M								P	I	
Explain the principles of flight and aerodynamics as they relate to high-performance aircraft.	P			P							I	P		
Calculate aircraft performance data necessary for takeoff and landing, and cross-country flight.	I	I	I	M								M	P	
Appraise takeoff decisions based on computed aircraft weight and balance, including center of gravity and the aircraft's safe operating limitations.	I	P	I	M								M	P	
Diagram the basic fuel system of a single-engine aircraft and relate the function of individual components to the overall system.	I			P								P		
Describe the objective, procedures, and common errors of the Commercial Pilot flight maneuvers.	P	P	I	P							I	M	P	I

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Student Learning Outcomes (SLOs), Measureable Objectives (MOs), Administrative Unit Objectives (AUOs)														
Course: AERO 152 Air Transportation	Connect Outcomes with an I, P, or M (see Key in Footer) identifying the level to which knowledge or a skill can be demonstrated in that portion of the course or service.													
SLOs, MOs, AUOs	PLO 1	PLO 2	PLO 3	PLO 4							ILO 1	ILO 2	ILO 3	ILO 4
Students will Identify the events, persons, equipment, facilities, and legislation which led to the development of the air transportation industry	P	P	I								P	I		
Students will analyze the economic and marketing process within a typical airline	P										P	P	P	P
Distinguish economic, cultural, and political factors impacting the air transportation industry	P	P		I							P	P		
Identify the events, persons, equipment, facilities, and legislation which led to development of air transportation industry	M	P	I								I	P		
Evaluate the administrative processes of agencies regulating air transportation industry	P	I										P	P	I
Identify the components of a commercial organization which administers and operates a typical airline	P	I									I	I		
Analyze economic and marketing process within a typical airline	P										P	P	P	I
Identify organizations controlling the regulatory processes in international aviation	M	P		I							I	I		I
Analyze aviation career opportunities in regard to personal strengths and weaknesses, minimum job requirements, and job outlook	P	I	I								P	P	P	P

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Course: AERO 200 Aviation Safety & Human Factors	Connect Outcomes with an I, P, or M (see Key in Footer) identifying the level to which knowledge or a skill can be demonstrated in that portion of the course or service.													
SLOs, MOs, AUOs	PLO 1	PLO 2	PLO 3	PLO 4							ILO 1	ILO 2	ILO 3	ILO 4
Students will be able to identify the common chain of events that lead to aircraft accidents	I	P	P									I		
Students will be able to identify the aeronautical decision making process	P	M										I		
Describe the various human factors that relate to and/or lead to an aviation accident.	I	P		I							P	I	P	
Explain the common illusions that a pilot might experience during flight.	P	M	P								P	P	I	
Analyze aviation accident case studies and identify key factors leading to the accidents.	I	P	P	I							P	P	P	I
Identify strategies recommended to reduce hazardous personal attitudes leading to pilot error and aviation accidents.	I	P		I							I	P	P	P
Combine techniques for Crew Resource Management into principles of applied cockpit and air traffic control efficiency and safety.	I	I	I	I							I	P	P	I

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Student Learning Outcomes (SLOs), Measureable Objectives (MOs), Administrative Unit Objectives (AUOs)														
Course: AERO 202 Aircraft Engines & Systems	Connect Outcomes with an I, P, or M (see Key in Footer) identifying the level to which knowledge or a skill can be demonstrated in that portion of the course or service.													
SLOs, MOs, AUOs	PLO 1	PLO 2	PLO 3	PLO 4							ILO 1	ILO 2	ILO 3	ILO 4
Students will be able to identify the Four Stroke Engine Cycle and the components of the aircraft engine	I		I	P								P		
Students will be able to differentiate between fixed pitch and variable pitch propeller systems	I			P								P		
Identify engine components and their function on a four-stroke aircraft engine.	P	I	I	M								P		
Differentiate aircraft engine problems from malfunctions involving other aircraft subsystems, including relating decisions for successful troubleshooting of operational engine problems.	I	P	P	M							I	P	P	I
Diagram basic aircraft subsystems, including hydraulic systems and pneumatic systems (to include identification of system components and their function).	I	P	P	P								P		
Interpret aircraft schematic diagrams and illustrated parts breakdowns.	I			P							I	P		
Analyze operation of jet engine fuel systems, fuel storage, and fuel transfer.	I	I	I	P							I	P	I	

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Student Learning Outcomes (SLOs), Measureable Objectives (MOs), Administrative Unit Objectives (AUOs)														
Course: AERO 250 Navigation	Connect Outcomes with an I, P, or M (see Key in Footer) identifying the level to which knowledge or a skill can be demonstrated in that portion of the course or service.													
SLOs, MOs, AUOs	PLO 1	PLO 2	PLO 3	PLO 4							ILO 1	ILO 2	ILO 3	ILO 4
Students completing the course will be able to identify, utilize, and integrate advanced radio navigation systems into their local and cross country flight planning procedures.	P		P	P								P	P	
Students will be able to complete aircraft flight planning logs utilizing the various procedures and techniques for long range navigation.	P	P	P	P								P	P	P
Define the terms and vocabulary associated with aeronautical charting, aerial navigation, and electronic navigation.	M	P	P	M							P	M		
Calculate solutions to aircraft performance charts and dead-reckoning navigation problems using a manual flight computer.	P	P		M								M	P	
Evaluate flight scenarios and select appropriate courses of action in relation to navigation systems and methods.	P	P	P	P							P	P	P	P
Explain the principles of radio navigation.	P	I		P							P	P		
Compare and contrast terrestrial radio navigation systems with satellite-based navigation systems.	P	I		P							P	P		P

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Student Learning Outcomes (SLOs), Measureable Objectives (MOs), Administrative Unit Objectives (AUOs)														
Course: AERO 252 Instrument Ground School	Connect Outcomes with an I, P, or M (see Key in Footer) identifying the level to which knowledge or a skill can be demonstrated in that portion of the course or service.													
SLOs, MOs, AUOs	PLO 1	PLO 2	PLO 3	PLO 4							ILO 1	ILO 2	ILO 3	ILO 4
Students will be able to plan IFR (Instrument Flight Rules) cross country flights.	P	P	P	P							P	P	P	
Students will be able to diagram holding patterns and holding pattern entries using a variety of radio navigation systems.	P			M								M		
Explain the minimum flight instruments required for instrument flight	P		P	P							P			
Analyze aircraft instruments to assure that each instrument is functioning properly		P	P	M								M		
Examine departure situations, including analysis of aircraft equipment requirements for IFR flights.	P	P	P	M							P	M	P	P
Calculate and complete an instrument flight planning log using aircraft performance data, instrument routing, weather data, and flight computer		P	P	P							P	M	P	P
Diagram an instrument holding pattern and compute an appropriate holding pattern entry	P		P	M								M		

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Student Learning Outcomes (SLOs), Measureable Objectives (MOs), Administrative Unit Objectives (AUOs)														
Course: AERO 256 (stand-alone) Flight Instructor Ground School	Connect Outcomes with an I, P, or M (see Key in Footer) identifying the level to which knowledge or a skill can be demonstrated in that portion of the course or service.													
SLOs, MOs, AUOs	PLO 1	PLO 2	PLO 3	PLO 4							ILO 1	ILO 2	ILO 3	ILO 4
Students will be able to demonstrate knowledge of instructional methods as outlined by the FAA	P			P								P	P	
Students will create lesson plans for basic and advanced flight lessons		P	P	P								P	P	
Construct flight lesson plans, provide background regarding required training items, and demonstrate lesson plans to peers.	P	P	P	P							P	P	P	P
Combine factors necessary for successful completion of newly introduced flight maneuvers and demonstrate how these factors will be utilized in flight lessons.	P	P	P	P							P	P	P	P
Differentiate errors made by student pilots in basic flight maneuvers, including correction of those errors by demonstration and further practice.	P			P								P	P	
Analyze basic flight maneuvers for common coordination errors made by student pilots.	P			P								P		
Distinguish flight test preparation requirements, including documents required.	P			P								P		

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Student Learning Outcomes (SLOs), Measureable Objectives (MOs), Administrative Unit Objectives (AUOs)														
Course: AERO 258 (stand-alone) Multi Engine Turbine Ground School	Connect Outcomes with an I, P, or M (see Key in Footer) identifying the level to which knowledge or a skill can be demonstrated in that portion of the course or service.													
SLOs, MOs, AUOs	PLO 1	PLO 2	PLO 3	PLO 4							ILO 1	ILO 2	ILO 3	ILO 4
Students will be able to differentiate characteristics of high speed flight that require special action by pilots previously trained in lower performance aircraft.	P	I	P	P								P	P	
Students will be able to diagram aircraft subsystems (including hydraulic systems and emergency equipment), to include identification of primary components and their function		I		P								P		
Diagram aircraft subsystems (including hydraulic systems and emergency equipment), to include identification of primary components and their function.		I		P								P		
Combine performance data for a multi-engine turbine aircraft to determine operational safety relative to takeoff and landing distance criteria and operational air speeds.		P		P							P	P	P	
Analyze subsystem malfunctions (simulated) that might occur during emergency conditions and provide resolution scenarios that are applicable to the safe completion of the flight.	P			P							P	P	P	
Identify characteristics of high speed flight that require special action by pilots previously trained in lower performance aircraft.	P	I	P	P							P	P		P
Relate performance characteristics to observed		P	I	P							P	P	P	P

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cockpit indications, including the detection of parameters outside of normal expected performance.														
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TECHNOLOGY & HEALTH DIVISION							
Program:	Aviation Science	# Courses: (if applicable)	11	Updated:	6/30/15	Submitted by:	Robert Rogus

Note: See Commercial Flight for overlapping/duplicated courses

Institutional Level Outcomes (ILOs): <i>As a result of an educational experience with any aspect of the college, students will develop the following knowledge, skills, abilities, and attitudes:</i>									
1. Communication		2. Critical Thinking		3. Information and Technology Literacy		4: Personal, Social, Civic, and Environmental Responsibility			
Connect PLOs with an I, P, or M (see Key in Footer) identifying the level to which knowledge or a skill can be demonstrated following the completion of the program or educational experience.						PLO to ILO Alignment			
PLO Name	PLO Defined: <i>Upon successful completion of this program, students will be able to:</i>					1	2	3	4
5. Air Traffic Control	Students will be familiar with how the National Airspace System has evolved into today's complex airspace environment; understand current air traffic control separation standards and procedures for both terminal and en route operations; apply those separation standards, procedures, and techniques in a computer simulated environment while being aware of emerging air traffic control technologies and automation.					M	M	M	P
6. Aircraft Recognition	Students will be able to recognize, identify, and remember a wide variety of aircraft including the manufacturer, Federal Aviation Administration identification code, aircraft performance characteristics, and how those characteristics are applied to meet en route and terminal separation standards in a computer driven simulated environment.					M	M	P	P
7. Air Traffic Control Team Skills	Students will be able to understand the importance of teamwork among co-workers, the various stages of team development, coping and performing techniques and how to apply them in a scenario-based working environment; recognize a variety of personality types and team behaviors toward becoming a skilled team player as applied to today's intense air traffic control working environment.					M	M	P	M

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Course: AIRT 151 Aircraft Identification and Performance	Connect Outcomes with an I, P, or M (see Key in Footer) identifying the level to which knowledge or a skill can be demonstrated in that portion of the course or service.													
SLOs, MOs, AUOs	PLO 1	PLO 2	PLO 3								ILO 1	ILO 2	ILO 3	ILO 4
Students will be able to identify aircraft by their category and weight class for separation purposes.	P	M									M	M	P	
Student will be able to recognize aircraft visually and identify the aircraft's manufacturer, aircraft designator, aircraft name, and FAA identification number.	P	M									M	M	P	
Detect the identifying characteristics of various aircraft and match that aircraft to the official FAA Type Designator (ID).	P	M									M	M	P	
Classify aircraft by FAA Category as required for air traffic control sequencing and separation.	P	M	I								M	M	P	I
Classify aircraft by FAA Weight Class as required for air traffic control sequencing and separation.	P	M									M	M	P	
Analyze aircraft for performance characteristics required for air traffic control sequencing and separation.	P	M	I								M	M	P	P
Inventory families of aircraft to determine similar manufacturer standards.	P	M									M	M	P	

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Course: AIRT 201 Terminal Air Traffic Control	Connect Outcomes with an I, P, or M (see Key in Footer) identifying the level to which knowledge or a skill can be demonstrated in that portion of the course or service.													
SLOs, MOs, AUOs	PLO 1	PLO 2	PLO 3								ILO 1	ILO 2	ILO 3	ILO 4
Students will compose microphone phraseology pertinent to radar and non-radar ATC instructions.	P	P	I								P	P	P	P
Students will distinguish the differences and the relationship between radar positions within a TOWER and a TRACON, including radar handoff procedures.	M		I								P	P	P	
Distinguish the differences and the relationship between positions within a Tower and a Terminal Radar Approach Control (TRACON).	M	P	P								P	P	P	I
Compose microphone phraseology pertinent to terminal ATC instructions.	P		I								P	P	P	P
Compose and interpret terminal flight progress strips for aircraft departures and arrivals.	P	P									P	P	P	
Diagram the functional relationship between assigned positions in an FAA control tower, including clearance delivery, ground control, and local control.	M		P								P	P	P	
Demonstrate proper issuance of Air Traffic Control (ATC) tower clearances.	P	I	I								P	P	P	P

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Course: AIRT 203 En Route Air Traffic Control	Connect Outcomes with an I, P, or M (see Key in Footer) identifying the level to which knowledge or a skill can be demonstrated in that portion of the course or service.													
SLOs, MOs, AUOs	PLO 1	PLO 2	PLO 3								ILO 1	ILO 2	ILO 3	ILO 4
Students will distinguish the differences and the relationship between radar positions within Air Route Traffic Control Center, including radar handoff procedures.	M		P								P	P	P	I
Demonstrate proper phraseology for enroute air traffic control clearances.	M	I	I								P	P	P	
Translate airspace structure into appropriate control instructions for adequate horizontal and vertical aircraft separation.	M										P	P	P	
Diagram the functional relationship between assigned positions in an enroute center, including radar control, associate radar control, and flight data.	M		P								P	P	P	
Compose and interpret enroute flight progress strips.	M	I									P	P	P	P
Prepare an ATC clearance using standard FAA phraseology for use during class role-playing exercises.	M	I	I								P	P	P	P

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Course: AIRT 251 Air Traffic Control Team Skills	Connect Outcomes with an I, P, or M (see Key in Footer) identifying the level to which knowledge or a skill can be demonstrated in that portion of the course or service.													
SLOs, MOs, AUOs	PLO 1	PLO 2	PLO 3								ILO 1	ILO 2	ILO 3	ILO 4
Students will combine techniques for effective teams in the accomplishment of ATC tasks involving interpersonal coordination, including aircraft handoffs and in-flight emergencies.	P	I	M								M	P	P	M
Students will construct scenario solutions involving the impact of attitudes and values in teamwork situations.	P		M								M	P	P	P
Combine techniques for effective teams in the accomplishment of ATC tasks involving interpersonal communication.	P		M								M	P		M
Integrate routine ATC radar separation requirements with non-routine ATC situations involving personal stress.	P	I	M								M	P		P
Criticize team techniques for efficiency and adherence to characteristics utilized by highly effective teams.	P		M								M	P		M
Differentiate interpersonal techniques that can be used for a variety of ATC scenarios, including non-radar control and separation of aircraft.	P		M								M	P		M
Construct scenario solutions involving the impact of attitudes and values in teamwork situations.	P		M								M	P	I	M

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Outcomes Mapping

Student Learning Outcomes (SLOs), Measureable Objectives (MOs), Administrative Unit Objectives (AUOs)														
Course: AIRT 201L (stand-alone) Terminal Air Traffic Control Lab	Connect Outcomes with an I, P, or M (see Key in Footer) identifying the level to which knowledge or a skill can be demonstrated in that portion of the course or service.													
SLOs, MOs, AUOs	PLO 1	PLO 2	PLO 3								ILO 1	ILO 2	ILO 3	ILO 4
Students will manage simultaneous calls from aircraft, including proper establishment of communication priorities	M	P	P								P	P	P	P
Students will distinguish ATC handoff procedures, including coordination between TRACON and control towers.	M	P	P								P	P	P	
Distinguish control tower arrival/departure procedures for VFR and IFR aircraft.	M	P	P								P	P	P	
Differentiate sequence of actions for weather observations and Automatic Terminal Information Service (ATIS) production.	M	P	P								P	P	P	
Manage simultaneous calls from aircraft inflight, including proper establishment of communication priorities.	M	P	P								P	P	P	P
Integrate procedures for handling computer and interagency communication priorities with direct communications from pilots within Class D airspace.	M	P	P								P	P	P	
Distinguish ATC handoff procedures, including coordination between Terminal Radar Approach Control (TRACON) and control towers.	M	P	P								P	P	P	I

Key for Level of Learning
 (Use for Mapping SLOs/MOs to PLOs to ILOs)
 I = Knowledge/Skill Introduced
 P = Knowledge/Skill Practiced/Applied
 M = Knowledge/Skill Mastered

Outcomes Mapping

Student Learning Outcomes (SLOs), Measureable Objectives (MOs), Administrative Unit Objectives (AUOs)														
Course: AIRT 203L (stand-alone) En Route Air Traffic Control Lab	Connect Outcomes with an I, P, or M (see Key in Footer) identifying the level to which knowledge or a skill can be demonstrated in that portion of the course or service.													
SLOs, MOs, AUOs	PLO 1	PLO 2	PLO 3								ILO 1	ILO 2	ILO 3	ILO 4
Students will distinguish proper separation between at least three aircraft making instrument approaches.	M	M	P								M	M	M	P
Students will relay altitude and heading changes to aircraft.	M	M									M	M	M	
Relate, by headset when necessary, each operating position of the FAA facility.	M	M	P								M	M	M	
Relate the operations and tasks of each facility position.	M		P								M	M	M	
Illustrate weather reporting and observation techniques, in accordance with NWS standards.	M										M	M	M	
Differentiate FAA forms utilized for air traffic management.	M	M									M	M	M	
Identify the procedures agreed upon in the FAA "Letters of Agreement" of at least four air traffic control facilities.	M	M									M	M	M	

Key for Level of Learning
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Outcomes Mapping

Student Learning Outcomes (SLOs), Measureable Objectives (MOs), Administrative Unit Objectives (AUOs)														
Course: AIRT 253 (stand-alone) Work Experience	Connect Outcomes with an I, P, or M (see Key in Footer) identifying the level to which knowledge or a skill can be demonstrated in that portion of the course or service.													
SLOs, MOs, AUOs	PLO 1	PLO 2	PLO 3								ILO 1	ILO 2	ILO 3	ILO 4
Employers of Air Traffic Control Work Experience Students will rate the technical skills of their students as above average.	M	M	M								M	M	M	P
Employers of Air Traffic Control Work Experience Students will rate the work habits of their students as above average.	M	M	M								M	M	M	P
Relate, by headset when necessary, each operating position of the FAA facility.	M	M	M								M	M	M	
Relate the operations and tasks of each facility position.	M	M	M								M	M	M	
Illustrate weather reporting and observation techniques, in accordance with NWS standards.	M										M	M	M	
Differentiate FAA forms utilized for air traffic management.	M	M	M								M	M	M	
Identify the procedures agreed upon in the FAA "Letters of Agreement" of at least four air traffic control facilities.	M	M	M								M	M	M	

Key for Level of Learning
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 I = Knowledge/Skill Introduced
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 M = Knowledge/Skill Mastered