WELCOME

Monthly Building Coordinator Meeting
Via ZOOM

April 17, 2024



Agenda

Asset Optimization Services (AOS):

Andy Van Etten – Associate Director, AOS - FM Operations & Maintenance

Hot Work Permit Process:

Melissa Miller – Risk Management Administrator Brent A Anderson – FM Occupational Safety Manager

Safety Culture and Tips:

Brent A Anderson – FM Occupational Safety Manager





April '24 Building Coordinators Update - AOS

April 17, 2024



Asset Optimization Services (AOS)

Who –The AOS Team is a technical resource team reporting into Building Operations and Maint. (Julie Sychra)

What –Focus on identifying and improving <u>energy and reliability</u> <u>of building systems.</u> (Mechanical, Electrical, and Plumbing)

How – Advocating for decision-making based on <u>Total Cost of Ownership</u>.





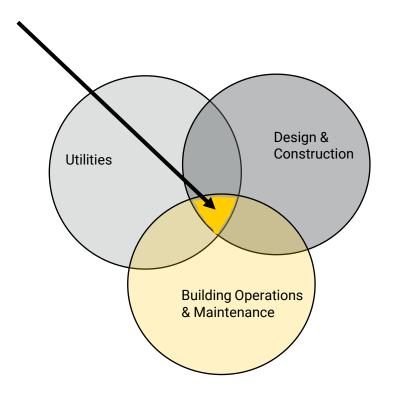
AOS Team Members

Andy Van Etten:

AOS Leader

Brad Dameron, Brian Dameron Analytic Response Group

Scott Sellner
Controls / ARG / AOS



Nikki Underwood, Daniel Rodriguez

Mechanical Engineer, Electrical Engineer: (Filling two needs previously identified by D&C)

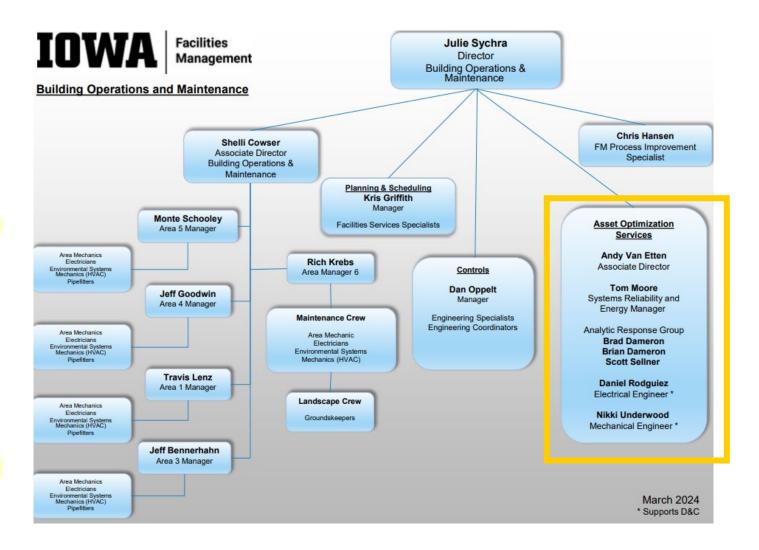
Jake Humphreys:

D&C Quality Leader

Tom Moore:

Systems Reliability and Energy Manager









Asset Optimization Services (AOS)

Four Main AOS Services:

- 1. Total Cost of Ownership resource
- 2.UI Design Standards and Procedures content development support
- 3. Energy Fund prioritization and project support
- 4. Building performance optimization



What is TCO?

 Total cost of Ownership (TCO) is a holistic approach to asset management that allows stakeholders to make data driven decisions that consider the entire life-cycle of the asset.

Usually, TCO is a financial estimate based on

facts, exp

$$TCO = \sum_{C_a} + \sum_{C_b} + \sum_{C_c} + \sum_{C_d} + \sum_{C_e}$$

Where:

Ca = Initial Asset Costs / First Cost (one Time)

C_b = Cost of **Operations and Maintenance** (Annual Recurring)

that are

C_c = Cost of **Utilities** (Annual Recurring)

Cd = Cost of Renewal (Periodic Recurring)

Ce = Cost at End of Useful / Functional Life (One Time)



Standards and Procedures – "The Beast"

Raw Data Blue Beam / The S&P's

Slow Down and understand



750+ pages, 30+ years of history, experience and passion

Action Items
Snag List

Stop and Measure



Change Control

AOS Change Tracking

Form

Proceed with knowledge



"The Utility Rate Energy Fund"

 Every year \$500K of our utility rates are set aside to fund "Energy and Reliability" type projects. All rate paying departments are included.

 AOS wants to work with you to prioritize and enable projects using the "Utility Rate Energy Fund"
 Prioritization Matrix

 AOS also want to collaborate with you to re-apply successful projects and identify new ones.



The "Energy Related" Matrix

 Version of a proven FM developed system to score potential projects based on the following criteria.

Safety
Energy Savings
Maintenance Savings
Reliability improvement
Obsolescence risk
Project complexity
Customer Impacts

We are a MEP focused team and the fund was established enable Energy and Reliability based projects.



Building Performance / Optimization – Blitz Ideas

- 1. Main Library HVAC
- 2. Dental Science Air Compressors
- Campus Rec and Wellness HVAC Retro Commissioning
- Siemens VAV set points on units w/o re-heats
- Trowbridge Hall Exhaust

Completed Events

Chemistry Fume Hood IMU HVAC Schaeffer Hall HVAC

Targeting week of 6/10 For next event





Hot Work Loss Prevention Program

Facilities Management & Risk Management

Brent Anderson and Melissa Miller

April 17, 2024

Agenda

- Scope
- Definitions
- Standard Hot Work Procedures & Responsibilities
- Process to Obtain and Use a Hot Work Permit
- Training Requirement



Purpose

- Establish a consistent campus-wide policy regarding Hot Work
- Reduce the risk of injury and loss by fire caused by Hot Work activities





Scope

 Requires <u>any individual</u> who engages in Hot Work to comply with University policy

 Applies to all faculty, staff, students, or third parties performing Hot Work on behalf of the University of Iowa and in all University of Iowa facilities, including UIHC



- Hot Work anything that produces flame, heat, or sparks
 - Electric or gas welding, abrasive cutting, soldering, grinding, torch work, and brazing;
 - Includes acetylene torches, arc welding equipment, portable grinders, and propane torches;
 - Also, non-rated electrical tools and equipment when used in a hazardous environment



- The following operations <u>do not</u> require a Hot Work Permit:
 - Bunsen burners in laboratories
 - Small electric soldering irons used for repairing electronics only
 - Authorized grilling on campus (must be in compliance with: https://uiowa.edu/riskmanagement/outdoor-gascharcoal-grilling-campus)
 - Sterno products for official university catered events.



Fire Safety Supervisor

- Designated permit authorizer,
- Trained to authorize Hot Work Activities, and
- Supervises the individual performing Hot Work



Fire Watch

- Designated and trained to observe Hot Work for the purpose of <u>preventing, detecting, and suppressing</u> fires
- Must continuously monitor Hot Work (during and <u>after</u> for 60 minutes)
- Must be trained to use manual firefighting equipment
 - There must a fire extinguisher present at the scene of the Hot Work, this cannot be the designed site fire extinguisher
- Must have the ability to summon emergency assistance if needed

CANNOT BE THE PERSON PERFORMING THE HOT WORK!!!!



Standard Hot Work Procedures & Responsibilities





Standard Hot Work Procedures & Responsibilities





Hot Work Locations

- Temporary by issuance of approved UI Hot Work Permit (Yellow Permit) or
- Designated Hot Work Sites with visible "Designated Hot Work Site" permit/certificate posted (White Permit)
 - Formally evaluated and meet the requirements of the International Fire Code
 - Inspection and verification of proposed designated location will be completed by UI Campus Safety or UIHC Safety and Security.
 - -Only be used by trained and authorized individuals
 - List of Designated Hot Work Sites



Temporary Permit Part 2

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WORK TO BE PERFORMED Does site contain combustible construction (with or without co	
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Is work on a combustible roof? If yes, treat as a "Hot Work High-	Dist
NAME OF PERSON PERFORMING FIRE WATCH Area" and provide ADDITIONAL REQUIRED PRECAUTIONS belo	
Hot work on/in closed equipment, ductwork and pipi	ing
I verify the above location has been examined, the Required Precautions have been taken, and permission is authorized for this work.	
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DATE: TIME: AM/PM Fire watch/fire monitoring the hot work area Perform a continuous fire watch during hot work.	
Perform a continuous fire watch following hot work completion	n for
Note: Emergency notification on back of form.	
Use as appropriate for your facility.	ter
Need more permits? Order additional Hot Work Permits at finglobalcatalog.com; or, download the FM Global Hot Work Permit App	
via fmglobal.com/apps. ADDITIONAL REQUIRED PRECAUTIONS:	
Yel Wink High Risk Are* — perform fire monitoring following watch completion for 3 hours.	g fire

Shut down ventilation and conveying systems. Remove combustibles and consider a second fire watch on opposition of floor, wall, ceiling or roof when openings exist or thermally conductive materials pass through.				
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as "Hot Work High-Risk Area" and provide ADDITIONAL REQUIRE PRECAUTIONS below.				
Is work on a combustible roof? If yes, treat as a "Hot Work High-Ris Area" and provide ADDITIONAL REQUIRED PRECAUTIONS below.				
Hot work on/in closed equipment, ductwork and piping				
Isolate equipment from service. Remove ignitable liquid and surge flammable gas/vapor.				
Remove combustible dust/lint or other combustible materials.				
Is work only equipment with nonremovable combustible linings				
or parts? If yes, treat as a "Hot Work High-Risk Area" and provide ADDITIONAL REQUIRED PRECAUTIONS below.				
Fire watch/fire monitoring the hot work area Perform a continuous fire watch during hot work.				
Perform a continuous fire watch following hot work completion for				
60 minutes.				
 Perform a final checkup of the area following the fire watch after hot work completion. 				
ADDITIONAL REQUIRED PRECAUTIONS:				
"Hot Work High-Risk Area" — perform fire monitoring following fire				
watch completion for 3 hours.				

Back of Part

2

WARNING!

HOT WORK IN PROGRESS Watch for fire!

In case of emergency, call the contacts listed below before attempting to extinguish the fire.

Number	
UI Campus - 91	1
UIHC - 195	

WARNING!









Designated Permit

UNIVERSITY of IOWA										
DEPARTMENT OF PUBLIC SAFETY										
FIRE SAFETY										
Location:				Inspection Type:						
Room 145	September 1, 2016 Designate				d Hot Work Site					
Building:				Bldg. #		Bldg. Abbrev.				
Madison Street Services Building				160		MSSB				
Address: User Group:										
640 South Madison Street Building and Landscape Services						ervices				
Facility Contact				< <	- 1					
Curt Fountain										
Building Occupancy Type:	Construction Type:			Fire Sprinkler System:						
Factory Industrial "F-1"	IIB (Non-combustible; non-protected) YES									
(Industrial; moderate hazard)	(,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,						

WE HAVE INSPECTED THE ABOVE PREMISES AND FOUND:

Based on my inspection of the Sheet Metal Shop; Room 145, located in the Madison Street Services Building, I approve the use of the room as a designated hot work site in accordance with Chapter 35 of the 2015 International Fire Code and the University of Iowa Hot Work Loss Prevention Program.

Please ensure the space is free of all combustibles, prior the start of any hot work. All requirements of Chapter 35 and the University's Hot Work Loss Prevention Program are properly followed before, during, and after all hot work is performed in this space.

This space will be subject to periodical inspections by this office and any deficiencies noted may result in loss of hot work privileges.

Type of hot work to be performed at this site:

Tungsten Inert Gas (TIG) welding Metal Inert Gas (MIG) welding

Oxy - acetylene welding / cutting Shielded metal arc ("stick" welding)

Grinding Sanding

Plasma cutting

Abrasive cutting (chop saw)

Soldering

THIS PERMIT WILL EXPIRE ON SEPTEMBER 8th, 2017

Post in a conspicuous location within the hot work site

Inspected By:

Bruce McAvoy, Fire Safety Coordinator

University of Iowa Department of Public Safety 808 University Capitol Centre Iowa City, IA 52242-5500

Standard Hot Work Procedures & Responsibilities





Fire Safety Supervisor Must:

- 1. Question whether the Hot Work is necessary
- 2. Verify the location has been examined, the precautions checked on the "Required Precautions Checklist" have been taken to prevent fire.
- 3. Verify there is a qualified Fire Watch for the immediate area until Hot Work is completed.
- 4. If the Hot Work is to be conducted in a sprinklered facility, ensure that the sprinkler protection in the Hot Work area is in service.



Fire Safety Supervisor Must:

- 5. Sign the Hot Work Permit
- *The Fire Safety Supervisor cannot be the same person performing the Hot Work.
- 6. Issue Hot Work Part 2 to the person performing the Hot Work, to be posted in a conspicuous location at the Hot Work site.
- 7. Fire Safety Supervisor will verify accuracy and completion of the permit, and submit to FM Occupational Fire & Life Safety Manager or UIHC Safety & Security.
- 8. FM, UIHC, RM and FM Global perform quarterly Hot work Audits



Standard Hot Work Procedures & Responsibilities





Employee Performing Hot Work Must:

- 1. Use the University of Iowa Hot Work Permit
- 2. Inform the shift supervisor or designee of planned work activities within designated areas requiring a Hot Work Permit
- 3. Sign Part 1 of the Hot Work Permit as the person performing the Hot Work
- 4. Request signature from Fire Safety Supervisor. Must be someone different than the person performing the Hot Work.
- 5. Complete all required fields on Part 2 of the Hot Work Permit
- Affix the authorized Hot Work Permit (Part 2) to a visible place in the work area.



Employee Performing Hot Work Must:

- 7. Ensure that tools and equipment are in satisfactory condition and good repair, and the proper use of PPE
- 8. Protect nearby personnel and passersby against heat, sparks, etc.
- Ensure Fire Watch is present at all times before, during, and after the Hot Work
- 10. Conduct the Hot Work operations
- 11. Stop Hot Work operations if any new hazards are introduced to the area.
- 12.Once the Hot Work has been completed, finish the time stamp section on Part 2



Standard Hot Work Procedures & Responsibilities





Fire Watch

- Inspect and monitor to ensure that safe conditions are readily and maintained during Hot Work operations.
- 2. The Fire Watch will have fire extinguishing equipment readily available and will be trained in its use.
- 3. The Fire Watch has the authority and will stop Hot Work operations if unsafe conditions develop.
- Shall remain in the Hot Work area <u>during the entire period of Hot Work</u> activities <u>and for 60 minutes thereafter</u>, including any break in activity.
- 5. Prior to leaving area, perform final inspection, sign and time stamp Hot Work Permit Part 2
 - A. In the event that the current Fire Watch has to leave the area, Hot Work activities must cease or replace Fire Watch.
 - B. Person performing Hot Work <u>cannot</u> also be the Fire Watch for the same Hot Work Permit unless they are replacing the fire watch after they are done performing the Hot Work.



How to Obtain and Use a Hot Work Permit

- A. Always ask yourself "Is there a safer alternative to Hot Work?"
 - If yes, use the safer alternative.
 - If not, continue to next step.
- B. Hot Work request is directed to the designated Fire Safety Supervisor.
- C. Fire Safety Supervisor visits the Hot Work site with the requestor to review the planned Hot Work and site.
- D. Fire Safety Supervisor fully completes the balance of the Hot Work Permit Part 1 (signature required).
 - University Part 1 is kept by the Fire Safety Supervisor for reminder/notification.
 - UHIC Part 1 is kept in the UIHC Fire Safety Office for tracking.
- E. Hot Work Permit Part 2 is given to the individual performing the Hot Work to complete and visibly post at Temporary Hot Work Site.



How to Obtain and Use a Hot Work Permit

- F. The person performs the Hot Work, with Fire Watch present
- G. After Hot Work is completed, the person performing the Hot work must complete Part 2 of the Hot Work Permit while the Fire Watch stays at the work site for 60 continuous minutes monitoring for smoldering and fire development.
- H. At the end of the 60 minutes, the Fire Watch signs the "post Hot Work Fire Watch" on Permit Part 2.

 *Remember During the Hot Work the Fire Watch cannot be the same as the person performing the Hot Work.
- I. Once Hot Work Permit Part 2 is completed and verified, return Permit Part 2 to the Fire Safety Supervisor, or Permit Authorizer.
- J. Fire Safety Supervisor inspects the permit for accuracy and competition to identify any mistakes prior to submission
- K. J. Fire Safety Supervisor or Permit Authorizer should forward completed Permit Part 2 to:
 - University:
 - i. FM Occupational Fire & Life Safety Manager, 200 University Services Building, or
 - ii. If it is a Design & Construction Project, the construction manager
 - UIHC: UIHC Fire Safety Office



Annual Training Requirement

 At UIHC: contact UIHC Fire Safety for UIHC training registration info

Outside UIHC:

- For non-uiowa staff: https://learn.uiowa.edu/
- For students: https://compliance.hr.uiowa.edu/
- For UI staff: <u>Employee Self-Service</u>

*If you would like more knowledge on Hot Work, please feel free to take the course on ICON





Summary

- Emphasized Standard Hot Work Procedures & Responsibilities
- Showed the Process to Obtain and Use a Hot Work Permit







QUESTIONS

University Campus Safety

808 UCC (319) 335-5389 https://police.uiowa.edu/fire-safety bruce-mcavoy@uiowa.edu

UIHC Safety & Security

0081 RCP UIHC (319) 356-2658

Website on UIHC intranet

Facilities Management Work Control

210 USB (319) 335-5071 https://www.facilities.uiowa.edu/bls/wcc.html facilities-wcc@uiowa.edu

Risk Management

202 PCO (319) 335-0010

https://uiowa.edu/riskmanagement/ risk-management@uiowa.edu

Environmental Health & Safety

122 Grand Avenue Court (319) 335-8501

https://ehs.research.uiowa.edu/ ehs-contact@uiowa.edu



QUESTIONS

Brent Anderson
Facilities Management
(319) 335-5444
brent-anderson@uiowa.edu

Melissa Miller
Risk Management
(319) 467-1327
Melissa-miller-1@uiowa.edu



FM Safety Culture...

Planting the Safety Culture seed, growing / nourishing Safety Culture, Yielding Safety Culture

Safety Culture...

- →OSHA, "Safety Culture is the environment where the attitudes, behaviors, and perceptions of all workers are reflected in the health and safety of the workplace".
- → We make Safety Culture personal. Not just in the workplace but all encompassing in everything that you do.
 - Home, Work, & Play



FM Safety Culture

- → COOPerative approach
 - Leadership Commitment / Style
 - Employee Empowerment / Involvement
 - Teamwork / Family
 - Communication
 - · Constant / Continuous, Timeliness, Open / Honest
 - Established Programs / Procedures
 - Compliance w/ procedures
 - Reporting of all incidents, accidents, and nearmisses
 - Incident / accident investigations (RCFA)
 - Checks / Balances
 - Audits
 - Metrics
 - Investments
 - Organizational Learning / Training / Competence
 - Resources
 - PPE





Moving the Safety Culture Needle within FM

- → Metrics over the past 9 years...
 - FROI (First Report of Injury) improvement of 62%
 - OSHA Recordables; improvement of 60%.
 - OSHA LTA (Lost Time Accident); improvement of 83%.
 - OSHA Lost Days; improvement of 63%.
 - OSHA Restricted Cases; improvement of 50%.
 - OSHA Restricted Workdays; improvement of 72%.
 - OSHA "Other Cases"; stable w/avg of 4/yr.









Safety Solutions...

Process in place to help improve safety across campus

Safety Solutions

What is Safety Solutions?

Safety Solutions is a mechanism to report safety related hazards, concerns, suggestions, and near-misses (situations that could have resulted in an incident or injury but did not).

Who can use Safety Solutions?

Any member of the University - faculty, staff, or students.

Sponsored by:



Be a Voice for Safety

How to access Safety Solutions

- Go to Safety Solutions at https://bizhub.facilities.uiowa.edu/bizhub/safety/incident
- Log in with your HawkID and password.
- Complete the form and submit for review.



IOWA

IOWA

IOWA

IOWA

Environmental Health and Safety Office Facilities Management

Business Services Risk Management

University Human Resources



Work Related Illness/Injury

Hazardous Waste Contingency Plan

Hazardous Materials Spills

EHS Open "Office" Hours

EHS Laboratory Safety Seminar

SAFETYmatters Newsletter

Accessing EHS Written Manuals and Forms

more

Chemical Inventory EHSA

Waste Pickup Request

EHS Safety Training

Chemwatch - SDS

OSHA Inquiries and Inspections Safety Solutions

Health & Safety Policy

Related UI Programs



Public Safety



FM@YourService



Fire Safety



UI Employee Health Clinic



Ergonomic Assessment



Environmental Compliance



Risk Management



Office of Emergency Management

Safety Solutions

Environmental Health and Safety (EHS), in collaboration with Facilities Management (FM), Risk Management, and University Human Resources, has released Safety Solutions, a mechanism to report:

- · safety hazards or concerns,
- · suggestions to improve safety, including the safety culture, procedures, or oversight, and
- near-misses = a situation that could have resulted in an incident or injury but did not.

Any member of the University faculty, staff, or students can use Safety Solutions by accessing the link above and signing in with their HawkID. The purpose of Safety Solutions is to encourage the campus community to be an active participant in ensuring a safe and healthy campus environment.

Safety Solutions should NOT be used to report:

- Any incident that resulted in an injury/illness to a UI employee use the First Report of Injury through Employee Self Service
- Any incident that resulted in an injury/illness to a non-UI employee (such as a student or volunteer) use Risk Management's Incident Report Form
- Building or grounds maintenance use FM@YourService
- Criminal or Emergency situations (including use of a fire extinguisher) 911 or <u>Department of Public Safety</u>
- Any concerns or events relating to UIHC report through <u>The Point</u>
- Anonymous reporting use Report a Concern

Following submission of a case, a group of administrators comprised of staff from EHS and FM will review the information.

Initial Submission Information

The submission will either be addressed by the administrators or may be assigned to an individual within the department for further investigation. The investigation will provide an opportunity for questions, gathering additional information, and clarification, where needed. The investigator will propose a resolution and possible action items, where appropriate.

Investigation Procedure

The campus user that submitted the form will be able to see the status of their submission by logging into Safety Solutions.

- New Item: Case has been submitted.
- In Review: Case is in review.
- Pending: Case is in review with Departmental Safety Administrator.
- Final Review: Proposed solution is being reviewed by Safety Solutions Administrators.
- Approved: Case is closed.

An email will be sent to the campus user when the workflow is complete and will allow full review of any information gathered during the process and any subsequent resolutions or action plans.

Any questions or concerns with Safety Solutions should be addressed to Haley Sinn, EHS Director, at haley-williams@uiowa.edu or 319-335-9553.



General Safety Tips...

- → Remove any old paint cans and paint thinners, in addition to old newspapers and magazines. Your local landfill/recycling center should have a place for hazardous material drop offs to dispose of the chemical's safety.
- → Consider your smoke alarms & CO Detectors. Do you have enough? Change the batteries each spring to be sure you are properly prepared. Clean the dust covers of each.
- → A good time to review your emergency escape/response plan with each member of the family in the event of an emergency, (fire, weather, gas leak, etc.).
- → Replace your furnace filter.
- → Grease can accumulate on your stove hood. Properly clean them as it is a way to keep flames from spreading should a fire break out.
- → Check all of your fire extinguishers needle indicators and dates to be sure that they are ready to utilize. Also, assess if you have enough of them and in the possible needed locations.
- → Clean around your dryer. Pay close attention to any ducts or dampers to be sure that lint has not accumulated and blocked the space. Accumulations of lint can lead to a fire.
- → Check all chords to prevent an electrical fire. Make sure they are not frayed and wires are not visible.



General Safety Tips...

- → Remember all aspects of ladder safety if needing to utilize them.
 - Do not use ladders in high winds or storms
 - Wear slip-resistant shoes while using.
 - Inspect the ladder before utilizing.
 - Ensure that the duty rating is more than the total weight of the climber, tools and other objects that will be placed on the ladder.
 - Choose a ladder long enough that you do not have to stand on the top rung or step. Stay off the top two rungs of a step ladder and the top three rungs of an extension ladder.
 - Your ladder should extend minimally 3' above the working surface such as a roof.
 - When using an extension ladder remember to set the ladder at the correct angle which is 4:1, (for every of ladder height you are 1' out).
 - Tie off the ladder to prevent it from slipping.
 - Be aware of any overhead or nearby electricity to not come into contact.
 - Place the ladder on firm, level ground.
 - Only allow one person a ladder at a time.
 - Do not position a ladder in front of closed doors.
 - Utilize 3-points of contact to reduce the risk of slipping or falling. Face the ladder with two hands and one foot or two feet and one hand in contact with the ladder or side rails.



Outdoor Safety Tips...

- → Check outdoor cords for frays and damage.
- → Check any gas-operated equipment to be sure all fuel lines are safe.
- → Do not store gasoline in an open space. Be sure all equipment used for lawn equipment and outdoor purposes has been properly fueled outdoors to eliminate the risk of inhalation.
- → Be cautious of chemical usage (cleaning, yard care, etc.) as they may pose numerous health hazards as well as flammability.
- → Be cautious with grilling (gas/charcoal). Always keep a good distance from structures as well as inspect all items prior to use.



SAFETY



- 2 feet & 1 hand or

- 2 hands & 1 foot

Do place the step ladder on level ground, solid and an unmoveable surface

Do face the step ladder when ascending or descending

Do stay centered on the step

Do fully open the step ladder and lock supports in place

Do brace yourself with your free hand if possible

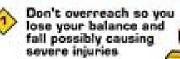
Do carry tools in a toolbelt or pouch not in your hands

Do use a step ladder with non-slip feet

Do use the right height of step ladder for the job

Do inspect the step ladder before using it





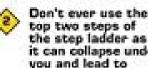
Don't ever use the top two steps of the step ladder as it can collapse under you and lead to crippling injuries

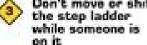
Don't move or shift the step ladder while someone is

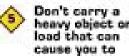
Don't place the step ladder on uneven ground, moveable objects, or a soft surface

Don't carry a heavy object or load that can cause you to lose your balance

Don't fold up and lean the step ladder against a wall or surface











Every Second Counts:

Plan 2 Ways Out!™

How fast does fire move? Very fast. You could have less than 2 minutes to get out safely once the smoke alarm sounds.

7 steps to practicing your escape plan

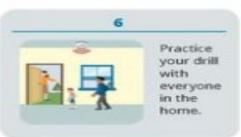




















Prevent home garage fires.

Store flammable items like oil, gasoline, paints, propane and varnishes in a shed away from your home.







Did you know?

Garage fires tend to spread farther and cause more injuries and dollar loss than fires that start in all other areas of the home.

Keep your home safe by following a few easy tips:

- Store oil, gasoline, paints, propane and varnishes in a shed away from your home.
- Keep items that can burn on shelves away from appliances.
- Plug only one charging appliance into an outlet.
- Don't use an extension cord when charging an appliance.

Garage safety through construction - install:

- A 20-minute fire-rated door that is self-closing and self-latching from the garage into the house.
- A ceiling made with 5/8-inch Type X gypsum board (or the equivalent) if you have living space above the garage.
- A wall with 1/2-inch gypsum board (or the equivalent) if the wall attaches the garage to your home.
- An attic hatch cover if you have attic access from the garage.
- A heat alarm not a smoke alarm in your garage. The heat alarm will sound if the temperature rises too high. Learn more about what type of heat alarm is best for garage installation at www.usfa.fema.gov.



Prevent Home Electrical Fires



Did you know?

Electrical malfunction is the leading cause of home fires year after year.

Share these electrical fire safety tips in your community:

- Electrical work should only be done by a qualified electrician.
- Check your electrical cords. If they are cracked or damaged, replace them. Don't try to repair them.
- Don't overload extension cords or wall outlets.
- Never use extension cords with appliances. Plug them directly into wall outlets.



CARBON MONOXIDE (CO) POISONING



SEEN

CAN'T BE CAN'T BE SMELLED HEARD

CAN BE STOPPED





Smoke is poisonous.

Get low to the ground and go under the smoke to your exit if you must escape through smoke.



Replace your alarms after 10 years.

Smoke alarms do not last forever. If your alarms are 10 years old or older, replace them with new alarms.



Prevent outdoor fires.

Keep your fire pits, personal fireplaces and torches at least 10 feet from your home or anything that can burn.



Test your smoke alarms once a month.

A smoke alarm can save your life in a fire. Use the test button to make sure your smoke alarms are working.





Replace your alarms after 10 years.

Smoke alarms do not last forever. If your alarms are 10 years old or older, replace them with new alarms.



Put smoke alarms in every sleeping room, outside each separate sleeping area, and on every level of your home, including the basement.



Keep Your Family Safe From Household Chemicals



Chemicals you use in your home can be dangerous to your health and the environment. To keep your family safe, follow these safety tips when you use, store or throw them out.

Use and storage tips:

- Follow the instructions on the label when you use and store household chemicals.
- Don't mix products. This can cause deadly gases or cause a fire.
- Store products in their original containers.
- Store anything that can catch on fire away from your home.
- Only fill portable gasoline containers outdoors in an airy area. Make sure to place the container on the ground when you fill it.
- Never store materials that can cause a fire in the sun or near an open flame or heat source.
- Store these materials out of the reach of children and pets.
- Use safety locks and guardrails on shelves and cabinets when you store materials. This will prevent them from falling or tipping.
- Wear gloves or goggles when you use these materials.

When you need to throw them out:

- Follow the instructions on the label.
- Aerosol cans might contain chemicals that can burn. If you put them in the trash, they can explode or start a fire.
- If you have a spill, clean the area and put the containers in an airy place. If you cannot control the spill, or are unsure about cleanup and disposal, call your local fire department.



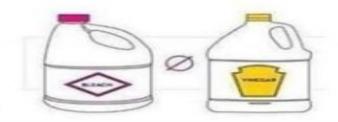




DO NOT MIX THESE CLEANING PRODUCTS

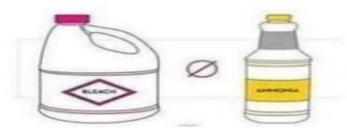
BLEACH + VINEGAR

Bleach and vinegar mixture produces chlorine gas, which can cause coughing, breathing problems, burning and watery eyes.



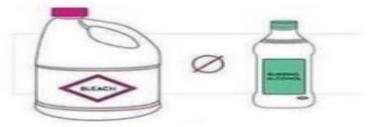
BLEACH + AMMONIA

Bleach and ammonia produce a toxic gas called chloramine. It causes shortness of breath and chest pain.



BLEACH + RUBBING ALCOHOL

Bleach and rubbing alcohol makes chloroform, which is highly toxic.



HYDROGEN PEROXIDE + VINEGAR

This combination makes peracetic/peroxyacetic acid, which can be highly corrosive





Building Coordinator

Next meeting: May 15, 2024, via zoom 11 AM to 12 PM

Proposed Agenda:

Design and Construction

FM Alerts

Questions? THANK YOU!

Feedback welcome by emailing stephanie-rourke@uiowa.edu