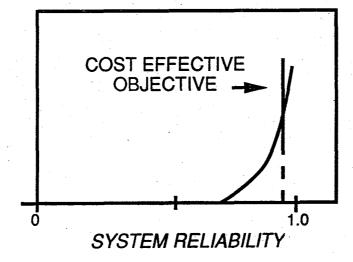
NASA Johnson Space Center



PRODUCT ASSURANCE TARGETED TO MEET MISSION OBJECTIVES

- DEMONSTRATED CAPABILITY FOR:
 - HIGH PROBABILITY OF SUCCESS
 - PAYLOAD CUSTOMER CONFIDENCE

PRODUCT ASSURANCE LEVEL OF EFFORT



Diane McLaughlin/NB23/x34089

Safety, Reliability , and Quality Assurance Office



PRODUCT ASSURANCE BASED ON "VALUE ADDED" STRATEGIC APPROACH

PRODUCT ASSURANCE TOOLS AND SUPPORT

- RELIABILITY BLOCK DIAGRAM ANALYSIS
 - EVALUATION OF PROBABILITY OF SUCCESS
 - SELECTIVE REDUNDANCY RECOMMENDATIONS
 - DESIGN EVALUATION
- MTBF REVIEW
- FAILURE HISTORY AND TRENDING
- OFF-THE -SHELF VENDOR MATRICES
 - MANUFACTURING PROCESS CONTROL
 - CERTIFICATION TEST REVIEW
 - INSPECTION ADEQUACY

PROJECT GOALS

- DEMONSTRATED PROBABILITY OF SUCCESS
- HARDWARE OPTIMIZATION
- COST AND SCHEDULE EFFICIENCY





PRODUCT ASSURANCE STRUCTURED FOR OPTIMAL PAYBACK

TASKS:

- CONTINUED SUPPORT OF ENGINEERING STUDY GROUP
- RELIABILITY ANALYSIS FOR CHOSEN EQUIPMENT
 - RELIABILITY BLOCK DIAGRAM ANALYSIS (RBDA)- MODELING TO VERIFY SYSTEM PERFORMANCE
 - FAULT TOLERANCE ANALYSIS
 - MTBF VERIFICATION
 - FAILURE HISTORY REVIEW
 - RELIABILITY IMPROVEMENT RECOMMENDATIONS
- VENDOR REVIEW
 - ASSURING GOOD PROCESS CONTROLS
 - TEST COMPARISON MATRIX
- SYSTEM INTEGRATION SUPPORT
 - RBDA MODELING TO VERIFY INTEGRATED PERFORMANCE
 - SUPPORT IN DEVELOPMENT OF INTEGRATED TEST PLANS

GOAL: OPTIMAL PERFORMANCE AND RELIABILITY WITH COST AND SCHEDULE EFFICIENCY

Diane McLaughlin/NB23/x34089

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