

PPPL	PRINCETON PLASMA PHYSICS LABORATORY	PROCEDURE		No. ENG-025, Rev. 4 page 1 of 3
		Subject: Impairments of Fire Dampers and Fire Doors	Effective Date: August 7, 2015	Initiated by: Head, Facilities Division
		Supersedes: Rev 3, dated May 22, 2009	Approved: Director	

Management System (Primary): 08.00 Facilities
Management System Owner: Associate Director for Engineering and Infrastructure
Management Process: 08.17 Fire Protection And Life Safety
Process Owner: Associate Director for Engineering and Infrastructure
Sub-Process: 08.17.06 Life Safety/Facility Egress
Sub-Process Owner: Associate Director for Engineering and Infrastructure, Head, Facilities
Subject Matter Experts (SMEs): Fire Protection Engineer; ESU Captain; Head, Facilities Division

1.0 APPLICABILITY

This procedure pertains to impairments of fire doors and dampers and applies to both PPPL staff and subcontractors working at PPPL.

2.0 INTRODUCTION

This procedure establishes controls to assure the functionality of fire dampers and fire doors. Reviews and approvals are required to assure that proposed additions, modifications, repairs and/or removals of fire dampers and fire doors are appropriately evaluated and documented to minimize the associated risks.

3.0 REFERENCE DOCUMENTS

NFPA	National Fire Protection Association Standards and Codes
DOE Order 420.1	Facilities Management
DOE Order 422.1	Conduct of Operations
GEN-006	Occurrence Reporting and Processing of Operations Information
ENG-027	Fire Barrier Penetration Seal Installation and Repair including Core Boring, Cutting and Drilling
ES&H Directive 5008	Section 5 - Fire Safety

4.0 PROCEDURE

A. Impairment of Fire Doors and Fire Dampers

Note: A fire door is impaired when chocked or blocked open and it is unattended (i.e., no one in immediate area who is responsible to close it). Doors that are closed automatically by a fire system are an exception. Opening a fire door and walking through it, or holding it open for material to pass through it is not impairment as long as someone is there to close the door when done.

A. Impairment of Fire Doors and Fire Dampers (continued)**Responsibility****Action**

Initiator

1. Identifies need to impair a fire door or fire damper

Note: Any activity impacting a radiologically activated or tritium contaminated system in the Tritium Area, MER, LECT, or Stack, must have prior approval of the D-Site Shift Supervisor on the Work Permit. The approval indicates that conditions of operation have been considered, appropriate actions initiated and that work on the fire protection system can be initiated. No work may be started until the approval is received from the D-Site Shift Supervisor.

Initiator

2. Requests "Fire Door/Damper Permit" by calling ESU (2536).

ESU

3. Inspects area and issues Fire Door/Damper Permit (Attachment 1).

4. Posts approved permit in visible location. Records impairment on the ESU tracking system.

Initiator/Cog Engineer

5. Restores fire doors or dampers as quickly as possible and then informs ESU.

ESU

6. Assures fire door/damper is functional, inspect door using attachment 3 and that the door, damper permit has been removed.

7. Updates ESU impairment tracking system. Informs D-Site Shift Supervisor that impairment has been corrected, when applicable.

8. Assures that warnings (Attachment 2) are posted on each fire door during regular PM inspection of fire doors. If warning is missing, places new warning label (label on both sides of each door)

9. Reviews periodically open permits and follows up on ones that are overdue for close-out.

B. Impaired Fire Doors or Dampers

Responsibility

Action

- | | |
|------------------------|---|
| Individual Discovering | 1. Informs ESU of non-functioning or unauthorized impairment of fire dampers or fire doors. If possible, immediately corrects deficiency (e.g., removes block from fire door). |
| ESU | 2. Evaluates reports of non-functioning fire dampers and fire doors. Corrects deficiency, if possible. If not possible due to operational need, contacts the Facility Manager who must initiate a permit. If not possible due to equipment malfunction, submits a work order for needed repair. |

5.0 TRAINING (SECTION REQUIRED FOR ALL PROCEDURES)

- | | |
|-----------------------------------|--|
| Head Facilities and Site Services | <p>1. Ensures the training methods and means (below) are provided.</p> <p>A. Standard distribution of revisions and TCRs of this procedure by Best Practices to all Supervisors.</p> <p>B. Target Audience: Emergency Services Unit staff
 Instructor: Head Fire Protection
 Training Method:
 <input checked="" type="checkbox"/> Read only of this procedure
 <input checked="" type="checkbox"/> Email distribution or briefing
 Frequency:
 <input checked="" type="checkbox"/> Once only upon major revision or TCR</p> |
|-----------------------------------|--|

6.0 RECORDS REQUIREMENTS SPECIFIC TO THIS PROCEDURE

Records Custodians must assure records are maintained as follows:

Record Title	Record Custodian	Location	Retention Time
Fire Door/Damper Permit Form	ESU	ESU Impairment Tracking System	Destroy when 6 years old <i>Reference: Admin 18 Security, Emergency Planning and Safety Records (11.4.d)</i>
Fire Door Inspection, Testing and Maintenance Form	Fire Protection Engineer	Facilities Files	Destroy 3 yrs after date of inspection <i>Reference: Electronic Records (1.f.1)</i>

Attachments:

1. Typical Fire Door/Damper Permit Form
2. Examples of Fire Door Warning Labels
3. Typical - Fire Door Inspection, Testing and Maintenance Form

**Site Protection Division
Emergency Services Unit**

Fire Door/Damper Permit

The following individual is authorized to
[check one]:

- temporarily block open the door listed
- temporarily disable damper
- other _____

FireDoor/Damper No _____
Name _____ Ext _____

**Door/Damper Location and
Description**

Site _____
Bldg./Area _____
Reason for blocking/disabling _____

Compensatory Measures

- None
- Fire Watch
- Periodic walk throughs [frequency _____]
- Other _____

Schedule and Approval

Work to be performed on [date]: _____
Duration [days/weeks]: _____
Estimated Closure Date: _____

Cost Center _____ Work Package _____ Job No. _____

Authorized By: _____
Signature/Date

NOTICE

**This fire door may not be blocked
open without a permit.**

Contact ESU at extension 2536.

Label to be used on fire doors.

Typical - Fire Door Inspection, Testing and Maintenance Form – the original is maintained by the Facilities and Site Services Division

PPPL FACILITIES

FIRE DOOR INSPECTION, TESTING and MAINTENANCE

NFPA 80 (2007) Standard for Fire Doors

BUILDING _____ LOCATION _____

TEST: ANNUAL TESTING _____ DATE NAME _____ SIGNATURE _____

CHECKLIST – SWINGING FIRE DOORS:

NFPA 80	INSPECTION, TESTING, MAINTENANCE	N/A	PASS	FAIL
5.2.4.1	Visible inspection of both sides of door			
4.2.1	Listing label in place and visible			
4.2.2				
5.2.4.2	No open holes or breaks in door surface			
5.2.4.2	Glazing intact and securely fastened in place			
5.2.4.2	Door, frame, hinges, hardware and threshold are secured, aligned and in working order			
5.2.4.2	No parts missing or broken			
5.2.4.2	Door clearances			
4.8.4	- Bottom of door maximum 3/4"			
6.3.1.7	- 1/8" top and vertical edges of doors			
5.2.4.2	Self-closing device operational			
	Hold-open devices operational			
5.2.4.2	Coordinator - inactive leaf closes behind active leaf			
5.2.4.2	Latching hardware operates and secures door			
5.2.4.2	Auxiliary hardware items that interfere or prohibit operation are not installed (e.g. door feet, chocks)			
5.2.4.2	No field modifications to door have been made			
5.2.4.2	Gasketing and edge seals (where required) – presence and integrity			

Inspection, Testing and Maintenance NOTES:
