



## CS ENERGY PROCEDURE FOR MINIMUM HEALTH AND SAFETY STANDARDS - CRITICAL RISKS CS-OHS-48

Responsible Officer: Group Manager Health and Safety  
Responsible Executive: Executive General Manager Corporate

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## 1 PURPOSE

All personnel have a responsibility to themselves, their family and work colleagues to work safely. Accordingly, CS Energy has developed the following minimum health and safety standards for critical risks which must be applied by all personnel for this to be achieved.

CS Energy has developed these minimum standards for critical risks based on incident management system data and consultation with management and employee representatives. The objective is to target and reinforce crucial behaviours and processes that ensure safety performance, particularly in the medium to high risk areas of the business.

These minimum standards for critical risks are defined as standards that must be applied when performing tasks to prevent injury, illness, plant damage and/or loss of supply by eliminating or minimising the risk of incident.

This procedure shall be used in conjunction with the Procedure for Health and Safety Life Savers, CS-OHS-49.

## 2 SCOPE AND RESPONSIBILITY

The minimum health and safety standards for critical risks apply to all employees and contractors working for CS Energy and its associated activities.

All managers/supervisors are to ensure that all personnel know, understand and apply these standards when conducting work for CS Energy. New employees and contractors must be familiarised with the standards in their induction and site-based safety training.

The minimum standards for critical risks do not replace CS Energy policies, standards, procedures and work instructions, but provide increased emphasis and focus.

## 3 MINIMUM HEALTH AND SAFETY STANDARDS FOR CRITICAL RISKS

The minimum health and safety standards for critical risks apply to key areas of the CS Energy health and safety management system. These areas are identified below outlining the specific minimum standards to be followed.

To support this procedure, a set of non-negotiable rules categorised as “Life Savers” has been implemented which must be adhered to by all personnel. These Life Savers are outlined in the Procedure, Health and Safety Life Savers, CS-OHS-49.

### 3.1 Permit to Work

The Permit to Work (**PTW**) Process must be followed under all circumstances. Refer to the Permit to Work Manual, CS-PTW-01 for details of this process. All control measures, isolations and subsidiary work permits under the PTW must be implemented before work commences. If the physical area, people, environment and scope of work (**the condition**) on the job change, you must stop work, make the area safe and re-assess the permit conditions to ensure all risks are being controlled. If the work you are about to perform is subject to a PTW, do not proceed unless:

- the scope of works and validity period for the PTW is clearly defined and understood;
- the PTW has been authorised by an authorised person for the site or facility;
- all required supporting control documents have been identified and obtained for work involving:

- Excavation (see Procedure for Digging and Excavation Work, CS-PTW-HAZ-04),
  - Hot work, (see Procedure for Hot Work, CS-PTW-HAZ-01),
  - Confined space entry, (see Procedure for Confined Spaces, CS-PTW-HAZ-03),
  - Working at heights, (see Procedure for Protection when Working at Heights, CS-PTW-HAZ-02).
- all hazards have been identified, risk assessed and controlled effectively;
  - the Conditions of the permit have been communicated with everyone involved in, or affected by the work; and
  - your personal issued lock is attached to the PTW board with your signed on to the PTW.

When circumstances on the job change, the work shall be stopped and the area made safe. Re-assessment of the task-based risks shall be carried out.

### 3.2 Risk Assessments

All tasks require a Task Risk Analysis (**TRA**) to be completed. Where energy sources impact on the task and isolation is required or the activity is assessed as higher than low, a Job Safety Environment and Analysis (**JSEA**) shall be prepared. The JSEA shall be prepared, discussed, understood and signed by all members of a work team when jobs are being performed under a PTW.

You must comply with the requirements of the CS Energy JSEA Procedure, CS-OHS-11.

### 3.3 Isolation, Electrical Access & Switching

All work on plant requiring isolation of energy sources must be controlled effectively. An authorised person must confirm that the correct energy sources to items of plant are identified for isolation, and a competent and authorised person must undertake the isolation which must be checked by the Officer in Charge. Isolations must be verified and confirmed effective prior to work commencing and if any of the Conditions on the job change or the job is interrupted the process must be repeated. Only work on plant requiring isolation if:

- you are complying with the PTW and JSEA procedures;
- all energy isolations for the job have been positively identified, verified as correct by an authorised person, and implemented correctly;
- the isolation has been verified effective using suitable equipment that has been maintained and calibrated;
- you are qualified, competent and authorised to carry out that work;
- your JSEA has considered arc flash hazards; and
- Form S1885, Live Electrical Work Check List, has been completed and approved if you are carrying out live work.

At least two people shall be in attendance when working on or close to exposed live conductors when working live.

### 3.4 Excavation Work

Work involving excavation deeper than 100mm may only proceed once an excavation permit has been obtained under the PTW system. All buried services in the excavation area must be located and, where

necessary, isolated. Other safety requirements are detailed in the Procedure for Digging, Excavation and Locating Services, CS-PTW-HAZ-04.

Only undertake work that involves excavations greater than 100mm if:

- the conditions of your PTW Excavation Permit are being complied with;
- a JSEA covering worksite and task-based risks has been completed by a competent person, and communicated to the entire work team; and
- all underground hazards, including pipelines, electric cables etc., have been identified, located and where necessary, isolated.

### 3.5 Hot Work

Hot works that have the potential to create a fire or explosion outside of controlled hot work areas (see Procedure for Hot Work, CS-PTW-HAZ-01) or any work in hazardous areas or flammable goods storage areas, will not commence without a hot works permit. The conditions of the permit must be adhered to.

Never undertake hot works unless:

- the conditions of your PTW Hot Work Permit are being complied with;
- you have performed a JSEA and prepared an emergency response plan where required;
- you are competent and authorised to perform the work; and
- the conditions of your permit, JSEA and ERP have been communicated with everyone involved in, or affected by, the work.

The requirements for performing hot work is outlined in the Procedure for Hot Work, CS-PTW-HAZ-01.

### 3.6 Confined Space Entry

Work involving confined space entry requires a confined space entry permit under the PTW system. The conditions of this permit including the use of standby persons, atmospheric testing, and emergency response plan must be adhered to. Work undertaken in or around a confined space shall be in accordance with the CS Energy Procedure for Confined Spaces, CS-PTW-HAZ-03.

Never undertake work in a confined space unless:

- the conditions of your PTW Confined Space Entry Permit are being complied with;
- you have performed a JSEA and prepared an emergency response plan;
- you are competent and authorised to perform the work;
- the conditions of your permit, JSEA and emergency response plan have been communicated with everyone involved in, or affected by, the work;
- all sources of energy affecting the confined space have been identified and isolated by an authorised person;
- the atmosphere inside the confined space has been tested, verified as safe, and re-tested as per the instructions on the confined space entry permit or when conditions change; and
- a standby person is in place or systems of work and controls are used that provide for an equal or better safety outcome than that provided by a stand-by person.

### 3.7 Working at Heights and Falling Objects

Work at heights must be conducted in accordance with the requirements of the CS Energy Procedure for Protection when Working at Heights, CS-PTW-HAZ-02 and the Procedure for managing Unprotected Edges, CS-PTW-HAZ-05. Never perform work above other people unless you have managed the risk of falling objects.

Only undertake work at heights if:

- you have performed a JSEA and prepared an emergency response plan;
- you are competent and authorised to perform the work;
- the conditions of your JSEA and emergency response plan have been communicated with everyone involved in, or affected by, the work;
- all work at height equipment is fit for purpose, inspected prior to use and maintained by competent persons;
- you have the correct tools and safety equipment for the job to ensure that all tools and equipment are secured from falling;
- you have established exclusion zones in areas below the work area with barricading and signage to warn of the falling object hazard; and
- appropriate retrieval plans are identified and prepared.

### 3.8 Incident Reporting

All incidents, injuries, near misses, dangerous events and issues of non-compliance with CS Energy health and safety management system (**Incidents**) must be reported to your supervisor or in the case of a contractor reported to your CS Energy contact as soon as possible.

Incidents shall be reported to your supervisor or CS Energy contact and recorded in the incident management database. You are required to honestly report incidents as soon as possible after they occur. Potential emergency situations must be notified to the emergency response team immediately. For further details refer to the procedure for Incident Management, CS-IM-01.

You are required to participate in incident investigations if requested to do so.

### 3.9 Hazardous Substances and Dangerous Goods

Work involving hazardous substances and dangerous goods must be performed in accordance with the CS Energy Procedure for the Management of Hazardous Substances, Dangerous Goods, Combustible liquids & Regulated Waste, CS-OHS-8, and follow the material safety data sheet (**MSDS**) instructions on the use of personal protective equipment, ventilation requirements, and chemical interactions with other substances. Always use the least harmful hazardous substance that is available to perform the task.

You will obtain and read the MSDS for any hazardous substance you are using, and use the JSEA to document the fact that you have taken into account the MSDS requirements for the chemical, including:

- The PPE requirements for the substance.
- The storage requirements for the substance.
- The physical hazards associated with the substance (e.g. flammability).
- The chemical hazards associated with the substance (e.g. chemical reactions).

Always ensure that the hazardous substance you are using is stored in appropriately labelled containers and is segregated from other substances if there is a dangerous goods risk involved. Always minimise physical contact with the substance where possible and seek guidance from your supervisor or site chemist if you are unsure of the appropriate requirements.

### 3.10 Training and Authorisation

Only undertake tasks or operate equipment if you are trained, competent and authorised to do so by the person in control of the work area. If you are a trainee you must be under direct supervision by a competent person.

If you are performing work in a prescribed occupation (e.g. rigging, electrical work etc) or operating plant which requires a license (e.g. excavator operation) your high-risk work license must be relevant, current and active.

You are only permitted to work on plant if you are authorised to do so by CS Energy.

### 3.11 Personal Protective Equipment

Always ensure you wear your personal protective equipment (**PPE**) as required by site conditions and where indicated by signage. Also, you must wear the appropriate PPE as determined through the JSEA or from instructions outlined in the relevant standard operating procedure for the task being undertaken.

Always inspect your PPE to ensure it is free of damage before each use and ensure faulty equipment is discarded. PPE must be worn correctly.

### 3.12 Hazardous Manual Tasks

Always consider manual handling risks when carrying out your tasks. This requires proper planning of your jobs to ensure you have the tools and equipment required to perform the task safely, and documenting your manual handling risk control measures in the JSEA or other risk assessment tool such as a Task Risk analysis.

Use your JSEA to document that you have considered manual handling hazards associated with your job. Choose the most appropriate control measure to reduce the risk from manual handling. Control measures to adopt include:

- (i) altering the workplace design;
- (ii) altering the systems of work used to carry out the task; or
- (iii) changing the objects used in manual handling in your workplace (e.g., by changing the size or weights of objects handled, or attaching handles).

Additionally, the following safe practices should be considered:

- Avoid manual lifts where possible and use mechanical lifting aids suitable to the load and task (e.g. use a vehicle to transport tools to a job site, or a hoist to lift heavy equipment).
- Ask for assistance to lift an object that is too heavy for a single person lift.
- When commencing a lift start in a good posture. At the start of the lift, slight bending of the back, hips and knees is preferable to fully flexing the back (stooping) or fully flexing the hips and knees (squatting).
- Hold the object close to your body while lifting.





- Avoid awkward postures while lifting or when performing various tasks (e.g. lifting with a twisted spine) by task redesign and work organisation.
- Perform warm up exercises prior to commencing manual work.

### 3.13 Fit for Duty

Always comply with the CS Energy fitness for work policy. Refer to the following procedures for your responsibilities to remain fit for duty. These procedures include:

- CS-OHS-42, Managing Alcohol and Other Drugs.
- CS-OHS-12, Fatigue Management.

Never attend work if you are above the defined limits for alcohol and other drugs. If your ability to work safely could be compromised by medication you have been prescribed, ensure you seek advice from your supervisor before commencing any work onsite. Also ensure all required control measures to minimise the effect of fatigue are implemented.

Do not commence work or attempt to operate equipment if your ability to do so safely is affected by your level of fatigue. Do not attempt to drive home from your place of work if you have exceeded your maximum permissible working hours for the day, or if a fatigue risk assessment has determined that you should not drive – in these cases arrange alternative means of transport.

## 4 CONSEQUENCES OF NON-COMPLIANCE

All personnel must work to ensure compliance with the minimum health and safety standards for critical risks. In cases where these standards are breached, appropriate management action shall be taken. This action is described in the Procedure for Fair and Just Culture, CS-OHS-47.

## 5 REFERENCE DOCUMENTATION

Reference No	Reference Title	Author
"B/D/11/39698"	CS Energy Health & Safety Policy	CS Energy
"B/D/11/30977"	<b>CS-OHS-M-01</b> - CS Energy Health & Safety Manual	CS Energy
"B/D/11/30976"	<b>CS-OHS-08</b> - CS Energy Procedure for Management Hazardous Substances, Dangerous Goods, Combustible Liquids & Regulated Waste	CS Energy
"B/D/11/30940"	<b>CS-OHS-12</b> - CS Energy Procedure for Fatigue Management	CS Energy
"B/D/11/30965"	<b>CS-OHS-42</b> - CS Energy Procedure for Alcohol and Other Drugs	CS Energy
"B/D/11/30969"	<b>CS-OHS-47</b> - CS Energy Procedure for Fair and Just Culture	CS Energy
"B/D/11/30971"	<b>CS-OHS-49</b> - CS Energy Procedure for Health & Safety Life Savers	CS Energy
"B/D/11/19582"	<b>CS-PTW-01</b> - CS Energy Permit to Work Manual	CS Energy
"B/D/11/19573"	<b>CS-PTW-HAZ-01</b> - CS Energy Procedure for Hot Work	CS Energy
"B/D/11/19581"	<b>CS-PTW-HAZ-02</b> - CS Energy Procedure for Working at Height	CS Energy
"B/D/11/39828"	<b>CS-PTW-HAZ-03</b> - CS Energy Procedure for Confined Spaces	CS Energy
"B/D/11/19576"	<b>CS-PTW-HAZ-04</b> - CS Energy Procedure for Excavation, Digging and Locating Services	CS Energy
CS-PTW-HAZ-05	<b>CS-PTW-HAZ-05</b> - CS Energy Procedure for Unprotected Edges	CS Energy
"B/D/11/45318"	<b>CS-IM-01</b> - CS Energy Procedure for Incident Management	CS Energy
"B/D/11/36153"	<b>S1885</b> - Live Electrical Work Checklist	CS Energy