中 國 醫 藥 大 學

China Medical University

實驗室職業安全衛生工作守則

Code of Practice for Occupational Safety and Health in Laboratory Operation

中華民國108年11月修正

Amended in November of 2019

China Medical University
Code of Practice for Occupational Safety and Health in Laboratory Operation

Chapter One
General Provisions

1. This code of practice is enacted to prevent occupational injuries and diseases, to maintenance occupational safety and health, and to ensure safe laboratory operation.
2. This code of practice is enacted in accordance with Article 34 of the Occupational Safety and Health Act and Articles 41, 42, and 43 of Enforcement Rules of the Occupation Safety and Health Act.
3. All rules and matters concerning laboratory operation stipulated in this code of practice are to be specifically abided by all laboratory workers and personnel.

Chapter Two
Organization of Occupational Safety and Health Management and Responsibility of Personnel in Each Level of Organization

1. China Medical University (the University) sets up the following occupational safety and health organizations in accordance with Article 23 of the Occupational Safety and Health Act:
   (1) Environmental Safety and Health Committee
   (2) Environmental Safety Office
2. The University sets up the following occupational safety and health personnel in accordance with Article 23 of the Occupational Safety

and Health Act:

(1) One Director of Environmental Safety Office

(2) Occupational safety and health personnel

3. The supervisors have the responsibility of preventing accidents and injuries.
4. The supervisors should be familiar with safety codes and work safety practices applied in his/her affiliated unit(s).
5. The supervisors should teach new employees and subordinates correct methods to work and operate.
6. The supervisors should constantly and consistently maintain safe operation of machinery/equipment under his/her jurisdiction. When abnormality occurs and becomes a risk to the safety of personnel or equipment, the supervisors are responsible to resolve the abnormality. If it is not possible to resolve, the supervisors should report to superiors immediately.
7. The supervisors have the responsibility of overseeing housekeeping and cleaning of the work area in his/her jurisdiction.
8. Without approval from supervisor in advance, no one is allowed to perform works of repair or adjustment outside his/her working area.
9. All colleagues should closely cooperate and remain in contact with each other, and work together to prevent accidents and injuries.
10. Safety and health personnel should be familiar with safety and health codes of practice and work safety practices, and apply these codes and practices in daily supervision.
11. Safety and health personnel should explain in detail to existing and new employees the safety and health codes of practice, and correct work practices and operations on the job.
12. Safety and health personnel should supervise personnel working in laboratory to use all personal protective equipment as needed and prescribed in regulations. When necessary, use of personal protective equipment should be included in safety and health code of

practice. Safety and health personnel should also implement the following tasks:

(1) Provide to the President consultation relevant to environment protection, safety and health issues.
(2) Assist in management and processing of tasks in the wastewater treatment facilities.
(3) Enforce and reinforce management of toxic materials in laboratory and testing facilities in the University.
(4) Supervise and assess tasks concerning laboratory safety and health in all Departments of the University.
(5) Establish for the University codes of practice relevant to environmental protection and to safety and health.
(6) Determine and establish plans of occupational injury and disease prevention for the University and provide guidance to Departments and units in the University for implementing aforementioned plans.
(7) Instruct and supervise relevant personnel to implement patrol, periodic inspection, focused inspection, and workplace monitoring.
(8) Schedule labor health examination and implement health management.
(9) Supervise and process investigation of occupational injury and disease, and conduct statistical analysis on occupational injury and disease and process as required by law.
(10) Other duties to implement as required by law.

Chapter 3
Equipment Maintenance and Inspection

Section 1: Air Compressor

1. Air compressor is to be operated by dedicated personnel assigned by the supervisor.
2. Before an air compressor is turned on, every parts of equipment relevant to compressor operation should be examined, for examples, pressure gauge, safety valve, pressure adjustment valve, and backflow prevention valve. Also to be examined includes the load adjustment device of the pressure distribution valve for verification of adjustment necessity. The water should be released from air slot. All components should be confirmed to function normally before the compressor may be activated.
3. Before and after operation, remember to refuel each part, and pay special attention to function of the automatically adjusted oiler and make sure it is in good condition.
4. Pay attention to refueling pressure gauge pointer of the self-flow oiler and perform adjustment in a timely manner. If it is a low-pressure air compressor, make sure the amount of oil dripping from the oil pot is appropriate.
5. Lubricating oil used in compressor should be made of highest-grade refined mineral oil that do not ignite from compression of hot air (the ignition point being higher than the spit temperature).
6. Scale of pressure gauge should be 1.5 to 2 folds of the pressure of compressor at work and has a reliable pointer.
7. Pay attention to pressure gauge readings when turning on air compressor.
8. Safety valve should be adjusted to a pressure slightly higher than the frequently used normal pressure.
9. Pressure gauge and safety valve should be examined frequently by personnel assigned by the supervisor to ensure their normal functions.
10. In operation, pay attention to the position of pressure gauge pointer to make sure the pressure is not too high. Appropriate adjustment should be made if the acceptable operating pressure is exceeded.

11. In operation, if any abnormality is found in the operation of machinery (for examples, pressure, temperature, sound, vibration, and etc), stop the operation immediately for emergency treatment and also make appropriate adjustment or replacement.
12. Do not use gasoline or kerosene when cleaning the interior of cylinder and the inside of air valve.
13. The air reservoir of air compressor (commonly known as air storage tank) must be equipped with a barometer, safety valve, and drain valve of appropriate size.
14. Pressure gauge and safety valve should be inspected as qualified before they are installed and used on an air compressor.
15. The engine and motor of air compressor, if driven by a belt, should be equipped with appropriate casing or cover for protection.
16. Before starting an air compressor, the operator should first inspect around the air compressor. Remove all objects near the fan belt and rotating parts to prevent unexpected falling of components causing accidents.
17. Do not use hands to detect temperature of the rotating parts when air compressor is in operation.
18. Do not use gasoline or highly volatile oil to clean air filter, as molecules of these agents when sucked into air reservoir may concentrate and cause explosion. Use warm cleaning agents (detergents) instead.
19. The oil basin located at the lower end of air filter in air compressor should use good-quality, all-new engine oil. Do not add used engine oil.
20. The amount of engine oil in the crankcase of air compressor is strictly forbidden to exceed the upper limit of oil dipstick for ensuring safety (corrosion of the valve or anti-leaking ring of the compressor will allow entrance of engine oil with the air into the air reservoir and risk explosion).

21. Everyday, before the air compressor is operated, the amount of engine oil in the crankcase should be measured once. At the same time, pay special attention to displacement, misplacement, or misfit of the outer sleeve of oil dipstick. These abnormalities may result in errors in oil-level readings and subsequently contribute to occurrence of accidents.
22. Do not blow the compressed air towards flammable fuel or clothing and cotton yarn stained with oil to prevent generation of sparks from electric static and risk of fire.
23. When the connector of the compressed air hose gets loose, shut down the release valve of the air storage tank before connecting the hose. Do not attempt to capture the moving broken hose so to prevent hand injuries from being hit by the iron connector.
24. Do not blow compressed air towards human body. It is not appropriate to blow off dust on people's head, hands, shoes and clothing using compressed air, as this action risks serious injury from being hit by iron dusts, particles, and etc. brought out from compressed air.
25. The pressure release upper limit of the safety valve is the maximum allowable working pressure plus 5%.
26. The function of each safety valve on the air reservoir and cooling box should be inspected at least once a day.
27. During the work, inspect the fan belt to exclude slippery condition so that the compressed air will not accumulate heat.
28. When repairing air compressor, all compressed air in air reservoir should be emptied so as to prevent injuries from sudden air release to people.
29. When attempting emergency repair, first cut off the power or turn off the engine, at the same time empty the compressed air in air storage tank before repair.
30. Do not repair parts of machine when it's operating. After finishing the repair, re-cover the machine with protective casing/shield.

31. When the work ends every day or the compressed air reservoir has not been used for a while, the residual compressed air in air reservoir should be released.
32. Every day after work, the water accumulated at the bottom of air reservoir should be released.

Section 2: Centrifugal Machinery

1. When taking out the contents from centrifugal machine, stop the machine operation before reaching for the contents.
2. Pay attention to the revolving speed when using centrifugal machine. Do not allow it to exceed the maximum operating speed of the machine.

Section 3: Drying Equipment and Auxiliary Devices

1. Before operation, inspect inside and outside of the drying equipment for any damage, deformation or corrosion, including those of the coverage external to the equipment.
2. Before using the drying equipment, any gas, steam, dusts or related matters accumulated inside the equipment due to previous drying should be removed to maintain normal temperature during current drying operation.
3. Inspect any abnormality of openings of the equipment such as peepholes, access holes, and etc.
4. Inspect any abnormality of devices for internal temperature measurement and adjustment.
5. Inspect any abnormality of internal electrical and mechanical devices and of wiring inside the equipment.
6. Do not use the equipment for heating or drying organic peroxides.
7. The objects to dry should be placed tidily in the equipment and positioned securely to prevent dropping, falling, and toppling of the

objects.

8. The objects after heating and drying need to be cooled down before being removed for storage.
9. During the operation of the drying equipment, do not open the cover or door of the equipment.
10. When the drying equipment is in operation, do not place items that are prone to fire in the neighboring area.
11. During the operation of the drying equipment, pay attention to the drying temperature and time and check for any abnormality.
12. After the drying operation is completed, inspect and make sure there are no items in the drying equipment.
13. After the drying operation is completed, turn off the power of the drying equipment (or other heating sources) and confirm the shut-down.
14. The drying equipment and it auxiliary devices should be inspected annually in accordance with the following requirements:
    (1) Inspect any damage, deformation or corrosion on the interior, exterior and external coverage of the equipment.
    (2) Inspect any abnormality of devices for exhausting gas, vapor or dusts generated from drying of hazardous materials in the equipment.
    (3) Inspect any abnormality of devices for ventilation in the combustion or ignition chamber when liquid fuel or flammable liquid is used as heating sources for the drying equipment.
    (4) Inspect any abnormality in openings of the equipment such as peepholes, access holes, venting holes, and etc.
    (5) Inspect any abnormality of devices of internal temperature measurement and adjustment.
    (6) Inspect any abnormality of internal electrical and mechanical devices and of wiring installed inside the equipment.

Section 4: Operation of Organic Solvent

1. Personnel who are unauthorized to work with organic solvent are not to access organic solvent-operating facility without permission.
2. Empty containers used for organic solvent storage should be enclosed tightly with lids or placed outdoors; wastes such as rags contaminated by organic solvent should be placed in tightly enclosed containers with lids. Do not arbitrarily discard.
3. Inspect ventilation equipment in the workplace and ensure that the equipment is in good condition before use of organic solvent.
4. Follow standard operating procedures stipulated in standardized operating methods when using and disposing of organic solvent.
5. Close containers for organic solvent tightly with lids anytime whether organic solvent is in use or not.
6. Proper gloves, safety goggles for eye protection, safety aprons and related personal protection equipment should be worn when working with organic solvent to avoid direct skin contact.
7. When working with organic solvent, stand in a well-ventilated upwind location to avoid inhaling vapor of organic solvent.
8. Organic solvent and the amount allowed for temporary storage in organic solvent-operating facility should not exceed what is needed for the work of the day.
9. Cleanse hands thoroughly before leaving the organic solvent-operating facility.
10. If feeling unwell when working with organic solvent, stop the operation immediately and report to superiors.

Section 5: Operation of Specified Chemical Substance

1. Personnel who are unauthorized to work with specified chemical substance are not to access facility of specified chemical substance operation without permission.

2. Empty containers used for specified chemical substance storage should be enclosed tightly with lids or placed outdoors; wastes such as rags contaminated with specified chemical substance should be placed in tightly enclosed containers with lids. Do not arbitrarily discard.
3. Inspect ventilation equipment in the workplace and ensure that the equipment is in good condition before use of specified chemical substance.
4. Follow standard operating procedures stipulated in standardized operating methods when using and disposing of specified chemical substance.
5. Close containers for specified chemical substance tightly with lids anytime whether specified chemical substance is in use or not.
6. Proper gloves, safety goggles for eye protection, safety aprons and related personal protection equipment should be worn when working with specified chemical substance to avoid direct skin contact.
7. When working with specified chemical substance, stand in a well-ventilated upwind location to avoid inhaling specified chemical substance or its vapor.
8. Specified chemical substance and its quantity allowed for temporary storage in facility of specified chemical substance operation should not exceed what is needed for the work of the day.
9. Cleanse thoroughly the skin and clothes contaminated with specified chemical substance before leaving the facility of specified chemical substance operation.
10. If feeling unwell when working with specified chemical substance, stop the operation immediately and report to superiors.
11. When leakage of specified chemical substance happens, use proper protection and absorb the leak with adsorbents, and then dispose of the processed specified chemical substance in accordance with rules governing hazardous waste disposal.

12. Do not mix waste liquids when the mixing may result in reactions generating hydrogen cyanide or hydrogen sulfite. For example, placing alkaline waste liquids such as potassium cyanide or sodium sulfite and strong acid waste liquids such as sulfuric acid and nitric acid together in the same waste water treatment system may result in such reaction.

Chapter 4
Occupational Safety and Health Standards

Section 1: Code of Practice for General Safety and Health

1. Comply with the safety and health precautions stipulated by the Department(s) wherein the work is conducted.
2. As required by the University receive all safety and health education and training relevant to the work.
3. As required by the University receive physical and health examinations.
4. Smoking, alcohol drinking, chewing beetle nuts, chewing gums, and eating are strictly prohibited in the laboratory.
5. Do not place any items near the safety gates, passage intersections, stairways, entrances and exits in the workplace.
6. Familiarize with how to use fire extinguishers and other fire-fighting equipments and the locations of these equipments.
7. Understand the routes of escape and evacuation in every work unit.
8. In the event of an accident such as a fire, do not use elevator to escape.
9. Do not pile up items excessively so that falling of objects and hurting people can be avoided.
10. Make sure to turn off unused electrical appliances, gas switches and faucets when leaving the workplace.

Section 2: Code of Practice for Safety and Health in Operation of Fire Equipment

1. Fire extinguishers should be periodically maintained/inspected, changed for the fire-fighting ingredients, and signed/dated for the maintenance. Every employee should be familiarized with and be proficient in the use of various kinds of fire-fighting equipments.
2. Mechanical and electrical equipments should be thoroughly inspected and properly maintained to prevent from risk of fire due to overheating and sparks/other fiery causes.
3. Flammable objects such as oily rags, paper and etc. should be placed in an iron bucket and covered with a lid.
4. Flammable, explosive and hazardous objects should be separately stored.
5. Do not pile up objects around fire-fighting equipments such as fire extinguishers and etc., which should always be maintained in good working condition.
6. Every employee should comply with the warning signs of no smoking/fire hazards in the “no smoking” areas.
7. Safety gates and safety ladders should be kept clear of obstruction/blocking and no items should be allowed in the passages.

Section 3: Code of Practice for Safety and Health in Operation of Electrical Equipment

1. When a fuse is burn, do not switch to other fuses that are inappropriate to use, or attempt to replace with electric wires or metals.
2. When the power of electrical equipment is turned off during repair, an noticeable signboard must be placed on the cut-off switch. Except the repairman, no one should take the sign down so that the risk of injury or death can be reduced.

3. Do not connect too many electrical appliances to the same circuitry so that system overloading and fire risk can be prevented.
4. Inspect electrical equipment frequently and conduct repair as necessary. When serious electrical failure, electrical fire and etc. occur, cut off the power and contact local electrical company immediately.
5. Firmly attach connectors/plugs between wires, straight lines, branch joints and joints between wires and appliances.
6. Cut off the power of equipment before removing or connecting fuses.
7. Do not place objects irrelevant to circuitry or equipment in the proximity of the circuits in the power room, transformer room or power-receiving room.
8. Do not hang or place any objects irrelevant to circuitry near electrical wires or electrical appliances.
9. Do not use industry-grade electrical appliances of unknown or unclear specifications.
10. Only licensed electric technicians and experienced electrical workers can perform installation and maintenance of electrical equipment (including repair, fuse change and etc.).
11. Non-employees are not allowed to enter the power room, transformer room or power-receiving room.
12. Do not carry on shoulders objects that are too long (such as bamboo ladders, iron pipes and etc.) when passing pressurized equipment or the space in-between.
13. When shutting down the power, it should be a complete shutdown. The switch or switch board should be locked if there is a locking device after the operation of equipment.
14. Make sure to pull on the body of the plug when unplugging the electric equipment. Don’t pull the wire.
15. The action of power cut-off should be swift and exact. If there are sparks developed, find the cause(s) and remediate before the

equipment is operated again.

16. Do not operate the power switch with wet hands or wet sticks.
17. Do not operate any electrical equipment unless you are authorized by the supervisor.
18. Non-conductive fire-extinguishing equipment should be used if there is a fire with the electrical equipment or circuitry.
19. Electrical switch of the machine should be shut down immediately when a power shortage occurs.
20. Wire circuit should be replaced if the wire sheathing (cover) is cracked to prevent hazardous conditions from happening.
21. Report any abnormality in operation of electrical machinery immediately to the superior. Turn off the power first if there is insufficient time to report. Do not flee in panic, doing so may deteriorate the hazard control.
22. Grounding wires of all electrical equipment casing should remain intact and should not be torn down arbitrarily.
23. Maintenance of all electrical equipment and wire circuit should strictly abide by electrical safety regulations and procedures.

Section 4: Code of Practice for Safety and Health in Operation of High-Pressure Gas Containers

1. High-pressure gas containers should be fixated when in use.
2. Specific trolleys should be used as accessible when high-pressure gas containers are transferred; the containers should be kept stable and in standing position during the transport.
3. Proper warning signs should be placed in storage places; smoking and fire are not allowed in the areas.
4. Do not place smoke-prone, fire-prone, flammable and pyrophoric objects in two meters around the storage areas.
5. Cylinders containing flammable gas, toxic gas and oxygen should be

stored separately.

Section 5: Code of Practice for Safety and Health in Operation of Boilers

1. Operation personnel should monitor status of boiler operation such as the pressure, water level and combustion conditions to make sure there is no abnormality in the safety valve, pressure gauge and other safety equipment.
2. Avoid sudden load change.
3. Maintain the steam pressure below the maximum working pressure.
4. Ensure the safety valve function normally.
5. Inspect the function of water level measuring device more than once every day.
6. Conduct proper flushing of boiler water to ensure its quality.
7. Maintain water supply device function normally.
8. Inspect and adjust the low-water-level combustion interrupter device, flame detection device, and other automatic control device to ensure their normal function.
9. Proper measures should be taken immediately if any abnormality is found.

Section 6: Code of Practice for Safety and Health in Operation of Pressurized Containers (Sterilization Pots including Autoclaves)

1. Operation personnel should monitor status of operation such as the operating temperature and pressure and make sure there is no abnormality in the safety valve, pressure gauge and other safety device.
2. Avoid sudden load change.
3. Maintain the steam pressure below the maximum working pressure.

4. Ensure the safety valve function normally.
5. Inspect and adjust automatic control device to ensure they function normally.
6. Ensure the cooling water device function normally.
7. Proper measures of safety cautions should be taken immediately if any abnormality is observed.

Section 7: Code of Practice for Safety and Health in Operation of Centrifugal Machinery

1. Centrifugal machinery should be equipped with covering and interlocking device.
2. Stop machinery operation before opening machine door when attempting to take out items placed in the centrifugal machinery.
3. Centrifugal machinery is not to be operated at a speed exceeding the maximum rotation number specified for the machinery.
4. Using manual control operation mode during operation of centrifugal machinery without authorization of the supervisor is prohibited.

Section 8: Code of Practice for Safety and Health in Operation of Organic Solvents and Specified Chemical Substances

1. The containers of organic solvents and specified chemical substances should be tightly closed with lids anytime whether they are in use or not.
2. Only organic solvents and specified chemical substances needed for work may be stored in the operating workplace on the day of work.
3. When working with organic solvent, stand in a well-ventilated upwind position to avoid inhaling vapor developing from organic solvent(s) and specified chemical substance(s).
4. Avoid direct skin contact with chemical.
5. During operation involving organic solvents and specified substances,

local exhaust ventilation should be activated, and proper respirators, protective clothing, protective gloves, protective creams and etc. should be used.

6. Smoking or eating in the operating workplace is prohibited.

Section 9: Code of Practice for Safety in Material Stacking

1. Materials should be properly and safely stacked; the stack should be limited to a height that is safe for storage and to avoid moving difficulty/object falling.
2. Do no retrieve a stacked material from the bottom of the pile.
3. Wear protective gloves when handling rough materials or those with coarse surface.
4. Remove any protruding iron sheets, nails and etc. before moving and opening boxes.
5. Act in unison or listen to the supervisor’s commands when two or more people are working together in moving materials.
6. Other precautions on material stacking:
   (1) Do not exceed the maximum safe load of the stacking area.
   (2) Do not interfere with lighting.
   (3) Do not interfere with operation of machinery or equipment.
   (4) Hazardous materials such as flammables and explosives should be stored separately in individual, isolated areas with warning signs around the perimeter; special attention should be paid to risk of fire and explosion.
   (5) Balance the weight when storing long and heavy materials/equipment.
   (6) Workers moving materials should not wear floor-sweeping long pants or oversized shoes/boots to avoid tripping.
   (7) When lifting a heavy object alone, the individual should first grab the object in a half-squat position, and then stand up with both legs while carrying the heavy material. Do not bend over

when grabbing and lifting the heavy material so to avoid waist and muscle sprain and strain. When moving while lifting a heavy object, walk straight and avoid making turns or changing directions.

(8) Do not toss materials in delivery/transfer.

(9) When moving materials in the proximity of electrical wires and electrical equipment, special attention should be taken, especially in not touching the power supply circuits.

(10) When storing long materials, do not allow them stick out onto the sidewalk.

(11) Do not use damaged containers or weak chains, steel cables and twines.

(12) In a square area of 16 m by 16 m wherein flammable materials are stored, smoking and fire as well as works prone to producing sparks are strictly prohibited; warning signs of no smoking or fire are to be placed around this area.

(13) Do not block traffic, entrance or exit.

(14) Do not raise the thresholds (temperature limits) of automatic sprinklers and fire alarms.

(15) Do not obstruct the emergency use of fire-fighting equipment.

(16) Drums should be stacked into a tower when they are stacked in a traverse position. Both sides of the lowest level of the drum should be stabilized by wedge woods to avoid rolling. For vertical stacking, a layer of board should be placed between drums, and wooden wedges should be used on the left and right sides to stabilize.

(17) When there are risk of collapse or fall with the stacked materials, non-workers/personnel should be prohibited from entering the premises.

Chapter Five

Education and Training

1. The safety and health education and training set forth in Article 2 of Occupational Safety and Health Education and Training Rules are categorized as follows:
   (1) Safety and health education and training specified for supervisors in charge of occupational safety and health;
   (2) Safety and health education and training specified for management personnel in charge of occupational safety and health;
   (3) Safety and health education and training specified for workplace monitoring personnel;
   (4) Safety and health education and training specified for construction safety assessors and process safety assessors;
   (5) Safety and health education and training specified for supervisors in charge of high-pressure gas operations, construction works and harmful operations;
   (6) Safety and health education and training specified for operators of dangerous machinery and equipment;
   (7) Safety and health education and training specified for special operation personnel;
   (8) Safety and health education and training specified for labor health service nursing personnel and labor health service-related personnel;
   (9) Safety and health education and training specified for first aid personnel;
   (10) General safety and health education and training;
   (11) On-the-job safety and health education and training for the preceding 10 Subparagraphs;
   (12) Safety and health education and training specified for other personnel as designated by the competent authority of central

government.

2. In accordance with Article 32 of Occupational Safety and Health Act and Article 16 of Occupational Safety and Health Education and Training Rules, occupational safety and health education and disaster prevention and response training should be held every year:
   (1) Contents of education and training
   - Overview of laws and regulations governing occupational safety and health
   - Overview of occupational safety and health and code of practice for work safety and health
   - Automatic inspection before, during, and after operation
   - Standard operation procedures
   - Emergency and accident responses
   - Fire and first aid and drills
   - Other knowledge related to safety and health of workers in workplace operation

   (2) Training hours
   - Must not be less than three hours for newly hired workers
   - Must not be less than three hours for workers rotated to a new position/workplace
   - Three additional hours for those who are involved in manufacturing, disposal or use of hazardous chemicals
   - Supervisors or business executives of all levels that are new employees or existing employees accepting new appointments should receive six more hours of training before job change and the training should include:
     [1] Safety and health management and implementation
     [2] Automatic inspection
     [3] Work improvement strategies
     [4] Safety operation standards
3. For other positions that can be served only by certified personnel as

required in laws and regulations, the University shall designate personnel to attend the training provided by relevant organizations (including training for operation of organic solvent, specified chemical substances, dusts-generating work, lead-involving work, high pressure gas, pressure vessel, and etc.)

Chapter Six

First Aid and Rescue

1. Before paramedics arrive, the employees who have received first-aid training should immediately deliver proper treatment for the patient to avoid severe consequences.
2. Before the injury is confirmed and relevant details realized, the patient should be laid down to prevent fainting and going into shock.
3. If the injured person’s face turns red, the head should be raised with a pillow; if vomiting, the patient’s head should be turned to one side to prevent from choking.
4. When necessary, use comforter, clothing and materials of insulation to keep warm of the injured to prevent from shock.
5. Call ambulance quickly, or use stretcher to transport the injured to the nearest medical facility, or immediately ask for medical personnel for assistance.
6. The responsibility of first responders is to “save lives” and “prevent deterioration of an injury or condition.” Keep the injured calm and comfortable, and wait for the medical staff to arrive.
7. First responders on the scene should assist the injured to describe cause of the condition so to help medical staff in diagnosis and treatment.
8. First responders must not panic and should have confidence to give the injured or those who suffer from acute illness immediate and temporary care until professional medical staffs arrive on the scene or

doctors provide treatment.

Chapter Seven

Preparation, Maintenance and Use of Protective Equipment

1. Supervisors at all levels should supervise their employees to do the followings for the protective equipment provided to them for use:
   (1) Keep clean of the equipment and disinfect as necessary.
   (2) Inspect the equipment frequently to maintain its functions, and store the equipment properly when they are not in use.
   (3) When the quantity of equipment is insufficient or when damage occurs, report to the supervisors immediately for re-supply.
   (4) Protective equipment should be placed in designated location; do not move them arbitrarily.
   (5) When the employees are in risk of contracting an infectious disease, they should use individually designated protective equipment.
2. When handling corrosive or toxic materials, use gloves, aprons, safety helmets, safety goggles, masks, face shields, and relevant equipment for protection as necessary.

Chapter Eight

Accident Notification and Reporting

1. When an accident happens, inform the supervisor of the unit immediately, and take necessary measures such as first aid and emergency rescue to prevent disaster from further deterioration.
2. The supervisor of the unit should contact safety and health personnel, and the safety and health personnel are responsible for recording the accident and conducting an investigation and analysis of the accident

for its cause(s) for future reference in improvement.

3. The accident report should be submitted by the safety and health personnel to the President. In the event of a major accident, the President should report the event to labor inspection agency within eight hours of occurrence of major accident.
4. Major accidents refer to the following events:
   (1) Accidents involving death;
   (2) Accidents causing injuries to three people or more;
   (3) Accidents causing injuries to one person or more that require hospitalization;
   (4) All other categories of accidents designated and officially announced by the central competent authority.
5. In the event that accidents of one of the types set forth in the preceding article occurs, without the permission of appropriate judicial body or inspection agency, the employers and employees shall not disturb or damage the accident site except for necessary first aid or emergency rescue.

Chapter Nine

Other Provisions

1. Employees are obligated to receive physical examinations, regular health examinations and specific health examinations.
2. Employees of the University shall receive general physical examination as required in the following areas:
   (1) Investigation of past medical history and work experience.
   (2) Self-aware symptoms and physical examination of body systems.
   (3) Inspection of height, weight, vision, color blindness and hearing.
   (4) Chest X-ray (large film) photographic examination.
   (5) Blood pressure measurement.
   (6) Examination of urine protein and urine occult blood.

(7) Examination of hemoglobin and white blood cell count.

(8) Examination of blood sugar, serum alanine transaminase (ALT or alternatively called serum glutamate pyruvate transaminase, SGPT), creatinine, cholesterol and triglycerides.

(9) Other necessary examinations.

Results of the aforementioned physical examinations should be recorded in a statutory form and kept for at least ten years.

3. Employees of this University shall receive general health examinations as stipulated in the preceding article in accordance with the following requirements:

(1) Workers of an age of or over 45 receive regular physical examination periodically every two years.

(2) Workers of an age of 30 or between 30 and 45 receive regular physical examination every three years.

(3) Workers under age of 30 receive regular physical examination every five years.

Results of the aforementioned physical examinations should be recorded in a statutory form and kept for at least ten years.

4. An employee who violates this code of practice may be reported to the governing authority for legal treatment, depending on gravity of violation. In compliance with Article 46 of Occupational Safety and Health Act, a fine of up to $3,000 may be imposed.

Chapter 10

By-laws

This code of practice was formulated in conjunction with labor representatives, and promulgated and implemented after report to Central Occupational Safety and Health Center of Occupational Safety and Health Administration, Ministry of Labor (formerly Central District Labor Inspection Office of the Labor Committee of the Executive Yuan)

for future reference. The same process will be followed when the code is amended or added with new requirements.