Preparing Your Home, Family, and Business for

TERRORIST ATTACKS

Some Common Sense Suggestions on Preparedness

U.S. Representative Ryan Costello

A product of the Congressional Taskforce on Terrorism and Unconventional Warfare

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INTRODUCTION

In this era of around-the-clock news coverage and instant access to information via social media, we know more than ever about the real and significant threats to our safety and security. These threats range from emboldened and organized terror organizations, such as ISIS, to alarming outbreaks of new, and sometimes rare, diseases, to persistent cyberattacks aimed at weakening our military and potentially sparking civil unrest. Closer to home, many of us live or work near the puffs of steam emanating from the Limerick nuclear power plant. Others have miles and miles of natural gas pipelines running beneath their yards or have freight trains rumbling through their communities carrying chemicals, petroleum products and other hazardous materials. Furthermore, our proximity to Philadelphia, the fifth largest city in the country, means that we must be even more prepared in case of a disaster. That's why being well-informed is more important than ever.

For your convenience, my office is offering this preparedness awareness book to provide you, your family, and business with the tools to become aware, well-informed and well-prepared in the event one of these threats ever reaches our neighborhoods. When a plan is in place and everyone is prepared, people are much less likely to panic in a crisis. This booklet is a "beginner's handbook" for dealing with sudden, unwelcome changes in our day-to-day lives. This book by no means contains all of the answers to every emergency that may arise. It is intended to serve as a starting point for families and to help calm the chaos that follows a disaster. Additionally, the manual contains links to detailed websites that will serve as additional resources.

It is important to note that we are not recommending any particular product or service, and you should never begin taking medicine without first talking with your doctor. We also encourage you to work with your family or business prior to laying out a plan and find one that best fits your needs.

We hope that you find this resource manual useful. As always, please don't hesitate to reach out to my offices Washington: 202-225-4315, West Chester: 610-696-2982, and Wyomissing: 610-376-7630. It is an honor to serve you in the House of Representatives.

U.S. Representative Ryan Costello
Pennsylvania's 6th Congressional District

"America faces serious and multiplying challenges from our adversaries, including Islamist extremists and terrorist sponsoring nations. Our nation must also contend with natural disasters and the globalized threat of pandemic disease. As we face these threats to our security and safety, thoughtful and prudent preparation is the key to protecting our families and communities."

- The Honorable Michael Chertoff, Former Secretary, U.S. Department of Homeland Security

"ISIS, Iran, al Qaeda and other terrorist organizations are focused on destroying our way of life. We should recognize their unrelenting focus and determined intent to attack America. Making common sense preparations for a possible attack on our Homeland should be a consideration of all Americans."

- Ambassador R. James Woolsey, Former Director, Central Intelligence Agency, Former Undersecretary of the Navy

IMPORTANCE OF PREPARATION

1. Why is Preparing for Terrorist Attacks Important?

   We need to prepare and to protect our family and business in times of attacks. From explosives to biological and chemical weapons, these emergencies and others demand that we plan and prepare our families and businesses to know how to react and determine the resources necessary to make our plans practical.

   This publication will help you prepare your family and business to respond to possible attacks!

2. Knowing how you will respond to an attack at home, school or work will help you remain calm, think clearly and react well. It also lowers the workload of firefighters, police and emergency medical workers.

3. This booklet is a guide to help you, your family, and business deal with sudden, unwelcome changes in your day-to-day lives and routines. Procedures for dealing with emergency events such as hazardous materials accidents, civil unrest or even intentional attacks using explosives, chemical or biological agents, include steps applicable during most emergency situations.

A Word on What Could Happen

As we've learned from previous events, the following things can happen after a terrorist attack:

- There can be significant numbers of casualties and/or damage to buildings and the infrastructure. So employers need up-to-date information about any medical needs you may have and on how to contact your designated beneficiaries.
- Heavy law enforcement involvement at local, state and federal levels follows a terrorist attack due to the event's criminal nature.
- Health and mental health resources in the affected communities can be strained to their limits, maybe even overwhelmed.
- Extensive media coverage, strong public fear and international implications and consequences can continue for a prolonged period.
- Workplaces and schools may be closed, and there may be restrictions on domestic and international travel.
- You and your family or household may have to evacuate an area, avoiding roads blocked for your safety.
- Clean-up may take many months.

Source: Ready.gov and Red Cross

POSSIBLE ATTACKS

What type of terrorist attacks do we need to be ready for?

Terrorist Attacks
- Explosives
- Chemical
- Toxic industrial chemical/ material
- Classical "war" agents
- Biological
- Local attack
- Pandemic
- Radiological
- Nuclear

Cyber attacks
- ID Theft
- Personal finances
- Extensive financial disruption—could lead to civil unrest

Pandemic diseases (communicable, widespread, possibly leading to serious impairment or death)
- Influenza
- Cholera
- Typhus
- Yellow Fever
- Measles
- Chicken Pox
- Ebola
- Others

Ready Bag Contents

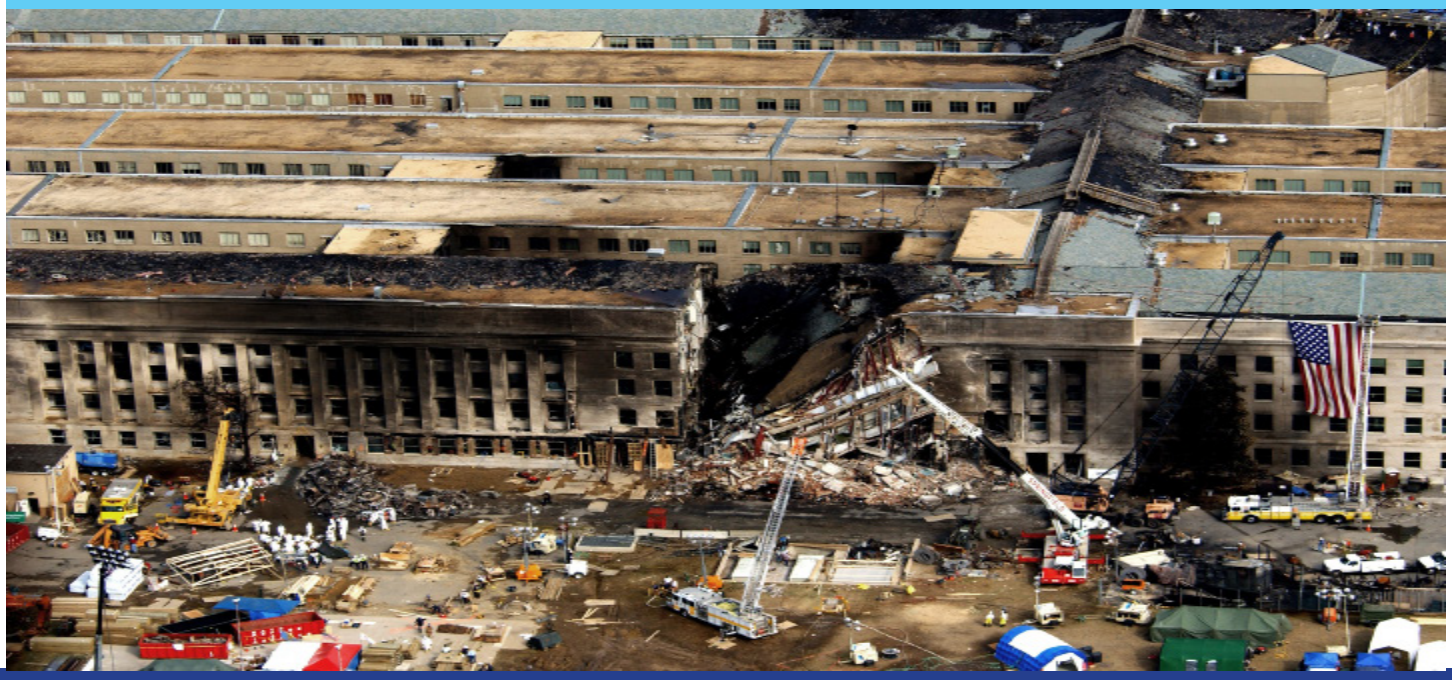
- 1 gallon of water per person, per day (at least)
- Waterproof matches
- Duct Tape
- Flashlight with extra batteries
- Clothing with long sleeves and pants
- 3 day supply of any medications taken regularly
- Manual can opener
- Cartridge and filter masks
- Knife or scissors
- Whistle
- Extra cash
- Candles
- Radio with extra batteries or portable hand-cranked radio
- Hand sanitizer
- Hand tools (hammer, etc.)
- Plastic garbage bags with ties (for human refuse and other garbage)
- Vitamins
- First Aid Kit
- Bible
- Protein bars
- Nuts
- Games for children
- Canned fruits
- Shelf stable milk
- Canned soup or pasta
- Energy bars
- Crackers
- Cereal
- Sterno
- Poncho or rain gear
- Hat or cap
- Feminine hygiene supplies
- Lysol or Clorox sprays
- Paper towels and toilet paper
- Signal flare
- Sturdy gloves
- Blanket, pillows, or sleeping bags
- Copies of important family documents such as insurance policies, ID and bank account records; store in a waterproof, portable container
- List of doctors and relatives to be notified if you are injured

Source: Ready.gov

MANUAL OVERVIEW

With the heightened concerns for our family's safety as a result of growing instability around the world, every time a terrorist attack occurs somewhere overseas or a severe weather event breaks out, we all feel concerned and a little more vulnerable. We all ask ourselves, "What can I do to protect my family a little better?" In this packet we have accumulated information and tips in hopes of providing you with "common sense" actions recognized by safety experts to better prepare you and your family for an event we truly hope never happens.

Prior to September 11, 2001, Americans had been fortunate to never have had to incorporate the threat of a possible terrorist attack into our daily routines. Hopefully, it does not happen to you, however you should consider what to think about should a terrorist attack occur in your area, or when a warning indicates that an attack is imminent. The good news is we have had some expert planning done on our part by our state and federal officials and have a nationally recognized plan in place to help protect us. For example, each state is part of an active bioterrorism surveillance system which will give us advanced warning of a disease outbreak in our area.



TERRORIST HAZARDS

Listed below are seven recurring ways terrorists conduct attacks against their enemies. In order to reduce stress, we must familiarize ourselves with the proper procedures should an attack occur. You can find information regarding all attacks in this manual.

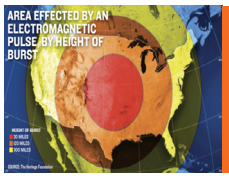
Explosions: Explosive devices are typically the most common and most accessible due to readily available information and how easily they can be detonated from remote locations.

Biological Threats: Biological threats are not always as noticeable in comparison to other attacks. Signs of these particular attacks usually correspond with patterns of unusual illness or waves of people seeking emergency attention. Many have extended incubation periods before they manifest themselves as diseases or sickness in individuals.

Chemical Threats: Chemical threats can have an immediate effect on people, animals or plants. Many chemical threats may be odorless and tasteless and have the ability to dissipate rapidly. Signs of a chemical attack include difficulty breathing, experiencing eye irritation, losing coordination, becoming nauseated, or having a burning sensation in the nose, throat and lungs.

Cyber Attack: Cyber threats do not give major signs of an attack and are often times difficult to identify. Cybercrime, state-sponsored hackers, and cyber espionage can pose national security risks to our country. They are extremely dangerous, and can be detrimental to businesses, government and personal privacy.

Nuclear Blast: Nuclear blasts carry intense light and heat, a damaging pressure wave and widespread radioactive material that has the potential to contaminate the air, water and ground surfaces for miles around.



Electromagnetic Pulse: An EMP acts like a stroke of lightning, but instead of striking a point it affects a broad geographic area, potentially the entire continental U.S., and is much stronger than lightning. An EMP can be much faster and shorter or much slower and longer than lightning, depending upon how the EMP is generated.

Radiological Dispersion Device (RDD): RDDs are far more likely to be used than a nuclear weapon due to the lack of technical knowledge they take to build and deploy. Most often called "dirty bombs", RDDs are designed to scatter dangerous and sub-lethal amounts of radioactive material over a general area.

Source: Ready.gov

EXPLOSIONS

Be Prepared – Have the following in place for you, your family, and business:

- Copies of prescription medications and medical supplies.
- Bedding and clothing, including sleeping bags and pillows.
- Copies of important documents: driver's license, Social Security card, proof of residence, insurance policies, wills, deeds, birth and marriage certificates, tax records, etc.
- Make a Family Emergency Plan. Your family may not be together when disaster strikes, so it is important to know how you will contact one another, how you will get back together and what you will do in case of an emergency. Plan places where your family will meet, both within and outside of your immediate neighborhood. Ensure family members have access to plans and phone numbers, and rehearse the plans if possible.
- It may be easier to make a long-distance phone call than to call across town, so an out-of-town contact may be in a better position to communicate among separated family members.
- You may also want to inquire about emergency plans at places where your family spends time: work, daycare and school. If no plan exists, consider volunteering to help create one.
- Know your community's warning systems and disaster plans, including evacuation routes.
- Notify caregivers and babysitters about your plan.

EMERGENCY NUMBERS

Poison Control Center: 1-800-222-1222

Hospital Name: _____ Phone: _____

Doctor's Name: _____ Phone: _____

Dentist's Name: _____ Phone: _____

Pharmacy Name: _____ Phone: _____

Health Insurance Plan: _____

Policy #: _____ Phone: _____

FAMILY CONTACT NUMBERS

Parents' Names: _____

Kids' Names: _____

Address: _____

City: _____ State: _____ Zip: _____

Home Phone: _____

Mom Cell #: _____ Mom Work #: _____

Dad Cell #: _____ Dad Work #: _____

Source: CDC and Ready.gov

BIOLOGICAL HAZARDS

Biological agents are organisms or toxins that can kill or incapacitate people, livestock and crops. A biological attack is the deliberate release of germs or other biological substances that can make you sick. However, in nature there are many items that can prove to be harmful and in some cases these can be seeded by terrorists. These include but are not limited to:

- Various strains of Influenza
- Cholera
- Typhus
- Yellow Fever
- Measles
- Chicken Pox
- Ebola

Actions to Take:

- Take vaccinations that may be offered. If you are unsure as to your status check with your doctor to ensure all required or suggested immunizations are up to date. Children and older adults are particularly vulnerable to biological agents.
- At all times one should maintain a high level of personal hygiene. This is especially critical before, during, or following a biological attack. Wash hands frequently, shower, clean surfaces using sanitary wipes, be aware of your surroundings and distance yourself from individuals coughing, sneezing, or secreting other bodily fluids.
- Avoid large and small animals such as mice and wildlife, insects (mosquitoes, ticks, etc.), birds, especially bats, and unknown domestic pets (cats and dogs, etc.).
- If you believe you have been exposed to a biological agent, take off and bag your clothes and other personal items. Wash, wear a facemask, or if not available, make a mask out of two or three layers of material.
- Most biological agents can be filtered using home HEPA (High Efficiency, Particulate Air) filters in the air intakes. These filters are capable of filtering most biological agents that are typically larger than 3 microns.
- In a declared biological emergency or developing epidemic, there may be reason to stay away from crowds where others may be infected.
- Since biological agents and diseases exhibit varying incubation periods, usually measured in days or even weeks, biological agent attacks are not as noticeable initially. The more serious phases of the disease will occur several days after the disease has been contracted.
- It is important that you only seek medical attention when you are certain you are ill. It is likely that the medical care system will be overwhelmed and the "worried well" will exacerbate that problem if they seek care when they do not need it. Your local medical experts will inform you of the symptoms that indicate you may be ill. Many symptoms do overlap, so ensure you don't seek care until you need it.

Source: CDC and Ready.gov

CHEMICAL HAZARDS

What you should do in a chemical attack:

- Quickly try to define the impacted area or where the chemical is coming from, if possible.
- Take immediate action to get away from that area. Try to get upwind from the source of the contamination.
- If the chemical is inside a building where you are, get out of the building without passing through the contaminated area if possible.
- If you can't get out of the building or find clean air without passing through the area where you see signs of a chemical attack, it may be better to move as far away as possible.

Chemical and Nerve Agents

Chemical	Odor	Color	Onset	Exposure	Weight of Agent	Signs and Symptoms*
Sarin, Tabun, Vx	None - to Vicks Vapo Rub	Colorless to amber liquid, eventually changing to a gas	Immediate to 18 hours	Skin, eating, breathing, drinking	Will sink to low ground	Runny nose; small pupils; difficulty breathing; sudden loss of consciousness; convulsions; drooling; no breathing
Chlorine; Chlorine Phosgene, Ammonia, Nitrogen Oxide	Chlorine	Colorless gas or liquid	Immediate	Skin, eyes, mouth	Will sink to low ground	Coughing; swelling; chest tightness; burning pain in mouth/throat; tearing; intestinal pain; nausea; vomiting
Blood Agenets (Cyanide)	Bitter almond, Peach kernels	Colorless gas	Several minutes	Skin, nose, mouth	Will rise up	Skin and lips turn red; rapid breathing; rapid heart rate and pain; weakness in fingers & toes; dim vision; dizziness; vomiting; loss of consciousness; convulsions; heart and lung failure

*Not all symptoms may be present in every exposure instance. Symptoms are dependent on agent concentration and length of exposure.

Source: CDC and Ready.gov

Signs and Possible Precautions for Biological Exposure

Disease	Communicable?	Incubation Period	Duration	Signs and Symptoms
Inhalation Anthrax	No	1-6 days	3-5 days; Fatal if untreated	Fever; fatigue; cough; chest discomfort which leads to high fever, severe breathing difficulty; bluish tint to skin; sweating; shock and death if untreated
Pneumonic Plague	High	2-3 days	1-6 days; Usually fatal	Fever; headache; chills; sweating; joint pain; weakness leading to difficulty breathing; high-pitched breathing sounds; and bluish tint to skin
Tularemia	No	2-10 days; avg. 3-5 days	2 weeks or more	Sudden fever; chills; muscle ache; joint pain; dry cough; weakness
Smallpox	High	7-10 days	4 weeks	High fever (above 101 degrees); chills; stiffness; body/back ache; leading to puss-filled blisters that crust and scab
Viral Hemorrhagic Fever (Ebola)	Moderate	4 -21 days	Death between 7-16 days	Fever; fatigue; loss of color to face and chest; dizziness; loss of strength; exhaustion; cough; nausea; vomiting; diarrhea; constipation; abdominal pain; sensitivity to light; leading to bleeding under the skin; bleeding of internal organs; bleeding from eyes, mouth, and ears; shock; confusion; seizures; coma
Botulism	No	1-5 days	Death in 24-72 hours; will last weeks if not fatal	Double/blurred vision; drooping eyelids; slurred speech; difficulty swallowing; dry mouth; leading to: muscle weakness that begins with shoulders and moves downward; respiratory failure
Ricin	No	18-24 hours	Days - death within 10-12 days if ingested	Sudden fever; cough; chest tightness; nausea; aching muscles; leading to: throat and lungs become severely swollen; fluid builds up in lungs; difficulty in breathing; skin turns blue

Source: CDC and Ready.gov

CYBER ATTACKS

You can increase your chances of avoiding cyber risks by setting up the proper controls. The following are things you can do to protect yourself, your family, and your business before a cyber-incident occurs.

- Only connect to the Internet over secure, password-protected networks.
- Do not click on links or pop-ups, open attachments, or respond to emails from strangers.
- Always enter a URL by hand instead of following links if you are unsure of the sender.
- Do not respond to online requests for Personally Identifiable Information (PII); most organizations – banks, universities, companies, etc. – do not ask for your personal information over the Internet.
- Limit who you are sharing information with by reviewing the privacy settings on your social media accounts.
- Trust your instincts; if you think an offer is too good to be true, it probably is.
- Password protect all devices that connect to the Internet and user accounts.
- Do not use the same password twice; choose a password that means something to you and you only; CHANGE YOUR PASSWORDS ON A REGULAR BASIS.
- If you see something suspicious, report it to the proper authorities. http://www.dhs.gov/how-do-i/report-suspicious-activity.
- The extent, nature, and timing of cyber incidents are impossible to predict. There may or may not be any warning. Some cyber incidents take a long time (weeks, months or years) to be discovered and identified. Familiarize yourself with the types of threats and protective measures you can take by:
- Signing up for the United States Computer Emergency Readiness Team (US-CERT) https://www.us-cert.gov to receive the latest cyber security information directly to your inbox. Written for home and business users, alerts provide timely information about current security issues and vulnerabilities.
- Becoming a Friend of the Department of Homeland Security's Stop. Think. Connect. Campaign and receive a monthly newsletter with cyber security current events and tips.

Immediate Actions

- Make sure the software on all of your systems is up-to-date.
- Run a scan to make sure your system is not infected or acting suspiciously.
- If you find a problem, disconnect your device from the Internet and perform a full system restore.

At Home

- Disconnect your device (computer, gaming system, tablet, etc.) from the Internet. By removing the Internet connection, you prevent an attacker or virus from being able to access your computer and perform tasks such as locating personal data,

Source: Ready.gov

manipulating or deleting files, or using your device to attack others.

- Purchase and install virus protection software, update the virus definitions (if possible), and perform a manual scan of your entire system. Install all of the appropriate patches to fix known vulnerabilities.

At Work

- If you have access to an IT department, contact them immediately. The sooner they can investigate and clean your computer, the less damage to your computer and other computers on the network.
- If you believe you might have revealed sensitive information about your organization, report it to the appropriate people within the organization, including network administrators. They can be alert for any suspicious or unusual activity.

Public Place

- Immediately inform a librarian, teacher, or manager in charge. If they have access to an IT department, contact them immediately.
- PII is information that can be used to uniquely identify, contact, or locate a single person. PII includes but is not limited to:
    - Full Name
    - Social Security number
    - Address
    - Date of birth
    - Place of birth
    - Driver's License Number
    - Vehicle registration plate number
    - Credit card numbers
    - Physical appearance
    - Gender or race

If you believe your PII is compromised:

- Immediately change all passwords; financial passwords first. If you used the same password for multiple resources, make sure to change it for each account, and do not use that password in the future.
- If you believe the compromise was caused by malicious code, disconnect your computer from the Internet.
- Restart your computer in safe mode and perform a full system restore.
- Contact companies, including banks, where you have accounts as well as credit reporting companies.
- Close any accounts that may have been compromised. Watch for any unauthorized charges to your accounts.

Source: Ready.gov

NUCLEAR BLAST

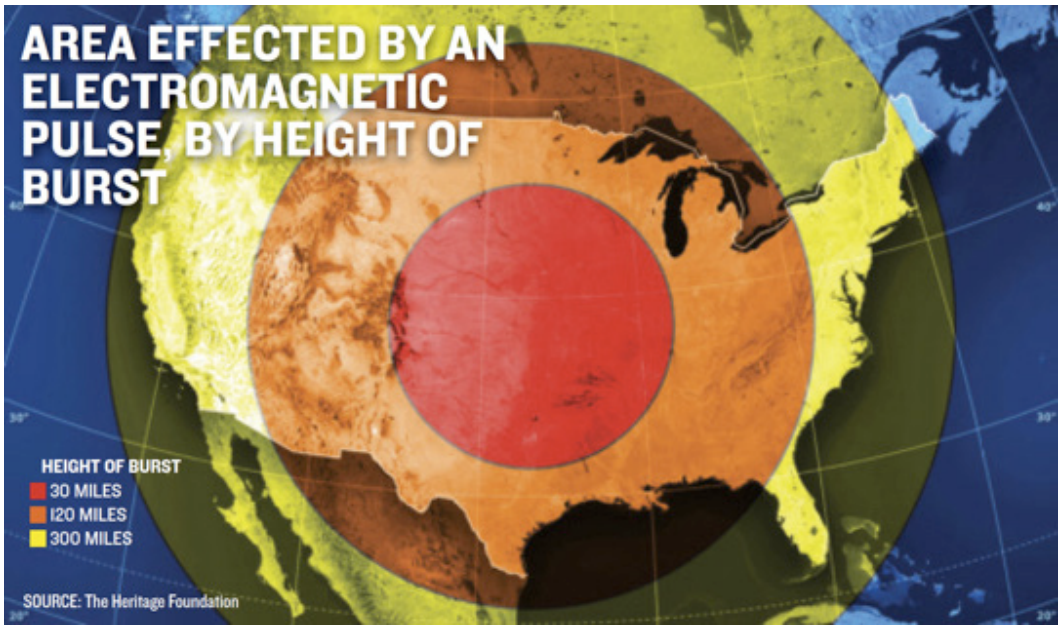
- In advance of any emergency it is imperative that local shelters be identified. Find out from officials if any public buildings in your community have been designated as fallout shelters. If none have been designated, make your own list of potential shelters near your home, workplace and school. These places would include basements or the windowless center area of middle floors in high-rise buildings, as well as subways and tunnels.
- If you live in an apartment building or high-rise, talk to the manager about the safest place in the building for sheltering until it is safe to go out.
- Before or during periods of heightened threats, increase your disaster supplies to be adequate for up to two weeks*.
- Taking shelter during a nuclear blast is absolutely necessary. Shelters offer protection from blast/overpressure, initial and residual radiation, heat and fire. However, even a blast shelter cannot withstand a direct hit. After the attack it is advisable to remain in the shelter until officials have determined the danger from radiation, fires, etc. has dissipated. Safety from residual radiation exposure can be provided by any area if the walls and roof are intact, and if possible, thick and dense enough to absorb gamma radiation.
- While there is no imminent concern of a nuclear attack from terrorists or terrorist nation states, we should recognize that this could be an intent, and include this outcome in our assessment and planning.

*See emergency kit

Source: Ready.gov

ELECTROMAGNETIC PULSE (EMP) AND GRID SECURITY

- An electromagnetic pulse (EMP) could result naturally, or be manmade through both nuclear and nonnuclear weapons creating a high-density electrical field. Nonnuclear EMP weapons, more commonly known as radio frequency weapons, can generate an EMP having very short wavelengths that could damage or destroy even small electronic devices in a localized area, usually out to a range of 1 kilometer or less.
- An EMP acts like a stroke of lightning but is stronger, faster, and shorter. An EMP can seriously damage electronic devices connected to power sources or antennas. This includes communication systems, computers, electrical appliances, and automobile or aircraft ignition systems and possibly the electric grid. The electric grid is susceptible to cyber-attack by computer viruses and hacking. The EMP Commission recommended that by protecting the electric grid and other critical infrastructures from nuclear EMP, all lesser threats could be mitigated, including cyber-attacks, sabotage, non-nuclear EMP, natural EMP, and severe weather.
- While some officials hold that the threats of an EMP, hard attack, or cyber attack on the electric grid are not imminent threats at this time, others contend the possibility is more likely. In either case being aware and knowledgeable of the possibilities is important.
- See emergency kit.



RADIOLOGICAL DISPERSION DEVICE

- RDD- Also known as "dirty bombs," consist of radioactive material combined with conventional explosives and are designed to scatter dangerous amounts of radioactive material over specific areas. The purpose of using an RDD is to cause psychological fear and economic disruption. The size of the affected area would depend on factors such as sophistication and size of the bomb, materials used, and meteorological conditions such as wind and precipitation.
- In advance of any emergency, it is imperative that local shelters be identified. Find out from officials if any public buildings in your community have been designated as fallout shelters. If none have been designated, make your own list of potential shelters near your home, workplace, and school. These places would include basements or the windowless center area of middle floors in high-rise buildings, as well as subways and tunnels.
- Plan places where your family will meet, both within and outside of your immediate neighborhood.
- It may be easier to make a long-distance phone call than to call across town, so an out-of-town contact may be in a better position to communicate among separated family members.
- You may also want to inquire about emergency plans at places where your family spends time: work, daycare and school. If no plan exists, consider volunteering to help create one.
- Know your community's warning systems and disaster plans.
- Notify caregivers and babysitters about your plan.
- Make plans for your pets.
- Choose an internal room to shelter, preferably one without windows.
- If you live in an apartment building or high-rise, talk to the manager about the safest place in the building for sheltering and about providing for building occupants until it is safe to go out.
- See emergency kit.

Source: Ready.gov

HAZARDOUS MATERIALS

Hazardous Materials, Toxic industrial chemicals or materials: (Note: These measures would also be applicable in the event of a chemical attack.)

- Determine if there are potentially dangerous chemicals or materials that are stored, processed or frequently transit your area (e.g. train track or main highways). Also determine if there are emergency plans addressing the release these materials.
- If asked to evacuate, do so immediately.
- Stay tuned to a radio or television for information on evacuation routes, temporary shelters, and procedures.
- Follow the routes recommended by the authorities--shortcuts may not be safe. Leave at once.
- If you have time, minimize contamination in the house by closing all windows, shutting all vents, and turning off all fans.
- Take pre-assembled disaster supplies.
- Remember to help your neighbors who may require special assistance--infants, elderly people and people with access and functional needs.
- Stay upstream, uphill, and upwind! In general, try to go at least one-half mile (usually 8-10 city blocks) from the danger area. Move away from the accident scene and help keep others away. Remain at the highest location possible. Chemical clouds tend to "pool" in low places like valleys, basements and the like.
- Do not walk into or touch any spilled liquids, airborne mists, or condensed solid chemical deposits. Try not to inhale gases, fumes and smoke. If possible, cover mouth with a cloth while leaving the area.
- Stay away from accident victims until the hazardous material has been identified.
- If in a motor vehicle, stop and seek shelter in a permanent building. If you must remain in your car, keep car windows and vents closed and shut off the air conditioner and heater.
- If asked to shelter in place, e.g., stay inside.
- Bring pets inside.
- Close and lock all exterior doors and windows. Close vents, fireplace dampers, and as many interior doors as possible.
- Turn off air conditioners and ventilation systems. In large buildings, set ventilation systems to 100 percent recirculation so that no outside air is drawn into the building. If this is not possible, ventilation systems should be turned off.
- Go into the pre-selected shelter room. This room should be above ground and have the fewest openings to the outside.
- Seal gaps under doorways and windows with wet towels or plastic sheeting and duct tape.
- Seal gaps around window and air conditioning units, bathroom and kitchen exhaust fans, and stove and dryer vents with duct tape and plastic sheeting, wax paper or aluminum wrap.
- Use material to fill cracks and holes in the room, such as those around pipes.
- If gas or vapors could have entered the building, take shallow breaths through a cloth or a towel. Avoid eating or drinking any food or water that may be contaminated.
- See emergency kit.

Source: Ready.gov

Some general information on chemical-biological agents:

- Biological agents can be dispersed by an aerosol spray which must be inhaled. However, these agents can also be used to contaminate food, water and other products. Attention to basic food hygiene when traveling abroad is very important.

- Some chemical agents may be volatile - evaporating rapidly to form clouds of agent. Others may be persistent. These agents may act directly on the skin, lungs, eyes, respiratory tract or be absorbed through your skin and lungs causing injury. Choking and nerve agents damage the soft tissue in these organs.

- When properly used, appropriate masks are effective protection to prevent the inhalation of either biological or chemical agents; however, this assumes an adequate warning. Gas masks alone do not protect against agents that act through skin absorption. Those who wish to acquire protective equipment for personal use should contact commercial vendors.

- There is an incubation period after exposure to biological agents. It is essential that you seek appropriate care for illnesses acquired while traveling abroad to assure prompt diagnosis and treatment.

- One of the biological agents is Anthrax, an acute infectious disease. It should be noted, however, that effective dispersal of the Anthrax bacteria is difficult. Anthrax is treatable if that treatment is initiated promptly after exposure. The post-exposure treatment consists of certain antibiotics such as Cipro.

For additional information, please consult your health care provider or local health authority.

Source: Ready.gov

Suggested Antidotes for Chemical and Biological Poisoning

Chemical Agent	Suggested Antidote
Chlorine	Sodium
Phosgene	Bicarbonate
Ammonia	Albuterol
Nitrogen Oxide	Calcium
Blood agents (e.g. cyanide)	Sodium Nitrate Sodium Thiosulfate
Nerve agents (e.g. sarin)	Pralidoxime and Atropine

Biological Agent	Suggested Antidote
Anthrax	Ciprofloxacin
Botulism	Botulism Antitoxin (equine)
Plague (contagious)	Gentamicin and Doxyclicine
Smallpox (contagious)	Cidofovir
Tularemia	Gentamicin and Doxycycline
Viral Hemorrhagic Fevers (Ebola)	Ribovirin
Cholera	Doxyclicine and Ciprofloxacin

Many of these antidotes may be available from officials, especially in areas that may be threatened by emergencies, or in the event attacks with the indicated agent becomes the norm.

Source: Ready.gov

NUCLEAR POWER PLANT ACCIDENTS

- If an accident at a nuclear power plant were to release radiation in your area, local authorities would activate warning sirens or another approved alert method. They also would instruct you through the Emergency Alert System (EAS) on local television and radio stations on how to protect yourself.
- Follow the EAS instructions carefully. If you have been told to evacuate to a shelter or you feel it is unsafe to remain in your home and you should go to a shelter, Text SHELTER + your ZIP code to 43362 (4FEMA) to find the nearest shelter in your area (example: shelter 12345).
- Minimize your exposure by increasing the distance between you and the source of the radiation. This could be evacuation or remaining indoors to minimize exposure.
- If you are told to evacuate, keep car windows and vents closed; use re-circulating air.
- If you are advised to remain indoors, close doors, turn off the air conditioner, ventilation fans, furnace and other air intakes.
- Shield yourself by placing heavy, dense material between you and the radiation source. Go to a basement or other underground area, if possible.
- Do not use the telephone/cell phone unless absolutely necessary.
- Stay out of the incident zone. Most radiation loses its strength fairly quickly.
- Seek shelter in an internal room and take your disaster supply kit.
- Seal the room with duct tape and plastic sheeting.
- Listen to your radio for instructions from authorities.

If you are caught in or near a contaminated area, you should:

- Move away immediately in a direction upwind of the source.
- Find shelter as quickly as possible.
- If you are outside, quickly decide the fastest way to find clean air. Consider if you can get out of the area or if you should go inside the closest building and shelter-in-place.

Source: Ready.gov

RADIOLOGICAL HAZARDS

While a nuclear blast will be immediately obvious, the presence of radiation, for example a radiological dispersal device, or an accident at a facility using radiological elements for day-to-day work, will not be known until trained personnel with specialized equipment arrive on scene. Whether you are indoors or outdoors, home or at work, be extra cautious. It would be safer to assume radiological contamination has occurred - particularly in an urban setting or near other likely terrorist targets - and take the proper precautions. As with any radiation, you want to avoid or limit exposure. This is particularly true of inhaling radioactive dust that results from an explosion. As you seek shelter from any location (indoors or outdoors) and there is visual dust or other contaminants in the air, breathe though the cloth of your shirt or coat to limit your exposure. If you manage to avoid breathing radioactive dust, your proximity to the radioactive particles may still result in some radiation exposure.

Taking shelter during the deployment of a Radiological Dispersion Device (RDD) event is absolutely necessary. There are two kinds of shelters - blast and fallout. The following describes the two kinds of shelters:

1. **Blast shelters** are specifically constructed to offer some protection against blast pressure, initial radiation, heat, and fire. But even a blast shelter cannot withstand a direct hit from a nuclear explosion.
2. **Fallout shelters** do not need to be specially constructed for protecting against fallout. They can be any protected space, provided that the walls and roof are thick and dense enough to absorb the radiation given off by fallout particles.

- Tape around doors and windows and turn off air intakes. If the air intakes must be on for respiration, ensure there are filters in the air stream of the air entering your shelter area. Leave the area only when told it is safe to do so.
- If you are outdoors, seek shelter indoors immediately in the nearest undamaged building.
- If appropriate shelter is not available, cover your nose and mouth and move as rapidly as is safe upwind, away from the location of the RDD blast area. Then, seek appropriate shelter as soon as possible.
- If indoors and you have time, turn off ventilation and heating systems, close windows, vents, fireplace dampers, exhaust fans, and clothes dryer vents. Retrieve your disaster supplies kit and a battery-powered radio and take them to your shelter room.
- Seek shelter immediately, preferably underground or in an interior room of a building, placing as much distance and dense shielding as possible between you and the outdoors.
- Seal windows and external doors that do not fit snugly with duct tape to reduce infiltration of radioactive particles. Plastic sheeting does not provide shielding from radioactivity or blast effects of a nearby explosion.

Source: Ready.gov

BASIC FIRST AID

If you find yourself in an emergency situation, knowledge of basic first aid can be an asset. The following tips can help you tend to injured parties. However, you may also find it useful to take a course in first aid and/or CPR. You can contact your local hospital or Red Cross chapter for information about what courses they offer.

While it is impossible to gauge what sort of injuries you may encounter during a disaster, you will want to remember to stay calm and to tend to any injuries you may have before assisting others. If you are physically able to help those in need, first check the surrounding area for any signs that you might put yourself in further danger then offer assistance.

If possible, you will want to use rubber gloves when tending to the injured so that you can avoid contact with blood and/or other bodily fluids. Also be sure to wash your hands with an antibacterial soap each time you administer any form of first aid and always remember that if you feel the victim has life-threatening injuries, your first priority should be to call for help.

Bleeding

Apply firm pressure to the wound to try and slow blood loss then clean the area with antiseptic and cover it with sterile dressing. If the bleeding does not appear to be slowing, have the victim raise the wound above the level of their heart if at all possible. Once the bleeding appears to be under control, cover the dressing with an elastic bandage to secure it. Be sure to check the wound frequently to ensure there is no further blood loss. You will also want to monitor the victim for any signs of shock.

Broken Bones

In the event of a broken arm or leg, attempt to immobilize the break and the joints above and below the break. This will help to reduce the pain and lessen the risk of furthering the injury. Once the break or fracture is secure, have the person minimize their movements and stay as still as possible while you apply ice to prevent and reduce swelling and to keep the pain at a minimum.

Burns

Begin treatment by dousing the affected area with water and continue to do so until the burning sensation has passed. Cover the burn with a gauze pad which can be secured with either medical tape or cloth. Change the dressing as needed.

Shock

Elevate the legs of the victim 12 inches off the ground. Try to prevent changes in their body temperature that may worsen their condition and avoid giving them food or water.

Source: Ready.gov

FAMILY EMERGENCY PLAN

Make a family emergency plan today, before the unexpected happens.

Comprehensive family emergency planning will provide elements that will be effective in most all situations. There are specific considerations for certain circumstances. However, you may want to include these measures in your basic plan. For example, if you normally enter your home through the garage, you may want to consider carrying a house key in the event a power outage prevents access through the garage.

For all emergencies, your plan should include:

- Phone numbers of a pre-assigned contact person for family members to call and other communication requirements.
- How to be safe if you stay in your home during an emergency.
- What to do with your pets.
- Thoughts about any older adults or those with functional needs in the home.
- Information for babysitters or caregivers so they can implement plan elements if necessary.
- How you will get to a safe place.
- How you will contact each another.
- Designate an emergency contact who will likely be out of the disaster area.
- How you will get back together.
- What you will do in different types of emergencies.

Mold your plan to fit your family's needs. Think about creating a group of neighbors, friends or family to help each other in emergencies. Discuss how that group can help each other connect, care for children, pets, disabled individuals or other needs.

Because your family may not be together when a disaster strikes, it is important to create a plan in advance. Even if your family is together, planning what to do will make reacting to various situations less stressful and potentially lifesaving. It is also essential to have a disaster supply kit that includes basic items from your home that you may need in case of emergency.

Once you have put together your plan, gather your family, sit down and decide how you will get in contact with each other, where you will go and what you will do in an emergency.

The first thing you will want to know during an emergency is where family members are and if they are safe. Cell phone networks are likely to be inundated. During the 9/11 disasters, communications by cell phone took as long as 9-10 hours after the attacks before the network traffic was somewhat back to normal. YOU MUST PLAN TO HAVE A COMMON MEETING PLACE OR TWO in case one or the other is in the direct emergency area. In addition to a primary communications plan, AN ALTERNATE PLAN FOR COMMUNICATIONS should be considered.

Source: Ready.gov

FAMILY EMERGENCY PLAN

Specific communication techniques:

- Identify a contact such as a friend or relative who lives out-of-state for household members to notify they are safe. It may be easier to make a long-distance phone call than to call across town, so an out-of-town contact may be in a better position to communicate among separated family members.

- Be sure every member of your family knows the phone number of the emergency contact and has a cell phone, coins or prepaid phone card to call the emergency contact. If you have a cell phone, program that person(s) as "ICE" (In Case of Emergency) in your phone. If you are in an accident, emergency personnel will often check your ICE listings in order to get in contact with someone you know. Make sure to tell your family and friends that you've listed them as emergency contacts.

- Subscribe to local alert services. Many communities now have systems that will send instant text alerts or e-mails to let you know about bad weather, road closings, local emergencies, etc. Sign up by visiting your local Office of Emergency Management web site, http://www.fema.gov/. Local TV and radio stations will also broadcast emergency alerts for a myriad of emergencies. You have probably seen or heard weather alerts, missing child or adult alerts and the monthly system test.

Other organizations in the region that can help. Who, where, what they do, and points of contact:

- CERT - www.fema.gov/cert
- DHS - www.dhs.gov
- Local Police, Fire and EMS- 911
- American Red Cross – www.redcross.org
- Center for Disease Control and Prevention- www.cdc.gov
- U.S. Department of Homeland Security - www.ready.gov
- National Poison Control Center - 1-800-222-1222
- American Academy of Pediatrics - www.aap.org
- Disaster Relief - www.disasterassistance.gov
- Federal Emergency Management Agency - www.fema.gov
- National Securities Institute - www.nsi.org
- Weather Channel – www.weather.com
- Memorial Institute for the Prevention of Terrorism - www.mipt.org
- Citizen Corps - www.citizencorps.gov
- U.S. Department of Health and Human Services - www.pandemicflu.gov
- Pennsylvania Department of Health - www.health.pa.gov

Source: Ready.gov

EMERGENCY KIT

Every family should have an emergency kit that can be readily accessed in the event of an emergency. This kit should include food, water, medications and other medical items, miscellaneous comfort items, repair kits and the like. There are items which can be used for specified emergencies, and there are some items that are purely optional.

The basic emergency kit should contain the following items:

- Water, one gallon of water per person per day for at least three days, for drinking and sanitation
- Food, at least a three-day supply of non-perishable food
- Battery-powered or hand crank radio and a NOAA Weather Radio with tone alert and extra batteries for both
- Flashlight and extra batteries
- First aid kit
- Whistle to signal for help
- Dust mask to help filter contaminated air and plastic sheeting and duct tape to shelter-in-place
- Moist towelettes, garbage bags and plastic ties for personal sanitation
- Wrench or pliers to turn off utilities
- Manual can opener for food
- Local maps
- Cell phone with chargers, inverter or solar charger

Once you have gathered the supplies for a basic emergency kit, you may want to consider adding the following items:

- Prescription medications and glasses
- Infant formula and diapers
- Pet food and extra water for your pet
- Cash or traveler's checks and change
- Important family documents such as copies of insurance policies, identification and bank account records in a waterproof, portable container. You can use the Emergency Financial First Aid Kit developed by Operation Hope, FEMA and Citizen Corps to help you organize your information
- Emergency reference material such as a first aid book or free information from this web site. (See Publications)
- Sleeping bag or warm blanket for each person. Consider additional bedding if you live in a cold-weather climate
- Complete change of clothing including a long sleeved shirt, long pants and sturdy shoes. Consider additional clothing if you live in a cold-weather climate
- Household chlorine bleach and medicine dropper – when diluted, nine parts water to one part bleach used as a disinfectant.Or in an emergency, you can use it to treat water by using 16 drops of regular household liquid bleach per gallon of water. Do not use scented, color safe or bleaches with added cleaners
- Fire extinguisher
- Sturdy, wide tape to tape windows and doors if necessary

Source: Ready.gov

EMERGENCY KIT

- Plastic sheeting to cover windows or doors as necessary
- Basic tool kit, with non-powered hand tools, screwdrivers, razor knife, tape measure, hammer, drill. Basic fasteners such as nails, screws, staples, nuts and bolts, etc.
- Matches in a waterproof container
- Feminine supplies and personal hygiene items
- Mess kits, paper cups, plates, paper towels and plastic utensils
- Paper and pencil
- Books, games, puzzles or other activities for children

In any emergency you or a family member may suffer an injury. If you have these basic first aid supplies you are better prepared to help your loved ones when they are hurt. Knowing how to treat minor injuries can make a difference in an emergency. You may consider taking a first aid class, but simply having the following things can help you stop bleeding, prevent infection and assist in decontamination.

- Two pairs of latex or other sterile gloves if you are allergic to latex
- Sterile dressings to stop bleeding
- Cleansing agent/soap and antibiotic towels
- Antibiotic ointment
- Burn ointment
- Adhesive bandages in a variety of sizes
- Eye wash solution to flush the eyes or as general decontaminant
- Thermometer

Prescription medications you take every day such as insulin, heart medicine and asthma inhalers. Ask your doctor about storing prescription medications such as heart and high blood pressure medication, insulin and other prescription drugs. You should periodically rotate medicines to account for expiration dates. Prescribed medical supplies such as glucose and blood pressure monitoring equipment and supplies.

- Non-prescription drugs:
- Aspirin or non-aspirin pain reliever
- Anti-diarrhea medication
- Antacid
- Laxative
- Other first aid supplies:
  - Scissors
  - Tweezers
  - Tube of petroleum jelly or other lubricant

Remember the unique needs of your family members, including growing children, when making your emergency supply kit and family emergency plan.

Source: Ready.gov

EMERGENCY KIT

For Baby:

- Formula
- Diapers
- Bottles
- Powdered milk
- Medications
- Moist towelettes
- Diaper rash ointment

For more information about the care and feeding of infants and young children during an emergency, visit the PA Dept. of Public Health website: www.health.pa.gov

For Adults:

- Denture needs
- Contact lenses and supplies
- Extra eye glasses

If you live in a cold climate, you must think about warmth. It is possible that you will not have heat. Think about your clothing and bedding supplies. Be sure to include one complete change of clothing and shoes per person, including:

- Jacket or coat
- Long pants
- Long sleeve shirt

Source: Ready.gov

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NOTES