Course Overview
Course number: TPS-3816
Course length: 5 days

Having problems getting your LCN and UCN to deliver the desired performance?
This course provides knowledge and tools to improve and optimize overall Local Control and Universal Control Networks performances.

- A review of LCN and UCN hardware and software environments
- Issues that affect performances

You will become familiar with the issues that affect performance by increasing your understanding of system operations, communications, and database management. You will utilize tools such as the Perfmenu and standard system displays for analysis and troubleshooting.

Course Benefits
Optimize LCN and UCN system performance
- Learn tools and methods to configure the LCN and UCN node databases for maximum performance
- Interpret the Perfmenu displays
- Identify and solve performance problem

Course Delivery Options
- Instructor based Training
- In-Center Instructor-Led Training

Who Should Take This Course?
TotalPlant Solution System (TPS) Customers:
- Responsible for optimizing performance of their site’s LCNs and UCNs
- Administering system support for their site’s LCNs and UCNs
- Responsible for defining site standards or standard operating procedures for database implementation
- Looking to better understand and utilize Perfmenu and the standard system displays

Prerequisite/Skill Requirements
Prerequisite Course(s)
- (TDC-3300HPM or TDC-3300HPM-FT) or
- (TPS-5722 or TPS-5722-FT)

Required Skills and/or Experience
- One of the following is recommended:
  - (TDC-3310UCN or TDC-3310UCN-FT)
  - (TPS-5756 or TPS-5756-FT)
  - Basic Picture Editor experience

Desirable Skills and/or Experience
- Familiarization with own plant’s process control environment
- Some prior experience with loop tuning in a production facility is helpful but not absolutely necessary

Course Topics
You will learn how to....
- Identify and understand the various functions of the operating system
- Backup the system database and understand the checkpoint files
- Understand LCN node communications and interpret related Perfmenu displays
- Implement the system clock and interpret the clock Perfmenu displays
- Perform an LCN Reconnect procedure
- Manage and create the files in the &ASY directory and perform on-line Network Configuration File (NCF) changes
- Configure the History Module (HM) to optimize its performance
- Optimize LCN Data Access to improve system performance
- Implement External Load Modules
- Allocate AM/APP node memory and configure optional, custom and background AM/APP functions in the NCF
Course Topics continued

- Determine and monitor a system’s performance characteristics using the Perfmenu displays
- Enhance Universal Station (US) display invocation time by optimizing memory allocation, pathname catalog configuration and custom graphic construction.
- Troubleshoot system problems using the standard system and SMCC displays
- Identify the UCN communications and interpret related system displays
- Manage UCN peer-to-peer communications
- Interpret NIM loading and factors that affect the NIM
- Use multiple NIMs
- Analyze the Process Manager schedule
- Manage the UCN database and checkpoint files
- Determine and monitor the UCN performance using Perfmenu displays
- Use Documentation Tool for UCN
- Use Find Names for UCN
- Optimize UCN Data Access to improve performance

Additional Training

To increase your knowledge and skills, there are additional courses available from Automation College.