

MYSTIC

Advanced Framework For Simulation
Integration & Modeling

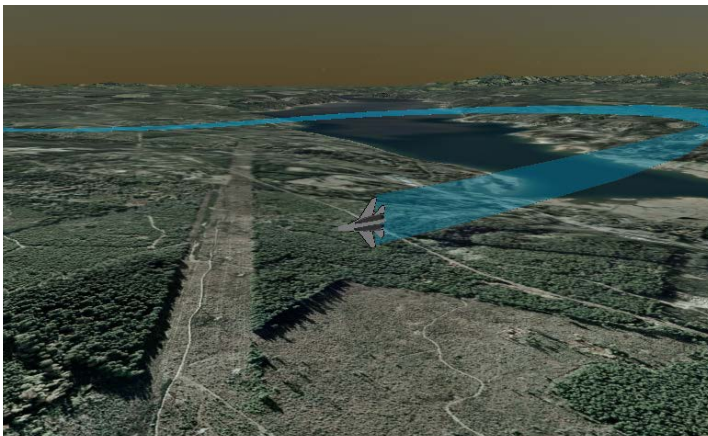
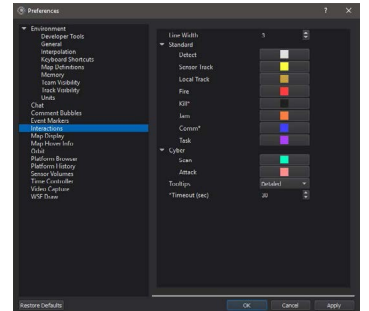
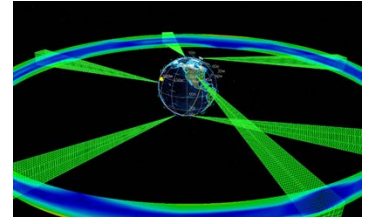


DCS is your source for AFSIM expertise and analysis excellence. As the original developers of Mystic, DCS conducts military utility and effectiveness analysis leveraging a variety of analytic techniques, our expert knowledge of AFSIM's flexible script-based input and user defined output to examine vast trade spaces across a myriad of existing and emerging equipment, concepts, actions, and settings.

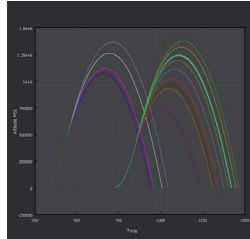
- Visualize replay of an AFSIM simulation execution
 - AFSIM event recordings (AER) file generated by the simulation
- Supports analysis within AFSIM
- Separate application (mystic.exe) delivered within the AFSIM release that can also be launched from Wizard or Warlock
- Automatically alerts user to re-load recording if scenario has been re-run in AFSIM
- Map overlay banner displays scenario's classification level, caveats, and trigraphs
- Dock widgets can be moved to other windows or floating windows and many can be shown at a time



- Most functionality can be enabled/disabled and customized
- Ability to mark points of interest, range rings, measure distance, and make annotations to map view
- Ability to drag items off the platform details and onto the map
- Model/Icon viewer and model/icon sizing capability
- Visualize
 - Tracks and ability to plot track metrics
 - Interaction lines (track, fire, jam etc.)
 - Sensor and jammer volumes
 - Platform history (trace-lines, wing-ribbons)
- Ability to save and load event filters using config files
- In-Application links to documentation

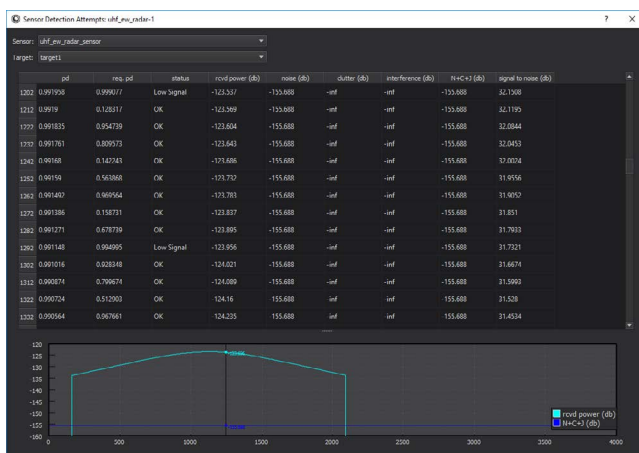
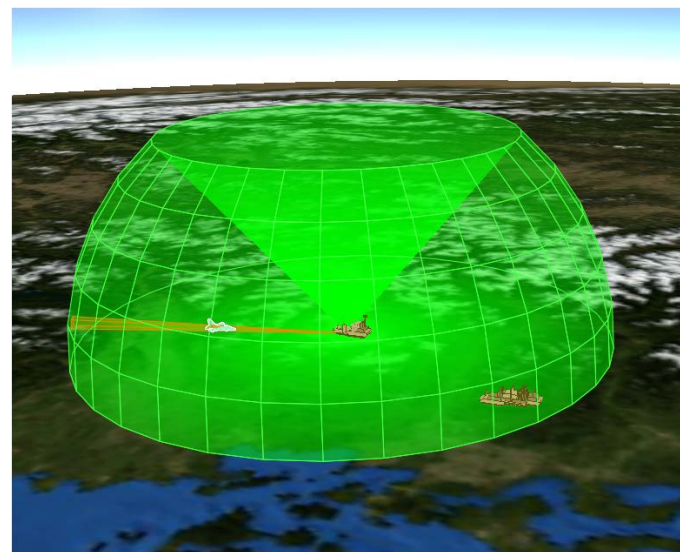
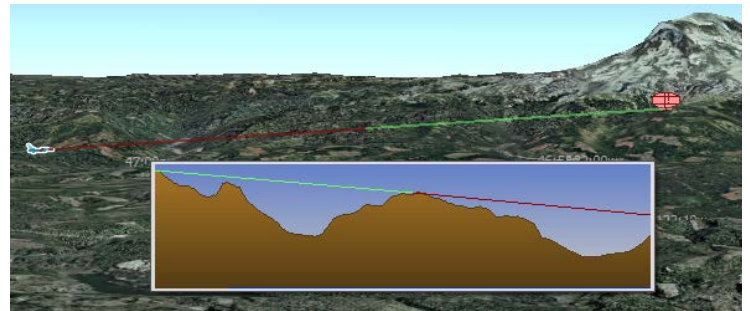


- Time controller options (jump to time, set play rate, play in reverse, play forward, pause, display rate, calendar time, sim time, bookmark navigation)
- Tether to platforms (custom camera views) with a special satellite tether for space domain platforms
- Compute relative metrics on the fly and drag and drop data onto any window
- Line-of-Sight tool allows a line to be drawn between two entities which will show when the line-of-sight is blocked by terrain
- Video capture/screenshot capability
- Ability to plot data over time by right clicking on numerical value in platform details dialog
 - Plot by platform, type, side, category etc.
- Ability to plot interaction state changes
- Integrated tools allow for the merger of replays from distributed simulations
- Behavior tree tool can be used to visualize the execution of advanced behavior trees
- Built in reports to look at detection attempts, engagement analysis, event list, and file statistics
- Ability to use engagement reports to trace tracks through the kill chain
- Users can customize event reports
 - Platform filter-rules to search by side, type, or category
- Ability to export filtered event-list to CSV files



GOVERNMENT MANAGEMENT

- AFSIM is available to DoD and DoD industry at no cost, includes source code, documentation, and access to training material
- Information Transfer Agreement (ITA) allows for direct distribution to industry, including classified version, allowing use of AFSIM for IRAD projects



DISTRIBUTION STATEMENT A: Approved For Public Release; Distribution is Unlimited. PA # AFRL-2022-4037

