

BEAUFORT COUNTY COMMUNITY COLLEGE
Hazard Communication

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A. Purpose

Beaufort County Community College is firmly committed to providing its employees and students, a safe and healthful work environment. The purpose of the Hazard Communication Program is to protect our employees and students, as well as the general public, from injuries and illnesses that may result from exposure to hazardous chemicals and substances within our learning institution.

There is no job, project, or experiment at BCCC, so vital or urgent, as to justify the risk of employee and/or student overexposure to a hazardous chemical.

B. Responsibilities

HAZARD COMMUNICATION COORDINATOR

The designated Hazard Communication Coordinator is the BCCC Health & Safety Coordinator. Specific responsibilities include:

1. Maintain an up to date Hazard Communication Program
2. Ensure that an up to date chemical inventory exists.
3. Ensure that a chemical Safety Data Sheet (SDS) exists for each chemical on the BCCC premises.
4. Ensure that an adequate supply of hazard warning labels are maintained.
5. Assist Division Deans/Supervisors in ensuring that training documentation exists for each employee in their area and is updated annually.
6. Ensure that adequate hazard communication training is provided to all applicable employees.
7. Keep a master copy of the HAZCOM Program and all SDSs in an electronic format and paper copies as detailed in this program.

DIVISION DEANS/SUPERVISORS

Specific responsibilities include:

1. Ensure that chemicals are properly labeled in their work area.
2. Ensure that before any chemical comes onto the campus, it is approved as per this program.
3. Ensuring that SDSs are obtained with any new chemicals received.
4. Ensure that SDS books in their work area are up to date against the electronic SDSs
5. Ensure that each employee in their work area is trained on any routine and any non-routine chemicals that may be used.
6. Send any new SDSs to the Program Coordinator for inclusion in the Chemical Inventory.

EMPLOYEES AND STUDENTS

Each employee and student is responsible for learning and following the requirements developed under this program and under the Chemical Hygiene Program. Ask a question when in doubt. Proceed with a job only after being satisfied that it is safe for you to do so.

C. Access to the Written Program

All or any part of this written Hazard Communication Program is available to employees, students, their designated representatives, the Assistant Secretary of Labor for Occupational Safety and Health (OSHA) or its representatives, the North Carolina Department of Labor, Occupational Safety and Health Division or its representatives, and the Director of the National Institute for Occupation Safety and Health (NIOSH) or its representatives.

These are the designated locations of this program:

Master Copy – main switchboard
Copy accessible at all times – Library
Health & Safety Coordinator – Building 1
BCCC website under Handbooks & Manuals

D. Hazard Assessment and Inventory

The initial hazard assessment of chemicals is performed by manufacturers or importers. Every hazardous chemical known to be present on the BCCC premises will be listed on the Hazard Chemical Inventory List. This list will serve as an index to the SDS file. An electronic copy is found in SharePoint which available to all employees and students. A copy of the chemical inventory is attached to the Switchboard Copy and the Library Copy.

The identity of the chemical appearing on the Hazardous Chemicals Inventory List will be the same name that appears on the manufacturer's label, on the in-house label, and on the SDS for the chemical.

E. Safety Data Sheets (SDSs)

The location of the master file of SDSs is either an electronic copy found on the SharePoint Health and Safety section or at the Switchboard or Library Copy. Each division is responsible for maintaining an up to date copy of SDSs in the work area. Each location of SDS copies shall be labeled for easy reference by employees and students. SDSs shall be easily accessible to all employees, student, and to any visitors.

Each division is responsible for obtaining an SDS for any new chemical that is not on the Beaufort County Community College Hazardous Chemical Inventory List and/or for which BCCC does not have an SDS. The division will forward a copy of the SDS to the Hazard Communication Coordinator for inclusion in the Hazardous Chemical Inventory List and placement in the master SDS file.

F. Labeling

No hazardous chemical will be accepted for use at BCCC, or shipped to any outside location, unless labeled with at least the following information:

1. Identity of the Hazardous Chemical
2. Appropriate Hazard Warnings (Physical and/or Health Hazards)
3. Name & address of the chemical manufacturer, importer, or other responsible party.
4. Label has NFPA ratings and/or GHS pictograms.

All in house containers of hazardous chemicals will be labeled with at least the following information:

1. Identity of the hazardous chemical-trade and chemical name
2. Appropriate hazard warning-physical and/or health warning

No label is to be defaced or removed when a material is received or in use. If a label becomes unreadable or material is poured into a different container, the person using the material is responsible for labeling the container with an in-house warning label. If the warning labels are not available in the work area, they may be obtained from the Hazard Communication Coordinator. Any chemical received or shipped out shall have Globally Harmonized System (GHS) Labels affixed to the container.

G. Employee Information and Training

Prior to initial task assignment, all employees at BCCC, including temporary employees, working with or potentially exposed to hazardous chemicals, will be appropriately informed and trained concerning the potential hazards to which they may be exposed.

All employees at BCCC will be informed of the details of the Hazard Communication Program, including an explanation of the labeling system and SDSs, and how employees can use the appropriate hazard information. The Hazard Communication Coordinator is responsible for the overall coordination of the training program.

Employees will be provided with training when new hazardous chemicals are introduced and added to the chemical inventory and before non-routine tasks are to be performed that could involve exposure to hazardous chemicals. This training is the responsibility of the division dean.

The extent of information transmitted to employees during training sessions will be dictated by the degree of the hazards presented by the chemicals. The basic element of the training program will include:

1. Type and location of hazardous chemicals used on premises.
2. Methods of detecting the presence or release of hazardous chemicals
3. Personal protective equipment (PPE) and methods of protecting against chemical exposure
4. An explanation of an SDS.
5. Any potential chemical health hazards, such as dermatitis and/or allergic reactions.
6. The text of the OSHA Hazard Communication Standard – 29CFR 1910.1200
7. This written program, including the Hazardous Chemicals Inventory List, procedures for chemical labeling (NFPA/HMIS/GHS), handling routine and non-routine tasks, and the contractor program.
8. Proper storage and handling of chemicals, i.e., flammables/combustibles, acids/bases, biohazards, explosive chemicals, etc.

Reinforcement of training will be conducted through topics at safety meetings, as appropriate. Training will be recorded on an appropriate training record and the division

dean will ensure that those training records are kept in the employee's division training file.

H. Non-Routine Work

Occasionally, employees will be asked to perform non-routine work tasks, which can be defined as work not normally performed by an employee during the normal course of job duties. Examples of non-routine work could be, but, are not limited to:

1. Confined space entry work
2. Start-up and phase-in of new equipment
3. Using chemicals in a manner different from normal or customary usage.

The following procedures will be used when employees perform non-routine work:

1. The appropriate supervisor will determine the need for non-routine work and the hazard associated with the work.
2. Prior to performing a hazardous non-routine task, a special training session will be conducted, usually between the supervisor and the employee(s).
3. In addition to the general employee information and training provided, the training will include thoroughly reading the SDS, reviewing any necessary PPE, any potential chemical health hazards, such as dermatitis and/or allergic reactions, and emphasizing any other precautions that may be needed to reduce or avoid exposure. Special work permits may be required for some non-routine work, such as confined space entry and some burning and welding tasks.
4. Employees share in the responsibility by ensuring their immediate supervisor knows that non-routine work will be performed. Employees should contact their immediate supervisor with questions concerning non-routine work.

I. Contractor Requirements

Any hazardous substance brought to BCCC by an outside contractor must be coordinated with the Hazard Communication Coordinator. The contractor and the coordinator shall supply one another with a list of the hazardous chemicals and the corresponding SDSs for the materials to which all employees will be potentially exposed in the course of their work while in the construction area.

Outside contractors must be provided with all necessary information concerning the potential hazards of the chemicals to which they are exposed and appropriate measures required to minimize or avoid their exposure.

All contractors working on the BCCC campus will provide the Coordinator a copy of contractor's and subcontractor's Hazard Communication Program for review for adequacy before any work is commenced by the contractor and any subcontractors.

J. Employees Requiring HAZCOM Training

The following classification of employees require HAZCOM training:

1. Maintenance Shop
2. Equipment Coordinator
3. Campus Operations Administrative Assistant
4. Machine Shop and Welding
5. Print Shop
6. Automotive Repair
7. Heavy Construction Equipment Repair
8. Cosmetology
9. Nursing & Medical Laboratory
10. Sciences and Chemistry
11. Early College High School Science and Chemistry Instructors
12. Agribusiness Instructors

K. Revision History

Date	REV #	Changes
7/8/2015	3	Approved by Senior Staff
6/1/2015	2	Added GHS
November 2003	1	Various
February 1997	0	New Issue

L. Glossary of Terms, Abbreviations, and Acronyms

1. **ACGIH:** American Conference of Governmental Industrial Hygienists.
2. **Acute Effect:** A health effect that occurs soon after a brief exposure to the offending agent.
3. **BCCC:** Beaufort County Community College
4. **Carcinogen:** A chemical that is capable of causing cancer. Under the HCS, a carcinogen is any chemical that has been found to be a carcinogen or potential carcinogen by the International Agency for Research on Cancer, is listed as a carcinogen or potential carcinogen in the *Annual Report on Carcinogens* published by the National Toxicology Program, or is regulated by OSHA as a carcinogen.
5. **Chemical Hygiene Plan:** The BCCC chemical hygiene plan, as required by the OSHA Laboratory Standard. Found as a separate Plan on BCCC website under Handbooks & Manuals.
6. **Chronic Effect:** A health effect that occurs over a long period of time as a result of continued or periodic exposure to the offending agent.

- 7. Combustible Liquid:** Any liquid having a flash point at or above 100 degrees F (37.8 degrees C), but below 200 degrees F (93.3 degrees C).
- 8. Compressed Gas:**
- I.* a gas or mixture of gases having, in a container, an absolute pressure exceeding 40 psi at 70 degrees F (21 degrees C); or
 - II.* a gas or mixture of gases having, in a container, an absolute pressure exceeding 104 psi at 130 degrees F (54.4 degrees C) regardless of the pressure at 70 degrees F; or
 - III.* a liquid having a vapor pressure exceeding 40 psi at 100 degrees F (37.8 degrees C) as determined by ASTM D-323-72.
- 9. Corrosive:** A chemical that causes visible destruction of, or irreversible alterations in, living tissue by chemical action at the site of contact.
- 10. Employee:** An individual receiving a paycheck from BCCC.
- 11. EPA:** U.S. Environmental Protection Agency.
- 12. Explosive:** A chemical that causes a sudden, almost instantaneous release of pressure, gas, and heat when subjected to sudden shock, pressure, or high temperature.
- 13. Flammable:** A chemical that catches on fire easily and burns readily.
- 14. GHS – Globally Harmonized System**
- 15. Globally Harmonized System (GHS):** International labeling system
- 16. HCS – The OSHA Hazard Communication Standard, 29 CFR 1910.1200.**
- 17. Hazardous Chemical:** Defined by OSHA as any chemical that is a health hazard or a physical hazard.
- 18. Hazard Warning:** Any words, pictures, symbols, or combination thereof appearing on a label that convey the hazards of the chemical(s) in the container.
- 19. Health Hazard:** A chemical for which there is statistically significant evidence based on at least one study conducted in accordance with established scientific principles that acute or chronic health effects may occur in exposed employees. Chemicals covered by this definition include carcinogens, toxic or highly toxic agents, reproductive toxins, irritants, corrosives, sensitizers, hepatotoxins, nephrotoxins, neurotoxins, that which act on the hematopoietic system, and agents that damage the lungs, skin, eyes, or mucous membranes.

- 20. Hematopoietic System:** The body's blood system, including the production and circulation of blood and the blood itself.
- 21. Hepatotoxins:** Chemicals that cause liver damage.
- 22. HMIS:** Hazardous Material Information System
- 23. Importer:** The first business with employees working with the Customs Territory of the United States that receives hazardous chemicals produced in other countries for the purpose of supplying them to distributors or employers within the United States.
- 24. Irritant:** A chemical that is not corrosive but causes a reversible inflammatory effect on living tissue by chemical action at the site of contact.
- 25. Label:** Any written, printed, or graphic material displayed on or affixed to containers of hazardous chemicals.
- 26. Mixture:** A heterogeneous association of substances where the various individual substances retain their identities and can usually be separated by mechanical means. Includes solutions or compounds but does not include alloys or amalgams.
- 27. NFPA:** National Fire Protection Administration
- 28. NIOSH:** National Institute of Occupational Safety & Health
- 29. Nephrotoxins:** Chemicals that cause kidney damage.
- 30. Neurotoxins:** Chemicals that produce their primary toxic effects on the nervous system.
- 31. Organic peroxide:** An organic compound that contains the bivalent -O-O- structure and may be considered to be a structural derivative of hydrogen peroxide where one or both of the hydrogen atoms has been replaced by an organic radical.
- 32. OSHA:** Occupational Safety and Health Administration, US Department of Labor.
- 33. Oxidizer:** A chemical other than a blasting agent or explosive that initiates or promotes combustion in other materials, thereby causing fire either of itself or through the release of oxygen or other gases.
- 34. PEL:** Permissible Exposure Limit
- 35. Permissible Exposure Limit (PEL):** An exposure limit that is published and enforced by OSHA as a legal standard.

- 36. Physical Hazard:** A chemical for which there is scientifically valid evidence that it is a combustible liquid, a compressed gas, explosive, flammable, an organic peroxide, an oxidizer, pyrophoric, unstable (reactive), or water-reactive.
- 37. Pyrophoric:** A chemical that will ignite spontaneously in air at a temperature of 130 degrees F (54.4 degrees C) or below.
- 38. Reproductive Toxins:** Chemicals that affect the reproductive capabilities including chromosomal damage (mutations) or effects on fetuses (teratogenesis).
- 39. ISIS Safety Profile:** A laboratory-specific chemical hygiene plan required by the OSHA Laboratory Standard for research labs, teaching labs, and common facilities (those shared by more than one researcher).
- 40. SDS:** Safety Data Sheet.
- 41. Safety Data Sheet (SDS):** Written or printed material concerning a hazardous chemical that includes information on the chemical's identity; physical and chemical characteristics; physical and health hazards; primary routes of entry; exposure limits; whether the chemical is a carcinogen; precautions for safe handling and use; control measures; emergency and first aid procedures; the date of preparation of the SDS or the last change to it; and the name, address, and telephone number of the manufacturer, importer, or employer distributing the SDS.
- 42. SARA Title III:** Title III of the Superfund Amendments and Reauthorization Act, it is also known as the Emergency Planning and Community Right-To-Know Act (EPCRA).
- 43. Sensitizer:** A chemical that causes a substantial proportion of exposed people or animals to develop an allergic reaction in normal tissue after repeated exposure to the chemical.
- 44. Threshold Limit Value (TLV):** A time-weighted average concentration under which most people can work consistently for eight hours a day, day after day, with no harmful effects. The values are published in a table annually by the American Conference of Governmental Industrial Hygienists.
- 45. Toxic:** Causing acute or chronic injury to the human body or suspected of being able to cause disease or injury under some conditions. The HCS defines "toxic" and "highly toxic" specifically by the chemical's median lethal dose and median lethal concentration for laboratory animals.
- 46. Unstable (reactive):** A chemical that in the pure state, or as produced or transported, will vigorously polymerize, decompose, condense, or will become self-reactive under conditions of shocks, pressure, or temperature.

47. Water-reactive: A chemical that reacts with water to release a gas that either is flammable or presents a health hazard.

48. Work area: A room or defined space in a workplace where hazardous chemicals are produced or used and where employees are present.

49. Workplace: An establishment, job site, or project at one geographical location containing one or more work areas.

M. Hazard Communication Training Documentation Record

Name: _____ Date: _____

Division: _____ Building & Room # _____

On the above date, I have received Hazard Communication Training on the following subjects:

- Type and location of hazardous chemicals used in my division or department
- Methods of detecting the presence or release of hazardous chemicals
- Personal protective equipment (PPE) and methods of protecting against chemical exposure
- An explanation of a Safety Data Sheet (SDS)
- The OSHA Hazard Communication Standard 29 CFR 1910.1200
- Locations of chemical Safety Data Sheets
- Globally Harmonized System (GHS) explanation and labeling
- The written Hazard Communication program, including:
 - The Chemical Inventory List,
 - Procedures for chemical labeling,
 - Handling of routine and non-routine tasks, and
 - Contractor requirements concerning hazardous chemicals.
 - Potential chemical health hazards, i.e., dermatitis, allergic reaction, etc.

Signature: _____

Printed Name: _____

Supervisor's Signature: _____

Supervisor's Printed Name: _____

M.

Beaufort County Community College

5337 Hwy. 264 East

Washington, NC 27889

Request for a Chemical Safety Data Sheet

Chemical Supplier's Name:

Address:

City, State, & Zip Code:

To Whom It May Concern:

In accordance with the Federal and North Carolina Occupational Safety and Health Administration (OSHA) Hazard Communication Standard (29 CFR 1910.1200, we are requesting that you provide a Safety Data Sheet (SDS) for the following chemical(s) that we are purchasing from your firm:

List of chemicals:

This request has been documented per OSHA standards and your response is required within 30 days of receipt by you.

Please address your response to:

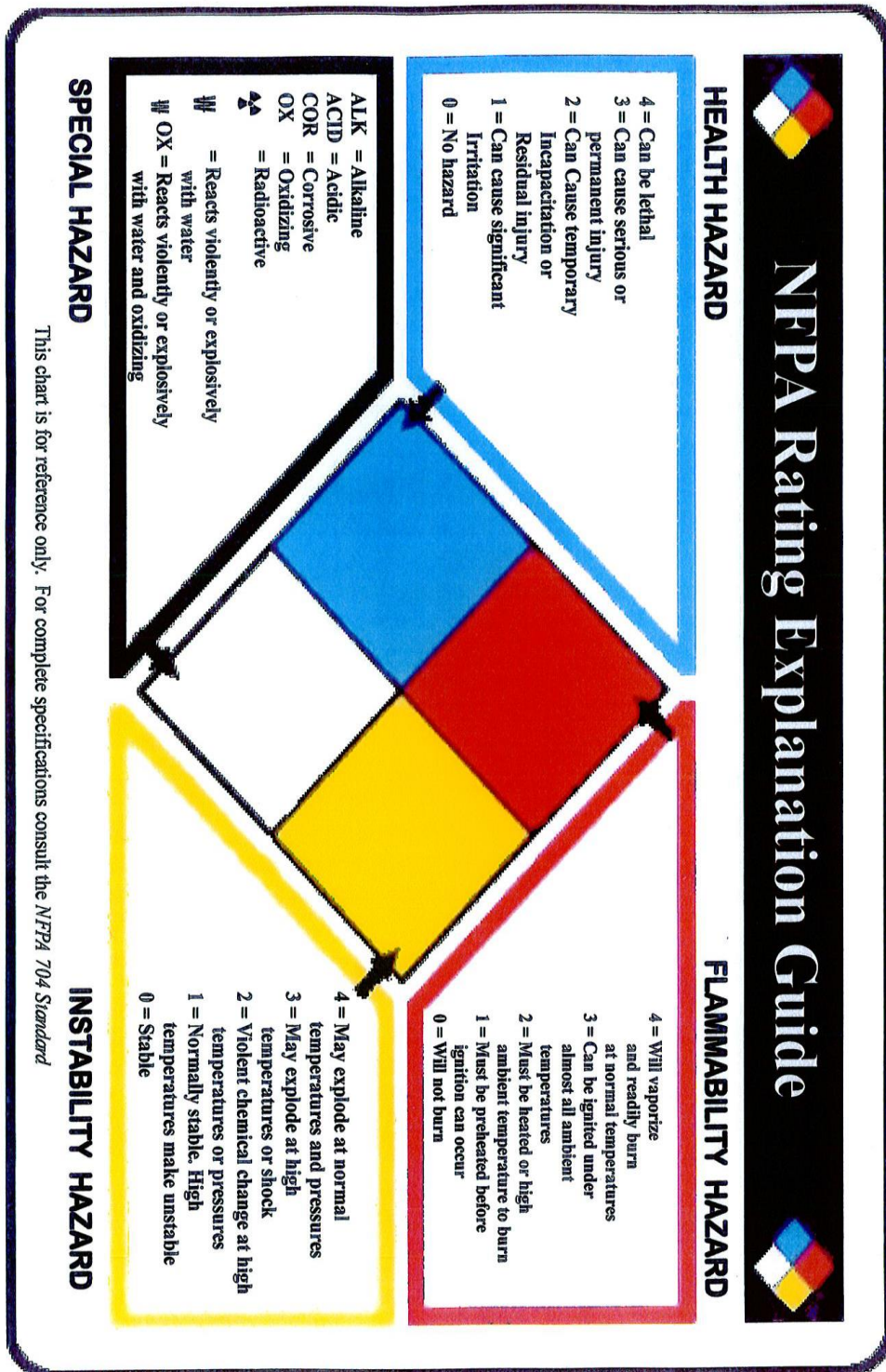
BCCC, 5337 Hwy. 264 East, Washington, NC 27889

Attn: Health & Safety Coordinator











Your assistance is appreciated.

Sincerely,

N. NFPA Rating Explanation Guide-National Fire Protection Agency



O. GHS Pictograms-Globally Harmonized System-international labeling

GHS - Hazard Pictograms and correlated exemplary Hazard Classes				
Physical Hazards				
				
Explosives	Flammable Liquids	Oxidizing Liquids	Compressed Gases	Corrosive to Metals
Health Hazards				
				
Acute Toxicity	Skin Corrosion	Skin Irritation	CMR, STOT Aspiration Hazard	Hazardous to the Aquatic Environment
1)carcinogenic, germ cell mutagenic, toxic to reproduction / 2) specific target organ toxicity				