



SEMINAR AGENDA

EFFECTIVE FALL PROTECTION PROGRAMS

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DAY ONE

SESSION 1: INTRODUCTION (60 MINS)

1. Welcome & Introduction
2. Myth vs. Fact
3. Fall Protection Overview
 - > Statistics
 - > Overview of regulations and standards
 - > Core elements of a fall protection program

SESSION 2: THE STATE OF WORKING AT HEIGHT TODAY (45 MINS)

1. Background
2. Evolving standards
 - > ANSI Z359 Fall Protection Code
3. Equipment advances
4. Prevention through Design

SESSION 3: EQUIPMENT COMPONENTS (45 MINS)

1. Full-body harness
2. Connecting components
3. Energy absorbers and lanyards
4. Self-retracting lanyards (SRLs)
5. Climbing systems
6. Vertical lifelines
7. Horizontal lifelines (HLLs)
8. Anchorage connectors

SESSION 4: EQUIPMENT USE, LIMITATIONS & INSPECTION (30 MINS)

1. Personal Protective Equipment – Equipment Use and Limitations
 - > Equipment limitations
 - > Video
2. Personal Protective Equipment – Equipment Inspection
 - > Inspection logs
 - > Damage and deterioration
 - > Video

SESSION 5: EQUIPMENT CONSIDERATIONS (60 MINS)

1. Anchorages
 - > Regulations and standards
 - > Types
 - > System elements
 - > Exercise
2. Fall clearance distances
 - > Swing fall
 - > Free fall distance
 - > Total fall distance
 - > Clearances
 - > Exercise
3. Fall protection rescue
 - > Regulatory requirements
 - > Prompt rescue
 - > Exercise

SESSION 6: FALL PROTECTION SURVEYS (60 MINS)

1. Fall Hazard Surveys
 - > Process
 - > Exercise

SESSION 7: WALKING/WORKING SURFACES & ACCESS DEVICES (60 MINS)

1. Fall Prevention and Protection – Walking/working surfaces and access devices
 - > Platforms
 - > Holes and covers
 - > Guardrail

- > Ramps, stairs and ladders
- > Video

SESSION 8: WORK AT ELEVATION (60 MINS)

1. Roof work
 - > Low slope and steep
 - > Hoist areas
 - > Holes
 - > Exercise
2. Lifts and Scaffolding
 - > Types
 - > Platform requirements
 - > Vacating (or entering) an aerial lift
 - > Exercise

SESSION 9: CLOSING (60 MINS)

1. Conclusion
 - > Action steps
 - > Course evaluation
 - > Thank you and closing

MANAGED FALL PROTECTION

TASKS

- > Task 1: Fall Protection Regulations and Standards
- > Task 2: Evaluate Your Managed Fall Protection Program Against the Elements Defined in ANSI/ASSE Z359.2-2017

MATERIALS NEEDED

- > **Session 1 and Session 2 material**



TASK 2: FALL PROTECTION REGULATIONS AND STANDARDS



Task Instructions

Place a checkmark in the **Yes**, **No**, or **Don't Know** column next to each item in the table below. If you check **No** or **Don't Know**, list at least one action you should take in your organization relative to the item.

| Item | Yes | No | Don't Know | Actions |
|--|-----|----|------------|---------|
| <p>1. HEIGHT THRESHOLDS Does your organization follow the appropriate fall protection height threshold?</p> | | | | |
| <p>2. ACCESS TO REGULATIONS Do you know how to access the regulations pertaining to fall protection?</p> | | | | |
| <p>3. ACCESS TO ANSI STANDARDS Do you have access to ANSI standards for fall protection?</p> | | | | |
| <p>4. ACCESS TO EN STANDARDS Do you have access to EN standards for fall protection?</p> | | | | |



TASK 2: EVALUATE YOUR MANAGED FALL PROTECTION PROGRAM AGAINST THE ELEMENTS IN ANSI/ASSE Z359.2-2017



Task Instructions

Place a checkmark in the **Yes**, **No**, or **Don't Know** column next to each item in the table below. If you check **No** or **Don't Know**, list at least one action you should take in your organization relative to the item.

| Item | Yes | No | Don't Know | Actions |
|---|-----|----|------------|---------|
| 1. POLICY STATEMENT Does your organization have a managed fall protection policy statement? | | | | |
| 2. EMPLOYER RESPONSIBILITIES Does your organizational leadership dedicate resources for the fall protection program? | | | | |
| 3. PROGRAM ADMINISTRATOR Has your organization identified a fall protection Program Administrator? | | | | |
| 4. QUALIFIED PERSON Does your organization have access to a fall protection Qualified Person? | | | | |
| 5. COMPETENT PERSON(S) Has your organization assigned an appropriate number of fall protection Competent Persons? | | | | |
| 6. AUTHORIZED PERSON(S) Has your organization identified workers who use fall protection systems as Authorized Persons? | | | | |



| Item | Yes | No | Don't Know | Actions |
|--|-----|----|------------|---------|
| <p>7. RESCUERS Does your organization have access to Competent and Authorized Rescuers (if necessary)?</p> | | | | |
| <p>8. TRAINERS Does your organization have access to fall protection trainers (if necessary)?</p> | | | | |
| <p>9. TRAINING NEEDS Has your organization identified training needs based on your specific hazards?</p> | | | | |
| <p>10. TRAINING DOCUMENTATION Is your organization's fall protection training documented?</p> | | | | |
| <p>11. RETRAINING Is the training for your Competent Persons and Authorized Persons current (i.e., within 2 years)?</p> | | | | |
| <p>12. SURVEY Has your organization conducted a complete fall hazard survey?</p> | | | | |
| <p>13. PROCEDURES Does your organization have written use and rescue procedures for all active fall protection systems?</p> | | | | |
| <p>14. NEW FACILITIES Does your organization consider fall protection during new facility design?</p> | | | | |
| <p>15. SYSTEM DESIGN Have all of your fall protection systems been designed by a Qualified Person?</p> | | | | |



| Item | Yes | No | Don't Know | Actions |
|---|-----|----|------------|---------|
| <p>16. ANCHORAGE USE Have all of your anchorages been certified by a Qualified Person, or have non-certified anchorages been identified by a Competent Person?</p> | | | | |
| <p>17. EQUIPMENT INSPECTION, MAINTENANCE, AND STORAGE Is your equipment inspected before each use by the Authorized Person, and as appropriate by the Competent Person?</p> | | | | |
| <p>18. RESCUE SERVICES Do you have a plan for summoning external rescue services (if necessary)?</p> | | | | |
| <p>19. INCIDENT INVESTIGATION Are all your fall incidents investigated?</p> | | | | |
| <p>20. PROGRAM EVALUATION Is your fall protection program evaluated every 2 years?</p> | | | | |



▶ ACTIVE FALL PROTECTION SYSTEM EQUIPMENT

TASKS

- > Task 1: Demonstrate Proper Use of a Body Support Device (harness)
- > Task 2: Describe Use and Limitations of Connecting Means
- > Task 3: Identify Anchorage Requirements

MATERIALS NEEDED

- > **Session 3, Session 4, Session 5**
- > **Sample Equipment Components** – Provided by facilitator



TASK 1: DEMONSTRATE PROPER USE OF BODY SUPPORT DEVICE



Task 1a. Instructions

Complete each of the tasks detailed in the table below. Be prepared to explain the results of each evaluation to your instructor.

Place an "X" in the table as you identify each of the four components of your assigned full-body harness.

| Dorsal Attachment | Sternal Attachment (if present) | Shoulder Straps | Leg / Thigh Straps |
|-------------------|---------------------------------|-----------------|--------------------|
| | | | |

Place an "X" in the table under each acceptable location for the four use types listed.

| Use | Location | | |
|------------------|----------|---------|---------|
| | Dorsal | Sternal | Frontal |
| Fall Arrest | | | |
| Travel Restraint | | | |
| Work Positioning | | | |
| Rescue | | | |

Place an "X" in the table indicating if the label provides information about the label's date placed in service, conformance with ANSI Z359.11, and weight capacity.

| Label Information | Yes | No | Not Sure |
|-------------------------|-----|----|----------|
| Date Placed in Service | | | |
| ANSI Z359.11 Conformant | | | |
| Weight Capacity | | | |





Task 1b. Instructions

Team up with at least one classmate, and complete the steps detailed in the tables below. Be prepared to demonstrate harness fit to your instructor.

| Task | Complete (X) |
|---------------------|--------------|
| Inspect | |
| | |
| | |
| | |
| | |
| | |
| Don | |
| | |
| | |
| | |
| | |
| | |
| Position and secure | |
| | |
| | |
| | |
| | |
| Evaluate | |
| | |
| | |
| | |
| | |
| | |



TASK 2: DESCRIBE USE AND LIMITATIONS OF CONNECTING MEANS



Task

Complete the evaluation of your assigned component(s) following the instructions in the tables below. Be prepared to explain your evaluation to your instructor.

Use the table to document a brief description of the component's use and at least one restriction or limitation of the component.

| Component | Use | Restrictions/Limitations |
|-----------|-----|--------------------------|
| | | |
| | | |



TASK 3: IDENTIFY ANCHORAGE REQUIREMENTS



Task 3

Identify the anchorage requirements for the use scenario provided by your instructor. Follow the instructions in the table below. Be prepared to explain your evaluation to your instructor and the class.

Enter the design load ratings for non-certified and certified versions of the anchorages.

| Use | Design Load Ratings | |
|---------------------|---------------------|-----------|
| | Non-certified | Certified |
| Fall Arrest | | |
| Work Positioning | | |
| Travel Restraint | | |
| Horizontal Lifeline | | |
| Rescue | | |



➤ FALL PROTECTION EQUIPMENT INSPECTION

TASKS

- > Task 1: Conduct anchorage connector formal inspection
- > Task 2: Conduct harness formal inspection
- > Task 3: Conduct lanyard formal inspection
- > Task 4: Conduct self-retracting device formal inspection
- > Task 5: Conduct vertical lifeline formal inspection

MATERIALS NEEDED

- > **Session 4**
- > **Sample Equipment Components** – Provided by facilitator



TASK 1: CONDUCT ANCHORAGE CONNECTOR/CONNECTOR FORMAL INSPECTION



Task

Complete the steps provided by your instructor. Be prepared to explain the inspection results to the instructor and class.

FORMAL INSPECTION LOG – ANCHORAGE CONNECTOR/CONNECTOR

Manufacturer: _____ Inspector: _____
 Model No.: _____ Inspection Date: _____ / _____ / _____
 Serial No.: _____ Previous Insp. Date: _____ / _____ / _____
 Date of Manuf.: _____ / _____ / _____ User's Name/Dept.: _____ / _____
 Type of Material (nylon, polyester, kevlar, other/specify): _____

| Description | Assessment (See Key) | | Comments |
|--|----------------------|----|----------|
| | OK | NG | |
| Connector Hardware | | | |
| Metallic parts (snaphooks, D-rings, O-rings, oval rings, adjusters) | | | |
| D-ring | | | |
| Snaphook | | | |
| Connector locking mechanism | | | |
| Connector gate | | | |
| Lubrication of twist lock | | | |
| Connector frame | | | |
| Other: | | | |
| Other: | | | |
| Other: | | | |
| Other: | | | |
| Plastic parts | | | |
| Labeling | | | |
| Other: | | | |
| Other: | | | |
| Connector Fabric/Synthetic Rope/Wire Rope | | | |
| Webbing/Rope | | | |
| Abrasion webbing/webbing protection | | | |
| Connector webbing | | | |
| Energy absorber | | | |
| Energy absorber cover | | | |
| Other: | | | |
| Other: | | | |
| Stitching | | | |
| Abrasion webbing/Webbing protection | | | |
| Connector webbing | | | |
| Energy absorber | | | |
| Energy absorber cover | | | |
| Other: | | | |
| Other: | | | |

Does the connector state that it meets ANSI Z359.1-2007? **YES NO**
 Does the connector state that it meets ANSI Z359.12-2009? **YES NO**
 Does the connector state that it meets ANSI A10.32-2004? **YES NO**
 Has current inspection date been recorded on inspection tag? **YES NO**
 Does the facility have Third Party Testing Information on file? **YES NO**
 Approved for Service? **YES NO**



FORMAL INSPECTION LOG – ASSESSMENT KEY

| Description of Part Inspected | Assessment | Comments |
|---|------------|--|
| <i>Connector Hardware</i> | | |
| No visible change | H0 | Signify whether article is acceptable or not acceptable with a suffix as described below: H0 – OK: ACCEPTABLE H2 – NG: NOT ACCEPTABLE DUE TO CORROSION AND/OR PITTING Make diagram on which areas of concern on the equipment can be circled. NG = No Good, requires replacement |
| Deformed/distorted/fractured/cut/nicks/broken | H1 | |
| Corroded/pitting | H2 | |
| Wear damage | H3 | |
| Missing/loose/illegible | H4 | |
| Heat exposure/burns | H5 | |
| Chemical exposure | H6 | |
| Burrs/sharp edges | H7 | |
| Malfunction/does not open or close properly | H8 | |
| Other (specify in comments) | H9 | |
| <i>Connector Fabric/Synthetic Rope/Wire Rope</i> | | |
| No visible change | F0 | Signify whether article is acceptable or not acceptable with a suffix as described below: F0 – OK: ACCEPTABLE F2 – NG: NOT ACCEPTABLE DUE TO ABRASION AND/OR WEAR Make diagram on which areas of concern on the equipment can be circled. NG = No Good, requires replacement |
| Cutting/frayed/broken fibers/loose or pulled thread | F1 | |
| Abrasion/wear/fuzziness | F2 | |
| Partially missing/altered | F3 | |
| Burns/heat exposure | F4 | |
| Chemical exposure/writing | F5 | |
| Mold | F6 | |
| Load indicator deployed | F7 | |
| Shock absorber exposed/cover opened | F8 | |
| Shock absorber elongated | F9 | |
| Other (specify in comments) | F15 | |

No marking in the “Assessment” column on the opposite side implies there was “No Visible Change” and H0/F0 applies to the part inspected.

Equipment shall be removed from service no later than five years from the date of manufacturer.

If the equipment is less than five years old and is NOT APPROVED FOR SERVICE, the equipment shall be immediately taken out of service and forwarded to Plant Safety for analysis and destruction.

If the equipment is involved in a fall incident, the equipment shall be immediately taken out of service and forwarded to Plant Safety for analysis and destruction.



TASK 2: CONDUCT HARNESS FORMAL INSPECTION



Task

Complete the steps provided by your instructor. Be prepared to explain the inspection results to the instructor and class.

FORMAL INSPECTION LOG – FULL BODY HARNESS

Manufacturer: _____ Inspector: _____
 Model No.: _____ Inspection Date: _____ / _____ / _____
 Serial No.: _____ Previous Insp. Date: _____ / _____ / _____
 Date of Manuf.: _____ / _____ / _____ User’s Name/Dept.: _____ / _____
 Type of Material (nylon, polyester, kevlar, other/specify): _____

| Description | Assessment (See Key) | | Comments |
|--|----------------------|----|----------|
| | OK | NG | |
| HARNESS HARDWARE | | | |
| Metallic Parts (D-rings, O-rings, Oval Rings, Adjusters, Buckles, Grommets) | | | |
| Dorsal D-ring | | | |
| Chest D-ring | | | |
| Hip D-rings | | | |
| Shoulder D-rings | | | |
| Torso sizing adjuster | | | |
| Tongue buckles | | | |
| Friction buckles | | | |
| Thigh strap grommets | | | |
| Other: | | | |
| Other: | | | |
| Plastic Parts | | | |
| Dorsal D-ring locator | | | |
| Strap collars | | | |
| Labeling | | | |
| Tool belt support clips | | | |
| Other: | | | |
| HARNESS FABRIC | | | |
| Webbing (straps) | | | |
| Shoulder straps | | | |
| Shoulder strap retainer | | | |
| Thigh straps | | | |
| Sub-pelvic straps | | | |
| Tool belt support | | | |
| Other: | | | |
| Stitching | | | |
| Shoulder straps | | | |
| Shoulder straps tips | | | |
| Shoulder strap retainer | | | |
| Shoulder strap reinf. | | | |
| Buckle straps | | | |
| Thigh straps | | | |
| Thigh straps – edges | | | |
| Thigh straps – tips | | | |
| Sub-pelvic straps | | | |
| Tool belt support | | | |
| Other: | | | |

Does the Full Body Harness state that it meets ANSI Z359.1-2007? **YES NO**
 Does the Full Body Harness state that it meets ANSI Z359.11-2014? **YES NO**
 Does the Full Body Harness state that it meets A10.32-2004? **YES NO**
 Has current inspection date been recorded on inspection tag? **YES NO**
 Does the facility have Third Party Testing Information on file? **YES NO**
 Approved for service? **YES NO**



TASK 3: CONDUCT LANYARD FORMAL INSPECTION



Task

Complete the steps provided by your instructor. Be prepared to explain the inspection results to the instructor and class.

FORMAL INSPECTION LOG – SHOCK ABSORBING LANYARDS

Manufacturer: _____ Inspector: _____
 Model No.: _____ Inspection Date: _____ / _____ / _____
 Serial No.: _____ Previous Insp. Date: _____ / _____ / _____
 Date of Manuf.: _____ / _____ / _____ User's Name/Dept.: _____ / _____
 Type of Material (nylon, polyester, kevlar, other/specify): _____

| Description | Assessment (See Key) | | Comments |
|--|----------------------|----|----------|
| | OK | NG | |
| Lanyard Hardware | | | |
| Metallic parts (snaphooks, D-rings, O-rings, oval rings, adjusters) | | | |
| Snaphook (leg 1) | | | |
| Snaphook (leg 2) | | | |
| Snaphook (leg 3) | | | |
| Carabiner | | | |
| Adjuster (leg 2/leg 3) | | | |
| Swaged fitting | | | |
| Thimble | | | |
| Hog ring | | | |
| Other: | | | |
| Other: | | | |
| Plastic parts | | | |
| Thimble | | | |
| Vinyl coating on wire rope | | | |
| Labeling | | | |
| Other: | | | |
| Lanyard Fabric/Synthetic Rope/Wire Rope | | | |
| Webbing/Rope | | | |
| Lanyard leg (leg 1) | | | |
| Lanyard leg (leg 2) | | | |
| Lanyard leg (leg 3) | | | |
| Splices | | | |
| Energy absorber | | | |
| Energy absorber cover | | | |
| Other: | | | |
| Other: | | | |
| Stitching | | | |
| Lanyard leg (leg 1) | | | |
| Lanyard leg (leg 2) | | | |
| Lanyard leg (leg 3) | | | |
| Energy absorber | | | |
| Energy absorber cover | | | |
| Splices | | | |
| Other: | | | |
| Other: | | | |

For twin leg lanyard, does each lanyard have a separate shock absorber? **YES NO**
 Does the lanyard state that it meets ANSI Z 359.1 or Z 359.13 **YES NO**
 Does the lanyard state that it meets ANSI A10.32-2004? **YES NO**
 Has current inspection date been recorded on inspection tag? **YES NO**
 Does the facility have Third Party Testing Information on file? **YES NO**
 Approved for service? **YES NO**



TASK 4: CONDUCT SELF-RETRACTING DEVICE FORMAL INSPECTION



Task

Complete the steps provided by your instructor. Be prepared to explain the inspection results to the instructor and class.

FORMAL INSPECTION LOG – SELF RETRACTING LANYARDS

Manufacturer: _____ Inspector: _____
 Model No.: _____ Inspection Date: _____ / _____ / _____
 Serial No.: _____ Previous Insp. Date: _____ / _____ / _____
 Date of Manuf.: _____ / _____ / _____ User's Name/Dept.: _____ / _____
 Type of Material (nylon, polyester, kevlar, other/specify): _____

| Description | Assessment (See Key) | | Comments |
|--|-------------------------|----|----------|
| | OK | NG | |
| Lanyard Hardware | | | |
| Metallic parts (snaphooks, D-rings, O-rings, oval rings, adjusters) | | | |
| Snaphook | | | |
| Carabiner (if attached) | | | |
| Shackle or other attachment mechanism | | | |
| Retraction mechanism | | | |
| Housing | | | |
| Handle (if provided) | | | |
| Swaged fitting (if provided) | | | |
| Load indicator tab (if provided) | | | |
| Other: | | | |
| Other: | | | |
| Plastic parts | | | |
| Vinyl coating on wire rope | | | |
| Labeling | | | |
| Other: | | | |
| Lanyard Fabric/Synthetic Rope/Wire Rope | | | |
| Webbing/rope | | | |
| Lanyard line | | | |
| Splices | | | |
| Load indicator tab (if provided) | | | |
| Other: | | | |
| Other: | | | |
| Stitching | | | |
| Lanyard line | | | |
| Lanyard at snaphook | | | |
| Other: | | | |
| Other: | | | |

Does the lanyard state that it meets ANSI Z359.1-2007 or Z359.14-2012? **YES NO**
 Does the lanyard state that it meets ANSI A10.32-2004? **YES NO**
 Has current inspection date been recorded on inspection tag? **YES NO**
 Has the SRL been sent to the manufacturer for in-depth inspection, if required? **YES NO**
 Does the facility have Third Party Testing Information on file? **YES NO**
 Approved for service? **YES NO**



TASK 5: CONDUCT VERTICAL LIFELINE FORMAL INSPECTION



Task

Complete the steps provided by your instructor. Be prepared to explain the inspection results to the instructor and class.

FORMAL INSPECTION LOG – VERTICAL LIFELINES

Manufacturer: _____ Inspector: _____
 Model No.: _____ Inspection Date: _____ / _____ / _____
 Serial No.: _____ Previous Insp. Date: _____ / _____ / _____
 Date of Manuf.: _____ / _____ / _____ User’s Name/Dept.: _____ / _____
 Type of Material (nylon, polyester, kevlar, kern mantle, other/specify): _____

| Description | Assessment (See Key) | | Comments |
|--|----------------------|----|----------|
| | OK | NG | |
| <i>Lifeline Hardware</i> | | | |
| Metallic parts (snaphooks, D-rings, O-rings, oval rings, adjusters, fall arresters) | | | |
| Fall arrester – housing | | | |
| Fall arrester – handle | | | |
| Fall arrester – load indicator tab (if provided) | | | |
| Fall arrester – moving parts | | | |
| Snaphook – vertical lifeline | | | |
| Snaphook – lanyard | | | |
| Carabiner | | | |
| Swaged fitting | | | |
| Thimble | | | |
| Hog ring | | | |
| Adjuster | | | |
| Other: | | | |
| Plastic parts | | | |
| Thimble | | | |
| Vinyl coating on wire rope | | | |
| Labeling | | | |
| Other: | | | |
| <i>Lanyard Fabric/Synthetic Rope/Wire Rope</i> | | | |
| Webbing/rope | | | |
| Vertical lifeline rope | | | |
| Lanyard leg | | | |
| Splices | | | |
| Energy absorber | | | |
| Energy absorber cover | | | |
| Other: | | | |
| Stitching | | | |
| Vertical lifeline loops | | | |
| Lanyard leg | | | |
| Energy absorber | | | |
| Energy absorber cover | | | |
| Splices | | | |
| Other: | | | |

For twin-leg lanyard, does each lanyard have a separate shock absorber? **YES NO**
 Does the lanyard state that it meets ANSI Z359.1-1992? **YES NO**
 Does the lanyard state that it meets ANSI A10.32-2004? **YES NO**
 Has current inspection date been recorded on inspection tag? **YES NO**
 Does the facility have Third Party Testing Information on file? **YES NO**
 Approved for service? **YES NO**



FALL HAZARD SURVEY

TASKS

- > Task 1: Identify Fall Hazards
- > Task 2: Assess Hazard Risk
- > Task 3: Select Abatement Methods
- > Task 4: Prioritize Hazards for Abatement

MATERIALS NEEDED

- > **Sample Work Area (Hazards):** *Provided by instructor*



TASK 1: IDENTIFY FALL HAZARDS

Objective

Given a specific work area representation (photograph, diagram, or actual), identify fall hazards in the area to include: means of access, locations, and/or hidden.



Task Instructions

Identify potential hazards (means of access, locations, and/or hidden) in the walking-working surfaces shown in the photographs provided by your instructor (*or in the actual walking-working surfaces if completing this exercise at a work site*).

Completion Requirements

1. Use the **Four Hazard Data Sheets** provided in this handout to record hazard data.
 - a. Assign each hazard a number (1, 2, 3, or 4) in the Number field.
 - b. Write a brief description of each potential hazard in the appropriate row (i.e., means of access, locations, or hidden) on the Hazard Data Sheet.

Debrief Requirements

Be prepared to present the hazards identified to your instructor and classmates.

TASK 2: ASSESS HAZARD RISK

Objective

Given a representation of a fall hazard (photograph, diagram, or actual) and a risk rating matrix, compute a relative risk rating for the hazard.



Task Instructions

Compute a risk rating for each hazard identified in Task 1.

Completion Requirements

- > Use the **Four Hazard Data Sheets** provided in this handout to record hazard data.
 - a. Record a probability score (1, 3, 7, or 10) in the Probability field and a severity score (1, 3, 7, or 10) in Severity field in the Risk Assessment table.
 - b. Multiply probability by severity and record result in the Rating field in the Risk Assessment table.
- > Using the **Hazard Summary Sheet**, compute a percentage of overall risk value for each of the four hazards. Note the total of all 4 hazards must equal 100%. Place these percentages in the % of Overall Risk column in the Hazard Summary Table.

Debrief Requirements

Be prepared to present your risk ratings to your instructor and classmates.

TASK 3: SELECT ABATEMENT METHODS

Objective

Given a representation of a fall hazard (photograph, diagram, or actual), identify at least one abatement option for the hazard based on the fall protection Hierarchy of Controls.



Task Instructions

Provide at least one abatement option, from one of the five categories on the fall protection Hierarchy of Controls, for each hazard identified in Task 1.

Completion Requirements

1. Use the **Four Hazard Data Sheets** provided in this handout to record hazard data.
 - a. Write a brief description of the abatement option in the appropriate row (i.e., Elimination, Substitution, Engineering Controls, Administrative Controls, or PPE).

Debrief Requirements

1. Be prepared to present your abatement selection to your instructor and classmates.
2. Your instructor will provide you an estimated cost for each abatement selection. Enter this cost in the Hazard Data Sheet.
3. Your instructor will provide you an overall budget for abatement. Enter this in the Hazard Summary Sheet.

TASK 4: PRIORITIZE HAZARDS FOR ABATEMENT

Objective

Given multiple fall hazards and a budget for abating the hazards, select which hazards to abate within the provided budget.



Task Instructions

Prioritize the hazards identified in Task 1 for abatement based on: 1) relative risk rating, 2) the abatement option you identified in Task 3, and 3) the budget for abatement provided by your instructor.

Completion Requirements

1. Use the **Hazard Summary Sheet** provided in this handout to record the following hazard data.
 - a. Transfer the Hazard Number (1-4) and Description from each individual Hazard Data Sheet to their corresponding fields.
 - b. Transfer the Risk Rating computed in Task 2 from each individual Hazard Data Sheet, and the relative risk ratings to their corresponding fields.
 - c. Transfer the Abatement description and estimated cost of each abatement method for all 4 hazards from each individual Hazard Data Sheet to their corresponding fields.
2. Based on your overall budget, estimated abatement costs, and budget provided by your instructor, place the hazard in priority order (1-4), and record results in the Hazard Summary Table.

Debrief Requirements

Be prepared to present your priority selections to your instructor and classmates.

HAZARD DATA SHEET

Number _____

Task 1:
Record all hazards identified, then transfer to **Hazard Summary Sheet.**

| Type(s) | Description |
|-----------------|-------------|
| Means of Access | |
| Locations | |
| Hidden | |

Task 2:
Compute risk for one hazard, then transfer to **Hazard Summary Sheet.**

| Risk Assessment | | |
|---------------------------|------------------------|---------------------------------|
| Probability (1, 3, 7, 10) | Severity (1, 3, 7, 10) | Rating (Probability x Severity) |
| | | |

Task 3:
Select at least one abatement method, then transfer to **Hazard Summary Sheet.**
Your instructor will provide an estimated cost.

| Abatement Type | Description | Estimated Cost |
|-------------------------------|---------------------|----------------|
| Elimination | | |
| Substitution | | |
| Engineering Control | | |
| Administrative Control | | |
| Personal Protective Equipment | Anchorage | |
| | Anchorage Connector | |
| | Body Support | |
| | Connecting Means | |
| | Rescue Plan | |



HAZARD DATA SHEET

Number _____

Task 1:
Record all hazards identified, then transfer to **Hazard Summary Sheet.**

| Type(s) | Description |
|-----------------|-------------|
| Means of Access | |
| Locations | |
| Hidden | |

Task 2:
Compute risk for one hazard, then transfer to **Hazard Summary Sheet.**

| Risk Assessment | | |
|---------------------------|------------------------|---------------------------------|
| Probability (1, 3, 7, 10) | Severity (1, 3, 7, 10) | Rating (Probability x Severity) |
| | | |

Task 3:
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Your instructor will provide an estimated cost.

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|-------------------------------|---------------------|----------------|
| Elimination | | |
| Substitution | | |
| Engineering Control | | |
| Administrative Control | | |
| Personal Protective Equipment | Anchorage | |
| | Anchorage Connector | |
| | Body Support | |
| | Connecting Means | |
| | Rescue Plan | |



HAZARD DATA SHEET

Number _____

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Record all hazards identified, then transfer to **Hazard Summary Sheet.**

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|-----------------|-------------|
| Means of Access | |
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Compute risk for one hazard, then transfer to **Hazard Summary Sheet.**

| Risk Assessment | | |
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| Probability (1, 3, 7, 10) | Severity (1, 3, 7, 10) | Rating (Probability x Severity) |
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| | Anchorage Connector | |
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| | Rescue Plan | |



HAZARD DATA SHEET

Number _____

Task 1:
Record all hazards identified, then transfer to **Hazard Summary Sheet.**

| Type(s) | Description |
|-----------------|-------------|
| Means of Access | |
| Locations | |
| Hidden | |

Task 2:
Compute risk for one hazard, then transfer to **Hazard Summary Sheet.**

| Risk Assessment | | |
|---------------------------|------------------------|---------------------------------|
| Probability (1, 3, 7, 10) | Severity (1, 3, 7, 10) | Rating (Probability x Severity) |
| | | |

Task 3:
Select at least one abatement method, then transfer to **Hazard Summary Sheet.**
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| Substitution | | |
| Engineering Control | | |
| Administrative Control | | |
| Personal Protective Equipment | Anchorage | |
| | Anchorage Connector | |
| | Body Support | |
| | Connecting Means | |
| | Rescue Plan | |



HAZARD SUMMARY SHEET

Total Budget _____

**Task 2 Continued:
Compute Relative Risk
Ratings**

| Number | Description | Risk | | Abatement | | Priority |
|--------|-------------|--------|-------------------|-------------|------|----------|
| | | Rating | % of Overall Risk | Description | Cost | |
| | | | | | | |
| | | | | | | |
| | | | | | | |
| | | | | | | |

Task 4:
Place hazards in priority order, based on risk ratings, cost to abate, and budget provided by your instructor.



