

## INVESTIGATION OF ABNORMAL EVENTS

### 1.0 Objective

The objective of this surveillance is to verify that laboratory personnel are effectively investigating abnormal events. The activities included in this surveillance provide a basis for determining whether the laboratory has implemented a thorough review process to identify, investigate, and resolve abnormal events. The surveillance also provides a basis for ensuring that applicable DOE requirements are implemented.

### 2.0 References

- 2.1 DOE O 232.1A, *Occurrence Reporting and Processing of Operations Information*
- 2.2 DOE 5480.19, *Conduct of Operations Requirements for DOE Facilities*
- 2.3 DOE-STD-1045-93, *Guide To Good Practices for Notifications and Investigations of Abnormal Events*

### 3.0 Surveillance Activities

The Facility Representative or Environmental, Safety, and Health Support Specialist performs the following activities to evaluate the effectiveness of the laboratory's implementation of a program to investigate abnormal events.

- Activity 1 - Review laboratory procedures for conducting abnormal event investigations.
- Activity 2 - Review a recent event investigation report.

**Surveillance Guideline**  
**INVESTIGATION OF ABNORMAL EVENTS**

Surveillance No.: \_\_\_\_\_

Facility: \_\_\_\_\_

Date Completed: \_\_\_\_\_

YES    NO    N/A

**Activity 1 - Review Procedures for Conducting Abnormal Event Investigations**

- |    |   |       |       |       |
|----|---|-------|-------|-------|
| 1. | Do procedures identify events requiring a formal investigation?   | _____ | _____ | _____ |
| 2. | Do procedures provide guidance on when an investigation should be completed for a near miss?  | _____ | _____ | _____ |
| 3. | Do procedures establish qualification requirements for personnel performing investigations?   | _____ | _____ | _____ |
| 4. | Do procedures clearly assign responsibility for conducting investigations?  | _____ | _____ | _____ |
| 5. | Do procedures provide guidance on information to be collected before an investigation begins?   | _____ | _____ | _____ |
| 6. | Do procedures include guidance on defining and scheduling corrective actions to eliminate the root cause for abnormal events and near misses? | _____ | _____ | _____ |
| 7. | Do procedures define requirements for preparing and distributing investigative reports?   | _____ | _____ | _____ |
| 8. | Do procedures include limits or controls on modifying schedules for corrective action due dates or on issuing extension for due dates?        | _____ | _____ | _____ |

**Surveillance Guideline**  
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**Activity 2 - Review Investigation Report**

- |     |  |       |       |       |
|-----|--|-------|-------|-------|
| 9.  | Did the personnel who performed the investigation have the required qualifications?  | _____ | _____ | _____ |
| 10. | Was the report reviewed and approved by the Facility Manager?  | _____ | _____ | _____ |
| 11. | Does the report contain:   |       |       |       |
|     | a. Description of the event?   | _____ | _____ | _____ |
|     | b. Discussion of the impact of the event?  | _____ | _____ | _____ |
|     | c. Root Cause?   | _____ | _____ | _____ |
|     | d. Expected versus actual equipment response?  | _____ | _____ | _____ |
|     | e. Lessons Learned?  | _____ | _____ | _____ |
|     | f. Proposed corrective actions?  | _____ | _____ | _____ |
|     | g. Positive aspects of the event?  | _____ | _____ | _____ |
| 12. | Was the report timely?   | _____ | _____ | _____ |
| 13. | For the event described in the investigation report, did the Operations Supervisor determine if the event should be included in operator training? | _____ | _____ | _____ |
| 14. | Were the corrective actions sufficient to eliminate the root cause of the event?   | _____ | _____ | _____ |
| 15. | Have the corrective actions been funded, scheduled, and entered into the laboratory's work management system?                                      | _____ | _____ | _____ |

OTHER:


**Surveillance Guideline**  
**INVESTIGATION OF ABNORMAL EVENTS**

YES    NO    N/A

**OTHER** (Continued)

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NOTES/COMMENTS:

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PERSONNEL  
CONTACTED:

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INVESTIGATION REPORT REVIEWED:

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**IF MORE SPACE IS NEEDED FOR FINDINGS, OBSERVATIONS, AND FOLLOWUP  
ITEMS - USE ADDITIONAL SHEETS**

**FINDINGS:**

Finding No.: \_\_\_\_\_

Description: \_\_\_\_\_

\_\_\_\_\_  
\_\_\_\_\_  
\_\_\_\_\_

Finding No.: \_\_\_\_\_

Description: \_\_\_\_\_

\_\_\_\_\_  
\_\_\_\_\_  
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Finding No.: \_\_\_\_\_

Description: \_\_\_\_\_

\_\_\_\_\_  
\_\_\_\_\_  
\_\_\_\_\_

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**OBSERVATIONS:**

Observation No.: \_\_\_\_\_

Description: \_\_\_\_\_

\_\_\_\_\_

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Observation No.: \_\_\_\_\_

Description: \_\_\_\_\_

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Observation No.: \_\_\_\_\_

Description: \_\_\_\_\_

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**FOLLOWUP ITEMS:**

Followup Item No.: \_\_\_\_\_

Description: \_\_\_\_\_

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\_\_\_\_\_

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Followup Item No.: \_\_\_\_\_

Description: \_\_\_\_\_

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Followup Item No.: \_\_\_\_\_

Description: \_\_\_\_\_

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LABORATORY MANAGEMENT DEBRIEFED AND RESULTS: \_\_\_\_\_

\_\_\_\_\_

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\_\_\_\_\_

Signature: \_\_\_\_\_ Date: \_\_\_\_\_

Facility Representative or  
Environmental, Safety, and Health Support Specialist