

[SAS-MC1V2]: SAS Macro Language 1: Essentials

Length : 2 Days
Delivery Method : Instructor-led (Classroom)

Course Overview

This course focuses on using the SAS macro facility to design, write, and debug macro programs, with an emphasis on understanding how programs that contain macro code are processed.

Audience Profile

Experienced SAS programmers who are familiar with simple SQL queries and well-versed in DATA step processing and who want to write reusable, dynamic programs and automate repetitive processing in SAS

At Course Completion

Learn how to

- Perform text substitution in SAS code.
- Use macro variables and macro functions.
- Automate and customize the production of SAS code.
- Conditionally or iteratively construct SAS code.
- Write self-modifying, data-driven programs.

Pre-Requisites

Before attending this course, you should have knowledge equivalent to having completed the SAS Programming 1: Essentials and SAS Programming 2: Data Manipulation Techniques courses. Specifically, you should be able to do the following:

- Write simple SQL queries using the SELECT statement.
- Read from and write to SAS tables using a DATA step.
- Use DATA step programming statements, including IF-THEN/ELSE, DO WHILE, DO UNTIL, and iterative DO.
- Use SAS data set options, including DROP=, KEEP=, and OBS=.
- Use character functions, including SUBSTR, SCAN, and UPCASE.
- Read subsets from tables using the WHERE statement.
- Create and use SAS date values and constants.
- Use Base SAS procedures such as SORT, PRINT, CONTENTS, MEANS, and FREQ.

This course addresses Base SAS software.

This course is appropriate for students who are using SAS 9 software. Demonstrations and practices are based on SAS 9.4M6.

AVANTUS TRAINING PTE LTD

80 Jurong East Street 21 #04-04 Devan Nair Institute Singapore 068897

Main Line: +65 6661 0888 | Fax: +65 6661 0886

Email: enquiries@AvantusTraining.com

www.AvantusTraining.com

Course Outline

Module 1: Introduction

Lessons

- Why SAS macro?
- Setting up for this course

Module 2: SAS Macro Facility

Lessons

- Program flow
- Creating and using macro variables

Module 3: Storing and Processing Text

Lessons

- Macro functions
- Using SQL to create macro variables
- Using the DATA step to create macro variables
- Indirect references to macro variables

Module 4: Working with Macro Programs

Lessons

- Defining and calling a macro
- Macro variable scope
- Conditional processing
- Iterative processing

Module 5: Developing Macro Applications

Lessons

- Storing macros
- Generating data-dependent code
- Validating parameters and documenting macros

AVANTUS TRAINING PTE LTD

80 Jurong East Street 21 #04-04 Devan Nair Institute Singapore 068897

Main Line: +65 6661 0888 | Fax: +65 6661 0886

Email: enquiries@AvantusTraining.com

www.AvantusTraining.com