Getting Started with OPC UA

Part 1: End User Products

Jouni Aro
Prosys OPC

Getting Started with OPC UA

#1 Free Test Applications
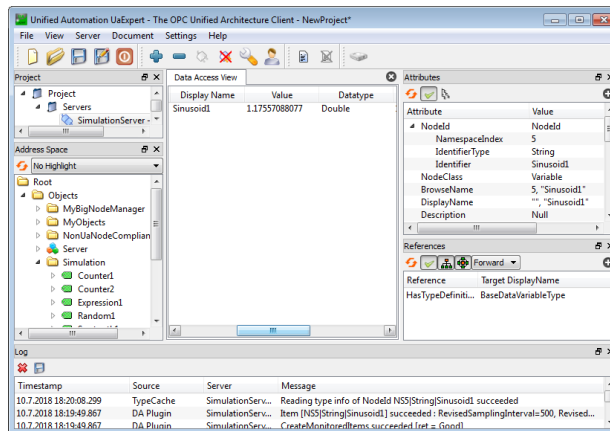
#2 End User Products
- ◦ Profiles
- ◦ Certification
- ◦ Product Catalog

#1 Free Test Applications

- OPC Foundation
  - Samples included in the '.NET Legacy' project
  - Github.com/opcfoundation
- Unified Automation
  - UaExpert
  - Demo Servers
  - unified-automation.com
- Prosys OPC
  - UA Client
  - UA Simulation Server
  - prosysopc.com

Free

#2 End User Products

▸ Select an Off-the-Shelf OPC UA Product for Your Needs
  ◦ Standalone or Embedded?
  ◦ Client or Server?
  ◦ Supported OPC UA Profiles?
  ◦ Certified?

OPC UA Profiles

- ▸ Subsets of Functionality
- ▸ Target for Certification

OPC UA Profiles

Following are the currently defined profiles, arranged according to their application category.

- Server Category
  - Facets
    - Core Characteristics
    - Data Access
    - Event Access
    - Alarm & Condition
    - Generic Features
    - Redundancy
    - Historical Access
    - Aggregates
    - Programs Model
  - FullFeatured
    - Nano Embedded Device 2017 Server Profile
    - Micro Embedded Device 2017 Server Profile
    - Embedded 2017 UA Server Profile
    - Standard 2017 UA Server Profile
    - Global Discovery Server 2017 Profile
    - Global Discovery and Certificate Mgmt 2017
- Client Category
  - Facets
    - Core Characteristics
    - Data Access
    - Event Access
    - Alarm & Condition
    - Generic Features
    - Redundancy
    - Historical Access
    - Aggregates
    - Programs Model
  - FullFeatured
    - Standard UA Client 2017 Profile
    - Global Certificate Management Client 2017

OPC
FOUNDATION

Welcome to the OPC Foundation Unified Architecture Profile Reporting Visualization Tool. This is the master database and primary source for all profile information and is used to generate the OPC UA Part 7 Profiles specification

Terminology used in this application:

- **Profile** - a full-featured definition of functionality that must be supported; consumer of other *Profiles*, *Facets*, *Conformance Groups*, and *Conformance Units*.
- **Facet** - a definition of partial functionality; consumder
- **Conformance Group** - a collection of *Conformance Units*
- **Conformance Unit** - specific functionality, e.g. Read an Array type etc.

Please refer to the OPC Unified Architecture Part 7 Specification.

Instructions

- Use the TreeView (left) to select a *Profile* or *Facet*
- The list of *Conformance Units* will appear here
- In the *Conformance Units* page you can filter the list using options at the top of the page.

Product Certification
End-User Focused

- Value Proposition
  - Proven reliability and interoperability
  - Faster configuration and start-up with fewer support calls
  - Minimal integration risks
- Target: Plug-and-play

Product Catalog

Product Catalog

Products » Find Certified Products

Find Certified Products

The OPC Foundation's Certification Program ensures that products meet OPC Foundation requirements for interoperability, reliability and minimum performance. End-users can reduce their system integration costs when deploying OPC-based systems by purchasing OPC Certified products such as those listed here.

🔍 modbus

	Member ▲	Products	Certified Profiles
+	Cyberlogic Technologies, Inc.	(1)	
+	Open Automation Software	(1)	
−	Prosys OPC Ltd	(1)	
		Prosys OPC UA Modbus Server	UA 1.02 Standard Server
+	Utthunga Technologies	(1)	

Showing 1 to 4 of 4 entries

← Previous 1 Next →

BECOME A MEMBER

Newest Members

Cisco Systems, Inc.
CoNet
VDW Verein deutscher Werkzeugmaschinenfabriken e.V.
iData Inc.
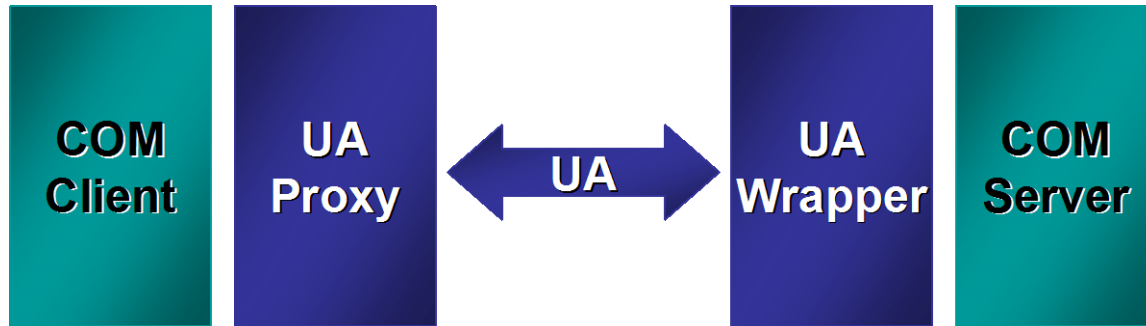CoreTigo

Certified Products

Cyberlogic OPC Server
Omron NX1 Machine Automation Controller
Puerto UaMonitor for Excel
TSI Facility Monitoring System (FMS)

Twitter Feed

Thanks @samsung for great hospitality hosting the @OPCFoundation Seminar Day Seoul

9

One more thing: OPC UA with OPC Classic

▸ UA Proxy & Wrapper components enable communications between UA and DCOM versions of OPC applications

COM Client	UA Proxy	← UA →	UA Wrapper	COM Server

▸ Where to get?
- OPC Foundation '.NET Legacy' project (free sample)
- Commercial products available (recommended)

Thanks!

Jouni Aro
Chief Technology Officer

jouni.aro@prosysopc.com