The goal of this course is to learn the configuration and features of the Symphony Plus operator console (HMI) used in SCADA applications.

**Learning objectives**

Upon completion of this course, students will be able to:

- Identify S+ Operations system architecture in SCADA application
- Apply basic system sizing criteria
- Setup the network communication of Symphony Plus system nodes
- Install Symphony Plus Software
- Configure and manage the system users
- Utilize the various tools available in S+ Engineering for system configuration
- Create graphic elements
- Manage and configure alarm and events
- Set up the historical data collection and configure trend displays
- Setup Web Client
- Set up Mobile Client
- Configure third party communication
- Diagnose S+ Operations stations
- Configure historical reports and scheduler
- Execute project backup and restore
- Utilize S+ Operations utilities

**Topics**

- Symphony Plus SCADA architecture and sizing
- PC network setup
- Time synchronization
- S+ Engineering and S+ Operations Installation
- SCADA workflow overview
- S+ SCADA Licensing
- S+ Engineering Navigation
- S+ Engineering User Management
- S+ Engineering Project Admin
- S+ Engineering Topology Design
- S+ Engineering Bulk Engineering
- S+ Engineering Connectivity
- S+ Engineering Universal Connect
- S+ Engineering Operations Engineering
- S+ Operations multi-server configuration
- S+ Operations SCADA architectures examples
- S+ Operations Server Redundancy
- S+ Operations Navigation
- S+ Operations Database
- S+ Operations Display Builder
- S+ Operations Graphical Symbols and Faceplates
- S+ Operations Alarms and Events
- S+ Operations Historical Data and Trends
- S+ Operations Point of Control
- S+ Operations Command Gateway
- S+ Operations Mobile Web Client
- S+ Operations stations diagnostic
- S+ Operations historical report & scheduler
- S+ Operations Utilities

**Participant profile**

This training is targeted to system and application engineers, commissioning and maintenance personnel, service engineers and system integrators.

**Prerequisites**

Students should have a general understanding of process automation and basic knowledge of SCADA systems. Experience in dealing with and handling of current Microsoft operating system is an advantage.
**Course type and methods**
This is an instructor led course with interactive classroom discussions and associated lab exercises. Approximately 50% of the course is hands-on lab activities.

**Duration**
9 1/2 days

---

### Agenda

<table>
<thead>
<tr>
<th>Day 1</th>
<th>Day 2</th>
<th>Day 3</th>
<th>Day 4</th>
<th>Day 5</th>
</tr>
</thead>
<tbody>
<tr>
<td>Course overview</td>
<td>SCADA workflow overview</td>
<td>S+ Engineering Topology</td>
<td>S+ Engineering Universal Connect</td>
<td>S+ Operations multi-server configuration</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Design</td>
<td></td>
<td></td>
</tr>
<tr>
<td>PC network setup</td>
<td>S+ Engineering User Management</td>
<td>S+ Engineering Connectivity</td>
<td>Hands-on lab: Exercises</td>
<td>S+ Operations Server Redundancy</td>
</tr>
<tr>
<td>Time synchronization</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>S+ Engineering and S+ Operations Installation</td>
<td>S+ Engineering Project Admin</td>
<td>Hands-on lab: Exercises</td>
<td>Hands-on lab: Exercises</td>
<td>Questions and Answers</td>
</tr>
<tr>
<td>S+ SCADA Licensing</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Hands-on lab: Exercises</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Day 6</th>
<th>Day 7</th>
<th>Day 8</th>
<th>Day 9</th>
<th>Day 10</th>
</tr>
</thead>
<tbody>
<tr>
<td>S+ Operations Display Builder</td>
<td>Hands-on lab: Exercises</td>
<td>S+ Operations Command Gateway</td>
<td>S+ Operations stations diagnostic</td>
<td>Questions and Answers</td>
</tr>
<tr>
<td>Hands-on lab: Exercises</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Hands-on lab: Exercises</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>