

Engineering Procedure	Title: ENGINEERING REVIEW BOARD (ERB)			Document Number: ENG-P-0019	
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PURPOSE

The Engineering Review Board (ERB) provides a discussion forum to address technical and operational problems/concerns with Base Operations and Spaceport Services (BOSS) managed facilities, systems, and associated assets. The board evaluates the problems presented and directs the best course of action based on engineering data and judgment.

This procedure outlines for the BOSS ERB processes and functions for resolving and closing technical and operational problems/concerns. The ERB requirement is established in the BOSS contract Performance Work Statement (PWS) Section 4.1.1.2.

The Interim Readiness Assessment, (IRA), IRA-Extension (IRA-E) or Institutional Design Certification Review (IDCR) items are processed in accordance with the “Interim Readiness Assessment Review Board Charter” procedure [ENG-P-0021](#) and briefed to the ERB if a Hazard/Risk Assessment (HAZ/RA) is required.

SCOPE AND APPLICABILITY

The scope of the ERB process includes, but is not limited to:

- Technical Anomaly Level (TAL) 3 reviews,
- TAL 2 status briefings,
- Follow-up ERB directed actions related to the TAL closure,
- Mission support readiness determinations,
- Return to service recommendations,
- Design review recommendations,
- Evaluations of manufacturing, integration, test adequacy, installations, and operations,
- IRA's, IRA-E's, and IDCR's briefed to the ERB if a HAZ/RA is required.

This procedure applies to all BOSS divisions, and departments, and BOSS Team Member Subcontractors responsible for assets identified in the Operation, Maintenance, Engineering and User (OMEU) matrix. The ERB operates under the authority of the office of the BOSS contract Engineering Manager. The ERB chairperson is the BOSS contract Chief Engineer or delegate who serves along with a National Aeronautics and Space Administration (NASA) Counterpart Co-Chair.

1. PROCESS

The technical decision analysis process is used to evaluate solution options recommended by the engineering community for eliminating or mitigating technical anomalies or operational problems and determines the most feasible solution based on safety aspects, operational support, program cost, and other related criteria.

The BOSS ERB is an integral component of a structured set of processes used to identify, analyze and resolve technical anomalies or operational problems, and certify that the related facilities and associated systems are ready for supporting mission milestones or unrestricted operations. The ERB provides a technical review process that promotes the identification and resolution of problems in a proactive manner, optimizes the use of available resources associated with recommended corrective actions, and drives improvements in operational procedures and processes. Figure 1 “Problem Resolution” is shown at the end of this procedure and illustrates the general decision process for resolving a technical problem. To satisfy contract objectives, there may be times where more than one ERB convenes concurrently to address a series of different problems.

Note: The ERB does not have the authority for any changes to the BOSS Configuration Baseline (OMEU/Configuration Management Data System (CMDS) and associated documents/drawings), but can recommend changes. The NASA/BOSS Facilities, Systems, Equipment, and Utilities (FSEU) Configuration Control Board (CCB) shall provide oversight and approval for all proposed changes that affect/impact the Form/Fit/Function of all BOSS Configured, Mission Essential, or Operationally Essential (OE) line items per procedure [ENG-P-0002](#) “Configuration Management of Facilities/Systems/Equipment/Utilities”. In special circumstances, there may be adequate justification to use a configured system when it is out of design specification or a not per print configuration based on time constraints associated with mission or operational support requirements and only when an engineering assessment has proven the risk is low. Approval to use a configured system or hardware that is not per print or not within design specification shall be processed in accordance with the BOSS Material Review (MR) and Material Review Board (MRB)” procedure [ENG-P-0039](#).

2. ENGINEERING REVIEW PROCESS

The Engineering Review Process has three phases: Initiation, Resolution and Closure.

2.1. Initiation

This phase opens the engineering review process by acknowledging and documenting an existing problem or concern typically classified as a TAL 3 requiring an engineering assessment or analysis with a subsequent presentation to the ERB. Procedure [ENG-P-0027](#) “Technical Anomaly Event Disposition Process” provides the process for documenting a technical anomaly.

2.1.1. Responsibility/Authority

Any engineer may initiate the engineering review process by bringing the technical problem to the attention (written or verbal) of the Chief Engineers Office, System Engineering Manager, Design Engineering Manager, or Project Engineering Management. The Lead System Engineer (LSE) normally coordinates an engineering assessment for TAL 3 problems or events that are documented with Maximo work orders.

The Engineering Manager, Chief Engineer, and System Engineering Leads have the authority to elevate a problem to the ERB for resolution.

2.1.2. Criteria

The engineering assessment process is initiated for items that satisfy one or more of the following criteria:

- An event or anomaly occurring on a system used for support of mission or operationally essential NASA launch services
- A change in design certification status for any system used for support of mission or operationally essential NASA launch services. This includes, but is not limited to: (1) a change in predicted operating environments impacting performance specifications; (2) planned component or system recertification; (3) or an audit or review finding creating a concern over certification status.
- Expected use of a new component or system in support of mission or operationally essential NASA launch services or facilities.
- A TAL 3 problem or event as defined in procedure [ENG-P-0027](#)
- Significant non-conformances, test anomalies, or process deviations that a NASA Engineer or Manager requests additional investigation beyond that obtained during normal launch service support or process reviews
- Designs outside of codified controls

2.1.3. Implementation

The LSE or SE has the responsibility in their assigned area(s) to use a variety of documented process criteria and resources to determine if a problem has occurred that needs to be elevated to the ERB. These type problems associated with BOSS assets are typically documented in Maximo as TAL 3 work orders. INPUTS are as follows:

- Failures/Change in operational status
- Kennedy Complex Control System (KCCS) or Andover Trend Data
- BOSS hardware/software performance specifications outside of design limits
- Observations/Shop reviews
- New or Revised conditions
- Repeated Failures
- Design not to codes/standards
- Review of the daily "Event Reports," "Systems Electronic Tie-In (SETI)" log entries, and other available activity reports
- Review of Maximo/PRACA documentation
- Customer Input
- Unexplained Anomaly

For identified problems, the initiating engineer or SE:

- Provides engineering summary with specific location of problem, a detailed description of the problem, applicability or impacts and preliminary recommendations for corrective action or mitigation

- Initiates TAL 2 and TAL 3 work orders to document problems in accordance with [ENG-P-0027](#)
- Provides documentation to the LSE and Mission Support office (MSO) as requested
- Consults LSE on problems and provides recommendations for design or process changes
- Coordinates concurrences with associated engineering elements including NASA counterparts
- Submits documentation to the Administrator for the ERB
- Identifies mission support requirements for the respective systems
- Initiates peer review of technical problems.

2.2. Resolution

This phase includes all activities required to consolidate data and develop recommendations and rationale necessary to resolve a problem.

2.2.1. Responsibility/Authority

The ERB has the authority to request that any BOSS engineering related problem be brought to the Board for resolution. The majority of the items addressed by the ERB are classified as TAL2 and TAL 3 events as defined in [ENG-P-0027](#).

The LSE or SE is responsible for ensuring corrective/mitigating actions have been performed satisfactorily to resolve a specific problem and to provide progress status through closure of any action items. If an ERB is required, then the LSE is responsible for ensuring that the ERB presentation content is adequate to support the board review and resolution.

The SE and LSE are responsible for gathering data and developing recommendations and rationale to support the resolution and closure of an assigned item.

Individuals with dissenting opinions shall express those to the ERB immediately so they may be addressed and documented at the forum.

2.2.2. ERB Presentation Briefing Criteria

It is recommended that the presentation follow the format outlined in the [ENG-F-0019](#) ERB-MRB Briefing Template. Mandatory fields are noted within the template and shall be considered the minimum required content for an ERB briefing. Oral presentations are permitted without the use of the briefing template where time restrictions occur or when follow-up status briefings are involved. Under these circumstances, the content highlights can be documented in the meeting minutes rather than with a written presentation.

For TAL 2 ERB briefings, the presentation will not follow the format outlined in the [ENG-F-0019](#) briefing template as the intent is to provide a brief summary of TAL 2 problems presented in a Maximo related report format. The report includes the Work Order Number, Event Report Number, Event Title, Location, Report/Initiation Date/Time, Status, TAL

Classification, Author, and Closure Summary that includes the Problem Description, Root Cause, Corrective Action, and Preventative Action. TAL 2 briefings are typically scheduled on a Quarterly basis covering the prior 3 months of activity.

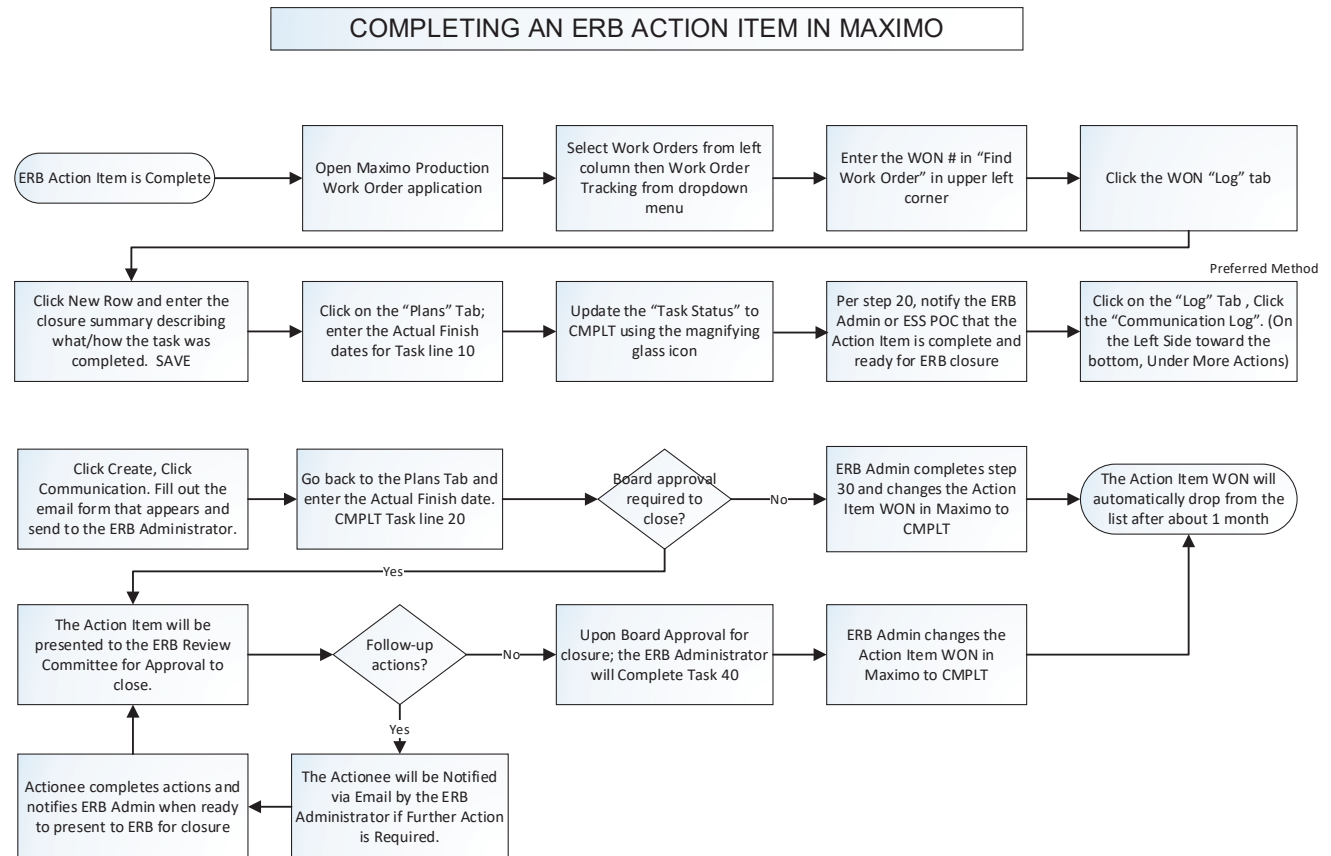
Presentations shall be provided to the Administrator a minimum of two working days but preference is 5 working days before the official ERB meeting date so they are available for review on the SharePoint site. The location of the ERB meetings varies based on availability and capacity requirements of conference rooms as determined by the ERB Administrator. During special circumstances with time constraints, an ERB meeting can be held remotely per teleconference under the guidance of the BOSS ERB Chair and NASA Co-Chair. Oral presentations are permitted during special circumstances with time constraints and the content highlights shall be documented in the meeting minutes. The ERB Administrator can be bypassed for scheduling purposes when special circumstances occur requiring an immediate decision by the board. The BOSS ERB Chair and NASA Co-Chair have the authority to schedule a real-time meeting based on special circumstances.

2.2.3. ERB assigned Actions

As discussed in the ERB, if the committee is not satisfied that the presentation resolves the concern or if follow-up actions to the presentation are given, then the ERB can direct follow up ERB actions to be tracked by the ERB administrator and either determined to be represented back to the ERB for closure or just to the ERB Administrator for closure.

- Each action will be documented with a MAXIMO EWR/WON#,
- The format of the Title shall be “ERBmmdyy item # – ERB Briefing for month day, year Action item”. Example: ERB021418 item #2 – ERB briefing for Feb 14, 2018,
- Work type will be a Baseline ENGWO type,
- The work steps will be provided by Job Plan ERB-ACTION,
- The Long description will document the action assigned by the ERB. ERB administrator will copy the action as described in the minutes to this field,
- The ERB Action will be a tied as a related record to the initiating TAL WON on the Related Record tab.
- If required to represent to the ERB for closure, the Administrator will add the statement to the long description field, “ERB committee review required to close this Action” else if not required, “ERB committee review not required to close this action, close upon completion of ERB action in Log tab”.

See the following figure for ERB action closure.

**FIGURE 2: ERB Action Closure**

2.2.4. Criteria

An ERB problem is considered resolved when the following criteria have been met:

- An ERB meeting has been requested to address a problem
- The ERB presentation package has been completed, provided to the Administrator, and presented to the ERB for approval. Oral presentations are permitted for special circumstances and do not require a written package as such and therefore are considered an exception to the rule.
- All recommendations from ERB briefing have been discussed and voted on by the board Quorum members. See Section 2.3 "Voting Method" for further details.
- All associated ERB board directed action items have been completed
- ERB documentation (Presentation, Meeting Minutes) has been stored in Tech Docs by the Administrator. Oral presentations content shall be documented in Meeting Minutes and therefore shall not require a written presentation to be stored in Tech Docs.
- Board directed actions have been documented and tracked to closure in Maximo by the ERB Administrator.

- If topic was associated with a TAL 3 work order, the “Closure Summary” inputs have been documented into Maximo that includes the detailed “Problem Description, Root Cause, Corrective Action, and Preventative Action” per [ENG-P-0027](#). All documentation, including the presentation if applicable shall be uploaded as an attachment to the work order.
- The BOSS ERB Chair has approved closure of the problem.

2.2.5. Implementation

The Responsible SE:

- Obtains data from supporting engineers and other NASA sources.
- Develops and proposes resolution rationale to the LSE, NASA counterpart, and Design Engineering
- Supports the development of the ERB presentation, if an ERB is required.
- Provides status updates to the Engineering Division Management, Chief Engineer, and SE Manager for unresolved problems
- Ensures problems that require ERB involvement are brought forward in an expedient manner.
- Notifies the ERB community if problem arises that requires disposition by ERB.

The LSE:

- Reviews and concurs with resolution recommendations and rationale proposed by the SE or other stakeholders.
- Develops and/or coordinates the ERB presentation, if an ERB is required.
- Reviews resolution implementation status updates provided by the SE or other engineering stakeholders.
- Prepares and presents the ERB presentation with support from SE and other engineering stakeholders. Subject matter experts outside of SE organization can present.
- Provides presentation to ERB administrator a minimum of 2 working days but preference is 5 working days prior to ERB meeting so that presentation is available on SharePoint for external review.
- Provides monthly status updates for board directed action items to ERB Chair and Administrator
- Ensures problems that require ERB involvement are brought forward in an expedient manner.
- Notifies the ERB community if a problem arises that requires disposition by the ERB.

The System Engineering Manager

- Ensures LSE's presentation content is adequate for briefing ERB and follow's the general guidelines and format recommended in [ENG-F-0019](#) URS ERB-MRB BRIEFING TEMPLATE.
- Ensures Lead SE resources are provided for developing and presenting data to the ERB.

2.3. Closure

This phase includes all of the activities associated with the ultimate closure of a problem.

2.3.1. Responsibility/Authority

The BOSS Engineering Manager or designee is responsible for ensuring that all engineering review items are processed in accordance with this procedure. The Chief Engineer or his/her designated representative is the ERB Chairman. The Board Chair is authorized to resolve all disputes associated with the resolution of an engineering review item. The Chair is authorized to designate engineers to act on behalf of an ERB member who is absent. The Engineering Manager and/or the Chief Engineer are authorized to designate an acting ERB chair.

The Engineering Manager and the FSEU Division Manager are responsible for providing all the necessary engineering support required to resolve an engineering review item in a timely manner.

2.3.2. Criteria

An engineering review item is closed when:

- ERB Chair, NASA Co-Chair, SE Manager, and LSE have determined that the item has been resolved satisfactorily outside of the ERB and therefore does not require ERB involvement. This could represent a downgrade of a TAL 3 work order if the associated risk is considered low based on acceptance rationale.

OR

- The presentation or oral briefing has been given to the ERB and the BOSS Chair approves closure based on the board's prior acceptance of the presented resolution/mitigation plan and the completion of any associated board directed action items.

2.3.3. Implementation

- Outside Board Review

The Lead SE and/or SE:

- Presents resolution recommendations and rationale to the BOSS Board Chair and/or NASA Board Co-Chair and SE Manager.
- Provides evidence to BOSS Board Chair, NASA Board Co-Chair, and SE Manager illustrating that action items, corrective actions, and mitigations to resolve a problem were satisfactorily completed to provide closure.

OR ERB Meeting Review

- ERB meeting briefing has occurred with a vote by Quorum members on presenter's recommendations.
- All corrective/mitigating actions have been completed to resolve a problem to the satisfaction of the BOSS Board Chair.
- All board directed actions have been tracked through closure by the Administrator and presented to BOSS Board Chair for final closure.

Note: Technical problems which may have associated risks are managed by the Risk Management Board. The Risk Management Board is the BOSS management panel for conducting Risk-Informed Decision Making (RIDM) per [SMA-P-0015](#).

3. ERB FUNCTIONS

3.1. Membership for ERB

- The ERB is managed by the BOSS Chief Engineer/Engineering Chair and the NASA Center Operations Co-Chair representatives. The ERB Quorum is composed of the BOSS Chief Engineer/Engineering Chair, NASA Center Operations (Co-Chair), NASA Safety & Mission Assurance representative, BOSS System Engineering Manager, and the BOSS System Safety representative who are the only voting members. Individual members may change based on availability and multiple ERB meetings being held simultaneously, therefore individual Quorum members for meetings are only identified in the respective meeting minutes. Appointment letters for ERB Chair designees are not required as appointments are handled verbally with individual organizational representatives identified in the respective meeting minutes. Other members serve as advisors with no voting privileges as noted in Appendix A.
- The BOSS ERB Chair along with the NASA Co-Chair have the authority to hold an ERB without a full Quorum if special circumstances occur where time constraints associated with mission or operational support require real-time decisions and attempts to contact members for participation fail. Situations as such shall be thoroughly documented in the meeting minutes.

- Appendix A (ERB Membership) outlines the organizations involved and delineates the ERB membership by Quorum and Advisor members.
- The BOSS Engineering Manager and/or the BOSS ERB Chair are authorized to designate engineers to act on behalf of an ERB member who is absent.
- The BOSS Chair manages the Quorum members voting approval process. Prior to the termination of the ERB meetings the Chair shall direct a voting measure when required to ensure presenter recommendations or other related items are properly addressed. Further details are provided in Section 2.3 "Voting Method".

3.2. Administration of ERB

The Administrator for the ERB is provided by BOSS and shall:

- Schedule the ERB meetings, provide the meeting agenda and maintain meeting minutes including the board voting results when applicable.
- For IRA, IRA-E, and IDCR briefings, Activation & Turnover organization presents the information in their own format and documents the meeting minutes. The ERB Administrator inputs the meeting minutes into TechDoc and manages/tracks any related action items.
- Distribute and collect signed attendance rosters for ERB meetings and store along with the meeting minutes in Tech Doc.
- Set up/run audio/visual equipment for ERB presentations.
- Distribute ERB meeting minutes.
- Archives ERB Meeting Minutes, Presentation when applicable, and supporting documentation in Tech Docs
- Assign the ERB board directed Action Item Tracking numbers as follows: ERB (Date: MMDDYY) Item Number -Topic Title, applies to Maximo WON Title. Example: "ERB092111 Item 1-CIF Substation Switching problem."
- Provide monthly report to BOSS ERB Chair on open board directed action items including any extensions and respective justifications, respective actionees, due dates and current status notes through closure. All extensions require documented justification.
- Maximo retains the history and status of the assigned action items.

3.3. Voting Method

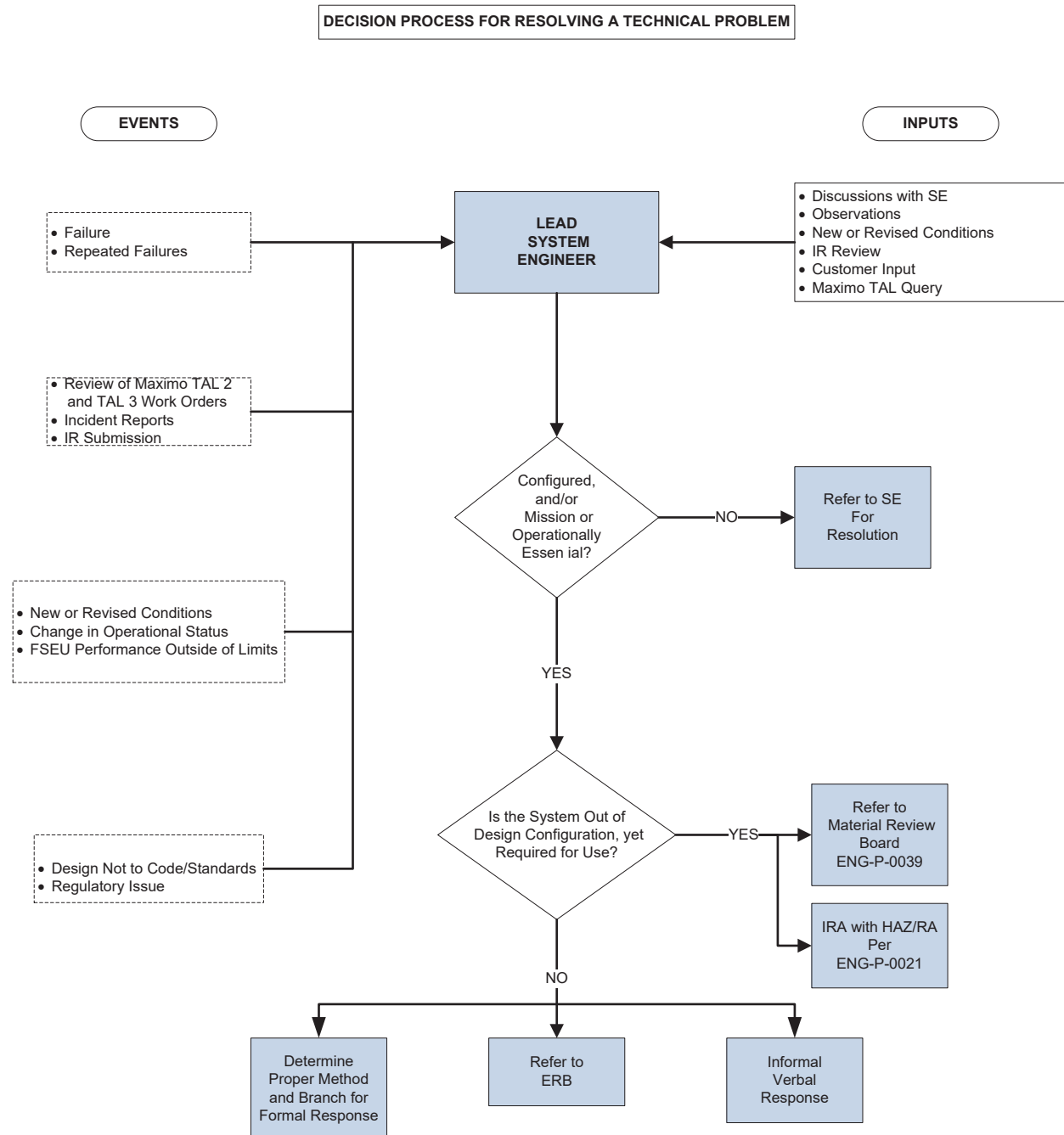
- Prior to the termination of an ERB meeting, the BOSS Chair or other Quorum member shall make a motion to vote on the briefing recommendations. The voting results shall be recorded by the Administrator in the meeting minutes.
- A measure is considered approved if most of the Quorum members vote "Yes", including both the BOSS Chair and NASA Co-Chair. If either the BOSS Chair or NASA Co-Chair vote "No" on a measure, then the measure is disapproved or rejected. Therefore, it requires the BOSS Chair, NASA Co-Chair, and at least one other Quorum member to vote "Yes" on a measure for approval with the 5-member

Quorum. Only one member is allowed to vote from each of the five organizations that represent the Quorum even though more members may be in attendance.

- When the objective of a presentation expresses a statement requesting board approval, then a measure as such shall be voted on by the board. If recommendations are expressed to the board for a written or oral presentation, then those recommendations shall be voted on by the board. If a written or oral presentation lacks specific recommendations and the content of the briefing expresses actions already taken to correct or mitigate a problem then a formal vote by the board is not required. Under these circumstances, board approval is implied should there be no objections expressed by any of the Quorum members.

4. MATERIAL REVIEW BOARD (MRB)

- All non-conformances associated with configured BOSS systems hardware or software that are not per print or design specifications shall be processed through the Material Review Board or System Level Material Review (MR) process per [ENG-P-0039](#) procedure prior to use.

**FIGURE 1: PROBLEM RESOLUTION**

APPENDIX A: ERB MEMBERSHIP

ENGINEERING REVIEW BOARD (ERB) MEMBERSHIP	
Organization	Q/A
BOSS Chief Engineer (Chair)	Q
NASA TA (Center Operations) (Co-Chair)	Q
NASA SA (Office of S&MA)	Q
BOSS Logistics Engineering	A
BOSS Design Engineering	A
BOSS System Engineering	Q
BOSS Quality, Safety & Environmental	Q
Designations: Q: Quorum – Required to vote and necessary for quorum. A: Advisor – Acts as advisor to ERB.	

RECORDS

The following records are retained by the organizations listed below:

Record	Responsible Organization	NRRS/Item#	Retention Period
ERB Action Items - SharePoint	BOSS PMO	08/107.0	Destroy/delete between 0 and 30 years after program/project termination. See Note 4
ERB Meeting Minutes	BOSS PMO	08/107.0	Destroy/delete between 0 and 30 years after program/project termination. See Note 4
ENG-F-0019 (ERB Template)	BOSS Engineering	08/107.0	Destroy/delete between 0 and 30 years after program/project termination. See Note 4

ROLES AND RESPONSIBILITIES

BOSS Program Manager: Ensures BOSS compliance to the requirements stated in this procedure. Reviews and approves or disapproves waiver requests written against this standard.

BOSS Division Manager of Engineering, Chief Engineer, or Designated Chair

- Chairs ERB or appoints ERB Chair
- Maintain a meeting environment that promotes free and open interchange of technical information between participants, with the goal of producing the best possible engineering decisions. Encourages dissenting opinions to be brought forward and discussed.
- Review upcoming topics with the BOSS Senior Manager and others as applicable.
- Ensure Senior Management is aware of open action items.
- Manages Quorum members voting approval process at the termination of ERB meetings where a voting measure is required to ensure presenter recommendations are addressed properly

- Ensures all engineering review items are resolved in accordance with this procedure.
- Ensures resolution of all dissenting opinions associated with engineering review items.
- Designates engineers to act on behalf of absent ERB members.
- Designate an acting ERB chairman when required.
- Ensure that the Agendas are complete and each item includes the appropriate technical documentation for presentation at the ERB. Work with the ERB Administrator to set the agenda, review required attendees, and meeting schedules.
- Refer ERB topics to other more appropriate formal processes as appropriate.
- Review action item status with Administrator monthly to ensure need dates are met or extended when necessary.

FUNCTIONAL ROLES AND RESPONSIBILITIES

Lead System Engineer (LSE)

- Evaluate and approve informal problems as specified in this procedure
- Prepare or assist in the preparation of presentations for the ERB
- Brief TAL2 Reports and TAL3 topics to ERB
- Coordinate support required for ERB presentations
- Provide lesson learned information from evaluations
- Support closure activity of board directed action items

Quality, Safety and Environmental engineer (QSE)

- Provide system technical expertise, guidance and control to ensure operational performance.
- Support LSE for development and briefing of ERB presentations
- Identify system needs and work with LSE to define requirements for maintainability, operability and operational risk.
- Review and approve project submittal.

System Safety Personnel

- Review project formulation and provide input on system safety requirements.
- Determine requirement for IRA HAZ/RA and provide input when required.

Administrator for the ERB

- Schedules the ERB meetings, provides the meeting agenda and maintains the meeting minutes.
- Assigns ERB action items to Maximo WON's (ENGWO'S)
- Archives meeting minutes and ERB presentation documents in TechDocs
- Tracks board directed action items through closure and request closure of the associated Maximo WON when complete.

REFERENCE DOCUMENTS

The following documents are referenced in this procedure:

Document Number	Title
BC-0002	Engineering Review Board Charter
ENG-F-0019	BOSS ERB-MRB Briefing Template
ENG-P-0002	Configuration Management of Facilities/Systems/Equipment/Utilities (FSEU)
ENG-P-0021	Interim Readiness Assessment Review Board Charter
ENG-P-0027	Technical Anomaly Event Disposition Process
ENG-P-0039	Institutional Services Contract (BOSS) Material Review (MR) and Material Review Board (MRB)
QAL-P-0023	Boards and Committees Management
SMA-P-0015	Risk Management Plan

ACRONYMS

BOSS	Base Operations and Spaceport Services
CCB	Configuration Control Board
CMDS	Configuration Management Data System
ERB	Engineering Review Board
FSEU	Facility, System, Equipment, & Utilities
HAZ/RA	Hazard/Risk Assessment
IDCR	Institutional Design Certification Review
IRA	Interim Readiness Assessment
IRA-E	Interim Readiness Assessment Extension
KCCS	Kennedy Complex Control System
KSC	Kennedy Space Center
LSE	Lead System Engineer
ME	Mission Essential
MR	Material Review
MRB	Material Review Board
MSO	Mission Support Office
NASA	National Aeronautics and Space Administration
OE	Operationally Essential
OMEU	Operations, Maintenance, Engineer, User
PRACA	Problem Reporting and Corrective Action
RIDM	Risk-Informed Decision Making
RMT	Risk Management Team
QSE	Quality, Safety and Environmental
SETI	Systems Electronic Tie-In
SE	System Engineer
TAL	Technical Anomaly Level

DEFINITIONS

Anomaly - A, hardware or software failure, a departure from established procedures or performance, or a deviation of system, subsystem, and/or hardware or software performance outside certified design/performance specification limits.

Problem - A, hardware or software failure, a departure from established procedures or performance, or a deviation of system, subsystem, and/or hardware or software performance outside certified design/performance specification limits.

Technical Anomaly Level 2 (Non-routine, No Mission Constraint) - **TAL 2** anomalies are classified as non-routine problems that occur on a configured, or OE system that do not have any mission constraint. (See ENG-P-0027)

Technical Anomaly Level 3 (Non-routine, Mission and/or Operational Impact) – **TAL 3** anomalies are classified as non-routine problems that occur on a configured, United States Space Force (USSF) Mission Essential (ME) system, or OE system that **does** have a mission constraint. (See ENG-P-0027)

REVISION RECORD

The following revisions have been applied to this document:

Revision Number	Change Description	Date
0	Initial Release	05/12/06
1	Revision	10/20/06
2	Revision	05/31/07
3	Rewrite of this document	12/31/07
4	Complete rewrite of this document	08/20/10
5	Separated MRB from this document. Document now only addresses ERB. Removed reference to Technical Director	06/13/10
6	Complete revision	04/10/12
7	Update to reflect changes to organizational structure	07/27/15
8	Update to BOSS	02/06/20
9	Engineering review. Minor administrative edits.	03/05/24

DOCUMENT APPROVALS

3/11/2024

X

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Division Director, Engineering
Signed by: SANDRA BURCHFIELD (affiliate)

3/11/2024

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Joshua Coulter (for)

Randy Christianson
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