

## ADA100 – ADA Fundamentals for ADA 95

<b>WEEK ONE</b>	
<b>Course Description</b>	1) Ada is a comprehensive high-level programming language designed for the professional development of large or critical programs where correctness and robustness are imperative. This course provides a full introduction to programming in Ada. Classic programming features are discussed, with an emphasis on Ada's support for constructing modular, portable, and reliable systems.
<b>Student Introductions</b>	1) Experience with ADA 95 2) Experience with other languages 3) Background and expectations
<b>Course Materials/Tools</b>	1) ADA95 Courseware 2) Canvas 3) Learn on Demand
<b>Class Topics</b>	1) Section 1: Introduction 2) Section 2: Basic Ada Code Organization
<b>WEEK TWO</b>	
<b>Class Topics</b>	1) Section 3: Ada Lexical Elements – some of the “small stuff” 2) Section 4: Ada Control Flow and Logic 3) Section 5: More Ada Types and Defining your own Types 4) Section 6: More about Types – Unbounded Strings, Arrays, Records, and Packages
<b>WEEK THREE</b>	
<b>Class Topics</b>	1) Section 7: Private Types, Limited Private Types, and a Little Bit of Object-Oriented Programming 2) Section 8: Toward a Standard Object-Oriented Ada Format 3) Section 9: Extending a Tagged Type 4) Section 10: Abstract Types and Subprograms
<b>WEEK FOUR</b>	
<b>Class Topics</b>	1) Section 11: A Bit More Control and Text File I/O 2) Section 12: Access Types 3) Section 13: Exceptions 4) Section 14: Generics 5) Section 15: Multi-Tasking Basics 6) Section 16: Operator Overloading
<b>WEEK FIVE</b>	
<b>Class Topics</b>	1) Section 17: AUnit – Unit Testing Framework 2) Section 18: A Very Brief Introduction to the Ada95 Booch Components 3) Section 19: Ada Program Structure 4) Section 20: Miscellaneous and Optimization