



Laboratory Safety

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Topics

- Hazard Determination
- Written Plan/Training
- Chemicals
- Equipment
- Misc.
- Injuries/Illness

Laboratory Safety:
It's not a matter of if,
but rather, when



LAB SAFETY

It's no accident.

Hazard Determination

- Survey Area
- Planning
- Procedures
- Engineering Controls



Written Plan/Training

- Chemical Hygiene Plan
 - Safety Procedures
 - Personal Hygiene
 - PPE/Safety Equipment
 - Housekeeping
 - Chemical Storage
 - Approved Activities
 - Spills/Accidents
 - Procedures



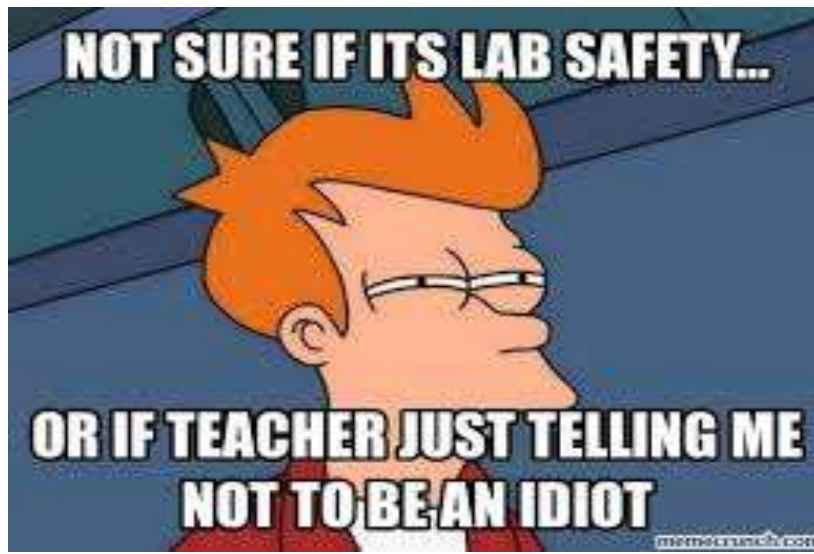
Written Plan/Training

- Standard Operating Procedures
 - Procedures
 - Safety
 - PPE
 - Chemical Information
 - Disposal Information



Written Plan/Training

- New Employees
- Change Positions
- Change Method
- Change Chemicals
- Periodic



Chemicals

- Safety Data Sheets
 - Posting/Location
 - Retention
 - Changes



Chemicals

- Labels
 - Changes
 - Secondary Containers





1 Sulfuric Acid



3 Danger! May be harmful if swallowed. Causes severe skin burns and eye damage. **4** Fatal if inhaled. Harmful to aquatic life.

Do not breathe dust/fume/gas/mist/vapors/spray. Wear protective gloves/protective clothing/eye protection/face protection. Wear respiratory protection.

5

IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing. Immediately call a POISON CENTER or doctor/physician.

In case of fire Use water spray, alcohol-resistant foam, dry chemical or carbon dioxide.

See Material Safety Data Sheet for further details regarding safe use of this product.

6 Sigma-Aldrich 3050 Spruce Street SAINT LOUIS MO 63103 USA Telephone : +18003255832

- 1** Product Identifier
- 2** Pictograms
- 3** Signal word, "Danger!"

- 4** Hazard Statements
- 5** Precautionary Statements
- 6** Supplier Information

Chemicals

- Storage
 - Acids/Bases
 - Oxidizers
 - Hazardous Materials
 - Purchasing



Chemicals

- Spill Response/Clean Up/Disposal
 - Preparation
 - Spill Kits
 - Employee Training
 - Emergency Information
 - Disposal
 - Amounts
 - Hazards
 - Byproducts
 - Labeling



Chemicals

- Poisons
 - Methods of Introduction
 - Personal Hygiene
 - Fume Hoods
 - Emergency Information/SDS



Chemicals

- Corrosives
 - Methods of Introduction
 - Concentrations
 - Storage
 - Spill Kits



Chemicals

- Fumes
 - Fume Hoods
 - Spills
 - Respirators



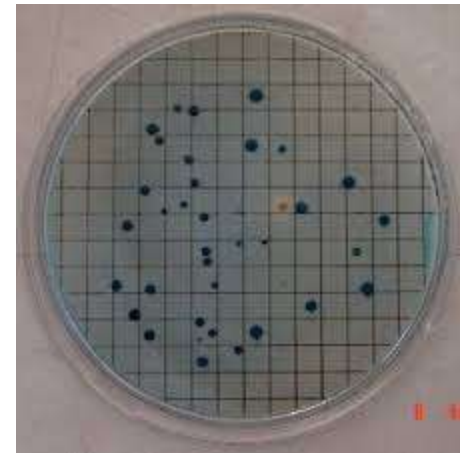
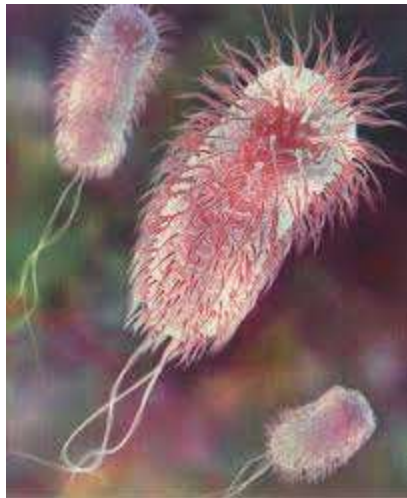
Chemicals

- Compressed Gases
 - Storage
 - Training



Chemicals

- Infectious Agents
 - Personal Hygiene/PPE
 - Lab Disinfection
 - Immunizations
 - Disposal



Equipment

- PPE
 - Hazard Survey
 - Training
 - Selection
 - Safety Glasses
 - Gloves
 - Lab Coats
 - Face Shields
 - Aprons
 - Respirators



Equipment

- Fume Hoods
 - Annual Testing
 - Sash Height
 - Crowding



Equipment

- Other Safety Equipment
 - Showers
 - Eyewash
 - Fire Extinguishers



Equipment

- Glassware
 - Integrity
 - Disposal
 - Proper Rating for Use



Equipment

- General Lab Equipment
 - Thermometers
 - Old Equipment
 - Electrical Equipment



Misc.

- Personal Hygiene
 - Eating/Drinking
 - Hair/Jewelry/Clothing
 - Contacts
 - Hand Washing
 - Contaminated Materials
 - Fridge Use



Misc.

- Housekeeping
 - Countertops
 - Exits/Eye Wash/Showers
 - Spills
 - Garbage



Misc.

- Horseplay/Complacency

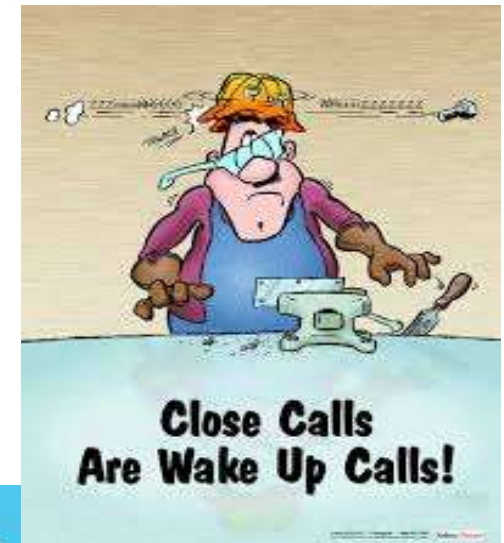


**DO NOT
HORSE AROUND
IN THE LAB**



Injury/Illness

- First Aid/Close Calls
 - Documentation
 - Training



Injury/Illness

- Exposure
 - Training
 - SDS
 - Monitoring
- Recordkeeping
 - Results/Monitoring
 - Retention



Questions?

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