AGENDA

UniSim Competency Suite

R450 Highlights

What’s Next?

Questions
UniSim Competency Suite

**UniSim Operations**
Simulation based Operator Training Simulator
High fidelity simulation based training

**UniSim Tutor**
Knowledge based training
Knowledge capture and propagation
Thinking skills development

**UniSim Curriculum**
ASM Competency model maps competency to training activities
Track progress towards target proficiency

**UniSim Field View**
Field Operator Training
Panoramic high resolution photography for 2 dimensional visualisation of the plant

**UniSim 3D Connect**
Field Operator Training
Interface to 3rd party virtual reality training systems
R450 Highlights

UniSim Operations

• **Training Features**
  - DCS emulation Studio
    - Toolkit and support for DCS console emulations
  - Integrated logging, User and Training record management
    - SQL Database with Windows Authentication
  - Enhanced Instructor Features
    - Scenario feature performance improvements
    - Trend Search
    - Checklist sequence editor supports drag and drop, insert, cut, copy
  - General product quality improvements
    - Installation refresh.
    - Customer input

• High fidelity control/PLC and console emulation solution
• Updates to instructor features improve productivity and enhance user experience
• Continuous improvement through customer generated feedback
Honeywell maintains best in class integration with Experion DCS components.

New non Honeywell solutions:
- Unity Pro Toolkit
- Hima HiMax Adaptor and Toolkit
- MetsoDNA Adaptor

Enhanced Solutions:
- Existing Non-Honeywell DCS/PLC interface/emulation updates.
- Profit Suite R431 support

Honeywell maintains interfaces to 3rd party DCS components.
R450 Highlights

UniSim Tutor

• Refresh of User Interface
  - Editing mode layouts and workflow modernized
  - Practice and Exam mode presentation simplified and modernized.

• Software framework update
• Intuitive easy to use editing environment
• Cleaner look and feel enhances user experience.
R450 Highlights

UniSim Field View

- Enhancements
  - Bug fixes

UniSim Curriculum

- Enhancements
  - Integrated User Administration, logging and records management.
  - Bug fixes

- Integrate, Maintain and Enhance.
R450 Highlights

UniSim Competency Suite

• Licensing
  - UniSim Operations
    - Support for runtime/maintenance/development licenses
    - Support for evaluation feature license (sequence checklist/KPV)
  - Software
    - Windows 7, 10, 2008 R2, 2012, 2012 R2, 2016 support (all 64 bit, no 32 bit support for any OS)
    - Excel 2013 and Excel 2016 support
    - Internet Explorer 11 support for all OS’s except IE 9/Win 2008 SP2 and IE10/Win 2012 Standard
    - .NET 3.5 and .NET 4.5.2
    - Adobe Acrobat DC support

• Engineering
  - UniSim Design multi-user collaboration with case scenario manager for dynamics
  - Improved usability/robustness of OLGA interface
  - 75% Faster graphics generation for FSC/SM with parallel toolkit execution
  - CEE Adaptor UI Persistence
  - General bug fixes, enhancements and updates
  - [USD on next slide]
UniSim Design R450

- Multi-Phase Pump Unit Operation
- Different Open and Close time for Valve Actuator
- Supercritical Region handling
- SUM function in spreadsheet
- PVT Sim Import Tool
- Crude-Assay Import Tool, Refining Properties
- Vessel Level Tapping.
- Gibbs Reactor
- Heater Cooler Enhancement
- Transfer Function enhancement
R450 Highlights

**Tactical Support**

- **Product evolution**
  - Tactical Updates
    - Adaptors
    - Bridges
    - Toolkits

- **Consulting Support**
  - Assistance and advice to business development and consulting to provide solutions for customers
  - Assistance and advise to project teams during roll out of new solutions for DCS integration and emulation
  - Consulting services for 3rd parties wishing to integrate to UniSim products via bridges and adaptors
• **Electrical Networking**
  - Electrical networking will be supported in UniSim Design
    - Port and refresh of Shadow Plant technology
    - Hosted EO sub flowsheet
  - On going Support for electrical network modelling in Shadow Plant will be demised with R451 release
  - Legacy support for electrical network modelling will be per Shadow Plant support roadmap

• **UniSim Tutor Web Front End**
  - UniSim Tutor will be refactored to provide a web front end
  - Requirement is UniSim Tutor to run in a browser
  - **Benefits:**
    - Easier deployment across platforms and devices
    - Easier cloud deployment
      - No client side installations
      - Get started straight away
Roadmap

R460 Preview

• **Sustain and Maintain**
  - Support existing offering with alignments to Experion and Windows OS evolution
  - Engineering productivity developments
  - Continuation of console emulation technology development

• **Transform**
  - Extend solution offering for Operator Competency Management
    - Software roadmap for cloud deployment (offline and online modes of use)
    - Content development for Training services offering through cloud hosted eLearning