

Lock Out Tag Out Try Out (LOTOTO): Managing Hazardous Energy Safety – Leadership Responsibilities

Executive Summary

Lock Out Tag Out Try Out (LOTOTO) is one of the most critical controls for preventing serious injury and fatality arising from the unexpected release of hazardous energy. Despite clear procedures and technical safeguards, LOTOTO failures continue to occur, most often due to leadership gaps rather than technical shortcomings.

This white paper positions LOTOTO as a leadership responsibility, explaining how leaders at all levels shape the effectiveness of hazardous energy control through decisions, behaviours, resourcing, and cultural signals. It provides a clear leadership lens on what LOTOTO requires, why it fails, and how leaders can actively prevent catastrophic incidents.

Understanding Hazardous Energy and LOTOTO

Hazardous energy includes, but is not limited to:

Electrical	Chemical
Mechanical	Thermal
Hydraulic	Stored or residual energy (springs, gravity, pressure)
Pneumatic	

LOTOTO is not merely
a procedure - it is a
life-critical control



One Lock One Life

LOTOTO is a systematic process used to:

- Isolate energy sources
- Lock them in a safe position
- Tag them to communicate status
- Verify zero energy before work begins

Why LOTOTO is a Leadership Issue

Serious Risk Cannot Be Delegated Away

While tasks may be delegated, accountability for hazardous energy control rests with leadership. LOTOTO failures often stem from:

- Inadequate enforcement of standards
- Time pressure overriding safety controls
- Poor role clarity between operations and maintenance
- Inconsistent leadership responses to violations

Leadership Behaviour Sets the Standard

If leaders tolerate shortcuts, LOTOTO becomes optional. If leaders consistently reinforce LOTOTO expectations, it becomes embedded practice.

Core Leadership Responsibilities in LOTOTO

Establishing Clear Standards and Expectations. There should be no ambiguity, uncertainty or doubt about the requirements of LOTOTO for the site you are responsible for as leaders.

Therefore, leaders must ensure:

- A single, clear LOTOTO standard is in place
- Roles and responsibilities are unambiguous
- LOTOTO applies to routine, non-routine, and contractor activities

Leaders need to ensure that they provide the resources and equipment required to ensure LOTOTO can be implemented correctly. Effective LOTOTO requires investment. Expecting compliance without training (and demonstrating competence) and the tools is folly.

Leadership responsibilities include:

- Providing sufficient locks, tags, and isolation devices
- Ensuring equipment is fit for purpose
- Supporting engineering solutions that reduce reliance on procedural controls

Organisations that implement and maintain LOTOTO standards demonstrate an understanding and application of competence and authorisation. LOTOTO competence goes beyond awareness training. Leaders must ensure:

- Only authorised persons perform isolations
- Verification of competence is robust and current
- Supervisors actively challenge unsafe energy control practices

Critical Insight: Most fatal incidents involve people who believed equipment was isolated - but it was not.

LOTOTO requires verification and zero-energy confirmation which is why we now talk about Try Out as the last step of the process. LOTOTO requires verification. Leadership responsibilities include:

- Reinforcing the principle of "test before touch"
- Ensuring verification steps are never skipped
- Supporting stop-work decisions when verification cannot be confirmed

Managing Contractors and Interfaces. LOTOTO failures often occur at interfaces. Therefore, leaders must ensure:

- Contractor LOTOTO systems align with site standards
- Clear handover between operations and maintenance
- Joint verification where multiple parties are involved

LOTOTO, Culture, and Human Factors

LOTOTO is highly vulnerable to:

- Normalisation of deviation
- Production pressure
- Assumptions and informal practices

Leaders counter these risks by:

- Personally reinforcing LOTOTO expectations
- Responding consistently to breaches
- Encouraging reporting of near misses and weak signals

LOTOTO strength is a direct reflection of organisational culture.

Common Leadership Pitfalls in LOTOTO

Pitfall	Impact
Tolerating shortcuts	Increased fatality risk
Inconsistent enforcement	Confusion and erosion of standards
Over-reliance on procedures	Human error unmanaged
Blaming individuals	Systemic failures persist

What Effective LOTOTO Leaders Do Differently

Effective leaders:

- Treat LOTOTO as non-negotiable
- Ask workers to explain isolation steps
- Personally intervene when unsafe practices are observed
- Ensure lessons learned are shared and acted upon
- Balance production priorities with life-critical risk control
- They demonstrate that no task is so urgent that LOTOTO can be bypassed.

LOTOTO as a Leading Indicator of Safety Maturity

Strong LOTOTO performance often correlates with:

- High-quality supervision
- Strong asset integrity
- Trust between workforce and leadership
- Low tolerance for serious risk exposure

Weak LOTOTO controls are a warning sign of broader safety governance gaps.

Conclusion: LOTOTO as a Leadership Test

LOTOTO effectiveness is not determined by the quality of written procedures, but by:

- Leadership clarity
- Visible commitment
- Consistent enforcement
- Willingness to stop work

Ultimately, LOTOTO tests whether leadership is prepared to protect lives even when it is inconvenient.