

Township of Woodbridge

John E. McCormac, Mayor

Office of the Mayor
One Main Street
Woodbridge, New Jersey 07095
Tel: (732) 602-6015 · Fax: (732) 602-6016
Email: wbmayor@twp.woodbridge.nj.us

June 2020

Dear Business Property Owner:

Woodbridge Township is taking a variety of proactive measures to protect against potential flood damage and to reduce the rising costs of flood insurance. To further advance these strong resiliency efforts the Township is participating in the Community Rating System (CRS) Program - a Federal Emergency Management Agency (FEMA)-sponsored program that encourages and recognizes community floodplain management and planning activities that exceed the minimum requirements of the National Flood Insurance Program (NFIP).

As part of the CRS program requirements, we are providing information geared to raise awareness about how to protect your business from flood risks. In addition, supplementary Township resources are available to help you better manage the potential for flood risk:

- The Township offers Flood Insurance Rate Map (FIRM) determinations based on a street address;
- The Township offers flood protection assistance consultations in order to highlight information such as, but not limited to, elevating the structure, flood-venting, and/or protecting utilities from flood vulnerability. Call the Division of Engineering at: 732.602.6057 to inquire.
- We have a dedicated website on the Township web page to help you learn more about the specific riverine and coastal conditions of the Township and where to direct all inquiries. Website: https://www.twp.woodbridge.nj.us/635/Floodplain-Management.

As we work to effectively assess flooding situations and to better evaluate/manage our federally regulated floodplains, enclosed with this letter please find a few helpful tips to help minimize risk and better prepare for severe weather conditions.

For questions about the CRS program contact the Division of Engineering. I look forward to our efforts to build an even more resilient Township.

Sincerely,

John E. McCormac

Mayor

Woodbridge Township

FLOODS ARE COSTLY.

Is Your Business Prepared?

Take three steps to save money, protect your business, save the environment and lower public health risks: *substitute*, *reduce and secure*.

SUBSTITUTE

Switch to safer chemicals or processes when feasible.

REDUCE

Reduce or eliminate the inventory of hazardous chemicals.

SECURE

Properly secure all chemicals above the flood plain elevation.

Always Be Prepared.

Have drain covers ready, conduct routine internal inspections, and have an emergency plan in place.

Manage Your Flood Risk.

Know your flood elevation.

Anchor all chemicals above the flood elevation.

Consider installing dry or wet flood proofing measures.

To learn more, visit:
EPA pollution prevention: https://www.epa.gov/p2
NJ Sustainable Business Registry: http://registry.njsbdc.com
NJ Work Environment Council: https://njwec.org





FLOOD MANAGEMENT PREPAREDNESS

- Ensure up-to-date facility plans document emergency shutoffs, utilities and fire-protection systems and other important infrastructure details. A copy of these plans should be stored off site.
- Locate all the drains on your property, both indoors and outdoors, and mark your drains where they go. Consider locating
 drain covers and spill supplies near drains so you can close them off, if you have time and it is safe to do so.
- Designate an individual to regularly conduct inspections of containers stored in outdoor storm shelters.
- Have supplies ready such as filled sandbags, plywood to fit the windows, screws and tools.

SAVE MONEY— SAVE YOUR BUSINESS

Here's how:

- Reduced or eliminated costs of permitting, monitoring, tracking and reporting by switching to safer chemicals
- Reduced repair costs for property damage due to floods
- Reduced disposal costs by switching to safer chemicals
- Potentially lower business costs associated with workers' comp and liability insurance
- Protection of product inventory by preventing the accidental release during floods
- Lower cleanup costs after a flood by switching to safer chemicals
- Getting your business up and running again sooner
- Reduced risk of illness or death from flood hazards and chemical exposure

Resources

- EPA Region 2 insight Bulletin; <u>Dry Cleaning</u>
 Sector Best Management Practices
- EPA's Safer Choice: www.epa.gov/saferchoice
- EPA P2 What You Can Do About Pollution Prevention—Business Resources: www.epa.gov/p2/p2-resources-business

This factsheet is not an exhaustive list. For additional information and resources, please go to www.njwec.org/p2resources.

This factsheet is a work product of a collaboration between NJ Work Environment Council and Sustainable Jersey and funded in part by the US Environmental Protection Agency.





AS EASY AS 1, 2, 3...

Three steps to reduce toxic exposures during a flood or storm surge.

1. SUBSTITUTE



Switch to safer chemicals or processes when feasible.

2. REDUCE



Keep chemical inventory to a minimum.

3. SECURE



Store chemicals properly and securely above the base flood elevation.

1. Substitute and Reduce the Hazard of a Chemical Spill

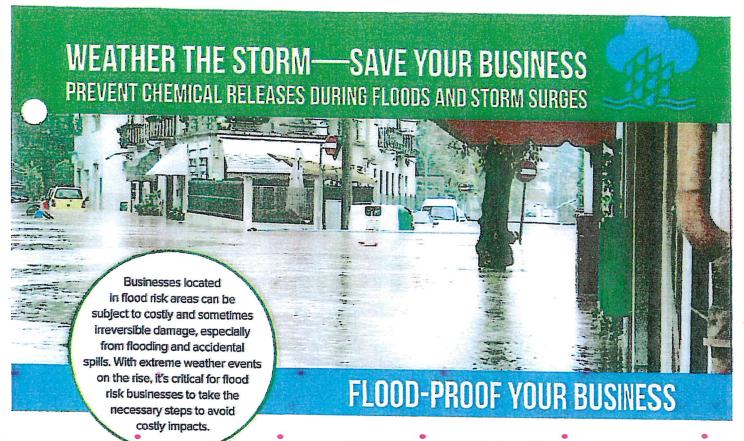
The most effective way to eliminate a toxic release is to eliminate the hazard. This can be done by switching to safer chemicals and processes. If possible, the most hazardous chemicals should be replaced with alternatives that pose significantly less risk to workers, the community and the environment. For example, dry deaners can switch from solvent based cleaning to eco-friendly wet cleaning.

2. Reduce Your Chemical Inventory

- Review your chemical inventory and ordering practices to ensure the inventory does not include more hazardous materials on-site than necessary.
- Reduce or eliminate outdoor storage of materials to prevent loss and possible release during a flood. If necessary, make sure materials are secured and anchored.
- Schedule hazardous waste pick-up to minimize the amount of time waste is on-site.

3. Safe Chemical Storage

- At the end of a work shift, be sure chemical containers are tightly closed and returned to their designated storage space.
- Keep chemicals off floors and store them on secured shelves 1-3 feet higher than the BFE.
- Anchor shelving areas to prevent chemicals from tipping over from water movement through the building.
- Select appropriate containers to store liquids inside.
- Properly anchor and contain above ground storage tanks. See FEMA.gov for technical guidance.



KNOW YOUR FLOOD RISK

- Determine whether your business is in a flood zone by viewing the Federal Emergency Management Agency (FEMA) maps and type in your address. If you are in a 1% or .02% flood zone, you are at risk of flooding.
- If you are in a flood zone, determine the base flood elevation (BFE) around your business. The BFE is the elevation at which a property has a 1% chance of flooding annually. Then find out the elevation of your business to see if it is above or below the BFE. Your building's elevation may be obtained from the site plan or an official building elevation certificate.

Major storms and flash floods can and will cause waters to rise higher than the BFE—therefore, it is always a good investment to build in a safety factor several feet above the BFE. This safety zone is often called "freehoard."

1 Note that the BFE is a conservative estimate for determining flood lavel because it is based on historical data, and does not account for recent trends of heavy precipitation and intense storm, which are expected to continue. For this reason, state law requires new construction to be one feet above the BFE, though some communities require an even higher freeboard (distance above BFE).

FLOOD PROOFING YOUR BUSINESS

There are many techniques to flood proof your business, or at least minimize the risk of water damage. Choosing the most appropriate technique, however, is helpful for avoiding even more costly damage. Therefore, it is important to first seek a professional to determine what type of flood proofing should be applied to your structure. Techniques include:

Dry flood proofing: techniques to prevent water from entering your structure. Some examples include:

- Waterproof coating or membrane to exterior walls
- Waterproof shields over all openings, including windows and doors
- Strengthened walls to withstand flood water pressures and debris.

Wet flood proofing: techniques to allow water to enteryour structure, but minimizes the damage to the structure and interior materials. Some examples include:

- Sealed walls and floors to reduce or prevent the penetration of floodwater. It's important to choose the right sealant for the job.
- Anchored ancillary structures, tanks and sheds to prevent them from being washed away
- Flood resistant materials and elevated mechanical and utility equipment above the BFE, or 1-3 feet higher than freeboard
- Openings, vents or breakaway walls to allow water to move through the structure, including the basement

Elevating your structure: raising your building several feet above the base flood elevation will reduce the exposure to flood waters.

FLOOD MANAGEMENT PREPAREDNESS

- Ensure up-to-date facility plans document emergency shutoffs, utilities and fire-protection systems and other important infrastructure details. A copy of these plans should be stored off site.
- Locate all the drains on your property, both indoors and outdoors, and mark your drains where they go. Consider locating
 drain covers and spill supplies near drains so you can close them off, if you have time and it is safe to do so.
- Designate an individual to regularly conduct inspections of containers stored in outdoor storm shelters
- Have supplies ready such as filled sandbags, plywood to fit the windows, screws and tools

SAVE MONEY— SAVE YOUR BUSINESS

Here's how:

- Reduced or eliminated costs of permitting, monitoring, tracking and reporting by switching to safer chemicals
- Reduced repair costs for property damage due to floods
- Reduced disposal costs by switching to safer chemicals
- Potentially lower business costs associated with workers' comp and liability insurance
- Protection of product inventory by preventing the accidental release during floods
- Lower cleanup costs after a flood by switching to safer chemicals
- Getting your business up and running again sooner
- Reduced risk of illness or death from flood hazards and chemical exposure

Resources

- EPA Region 2 Insight Bulletin: <u>Dry Cleaning</u>
 <u>Sector Best Management Practices</u>
- EPA's Safer Choice: www.epa.gov/saferchoice
- EPA P2 What You Can Do About Pollution Prevention—Business Resources: www.epa.gov/p2/p2-resources-business

This factsheet is not an exhaustive list. For additional information and resources, please go to www.njwec.org/p2resources.

This factsheet is a work product of a collaboration between NJ Work Environment Council and Sustainable Jersey and funded in part by the US Environmental Protection Agency.





AS EASY AS 1, 2, 3...

Three steps to reduce toxic exposures during a flood or storm surge.

1. SUBSTITUTE



Switch to safer chemicals or processes when feasible.

2. REDUCE



Keep chemical inventory to a minimum.

3. SECURE



Store chemicals properly and securely above the base flood elevation.

1. Substitute and Reduce the Hazard of a Chemical Spill

The most effective way to eliminate a toxic release is to eliminate the hazard. This can be done by switching to safer chemicals and processes. If possible, the most hazardous chemicals should be replaced with alternatives that pose significantly less risk to workers, the community and the environment. For example, dry deaners can switch from solvent based cleaning to eco-friendly wet cleaning.

2. Reduce Your Chemical Inventory

- Review your chemical inventory and ordering practices to ensure the inventory does not include more hazardous materials on-site than necessary.
- Reduce or eliminate outdoor storage of materials to prevent loss and possible release during a flood. If necessary, make sure materials are secured and anchored.
- Schedule hazardous waste pick-up to minimize the amount of time waste is on-site.

3. Safe Chemical Storage

- At the end of a work shift, be sure chemical containers are tightly closed and returned to their designated storage space.
- Keep chemicals off floors and store them on secured shelves 1-3 feet higher than the BFE.
- Anchor shelving areas to prevent chemicals from tipping over from water movement through the building.
- Select appropriate containers to store liquids inside.
- Properly anchor and contain above ground storage tanks. See FEMA.gov for technical guidance.

FLOODS ARE COSTLY

Is Your Business Prepared?

Take three steps to save money, protect your business, save the environment and lower public health risks: *substitute*, *reduce and secure*.

SUBSTITUTE

Switch to safer chemicals or processes when feasible.

REDUCE

Reduce or eliminate the inventory of hazardous chemicals.

SECURE

Properly secure all chemicals above the flood plain elevation.

Always Be Prepared.

Have drain covers ready, conduct routine internal inspections, and have an emergency plan in place.

Manage Your Flood Risk.

Know your flood elevation.
Anchor all chemicals above the flood elevation.
Consider installing dry or wet flood proofing measures.

To learn more, visit:
EPA pollution prevention: https://www.epa.gov/p2
NJ Sustainable Business Registry: http://registry.njsbdc.com
NJ Work Environment Council: https://njwec.org





WEATHER THE STORM—SAVE YOUR BUSINESS PREVENT CHEMICAL RELEASES DURING FLOODS AND STORM SURGES Businesses located in flood risk areas can be subject to costly and sometimes irreversible damage, especially from flooding and accidental spills. With extreme weather events on the rise, it's critical for flood risk businesses to take the necessary steps to avoid costly impacts.

KNOW YOUR FLOOD RISK

- Determine whether your business is in a flood zone by viewing the Federal Emergency Management Agency (FEMA) maps and type in your address. If you are in a 1% or .02% flood zone, you are at risk of flooding.
- If you are in a flood zone, determine the base flood elevation (BFE) around your business. The BFE is the elevation at which a property has a 1% chance of flooding annually. Then find out the elevation of your business to see if it is above or below the BFE. Your building's elevation may be obtained from the site plan or an official building elevation certificate.

Major storms and flash floods can and will cause waters to rise higher than the BFE—therefore, it is always a good investment to build in a safety factor several feet above the BFE. This safety zone is often called "freeboard."

1 Note that the BFE is a conservative estimate for determining flood level because it is based on historical data, and does not account for recent trends of heavy precipitation and intense storm, which are expected to continue. For this reason, state law requires new construction to be one feet above the BFE, though some communities require an even higher freeboard (distance above BFE).

FLOOD PROOFING YOUR BUSINESS

There are many techniques to flood proof your business, or at least minimize the risk of water damage. Choosing the most appropriate technique, however, is helpful for avoiding even more costly damage. Therefore, it is important to first seek a professional to determine what type of flood proofing should be applied to your structure. Techniques include:

Dry flood proofing: techniques to prevent water from entering your structure. Some examples include:

- Waterproof coating or membrane to exterior walls
- Waterproof shields over all openings, including windows and doors
- Strengthened walls to withstand flood water pressures and debris.

Wet flood proofing: techniques to allow water to enteryour structure, but minimizes the damage to the structure and interior materials. Some examples include:

- Sealed walls and floors to reduce or prevent the penetration of floodwater. It's important to choose the right sealant for the job.
- Anchored ancillary structures, tanks and sheds to prevent them from being washed away
- Flood resistant materials and elevated mechanical and utility equipment above the BFE, or 1-3 feet higher than freeboard
- Openings, vents or breakaway walls to allow water to move through the structure, including the basement

Elevating your structure: raising your building several feet above the base flood elevation will reduce the exposure to flood waters.