COMAH Competent Authorities

Operational Delivery Guide

Inspecting Major Hazard Leadership and Investigating Leadership Failures in Major Accidents

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Open Government status
Fully open

Contents

Purpose

1. This Delivery Guide (DG) is part of the COMAH Competent Authority's (CA) strategy for encouraging strong leadership and preventing major accidents in major hazard industries. It underpins the CA's programme for ensuring effective major hazard leadership in preventing, controlling and mitigating major accidents.

2. The guide covers the background and arrangements for inspection and investigation of leadership. A separate Major Hazard Leadership Intervention Tool provides the principles to use when engaging with senior leaders.

3. This guidance sets out a framework for:

   a) inspecting aspects of major hazard leadership (MHL) at senior levels in companies; and

   b) investigating leadership failures at senior levels following a major accident.

Target audience

4. This guidance is for all operational staff within the Competent Authority, including CEMHD, ONR, EA, SEPA, and NRW.

Scope

5. This guide applies primarily to operators of COMAH establishments, but can be used at other establishments if there are concerns over leadership.

6. It may also be used by COMAH site dutyholders to prepare for an intervention, or by non-COMAH sites in respect of good leadership practice.

7. This Delivery Guide and the Major Hazard Leadership tool, when used at a COMAH establishment, apply to both the safety of people and the environment. Any reference to major hazard safety should thus be considered to be inclusive of control of Major Accidents to the Environment (MATTEs).

Inspection

8. The guide and MHL Intervention Tool provide CA staff with a means of assessing whether the boards or senior leaders of duty holders can demonstrate effective leadership arrangements when benchmarked against legislative requirements, including COMAH, and established industry standards for major hazard control.

9. The approach is designed to improve major hazard leadership by focusing on tangible elements of good major hazard leadership rather than leadership as a whole. Where inadequate leadership is evident as an underlying feature in poor risk control, then this issue should be addressed using regulatory powers.

Investigation

10. CA staff should also use the guidance to help identify how and where leadership failures at senior and board level may have contributed to a major incident. In most incidents, leadership failings will be a legitimate line of enquiry.

Background

11. The need for strong leadership at board and senior levels in major hazard organisations has been understood and required for many years. The Process Safety Leadership Group[1] (PSLG), a joint industry and regulator group, published the eight 'Principles of Process Safety Leadership' in 2009. In June 2012, the OECD[2], representing 34 industrialised countries, published 'Corporate Governance for Process Safety - Guidance for senior leaders in high hazard industries'.

12. BS EN ISO 14001:2015 *Environmental management systems. Requirements with guidance for use* sets out the criteria for an environmental management system, and this includes an increased focus on leadership at the top of an organisation (clause 5).

13. More recently, ISO 45001:2018 *Occupational health and safety management systems — Requirements with guidance for use* was published, and includes guidance on leadership as part of the safety management system.

14. HSE publications such as INDG277[3], INDG417[4] and Managing for Health and Safety HSG65 set out leadership expectations. Leadership is a key element in the Plan, Do, Check, Act cycle.

15. Senior leaders set the vision and culture for an organisation, and their decisions have a direct bearing on major hazard safety outcomes. The OECD guidance for senior leaders in high hazard industries reports that analysis of past incidents has shown that inadequate leadership and poor organisational culture have been recurrent features. In particular:

    - a failure to recognise things were out of control (or potentially out of control), often due to lack of competence at different levels of the organisation;

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[1] PSLG, Process Safety Leadership Group, formed following investigations into the Buncefield incident, with joint Competent Authority and industry membership.

[2] The Organisation for Economic Co-operation and Development (OECD) is an intergovernmental organisation in which representatives of 34 industrialised countries in North and South America, Europe and the Asia and Pacific region, as well as the European Commission, meet to co-ordinate and harmonise policies, discuss issues of mutual concern, and work together to respond to international problems.

[3] Leadership for the major hazard industries, Rev1, 09/11.

[4] Leading health and safety at work: Leadership actions for directors and board members. Joint guidance by HSC and Institute of Directors, 09/11.

- an absence of, or inadequate, information on which to base strategic decisions – including the monitoring of process safety performance indicators by senior leaders;

- a failure to understand the full consequences of changes, including organisational ones;

- a failure to manage process safety effectively and take the necessary actions.

16. Often, investigations focus on technical and management system failings, but there is a growing impetus for looking at the role of senior leaders during major accident investigations, and holding them accountable for their actions.

17. Whatever the nature of the organisation, leadership is a cross sector issue. Lessons from major incidents in all industries, such as Piper Alpha, Buncefield, Texas City, Nimrod, Deepwater Horizon, and Southern Health NHS Foundation Trust have highlighted leadership failures as key issues. Boardroom decisions can have a significant impact upon major hazard safety, but this has not always been recognised as that impact may not be felt until some time later.

18. In most major incidents, information was available somewhere in the organisation suggesting that safety barriers were not sufficiently robust, but these weak signals were neither recognised nor acted upon.

19. When carrying out investigations, CA staff should consider enforcement in line with their organisation's policy.

20. HSE's Enforcement Policy Statement (EPS) contains the following extract:

    The purpose of enforcement is to…:

    ■ *ensure that dutyholders who breach health and safety requirements, and **directors or managers who fail in their responsibilities, may be held to account**, which may include bringing alleged offenders before the courts in England and Wales, or recommending prosecution in Scotland.*

21. The Environment Agency's Enforcement Sanctions Guidance states:

    We will take enforcement action against those persons responsible for the offence…where an offence has been committed by a body corporate and is attributable to the consent, connivance or neglect of any director, manager, secretary or other officer, that person can be guilty of an offence and is liable to be the subject of enforcement action for that offence… In appropriate cases, we will consider seeking disqualification of directors under the Companies Act.

Proportionality

22. Major hazard dutyholders will be subject to a level of regulatory scrutiny that is proportionate to their risks and performance, including scrutiny of major

hazard leadership within the organisation. Interventions will take account of the size and complexity of the organisation.

Inspection

23. CA field teams have flexibility on where they use the delivery guide to inspect major hazard leadership, and there will be any number of factors which may influence the decision. The field teams should prioritise based on the risk and performance profile of the businesses in their sectors, sector strategic priorities and individual establishment strategies determined using the Profiling, Targeting and Strategy (PTS) framework. The guide may be particularly useful in the following situations:

- when inspecting following a potential or actual major accident;

- where the operator is considered a poor performer, or

- where consideration of previous key interventions for PTS reveals that the operator only takes action reactively when issues are brought to their attention by the CA.

24. Other factors which could be considered include:

- following significant mergers or acquisitions of major hazard businesses;

- businesses undergoing significant organisational change;

- new entrants into sectors where the CA needs assurance that businesses have effective major hazard leadership;

- significant changes to the senior leadership team;

- following high levels of CA enforcement action:

- businesses with a higher-than average number of incidents, dangerous occurrences, or near-misses compared with the rest of their industrial sector, or

- inspections uncover significant gaps in the safety management systems which have not been identified by the site.

25. The inspection guide is designed principally for use at senior leadership level involving the key decision makers. It refers to senior leaders, who may be chief executive officers, presidents, board members, directors, trustees or other senior personnel within an organisation who have the authority to influence the direction and culture of that organisation, and who play a significant role in any decision-making that impacts upon major hazard performance.

26. The intervention team should determine how much authority senior leaders in this country have, and whether they have the power to make significant changes.

27. Where organisations have multiple sites with the same leadership team, a single intervention should be sufficient to explore how the senior leaders discharge their duties at all sites. The CA staff for each site should liaise to consider performance across the organisation, determine where the intervention should take place, and who should be involved. This should be reviewed in the context of the organisation being assessed.

Investigation

28. Leadership failures should always be considered when investigating major incidents and specifically when:

- lines of enquiry identify potential leadership failings; or

- there have been previous incidents or near misses and the organisation has failed to learn the lessons.

29. The investigation guidance sets out the considerations for CA staff when determining whether the decisions, actions or omissions of senior leaders have been a contributory factor leading up to an actual or potential major accident.

Action - Inspection

30. The inspection team should benchmark the duty holder's arrangements against the criteria in the Major Hazard Leadership Intervention Tool. It is not necessary to explore all areas in depth; sampling decisions on which aspects to explore should be informed by inspection intelligence. For example, where poor risk control has been identified and can be linked to specific major hazard leadership principles, interventions may be targeted towards these aspects.

31. To make the most impact, the regulatory team should consider carefully who should be involved. In determining the intervention team, the level of influence on the senior leadership team (and the wider organisation) should be a consideration. For inspections at large organisations, it may be appropriate for a leadership intervention to involve, or be led by, joint CA operational managers or senior leaders.

32. The experience and competencies of CA staff undertaking interventions with senior leaders should include an appropriate balance of technical and non-technical (personal) skills. These competencies should include:

- knowledge of the requirements of the delivery guide and guidance on major hazard leadership;

- understanding of the CA's strategy on major hazard leadership;

- sufficient knowledge of the performance of the organisation at site and organisational level, including relevant performance of associated organisations;

- knowledge of COMAH requirements including a brief overview of the organisation's Major Accident Prevention Policy (MAPP) and safety management systems (SMS);

- experience in dealing with senior leaders in major hazard industries, and

- the ability to influence at a senior level in the relevant organisation.

33. For some inspections it may be appropriate to involve Human Factors specialists, for example, when considering issues arising from the management of organisational change, but this will depend on the nature of the intervention and should be determined on a case-by-case basis.

34. Discussions with senior leaders and key decision makers will be necessary. These should include UK managing directors, country managers and/or other board members. It is not expected that other company personnel (e.g. technical or safety specialists) would be present in these discussions as it is key to assess the 'controlling minds' of the organisation.

35. Greater influence may be achieved by interviewing corporate senior management at the company's UK headquarters in addition to, or instead of, senior management on site. The number of interviews will depend upon the size and complexity of the organisation.

36. Consultation with employees will be necessary to achieve a more complete view of the organisation, and the inspection team should also consider the management of contractors on site.

Pre-inspection preparation

37. CA staff should establish:

    a) the reasons for the inspection, being clear what they want to achieve;

    b) who to interview;

    c) who will conduct the interviews;

    d) which topics or areas in the inspection tool should be included in the interviews;

    e) whether a stand-alone inspection targeted specifically at major hazard leadership is necessary, or whether it is possible to consider safety leadership as part of a wider intervention;

    f) knowledge of the dutyholder's trade association membership, and their resources on leadership where relevant, and

    g) the intended outputs and nature of reporting.

38. It is not envisaged that CA staff will run through the questions in the MHL Intervention Tool sequentially; rather these are included to provide a guide to topic areas and inform discussion.

39. The MAPP and elements of the safety management system associated with organisation and personnel, (an organogram may assist) monitoring, audit and review may help to inform CA staff of the dutyholder's arrangements,

but the focus should remain on leadership and the reasons for the intervention. Safety Reports should provide an overview of current systems.

40. Engagement with senior leaders should be planned to allow the necessary arrangements to be made. The purpose of the discussions includes verifying and testing the responses from the Major Hazard Leadership Intervention Tool, (e.g. to explore whether senior leaders can talk through major hazard scenarios and control measures), obtaining evidence of certain activities having been done (e.g. reports from leadership site visits, or contents of performance agreements) and ensuring they understand the criticality of control measures (barriers) and the need to maintain them.

41. Prior to the inspection, the relevant aspects of the Major Hazard Leadership Intervention Tool should be sent to the organisation.

The references should also be forwarded to potential interviewees.

Inspection of nuclear licensed facilities

42. Note that for COMAH enclaves on nuclear licensed sites, effective major hazard leadership must be set in the context of the overall safety management system related to nuclear safety, rather than considering COMAH in isolation. All CA staff engaging with these sites must contact ONR prior to undertaking any interventions to ensure regulatory interactions on leadership are consistent, and that consideration is given to the holistic site hazard profile.

43. Following an inspection on a nuclear licensed site, the team/inspector must discuss the outcomes with ONR inspectors before providing a performance rating or taking any associated follow up action that may arise.

COIN requirements and performance rating

44. The team/inspector should score the organisation's performance on major hazard leadership against the criteria in Table 1. The score should be entered on the IRF/Ratings tab on the inspection plan service order under the topic 'Major Hazard Leadership'. The score is based on the inspection team's judgement of major hazard leadership in the organisation when based against the principles in the Major Hazard Leadership Intervention Tool.

Table 1 Performance Rating

TOPIC PERFORMANCE SCORE					
60	**50**	**40**	**30**	**20**	**10**
No assurance	**Poor assurance**	**Limited assurance**	**Some assurance**	**Good assurance**	**Strong assurance**
No evidence that any PSLG leadership principles or other relevant good practice are embedded	Little evidence that any PSLG leadership principles or other relevant good practice are embedded	Limited evidence that some PSLG leadership principles or other relevant good practice are embedded	Evidence that most PSLG leadership principles or other relevant good practice are embedded	Evidence that all PSLG leadership principles or other relevant good practice are embedded	Goes beyond embedding the PSLG leadership principles or other relevant good practice
Failure to recognise the importance of effective MH leadership	Poor recognition of the importance of effective MH leadership	Limited recognition of the importance of effective MH leadership	Recognition of the importance of effective MH leadership	Recognition of the importance of effective MH leadership and steps taken to verify adequacy of leadership arrangements	Senior leaders exceptionally proactive and engaged, striving for continuous improvement
Evidence that leadership failures are having a substantial negative impact on management of major hazard risks	Evidence that leadership failures are having a significant negative impact on management of major hazard risks	Evidence that leadership failures may be having a negative impact on management of major hazard risks	No evidence that leadership failures are having a significant negative impact on management of major hazard risks	Evidence that good leadership is having a positive impact on management of major hazard risks	Strong evidence that good leadership is having a positive impact on management of major hazard risks
Insufficient level of competency in MH risks at senior leadership level	Senior leaders' competency in controlling MH risks is poor	Senior leaders' competency in controlling MH risks is limited	At least one senior leader can demonstrate competency in controlling MH risks	Most senior leaders can demonstrate competency in controlling MH risks	Senior leaders can demonstrate excellent competency in controlling MH risks

Inspection outcomes

45.   The requirement for effective leadership is implicit throughout HSWA, COMAH, and MHSWR, etc, even though there is no specific legal provision for leadership in health and safety or environmental law.

46.   The findings from the inspection and recommendations on improving leadership performance, based on the principles, should be confirmed in writing. The recommendations/enforcement actions should be aimed at the corporate level.

47. On nuclear licensed sites, ONR inspectors must be consulted before any written communication with the site.

48. Normally, CA letters should only include important health or safety concerns requiring further action by the dutyholder. However, in certain circumstances, the CA may make recommendations or give advice for ensuring future compliance with the law, or for improving arrangements for managing major hazard and environmental safety.

49. Significant failings in leadership may manifest themselves in failures of risk control systems closer to the immediate major hazard risks. Leadership scores of 40, 50 or 60 are likely to raise more fundamental concerns about the organisation's ability to manage major hazard risks and it will be appropriate to review the establishment strategy and intervention plan in line with the PTS framework. The inspection team should consider whether further interventions targeted at the safety management system or key risk control systems are necessary and whether enforcement action relating to a specific legal provision is required.

Legislative requirements

50. When considering how to address the manifestations of poor leadership, CA staff should consider which parts of the COMAH Regulations (Schedule 2 may assist) or other applicable legislation may have been breached.

51. Elements of what is required for effective leadership will form part of more general provisions. For example,

- if senior leaders do not routinely receive reliable major hazard safety performance information, then they will not be able to make a proper judgement on whether major hazard risks are under control, and enforcement under COMAH or the Management of Health and Safety at Work Regulations 1999 (MHSWR) may be appropriate;

- where senior leaders cannot demonstrate adequate competence to understand their risk profile, then specific action could be taken to address this deficiency;

- if the impact on major hazard control of organisational or structural changes are not properly appreciated by senior leaders, then further action may be needed.

52. These examples are not exhaustive, and the legislative requirements should be determined for each individual breach.

Action - Investigation

53. During investigations covered by the scope of this guidance, inspectors should consider leadership failures including to what extent the decisions, actions, or omissions by senior leaders have contributed to the accident.

54. Inspectors should determine whether physical and technical failures are linked to failures or deficiencies in the organisation's risk control systems. If failures are identified in these systems, the inspector should then investigate whether senior leaders failed to ensure that the risks associated with the

failure were effectively managed. It will be important to determine what the senior leader knew, what information was or should have been available to highlight the issue, and whether the leader took appropriate action, or even instructed employees to overlook the problem.

55. The Major Hazard Leadership Intervention Tool contains a list of areas to explore which the inspection team can use on a case-by-case basis to probe leadership failings during the course of an investigation, including at PACE interviews, where there is evidence of poor leadership being a contributory factor in the accident. The list is not exhaustive, but contains most areas where failings are likely to occur. CA staff should use judgement in which areas to explore based on their initial investigation findings, and adapt the questions to suit the requirements of the investigation.

Investigation enforcement expectations

56. As normal, inspectors should make their enforcement decisions in line with the Code for Crown Prosecutors and the respective CA partner Enforcement Policy Statement (EPS).

57. Directors and senior managers can be prosecuted under HSW s37 and environmental legislation. HSW s37 places a duty on an individual, and should only be used when there has been an offence committed under a relevant statutory provision which has been with their consent, connivance or due to their neglect   When considering taking a s37 case, it is essential to refer to the [Enforcement Guide](#) and [OC 130/08](#).

58. Where sufficient evidence has been found in the investigation to rate leadership performance, this should be added on COIN in accordance with the section 'COIN requirements and performance rating'.

Annex 1   Guidance

1. A guide to the Control of Major Accident Hazards Regulations 2015 L111
    www.hse.gov.uk/pubns/books/l111.htm

2. Leadership for the major hazard industries INDG277(rev1)
    http://www.hse.gov.uk/pubns/indg277.pdf

3. Leading health and safety at work: Actions for directors, board members, business owners and organisations of all sizes INDG417(rev1)
    http://www.hse.gov.uk/pubns/indg417.pdf

4. Managing for health and safety HSG65
    http://www.hse.gov.uk/pUbns/priced/hsg65.pdf

5. Process Safety Leadership Group (PSLG) - principles of process safety leadership http://www.hse.gov.uk/comah/buncefield/pslgprinciples.pdf

6. Corporate Governance for Process Safety – OECD Guidance for senior leaders in high hazard industries
    OECD Corporate Governance for Process Safety

7. Process safety leadership in the chemicals industry (CIA guidance)
    CIA Process safety leadership

8. Senior Leaders: What you need to know about major hazard leadership COMAH Strategic Forum
    https://webcommunities.hse.gov.uk/gf2.ti/f/22306/679237.1/PDF/-/goodsafetyleadership_poster_v1_Final.pdf

9. Managing Risk: The hazards that can destroy your business. A guide to leadership in process safety - COMAH Strategic Forum
    https://webcommunities.hse.gov.uk/connect.ti/COMAHSF/view?objectId=656517

10. Principles of Safety Leadership – Chemical Business Association
    https://www.chemical.org.uk/regulatory-issues/health-safety/

11. Energy Institute: Process Safety Management Framework Element 1: Leadership, commitment and responsibility
    Leadership, commitment and responsibility

12. BS EN ISO 14001:2015 Environmental management systems. Requirements with guidance for use
    https://shop.bsigroup.com/ProductDetail/?pid=000000000030281203

13. ISO 45001:2018 Occupational health and safety management systems — Requirements with guidance for use
    https://www.iso.org/standard/63787.html