ds.tools
DISTRIBUTED SIMULATION TOOLS

coreDS X-Plane

HLA and DIS made easy with coreDS™

Overview

coreDS™ X-Plane is a plugin that turns your X-Plane flight simulator into a full featured HLA federate and/or DIS simulation.

Scripting functionality provides the flexibility needed by the end user to fully customize the simulator behaviour. coreDS™ X-Plane also provides a complete LUA scripting engine deeply integrated with X-Plane. For instance, you can create an OpenGL object when a given Interaction or PDU is received.

The software provides all the configuration GUIs, data encoding, a scripting engine, rate limiting capability and default configurations.

Main features

- Supports X-Plane 11 and 12;
- Cost-effective solution using proven technologies - save time and money;
- Provides configuration GUIs;
- Switch configuration at runtime from HLA to DIS, or to a new set of mapping, or FOM, or anything you can think of;
- Lightweight scripting engine (LUA) to do on-the-fly data conversion, reply to messages or update objects;
- Data mapping at run time. Change your FOM file or PDU mapping on the fly;
- Integrated dead reckoning;
- Support most distributed simulation concepts out of the box.

Advanced features

- Weapons and colisions support;
- Display external entities and events on the local map and/or IOS;
- Display external entities and events in the 3D world with custom models;
- Multiplayer mode;
- Multiscreen support;
- Built-in debugging tools.

High-Level Architecture (HLA)

Supported protocols

- HLA - DOD 1.3
- HLA - IEEE 1516
- HLA - IEEE 1516e

Supported RTIs

- All commercial RTIs (Pitch, MAK, RTI Ng Pro, RTI-S, Raytheon RTI, CAE RTI)
- Most OpenSource RTIs (Portico, Certi, Open-RTI)

Supported FOM

- Support any valid FOM File
- Tested with the RPR-FOM, NETN FOM

Distributed Interactive Simulation (DIS)

Supported protocols

- DIS 5 (IEEE 1278.1-1995)
- DIS 6 (IEEE 1278.1a-1998)
- DIS 7 (IEEE 1278.1-2012)

Supported PDUs

- All PDUs are supported
- Custom PDUs are supported