Executive Summary

This workshop on Coatings for Corrosion Protection: Offshore Oil and Gas Operation Facilities, Marine Pipelines, Ship Structures, and Port Facilities was held on April 14-16, 2004, in Biloxi, Mississippi. This workshop was organized by an industrial-based committee and hosted by the Colorado School of Mines for the U.S. Department of Interior (Mineral Management Service), U.S. Department of Transportation (Office of Pipeline Safety), U.S. Department of Commerce (National Institute of Standards and Technology), U.S. Department of Energy (Economic Regulatory Administration), U.S. Department of Homeland Security (U.S. Coast Guard-Ship Structure Committee), Norwegian Petroleum Directorate, California State Lands Commission, American Bureau of Shipping, Natural Resources of Canada, NACE International, and SSPC (The Society for Protective Coatings).

This workshop drew participation by internationally recognized marine coating experts, material specialists, inspection specialists, coating manufacturers, maintenance engineers, and designers. The workshop was designed to include multiple viewpoints: industrial, academic, environmental, regulatory, standardization, and certification.

Keynote and topic papers were presented to establish a current information base for discussions. Six discussion groups addressed specific issues and identified, prioritized, and recommended specific research and development topics for the government and industries to undertake. This workshop undertook a complete assessment of opportunities for research and development of coating practice, coating materials, coating application, repair, nondestructive evaluation, and extended coating life prediction. This workshop defined the state of the art, assessed the current practices and their limitations, discussed field experiences, and charted a course for the best corrosion protection methodologies of offshore structures, pipelines, and ship structures, including sensing and monitoring.

The recommendations of this workshop offer a clear identification of research and development issues and create a roadmap for achieving them. These recommendations are classified in a general fashion as Research, Development, Administration, and Operations. The recommendations are written in a format of broad agency announcement and offered in part or whole topics for consideration by agencies, technical societies, industry, and certification organizations for support and implementation.