Fire and Life Safety Program



PURPOSE

Texas A&M University-Texarkana is committed to the safety and wellbeing of all persons who enter these premises. A&M-Texarkana Administrators are well aware of the devastating effects a major fire could have on the University, its staff, faculty, and students. This fire safety program will ensure all staff, faculty, and students are made aware of the possibilities of such a disaster, fire prevention techniques, and emergency procedures to follow in the event a fire does occur.

INTRODUCTION

A serious fire can be one of the most devastating emergencies a university can face. Each year accidental fires in the workplace cost thousands of people their livelihoods and sadly, many lose their lives. Unlike tornadoes and other disasters that may only occur once in a lifetime, a serious fire can happen any day of the year. Unlike natural disasters though, many serious fires that do occur could have been prevented. This fire safety program is directed toward fire prevention and protection in an attempt to reduce the chance of a fire occurring and to prevent the loss of life and reduce the amount of damage if one does occur.

RECOGNIZING FIRE HAZARDS

Fires can be caused by a variety of hazards including unprotected or faulty equipment, unsafe storage of combustible materials, inadequate ventilation, failure to follow established safety guidelines, inattention, human error, and arson. Most fire hazards can be recognized (and corrected) by following the procedures listed herein and staying alert to potentially dangerous situations. A&M-Texarkana employees should report fire hazards to their supervisor as soon as possible.

THE EFFECTS OF A FIRE

Most fires produce an immense amount of smoke that is highly toxic. For this reason, smoke is responsible for more fire fatalities than flames. A smoky fire can have the following effects on humans:

- Within 30 seconds disorientation
- Within 2 minutes unconsciousness
- Within 3 minutes death

Timing is critical during a fire. To ensure your safety, you must know how to respond to any fire emergency.

PREVENTING FIRE HAZARDS

Everyone at A&M-Texarkana can help in the effort to prevent fires by following these guidelines:

- Keep all equipment and machinery clean and in good working order.
- Make sure all electrical equipment is UL approved. Inspect wiring for damage on a regular basis.
- Extension cords must be an approved type with grounding plug and shall be unplugged after use. Extension cords should only be used on a limited basis, defined as an 8-hour workday. If the extension cord is needed for longer than that, consideration shall be given to rearranging the workspace or seeking another permanent solution to eliminate the need for the extension cord.
- Never overload circuits.

- Store flammable/combustible materials in approved containers, away from heat sources.
- Keep work and refuse areas clean and free of debris.
- Dispose of flammables according to established safety guidelines.
- Store rags that contain flammable liquids only in approved containers.
- Fire extinguishers are inspected monthly. If you see one in your area that has lost its charge, contact the Environmental, Health & Safety (EHS) Office as soon as possible. Fire extinguishers must be fully charged to be effective in an emergency.
- If you smell natural gas, report it to the EHS and University Police Department (UPD) immediately.
- Always allow machinery to cool before refilling gas tanks.
- Do not leave microwaves unattended while in use.
- Dispose of cigarette butts in designated cigarette disposal.
- The use of space heaters is prohibited unless a work order to the Central Plant has been submitted and approved for temporary use.

EMERGENCY FIRE PROCEDURES

Staff, Faculty, and Bringle Lake Village (BLV) dorm students:

- If you smell smoke, try to locate where the smell is coming from.
- If you see smoke or a fire, go to the nearest fire pull station and pull the fire alarm.
- Alert the people in your vicinity to the danger and begin evacuating the building. If you are not in any immediate danger, call 911 and report the fire.
- If the fire is small, not presenting immediate danger to yourself, and you have been trained in the proper use of a fire extinguisher, you may attempt to fight the fire. When doing so, do not put yourself or others in unnecessary danger.
- Keep the fire in front of you and the exit behind you to ensure you do not get trapped. Never turn your back to a live fire.
- In all other cases, evacuate the building immediately, closing doors behind you as you go.
- Remember to follow posted evacuation routes and never use the elevator during a fire.
- Remember to stay low to the ground if the building is full of smoke.

Common meeting grounds:

All staff, faculty, and students should evacuate to the main parking lot area, making sure to stay out of the way of arriving emergency vehicles. Dorm students should evacuate to the parking area on their particular end of the dorm building and meet with their Resident Advisor (RA). All staff should meet with their department supervisor to ensure everyone is accounted for.

FACULTY AND STUDENTS

At the beginning of each semester, all faculty members should instruct their students on what to do in case of a fire alarm or an actual fire. Students should be instructed on evacuation routes, location of fire alarm pull stations and fire extinguishers, and proper evacuation procedures for fire and smoke in the building.

Students should be advised that once they exit the building, they should meet with their instructor in front of the main parking lot. Faculty members need to make it clear to their students that they cannot leave the area until the class roll is taken to ensure everyone is accounted for. During inclement weather, all faculty and their students should assemble in the Central Plant building, located east of the Science and Technology building.

BUILDING EVACUATION

Building evacuation procedures would include the following:

- When you hear a fire alarm LEAVE the building immediately closing all doors behind you.
- Follow the main evacuation route but be prepared to use an alternate route.
- If you must evacuate through smoke, get low to the floor and crawl. Heat and deadly smoke rise and cleaner air will be 12-24 inches above the floor.
- If you must open doors while evacuating, test the door before opening. Use the back of your hand to touch the door, the doorknob, and door frame. If they are hot, do not open the door. If they are cool, brace yourself against the door and slowly open it. If smoke and heat are present, close the door and use an alternate route.
- Use stairways, never an elevator. In a fire, elevator shafts may fill with smoke or the power may go out leaving you trapped.
- Once outside, assemble at your designated area and do not return to the building until authorities indicate the building is safe to re-enter.
- If you are trapped, try to stay as calm as possible. Try to get to a room with an outside window and a telephone. Call 911 and give them your exact location. If there is no phone, wave an object out the window to signal for help. Keep all doors between you and the fire closed. Cover all vents and seal cracks around the door to keep out smoke. Be as calm and patient as possible. Rescue personnel will arrive to assist you.

EVACUATION ASSISTANCE

Any person who cannot walk down stairs will be directed to the northeast stairwell of each floor in the University Center; the southeast stairwell in the Science and Technology building; and the east or west stairwells in the BLV dorm. Emergency Response Team members serve as floor monitors and will assist those requiring help to the appropriate interior stairwell. The BLV RAs will serve as floor monitors in the dorm and provide this assistance for dorm students and/or visitors. Once in the interior stairwell the floor monitor will call or radio the UPD and give their location and how many persons are in the stairwell with them. They will stay there until emergency responders arrive and assist them out of the building. The interior stairwells have sprinklers and should be safe until emergency assistance arrives.

ARSON

If you suspect arson was committed, no matter how small the incident, contact the UPD. Do not alter the fire scene in any way, unless you are trying to extinguish a live fire.

FLAMMABLE/COMBUSTIBLE STORAGE

If flammable/combustible materials are stored improperly, employees not only increase the potential for having a fire, they increase the potential severity of the fire. To reduce the hazards associated with flammable/combustible storage, follow the guidelines below:

- Store flammables in approved containers. Amounts of 5 gallons or more should be stored in flammable storage safety cabinets.
- Eliminate excess combustible materials such as paper and cardboard.
- When stacking combustible materials, leave at least 24 inches between the top of the stack and the ceiling.

EMERGENCY ACCESS AND EGRESS

Emergency access and egress are critical during an emergency such as a fire. During a fire, timing and quick response are essential to save lives and property. Effective emergency access ensures that fire trucks can reach a building in time to extinguish a fire before it gets out of hand. Unobstructed emergency egress ensures that building occupants can exit a building to safety. These definitions help clarify the concept of emergency access and egress:

- Emergency Access Pertinent facilities and equipment remain available and unobstructed at all times to ensure effective fire detection, evacuation, suppression, and response.
- Emergency Egress A continuous and unobstructed way to travel from any point in a public building to a public way. A means of egress may include horizontal and vertical travel routes, including intervening rooms, doors, hallways, corridors, passageways, balconies, ramps, stairs, enclosures, lobbies, courts, and yards.

CORRIDORS, STAIRWAYS, AND EXITS

An exit corridor and/or stairwell is a pedestrian pathway that allows direct access to the outside of a building and/or allows access to a building entrance and subsequent pathways to the outside of a building (i.e. an exit corridor is the quickest, easiest, and most direct pathway for leaving a building). Follow these guidelines to promote safe evacuation in corridors, stairways, and exits:

- There must be at least 44 inches clear width of unobstructed, clutter–free space in all corridors, stairways, and exits.
- Keep all means of egress clean, clutter-free, and unobstructed.
- Do not place hazardous materials or equipment in areas that are used for evacuation.
- Do not use corridors or stairways for storage of office or laboratory equipment. Corridors may not be used as an extension of the office or laboratory.

FIRE DOORS

A fire door serves as a barrier to limit the spread of fire and restrict the movement of smoke. Fire doors are located in stairwells, corridors, and other areas required by the Fire Code. The door, doorframe, locking

mechanism, and closure are rated between 20 minutes and 3 hours. A fire door rating indicates how long the door assembly can withstand heat and a water hose stream. Fire doors should always remain closed and unobstructed. They should never be propped open. Some fire doors must remain open due to their location so they must be fitted with special closures. This closure will connect the fire door to the building's fire alarm system and will automatically close the door when the alarm system is activated. Doors to offices, laboratories, and classrooms help act as smoke barriers regardless of their fire rating, so keep these doors closed whenever possible.

FIRE EXTINGUISHERS

All fire extinguishers are labeled according to the class of fire they are designed to extinguish. The fire classes, as defined by the National Fire Protection Association (NFPA), are as follows:

- Class A Fires involving ordinary combustibles such as wood, textiles, paper, rubber, cloth, and trash. Water and multi-purpose dry chemical fire extinguishers are ideal for use on these types of fires.
- Class B Fires involving flammable or combustible liquids or gases such as solvents, gasoline, paint, lacquer, and oil. Carbon dioxide, multi-purpose dry chemical, and halon fire extinguishers are ideal for use on these types of fire. Never use a water extinguisher on a Class B fire.
- Class C Fires involving energized electrical equipment or appliances. This would include wiring, fuse boxes, circuit breakers, and all appliances run by electricity. Once the equipment has been de-energized, the fire is no longer a Class C fire. Carbon dioxide, multi-purpose dry chemical, and halon extinguishers are ideal for these types of fires. Never use a water fire extinguisher on a Class C fire.
- Class D Class D fires are fires in combustible metals such as potassium, sodium, aluminum, and magnesium. Dry Powder extinguishers are similar to dry chemical except that they extinguish the fire by separating the fuel from the oxygen element or by removing the heat element of the fire triangle.
- Class K Class K fires are fires in cooking oils and greases such as animal fats and vegetable fats. A wet chemical extinguisher uses an agent that extinguishes the fire by removing the heat of the fire triangle and prevents re-ignition by creating a barrier between the oxygen and fuel elements. Class K wet chemical extinguishers were developed for modern, high efficiency deep fat fryers in commercial cooking operations. Some may also be used on Class A fires in commercial kitchens.

Most fire extinguishers at A&M-Texarkana are multipurpose dry chemical type extinguishers that can be used on Class A, B, or C fires. Fire extinguishers are under pressure and whenever they are used, all of the pressure is depleted and the extinguisher must be recharged before being used again. Occasionally, pressure can escape from an extinguisher over a period of time, which is why they must be checked regularly to ensure they are ready to use. A&M-Texarkana fire extinguishers are checked annually by a contracted fire extinguisher company and by the EHS Office monthly during building inspections for safety purposes.

Never attempt to use a fire extinguisher unless you have been trained to do so. While operating instructions are on the label, the time to learn about its use is not during an actual fire. When using an extinguisher, remember the word PASS:

- P: Pull the pin. Unlocks the operating lever and allows you to discharge the extinguisher.
- A: Aim the nozzle at the base of the fire.
- S: Squeeze the handle which discharges the agent.
- S: Sweep from side to side, keeping the extinguisher aimed at the base of the fire.

HOLIDAY DECORATIONS

Holiday decorations can sometimes be fire hazards. Following the listed guidelines can improve fire safety during the holidays:

- Do not use live Christmas trees in any university building.
- Do not place trees or holiday decorations where they may block emergency egress.
- Practice good housekeeping by minimizing paper and other combustibles.
- Avoid using extension cords. If you must use an extension cord, use a heavy gauge cord with a grounding plug and place it in plain view, making sure it is not a tripping hazard.
- Use only UL labeled electrical decorations.
- Do not use candles or other decorations with open flames.
- Turn off lighted decorations when the room is unoccupied.

FIRE DRILLS

Although a fire drill may interrupt work and classes for a short period, they are a small inconvenience that could possibly save lives if a real fire were to occur. Consequently, all persons at A&M-Texarkana are required to participate in all fire drills and must leave the building when the alarm is sounded. All persons should quickly lock up valuables or take them when exiting the building. Remember to close office and classroom doors when leaving. The EHS office will conduct a fire drill for A&M-Texarkana academic and administration buildings once each semester. University ERT members and RA's will ensure that all persons have left each floor and the building.