JOINT BASE MCGUIRE-DIX-LAKEHURST

SHELTER-IN-PLACE & EVACUATION GUIDE

2 January 2024



87TH CIVIL ENGINEER SQUADRON OFFICE OF EMERGENCY MANAGEMENT 1821 SHEPPARD BRIDGE RD JOINT BASE MCGUIRE-DIX-LAKEHURST, NJ 08641 609-754-4968/3731

Joint Base McGuire-Dix-Lakehurst (JB MDL) Shelter-in-Place and Evacuation Guide

<u>Table of Contents</u>	<u>Page</u>
Purpose	3
Impact Assessment	3
Before an Emergency Occurs	4
Evacuation	4
Shelter-in-Place	4
During an Emergency	5
Evacuation	5
Shelter-in-Place	6
ALL CLEAR Guidelines	6
Your Shelter Kit	7
Measuring Requirements	8
Developing Shelter-in-Place Plans and Checklists	9
Sample Shelter-in-Place Plan	10
Shelter-in-Place Supervisor Checklist	11
Facility Manager Shelter-in-Place Checklist	12
Shelter-in-Place Checklist for All Personnel and Facility	12
Shelter-in-Place Checklist for Sealing Windows/Door/Vents	13
Notification Methods	14
McGuire Sector Map	15
Dix Sector Map	16
Lakehurst Sector Map	16
JB MDL Office of Emergency Management SharePoint	17
JB MDL Office of Emergency Management Teams Site	18
Shelter-in-Place Program Signs	19-21

PURPOSE

This guide contains information on what to do if directed to evacuate or Shelter-in-Place (SIP) due to a hazardous material (HAZMAT) release, terrorist use of a chemical, biological, radiological, nuclear (CBRN) or if an explosive device is discovered.

All unit Emergency Preparedness Liaisons (EPL) will include this guide as part of their unit training program and ensure all unit members are familiar with the specific SIP and evacuation procedures for their work center.

IMPACT ASSESSMENT

Joint Base McGuire-Dix-Lakehurst (JB MDL) is vulnerable to the health and safety impacts from a hazardous materials release which can result from either an accidental release or deliberate release. There are numerous hazardous materials on base as well as those that travel through the local area via the road network and highways. Please reference the JB MDL Installation Emergency Management Plan (IEMP) 10-2 for detailed response and sheltering information. If these events were to occur, the Incident Commander has two options to protect personnel.

- ➤ The first option is to evacuate personnel that are in the affected area(s). Evacuations can be time consuming and resource demanding to complete. Evacuations can also expose personnel to danger if there is a hazard that can overwhelm them during evacuation.
- The second option is to direct personnel to SIP if a hazard could quickly overtake unprotected or evacuating citizens. The amount of protection from completing this procedure depends mainly on the air tightness of the building and the length of time the building is exposed to a hazardous plume.

Note: The National Institute for Chemical Studies has shown no fatalities associated with SIP during HAZMAT emergency case studies.

Modern homes and workplaces provide one of the most effective barriers from the outside environment; however, even the most weather-tight structure will slowly allow contaminated air to enter a facility. Sealing windows, doors and vents with plastic sheeting and duct tape can further reduce infiltration of contaminated air into a facility.

Once an ALL CLEAR has been declared, it is extremely important to ventilate and/or leave a structure. A SIP room is only meant to offer protection for a limited time due to a buildup of carbon dioxide from personnel breathing. Any HAZMAT vapors that may have entered the structure will eventually leave the facility. Hazardous substances that have absorbed onto a building surface will also gradually be released. If an occupant remains in the facility for a long period of time without adequate air exchange, exposure to the hazardous substance can increase. By opening windows and turning on air moving equipment, the air exchange rate of the building will be increased, and hazardous substances will be removed at a greater rate.

To maximize the protective value of SIP and evacuation, members of JB MDL must know how to respond quickly and effectively; therefore, unit Emergency Preparedness Liaisons must include this guide in their unit's education and training program.

BEFORE AN EMERGENCY OCCURS

- Ensure proper SIP signs are properly displayed throughout the facility (i.e., entrances, exits, SIP kits and safe rooms).
- Ensure all assigned personnel have access to this guide and are familiar with the concepts of evacuation and SIP.
- Ensure SIP checklists are current and on-hand for all unit personnel to access.
- Conduct and document semi-annual exercises, at a minimum, so personnel know the correct procedures.

Evacuation

- Have a primary and an alternate evacuation location identified if you need to evacuate the building in the event of either a fire or a bomb threat. Locations should be at least 500 ft. from your facility, preferably in opposite directions. If you are in a Control Center, then plan on a 2000 ft. evacuation distance to re-establish your Control Center.
- If possible, have another building act as your rally point. This will get all personnel out of inclement weather, and in the event of any explosive device(s), this will provide greater protection. Ensure you coordinate with the proposed evacuation Facility Manager prior to an event occurring.
- Educate all personnel on evacuation locations and proper procedures to follow during an event. Develop a facility-specific checklist for all personnel to follow that includes step(s) for "SEARCHING FOR ANY SUSPECIOUS ITEM(s)". If anything is found or if something appears to be out of the ordinary, ensure personnel move to the secondary evacuation point.

Shelter-in-Place Room Recommendations

- There are minimum requirements for each SIP room. Please use the following recommendations when determining your SIP room.
 - > It is recommended that each SIP room is in the center of the facility which may also provide protection in the event of an explosion outside your building.
 - Each room must be large enough to hold the highest amount of personnel who could be in your building at one time. Several rooms may need to be used if you are in a large facility. Also, if there is a lot of furniture and other items in the room it may reduce the number of personnel that could realistically be in there. Estimate about 10-15% less personnel.
 - Everyone requires at least 10 square feet and 32.4 ft. of air per hour for at least 3 hours.* *Room calculations are discussed in more detail later in the guide*
 - ➤ The SIP room should have very few windows, vents, and doors as possible.
 - A form of communication must be available (i.e., phone, computer, etc.).
 - A fire extinguisher and first aid kit are recommended/required for each SIP room. (These items are owner/user procured and maintained).

Conduct SIP and Evacuation exercises semi-annually at a minimum. If needed, conduct them monthly until facility personnel are proficient on the procedures. After every training event, inspect or re-inspect SIP kit(s) to ensure all required items are accounted for. Keep in mind that all SIP kit items are considered real world items. If any kit items are lost, stolen, or otherwise unusable, the unit is responsible to reconstitute the SIP kit. (Note: It is recommended to maintain enough supplies for utilization during Wing training events and exercises.). Document any training completed on Attachment 3 in the EPL binder.

DURING AN EMERGENCY

Evacuation

These are the basic steps that should be taken when evacuating a facility:

- 1. Once evacuation is initiated, notify all personnel in the facility.
- 2. Secure all classified (hard copy and electronic) material. Remove mission critical assets from facility, time permitting.
- 3. Remember to check assets, especially vehicles, for suspicious device(s) and anything unusual.
- 4. Leave facility and proceed to primary evacuation location. First person to reach the location will sweep the area for any suspicious device(s) or unusual item(s). If found, then personnel will proceed to alternate evacuation location.
- 5. Take accountability of personnel.
- 6. Do not transmit within 100 ft. of the suspicious device(s) or unusual item(s) with any type of communication device.
- 7. Do not touch, handle, or examine the suspicious device(s) or unusual item(s).
- 8. Call 9-1-1 once clear of the suspicious device(s) or unusual item(s). If using a cell phone, you will need to have Burlington/Ocean County dispatch transfer you back to your Emergency Communication Center (ECC). The Joint Base Law Enforcement desk can be reached directly by calling (609) 754-6001.
- 9. Notify Chain of Command with your new contact number, location, means of communication, accountability to include dead, injured or missing (DIM) numbers, and all information concerning the reason for evacuation.
- 10. Follow the directions of response personnel. Make sure to notify your Control Center/chain of command if something changes.

NOTE: For additional information please refer to the JBMDL Integrated Defense Plan and JBMDLI 32-2001, Fire Prevention/Protection Program.

Shelter-in-Place Procedures

These are the basic steps to go through when directed to SIP.

- 1. Use this guide as to create a <u>unit/facility specific checklist</u> and place a copy in the SIP kit.
- 2. Upon notification, alert and direct all personnel in the building to SIP.
- 3. Shut and secure all window(s) and lock exterior door(s) & post the "Shelter-in-Place" sign (Exercise or Real World) facing out.
- 4. If not already located in your SIP room, take your SIP Kit, fire extinguisher and first aid kit and move to your designated SIP room.
- 5. Remove the plastic provided in the kit and unfold it carefully. Duct tape the plastic to the inside of the SIP room door(s), making sure that the plastic overlaps the door frame.
- 6. Pull out your additional piece(s) of plastic and cover all vents & windows that open.
- 7. Turn off all HVAC systems if possible. If unable to do so: In the Fall/Winter months, turn thermostats to the coldest setting and in the Spring/Summer months turn it to the warmest setting.
- 8. Tune SIP kit radio to 1650 a.m., to listen for announcements and updates.
- 9. Notify your Unit Control Center/Command Post (609-754-3935) and report your status and accountability.

ALL CLEAR Procedures

- 1. Once **ALL CLEAR** is declared, confirm with Command Post ((609) 754-3935) and notify all personnel in your facility that **ALL CLEAR** has been declared.
- 2. Prepare to dispose of tape and plastic by donning gloves and dust mask and placing used plastic and tape in trash bag.
- 3. Carefully, starting with an upper corner, remove the duct tape and plastic from the top of the door/vents/windows. Roll the plastic inwards and down (away from your body) and place into trash bag.
- 4. Remove the SIP sign and place back in SIP kit.
- 5. Air out facility by opening all doors, windows and vents.
- 6. Notify your unit Control Center/Command Post ((609) 754-3935) and report your status.
- 7. Re-activate HVAC system as applicable and restore all thermostats to previous settings.
- 8. Wash your hands and face thoroughly.

Note: Reconstitute your SIP kit with items needed to be replaced (gloves, trash bag, plastic, duct tape, etc.).

YOUR SHELTER KIT WILL CONTAIN AT A MINIMUM

- Pre-cut plastic sheeting to cover windows, vents, and doors in the shelter room.
- Enough duct tape to secure plastic over windows, vents, and doors.
- Scissors or cutting tool for plastic and/or tape
- Trash Bag, rubber gloves and dust mask to dispose of used tape/plastic.
- ➤ Battery operated radio with fresh batteries.
- Flashlight with fresh batteries.
- Fire extinguisher (in or near the room).
- First aid kit (in or near the room).
- ➤ SIP checklist specifically tailored to the facility.
- > SIP door signs (real world and exercise) to post during SIP operations.
- Diagram showing SIP rooms, kits, evacuation routes, and max occupancy.

Kits will be checked at the conclusion of each exercise, on a semi-annually basis. If any of the supplies are expired or have been used, it is up to the unit/facility manager to replace it. Unit Emergency Preparedness Liaisons will ensure that facility managers check the kits.



MEASURING REQUIRMENTS FOR SIP

There are two considerations that need to be accounted for when determining if a location will be able to meet the requirements to be identified as a SIP room. The first requirement is that each individual requires 10 square feet of space allocated for them in a SIP location. The second is that it has to be determined that there is a minimum of 32.4 cubic feet of breathable air for each individual for each hour of occupancy a SIP room (min 3 hours of occupancy).

It is the responsibility of the Facility Manager to use the identified equations below to ensure that the designated rooms are large enough for the **maximum** amount of personnel who could be in the building at any given time. This includes both workers and visitors.

SPACE

Length of the room (L) multiplied by the Width of the room (W) equals the square feet (F)

■ Length x Width = Square Feet

Square Feet (F) divided by 10 equals the amount of people you can fit in the room (P)

Square Feet / 10 = Number of People for a SIP room

For example, a room that is 20 feet long and 9 feet wide 10 feet high:

$$20(L) \times 9(W) = 180(F)$$

 $180(F) / 10 = 18(P)$

18 personnel can fit in the room at one time.

AIR

Length (L) multiplied by the Width (W) multiplied by the Height (H) equals feet cubed (F²)

Length x Width x Height = Cubic Feet

Feet cubed (F²) divided by 32.4 equals' number of people who can breathe for one hour (P²)

• Cubic Feet / 32.4 = Number of people who can breath for an hour

Personnel (P²) divided by (P) equals how long the maximum amount can stay in the room (T)

Number of people who can breath for an hour / Number of People for SIP room = Stay
 Time

$$20(L) \times 9(W) \times 10(H) = 1800(F^2)$$

 $1800(F^2) / 32.4 = 55.5(P^2)$
 $55.5(P^2) / 18(P) = 3 \text{ hours (T)}$

Note: All SIP rooms must provide enough air for the maximum amount of personnel for 3 hours. This calculation is done for an empty room. Furniture and other items will reduce the number of personnel (about 10-15%) that could fit in the room. The final maximum number of personnel that could fit in the room should bear this fact in mind.

Developing Shelter-in-Place Plans and Checklists

Unit Emergency Preparedness Liaisons (EPL) shall assist Facility Managers in developing SIP plans and checklists. All Facility Managers on JB MDL must develop specific procedures to implement SIP protection within their facility. Use the sample plan and checklist below, as a template. Additional information as well as case studies of hazardous materials incidents where "Shelter-in-Place" was used to protect the public can be found on the National Institute for Chemical Studies web site at: pbadupws.nrc.gov/docs/ML1233/ML12339A626.pdf

Facility Managers must carefully review the floor plan of their building and identify an area or areas that will serve as temporary shelter for personnel working within the facility. See "Before an emergency occurs", in Part I of this guide for more information.

Additional Steps to Consider

- 1. Personnel should be assigned specific duties during an emergency. Alternates should be assigned to each duty. Task cards are a valuable tool to use.
- 2. It is important that personnel assigned to your facility are familiar with this plan and have participated in a "Shelter-in-Place" exercise.
- 3. Develop a personnel accountability system for use during shelter operations.
- 4. Drills should be planned and executed on a regular basis (set by unit commander based on ability to perform but no less than semi-annually). Afterwards, the drill should be critiqued by those involved and lessons learned should be incorporated into your Shelter-in-Place Plan. Make sure to keep documentation with the date the exercise happened and all those who participated in it.

NOTE: If your facility has an automatic HVAC shutoff button, only the doors and windows that <u>OPEN</u> to the outside will have to have plastic and tape. The vents and/or ducts in the facility <u>DO NOT</u> have to have plastic and tape.

As you can see, these requirements are basic, require minimal equipment and supplies, and are easily implemented. Taking these few steps may very well make the difference between surviving an incident and not.

The office of primary responsibility (OPR) for this document is the 87th Civil Engineer Squadron Emergency Management Flight (87 CES/CEX), Joint Base McGuire-Dix-Lakehurst, New Jersey 08641.

If you need assistance with any portion of your SIP program or just need additional information, please contact us at (609) 754-4968/3731.

SAMPLE SHELTER-IN-PLACE PLAN

This is an example of a starter plan you could use to build your unit's plan for Shelter-In-Place actions. Modify it as necessary to make it work for your individual facilities. Your plan should, and will no doubt, be much more detailed. Include maps and/or diagrams showing shelter areas, HVAC shut offs, thermostat locations, etc. Consider filming or taking digital photos of key tasks to train personnel on essential activities. Electronic means of information dissemination is encouraged but should never completely replace posting vital information on boards, briefing in person, commander's calls, etc.

Shelter-in-Place Plan for Building ####.

In the event personnel in this facility or area are directed to SIP, all people in the facility must be immediately notified to SIP and that all doors will be locked.

All personnel will report to their assigned shelter area, initiate HVAC shutdown as applicable and room sealing procedures (as required). They will remain in that area until the "ALL CLEAR" is given.

Procedure	Responsible Individual	Needed Items
Responsible announcement Via giant voice, radio, PC and/or phone.	All assigned	None
Advise all personnel to report to designated shelter area.	All assigned	Cell phone, land line or radio as necessary
Turn off ventilation systems in the shelter area.	Designated shelter area monitor or facility Manager	None
Turn off all main air handling equipment switches.	Facility Manager/Shop Chief, etc.	None
Make sure all doors and windows to the shelter are closed.	Designated shelter area monitor	None
Seal windows, doors, and vents using plastic and duct tape.	Designated shelter area monitor	Plastic sheeting and duct tape.
Have all personnel in the area sign in.	Designated shelter area monitor	None

After "ALL CLEAR" is given: Open all windows and doors, leave the facility, turn the HVAC system on to help push residual vapors/particles out of the facility and report to pre-designated assembly area. Follow directions of emergency response personnel.

NOTE: Checklists supplied within this guide are provided as a starting point to assist personnel with SIP operations. All are subject to and may require "incident specific" modification during contingency operations.

SHELTER-IN-PLACE SUPERVISOR CHECKLIST

When	a SIP directive is issued:
1.	Announce, "A SIP directive has been issued. All personnel should secure your area and proceed to room, which is our shelter location Ensure all windows and doors are closed and locked before leaving".
2.	Take accountability of personnel using a sign-in sheet for the shelter room.
3.	Secure ventilation systems and seal room as much as possible.
4.	When the "ALL CLEAR" is issued, take the sign-in sheets and leave the shelter room. Proceed to the pre-designated meeting area outside the building.
	Your pre-designated meeting areas are:
	Primary
	Alternate

- personnel using sign-in sheets and report your status to your chain of command. Immediately report any discrepancies to emergency response personnel.6. When the building has been ventilated, and responders clear you back in, return to the
- 6. When the building has been ventilated, and responders clear you back in, return to the building and reconstitute the SIP kit. Have all personnel sweep their work areas for anything that could have been tampered with or anything that could be missing.

FACILITY MANAGER SHELTER-IN-PLACE CHECKLIST

Primary	Alternate
---------	-----------

When a Shelter-in-Place directive is issued:

- 1. Turn off air handling equipment (HVAC) if safe to do so without exiting the facility. Do not enter into a mechanical room unless specifically trained and authorized to do so.
- 2. Proceed to the shelter area and remain there until released.
- 3. For "ALL CLEAR" proceed to the mechanical room. Turn all ventilation equipment on.
- 4. Leave the building and go to the pre-designated meeting area outside.

SHELTER-IN-PLACE CHECKLIST	FOR ALL	PERSONNEL	IN
FACILITY #			

When a SIP directive is issued:

- 1. Upon hearing the SIP announcement, make sure all office windows are closed and locked. Secure your office when you leave. Immediately go to your shelter area and ensure any visitors accompany you.
- 2. Remain in the shelter area until the "ALL CLEAR" is announced. Immediately go outside to the pre-designated assembly area. Make sure any visitors are escorted to the meeting area as well. Sweep for suspicious items and complete an accountability check. Report status to your chain of command.
- 3. After the building is thoroughly ventilated and upon instruction from emergency response personnel, return to your office.
- 4. If you are outside when the SIP order is given, attempt to gain entry into a facility before it secures. If all facilities are secure move in a 90 degree direction from the wind. For example, if the winds are coming from the north, move east or west. Moving crosswind will increase your chances of quickly leaving the hazard area and finding a facility or protected area to find refuge. As soon as possible contact unit Control Center/Command Post to update your location and condition. Good rule of thumb, attempt to cover your nose/ mouth with a tightly woven cloth; dampen if possible, if you simply cannot escape a plume.

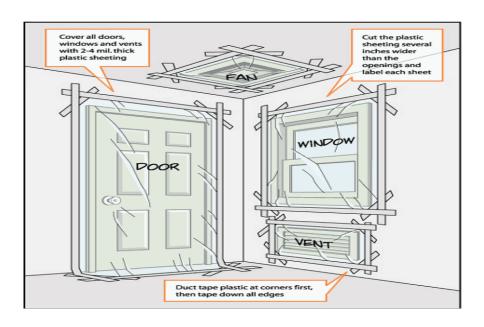
SHELTER-IN-PLACE CHECKLIST FOR SEALING WINDOWS/DOORS/VENTS

When a SIP directive is issued:

- 1. Close and lock office windows and close doors on the way to the shelter area.
- 2. Post a sign visible to outside personnel advising them the facility is secure.
- 3. Remove plastic sheets and duct tape from shelter kit.
- 4. Place plastic over windows; seal the four corners along with the edges with long strips of duct tape. Be sure tape securely overlaps all edges of the plastic.
- 5. Place plastic over all vents and seal the same way as the windows with long strips of duct tape. Be sure tape securely overlaps all edges of the plastic.
- 6. Lock door to shelter room and seal edges with long strips of duct tape. Be sure tape securely overlaps all edges of the door. If the door has a window or vents on it, use a sheet of plastic sealing the same way as the vents and windows.
- 7. When the "ALL CLEAR" is announced, immediately remove the plastic from the windows, doors, and vents. Open all windows and exterior doors.
- 8. Go outside to the pre-designated assembly area, sweep for unusual items. If found relocate to the alternate assembly area. If none found do a personnel accountability check and report status to your chain of command.
- 9. When the building is thoroughly ventilated and you are instructed to return by emergency response personnel, return to your office area.

ORDER OF IMPORTANCE

- 1. Windows
- 2. Vents
- 3. Fans
- 4. Doors



NOTIFICATION METHODS

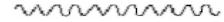
Installation Warning Systems

Giant Voice (GV) Siren System

(3-5 Minute Steady Tone)

Tornado Warning





(3-5 Minute Wavering Tone)

Active Shooter

(Voice Announcement)

All Clear

(The Immediate Tornado Threat Has Ended Or The Active Shooter Is Over)

- Ensure all personnel are warned/notified and accounted for.
- Listen to and follow Warning System instructions.
- Actions may include: Lockdown, Shelter In-Place, Evacuation, staying indoors to take cover and increasing appropriate security measures.

Bottom Line: Stay Informed and Take Appropriate Actions.

The following notification systems broadcast valuable information to the base. At a minimum, units must notify all personnel, perform accountability and report to Unit/Group Control Centers, the Command Post (609-754-3935) or Joint Base Control Center (JBCC) (609-754-0990).







JBMDL App

Don't have a smart phone?

STAY ALERT

GIANT VOICE SIREN DESKTOP ALERTS SOCIAL MEDIAS SITES 1650 AM RADIO STATION



At Hoc Alert System

At Hoc Is a message alerting system that sends texts, emails, phone calls to registered base population.



At Hoc Desktop Alerting

Appears on equipped JB MDL government computers. Notification window remains displayed until user closes the box.

JB MDL OEM Social Media





www.facebook.com/jbmdl



flickr www.flickr.com/jointbasemdl



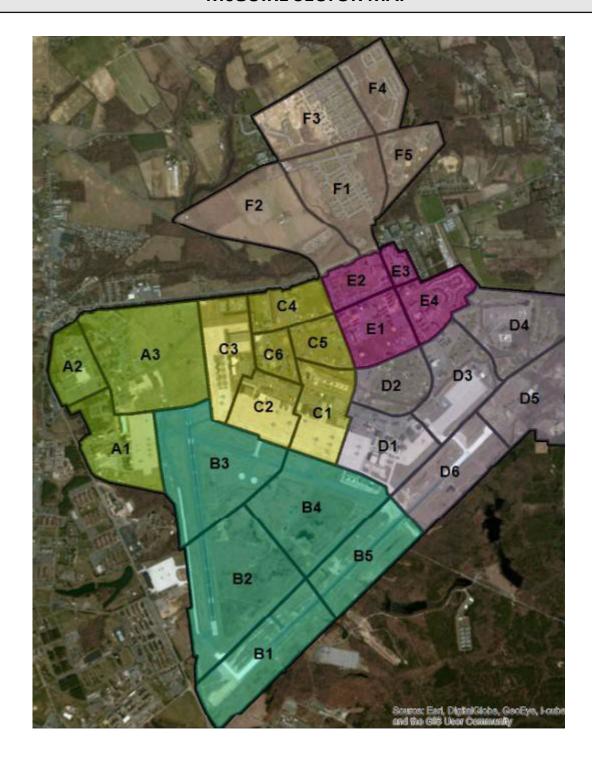
1650 AM Radio Station

When the lights on posted warning signs are flashing, tune your radio to 1650 AM to receive urgent information. Continue monitoring until the event has been terminated and the all clear announced. NOAA weather radio continuously plays until an urgent message is broadcast.

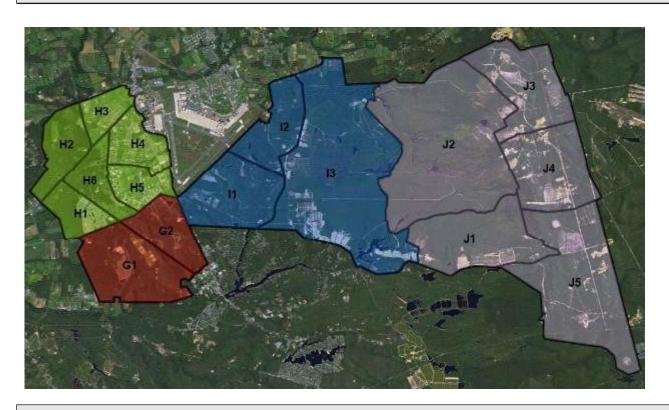


JB MDL OEM VA-1(Locally replaces AFVA 10-2510), 1 June 2023, previous editions obsolete

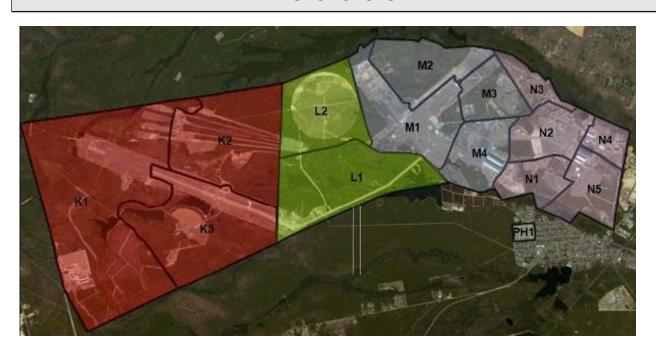
McGUIRE SECTOR MAP



DIX SECTOR MAP



LAKEHURST SECTOR MAP

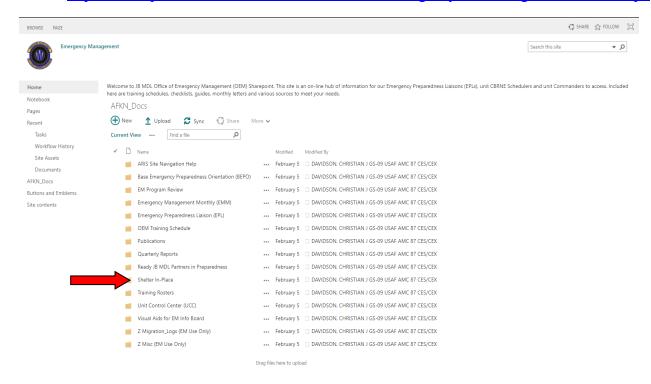


JB MDL OFFICE OF EMERGENCY MANAGEMENT SHAREPOINT

The JB MDL OEM SharePoint is a tremendously valuable tool to use for information about the Joint Base Emergency Management Program. On it, are SIP guidelines and models and additional information concerning hazards to the bases.

For Air Force members, you can access the SharePoint by copying and pasting the following link into your Internet browser (Chrome Recommended):

https://usaf.dps.mil/sites/87CES/office%20of%20emergency%20management/default.aspx

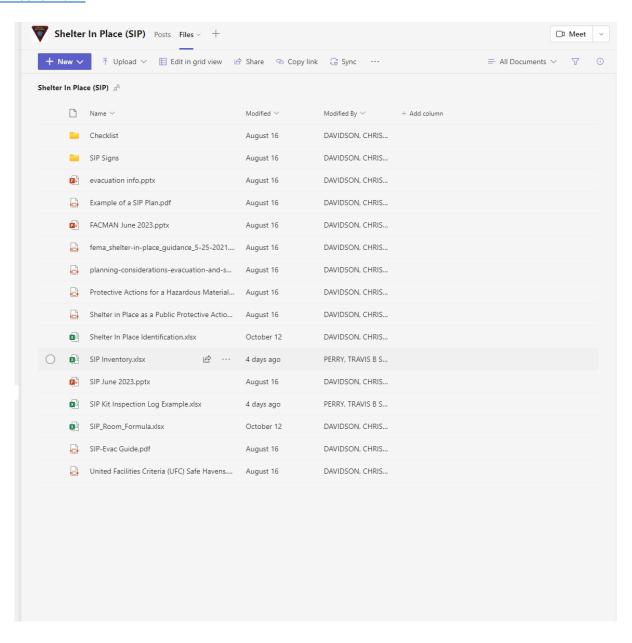


JB MDL OFFICE OF EMERGENCY MANAGEMENT TEAMS SITE

The JB MDL OEM Microsoft Teams can be used if the OEM Share Point link is not working. On it, are SIP guidelines and models and additional information concerning hazards to the bases.

Non-Air Force members will not have access to the OEM Share Point site. They can copy and paste the following link into their Internet browser (Chrome Recommended):

 $\frac{\text{https://dod.teams.microsoft.us/l/channel/19\%3adod\%3a1e6dc83da47942a08c85c654980cc23c\%40thread.tacv2/Sheltergw2520In\%2520Place\%2520(SIP)?groupId=e008efab-9e9e-4058-94e9-a2716bd96681\&tenantId=8331b18d-2d87-48efa35f-ac8818ebf9b4}$



FACILITY SIGN

JB M-D-L Evacuation & Shelter In-Place Program



For More Info Contact Your Unit Emergency Preparedness Liaison (EPL) or The Office of Emergency Management @ 609-754-6208 or 609-754-3731

WARNING SIGN

<u>WARNING!</u>
This Facility is Under
Shelter In-Place Conditions

Do Not Attempt Entry!



Building 5511

EXERCISE SIGN

EXERCISE! EXERCISE!
This Facility is Under
Shelter In-Place Conditions

Plastic and / or Duct Tape is Simulated



SAFE ROOM SIGN

Building 5511
Safe Room



Hallway

When Directed to Shelter In-Place, Proceed to conference room.

Run Shelter In-Place Checklist and Complete Required Actions –

Report Status Changes to Your Unit Control Center and <u>All</u>

Emergencies to 911

SIP KIT SIGN

Building 5511 Shelter In-Place Response Kit #1 of 2



Once Directed to Shelter In-Place, Open Kit, Run Checklist and Complete Required Actions – Report Status Changes to Your Unit Control Center and <u>All</u> Emergencies to 911

