

TOPIC 7	Function m-files
SUB-TOPICS	<ul style="list-style-type: none"> ▪ MATLAB built-in (pre-defined) functions ▪ Using functions: function calls, input and output ▪ Built-ins accepting different types of function calls ▪ Anonymous functions ▪ Function m-files – basic rules ▪ Global and local variables ▪ Functions with no input or output variables ▪ Comparing script and function m-files
OBJECTIVES	<p>by the end of this unit, students should be able to:</p> <ul style="list-style-type: none"> - use built-in functions having multiple input/output variables with confidence - write and use anonymous functions - construct (working) function m-files and use them correctly - manage files and folders on the MATLAB search path - convert script files to functions (if/when appropriate)
KEY WORDS AND EXPRESSIONS	on MOLE
CORE STUDY MATERIALS	<ul style="list-style-type: none"> - Textbook selection - MATLAB Topic 7 Notes - Topic 7 Problems (Question Bank) - Vocabulary Lists
TEXTBOOK STUDY	<p>Essential Reading</p> <p>Chapter 4 <i>Importing and Exporting Data</i></p> <ul style="list-style-type: none"> - Section 4.1 (Common Functions) <p>Chapter 7 <i>Function M-files</i></p> <ul style="list-style-type: none"> - All except sections listed under Recommended Reading <p>Key content: 7.2 (Basic Rules) & Chapter Summary</p> <p>Recommended/Optional Reading (these topics are difficult without some background in programming)</p> <p>Chapter 7 <i>Function M-files</i></p> <ul style="list-style-type: none"> - Sections 7.2.1 – 7.2.4 (Subfunctions, Private functions, P-code, Profiler) - 7.3 Function Handles - 7.6 Debugging - 7.7 Recursion
ADDITIONAL RESOURCES	check on MOLE