

CRITICAL DECISIONS IN PROJECT MANAGEMENT

	Start Formal Project				Close Project		
PHASES	PROJECT PLANNING Phases				PROJECT EXECUTION Phases		
	PRE-CONCEPTUAL	CONCEPTUAL	PRELIMINARY DESIGN	FINAL DESIGN	CONSTRUCTION	ACCEPTANCE	OPERATIONS
Critical Decisions			SPECIAL PROCUREMENT		REMAINING PROCUREMENT		
	MISSION NEED APPROVED CD-0	BASELINE RANGE APPROVED CD-1	PERFORMANCE BASELINE APPROVED CD-2	CONSTRUCTION START APPROVED CD-3	COMPLETION/ ACCEPTANCE CD-4		
Major Input Items	<ul style="list-style-type: none"> Document Proposed Modification Technology Management Plan 	<ul style="list-style-type: none"> Permit Requirements Facilities Scope Preliminary Technology Development Input RSA / ORR Applicability 	<ul style="list-style-type: none"> Approval of Baseline for Major Projects Project Authorization Facility Scope Package Project Schedule Special Requirements Customer Expectations Initial Budget 	<ul style="list-style-type: none"> Source Documents Technology Development Output 	<ul style="list-style-type: none"> IFC Design Documents Material and Equipment Construction Permits 	<ul style="list-style-type: none"> Completed Systems 	
Major Milestones (examples)	<ul style="list-style-type: none"> Establish Project Team (IPT) Preliminary Environmental Strategy Technical Organizational Interfaces Integration with Other Projects and Activities Preliminary Acquisition Strategy Assemble Upfront Planning Committee Independent Mission Validation Review 	<ul style="list-style-type: none"> Define Project Objectives Develop Conceptual Phase Schedule Establish Existing Facility Baseline Set Project Execution Strategy Initial Site Investigation Establish Initial Budgets Review Design Alternatives Identify Project Codes, Standards and Procedures Evaluate Alternate Site Location Complete Facilities Scope Package Establish Technical and Functional Requirements Establish Cost and Schedule Ranges Perform Safety & Operability Review Verify Performance Criteria Perform Life-Cycle Cost Analysis Perform Project Risk Management Identify and Control Interfaces 	<ul style="list-style-type: none"> Confirm/Re-establish Project Team Initiate Performance Reporting Implement Trend Program Develop Project Specifications Finalize Permit Requirements Integrate Team Execution Plan Commit Critical Equipment Initiate Pulse Surveys Perform Process Hazards Review Project Site Selection Establish Scope, Schedule, and Cost Baselines Baseline Verification (Validation) Baseline Review 	<ul style="list-style-type: none"> Start Planning Drawings Receive Critical Vendor Data Complete Design Model Conduct Technical Innovations Evaluation Finalize Field Support Plan Commit Critical Equipment Review Safety Action Plan Perform Final Design Review 	<ul style="list-style-type: none"> Start Site Work Complete Procurement of Materials and Equipment Start Systems Completion Initiate Document Closeout Process Work off Punch Lists 	<ul style="list-style-type: none"> Startup Testing Verification of Performance Criteria Lessons Learned 	<ul style="list-style-type: none"> Financial Closeout Satisfaction Meeting
Major Deliverables	<ul style="list-style-type: none"> Statement of Mission Need Minimum Technical and Functional Requirements Short Form Data Sheet Pre-Conceptual Development Plan Technical Task Request (TTR) Technology Development Issues Program Plan 	<ul style="list-style-type: none"> Issue Acquisition Plan Project Expectations Summary Statement of Work NEPA Documentation Systems Engineering Management Plan Project Data Sheet Conceptual Design Report Project Execution Plan 	<ul style="list-style-type: none"> Team Execution Plan Detailed Schedules IFD Source Documents Division of Responsibilities Matrix Performance Metrics Staffing Plans Technical Risk Analysis Report Technology Development Output 	<ul style="list-style-type: none"> Equipment and Material Requisitions Definitive Estimate IPS and Detail Schedules 100% Design Estimate 	<ul style="list-style-type: none"> Turnover & Startup Plan Operating and Maintenance Manuals Construction Completion Startup Test Plan 	<ul style="list-style-type: none"> Readiness Self-Assessment Approval for Acceptance As-Built Drawings Project Completion Report 	

Note: Deliverables from each phase are input to subsequent phases