



Human Systems Integration — Common Presentation Layer (CPL)

MPR Leads the Navy Team to Create Intuitive Display Guidance to Improve Operator Performance and Reduce Cost

CHALLENGE

Existing guidance for Navy shipboard displays has been very general, requiring developers to create their own unique guidance resulting in shipboard operators having to work with multiple interfaces, and sometimes without good human factors features in the displays. As a result, display development and training costs have been high and operator performance is not optimized.

SOLUTION

The Navy initiated a project to develop improved guidance for shipboard operational displays and define a “common presentation layer” (CPL) to be its foundation. The Navy assembled a team with demonstrated expertise in ship system displays, mission and tactical displays, human factors related to critical decision making, and the ability to apply leading edge industry knowledge to the Navy’s needs. The Navy selected MPR to lead this team due to our demonstrated success with developing displays to support critical decisions for ship system damage recovery and shipboard damage control; our understanding of human factors, decades of relevant experience in the nuclear power industry, and our ability to effectively lead the diverse Navy team. MPR developed the CPL Guide with input and review by a large team of experts and stakeholders. We achieved a consensus on the guidance and the Navy formally published the CPL Guide.

RESULTS

The superior human factors guidance and more extensive, detailed guidance in the CPL, promises to help the Navy achieve its goal of optimizing human performance. By improving commonality across displays, application of the CPL Guide will reduce the cost of training, display development and display upgrades. Users of the CPL Guide have referred to it as the best display guidance document they have seen.

