

Safety Guidelines for Clinical Practice

GUIDELINES FOR SAFETY IN COMMUNITY SETTINGS

For promotion of safety while in community-focused nursing practice courses, please follow the guidelines listed below:

1. For community health visits:

- a. Wear a uniform or designated dress, student I.D., name tag, and minimal jewelry.
- b. Carry only a sufficient amount of money for the day's needs. Important papers, etc., should be locked in your trunk before leaving home. Pocket change to make a phone call may be useful.
- c. Be in the field only during daylight hours and at those times specifically assigned. Report to the instructor when departing for and returning from your assignment.
- d. Visit only those clients at addresses that have been approved by your instructor.
- e. Leave with the instructor a list of the families or organization and the sequence in which you will visit prior to your departure. This list includes full name, exact address, apartment number, and phone number. If family has a phone, telephone prior to visit to confirm visit.
- f. Phone your instructor for approval prior to any change in sequence or if you find the family is at another address. Under no circumstances, go to any address or apartment which is not on your list without approval from the instructor, at least by telephone.
- g. Check with the instructor for the exact location of your destination and review the exact transportation you will use prior to departure.
- h. Walk briskly with a sense of purpose. Never loiter. Obtain clear directions prior to departure for the visit. Consult a map, the client, police, or post office department. Know exactly where you are going. After departure, if in doubt, ask a storekeeper, police officer, postman, or any official agency representative.
- i. Walk on the curb side of the street, avoid doorways and alleyways.
- j. Use streets that are active and busy and contain residences rather than deserted, dimly lit streets with quiet warehouses and bar areas.
- k. Speak to storekeepers and those neighborhood people you see each week. Identify yourself and the agency you represent. Familiarize yourself with the geography of the neighborhood and the locations of "safe" places.
- l. Notice which shops have phones you could use in an emergency.
- m. Under no circumstances, enter any building when observation or intuition tells you something is not right. Proceed to the nearest phone, and call the agency or the instructor or the police - 911 will put you in direct emergency contact with the police in the town or neighborhood in which you find yourself.
- n. Should anyone demand your property during a robbery, give it to them and proceed to the most active situation at hand (traffic, neighborhood store, health center, police or fire department. Report all frightening experiences to the police, your instructor, and the College of Nursing at (561) 297-3261.
- o. Should you at any time, for any reason, feel unsafe or frightened, call the Police, 911- and request assistance. Also notify your instructor and the College of Nursing at (561) 297-3261.
- p. Should anyone confront you or follow you in an unfriendly manner, seek the assistance of the closest individual on foot or in a motor vehicle. This will attract attention to you. Do not, however, enter any vehicle other than a public bus, licensed cab, or police car.
- q. In the event any unusual incident occurs, proceed into the most active situation available, the police precinct, fire house, neighborhood store, social service or health agency, school, housing project office, or board a bus.
- r. Use a phone in any one of these places to call the agency or, if indicated, 911 the police. Maintain a list of Police Dept. non-emergency numbers or information requests. Identify yourself, the agency you represent, where you are, and the problem.
- s. Student is responsible for adhering to all safety guidelines for external assignments.
- t. Students should make community visits in pairs if possible.

2. When arriving or leaving the clinical agency (including utilizing the parking lot) you should:
 - a. Lock all doors when leaving car. You should not remain in a parked car.
 - b. Know the designated area for parking.
 - c. Park in well lighted designated areas.
 - d. Leave the agency with the group or ask for an escort to your car.

REMEMBER

1. You are never alone.
2. We are a phone call away - 911 or university telephone 297-3261.
3. A police cruiser can reach you in minutes.
4. Your best protection is to:
 - a. Know your neighborhood resources
 - b. Know the neighborhood people.
 - c. Have the neighborhood know you in your professional role

CRITICAL INCIDENTS

It is expected that all graduate students adhere to the policies and procedures of the practice site, including HIPAA regulations. Professional behavior is expected at all times.

Critical incidents include errors and events in clinical settings in which there is potential/actual injury or harm to a client, staff member, or student. In the event of a critical incident in any clinical setting, the student must follow the policies/procedures of the agency as to completion of the proper documents.

In cases where the student has sustained a physical/chemical injury or has been exposed to an infectious agent, the student must follow the procedure of the institution as to the reporting of the incident and follow-up. Students are required to maintain personal health insurance and follow approved guidelines as to follow-up following injury or exposure to potentially harmful infectious/chemical agents. The following sections outline the American Nurses Association's Position Statement on Post-Exposure Programs in the Event of Occupational Exposure to HIV/HBV.

All critical incidents are to be reported to the Assistant Dean of Graduate Studies, College of Nursing by the clinical faculty member within two working days of the event.

BLOODBORNE PATHOGEN EXPOSURE

Policy

Advanced practice nursing students are at a rare risk for exposure to the human immunodeficiency virus (HIV) through needles or other sharp instruments contaminated with blood or through splashes of blood onto the mucous membranes of the eye, nose, or mouth or skin. Universal precautions must be utilized in all appropriate clinical situations.

If it cannot be discerned whether the source patient's blood was HIV infected, beginning postexposure medication is decided on a case-by-case basis. Likelihood of HIV infection in the known or possible patient source is evaluated in addition to the nature of the blood exposure.

Postexposure prophylaxis (PEP) should begin in 1-2 hours. It may not be effective if started longer than 24-36 hours after exposure.

Procedure

1. All students must have current health insurance and should carry with them the phone number to call to receive emergency services that are reimbursed by their insurance.
2. Post-exposure: immediately wash cuts and needle sticks with soap and water. Flush splashes to the nose, mouth, or skin with water. Irrigate eyes with clean water or saline.
3. Report the exposure immediately to your clinical faculty, Graduate Program Office and to the health care agency supervisor and ask to be referred immediately to the agency person responsible for managing exposures (occupational health nurse, infection control specialist, emergency department supervisor). The faculty will assist the student in getting immediate care through a provider for whom they have insurance. The faculty is responsible for seeing that an incident report using the agency's form is completed.
4. There is no time to lose following exposure. You need to be immediately seen by a health care provider. You must have counsel regarding the risks of your exposure and weigh the risks and benefits of treatment. Balancing risks is challenging. It is recommended that HIV post-exposure treatment begin within 1-2 hours.
5. Within 24 hours, excluding the weekend, please file an incident report with the Assistant Dean's Office, (561) 297-3384.
6. You should be tested for HIV antibody as soon as possible after exposure and then at 6 weeks, 12 weeks, and 6 months. You should be assured that your test results will remain confidential. If the patient source of the blood does not have a previous diagnosis of AIDS or HIV, the patient should be told of the health care worker's exposure and an informed consent obtained for taking an HIV antibody test. They do have the right to refuse.
7. If you are taking PEP, you should have your blood drawn for a CBC and hepatic/renal function at baseline and at 2 weeks.
8. You should report any severe flu-like illness that occurs during the 12 week follow-up period--this is the usual time for HIV infection to develop. Likewise, most infected people will seroconvert by 12 weeks.
9. During the first 12 weeks of exposure until your blood test demonstrates that you remain free of HIV infection, you should refrain from sexual intercourse or inform your partner and practice safe (but not risk free!) sex with a latex condom used consistently. In addition, women should not breast-feed during this time.

REFERENCES:

U.S. Dept. of Health & Human Services. (1997). Information for health-care workers-occupational exposure to HIV (Brochure). Rockville, MD: Author.

American Association of colleges of Nursing. (1997). Policy and guidelines for prevention and management of human immunodeficiency virus and hepatitis B virus infection in the nursing education community. *Journal of Professional Nursing* 13(5), 325-328.

CDC National AIDS Hotline 1-800-342-2437

GUIDELINES FOR UNIVERSAL PRECAUTIONS

The concern for occupational exposure to hepatitis B virus (HBV) and human immunodeficiency virus (HIV) among health care workers had led to the development and implementation of "universal precautions" for all hospitalized patients. Universal precautions were designed and recommended by the Centers for Disease Control (CDC) in 1987 and were revised in 1988, based on epidemiologic evidence regarding the transmission of HBV and HIV. Under universal precautions, blood and certain body fluids of all patients are considered potentially infectious for HIV, HBV, and other blood borne pathogens. Physical examinations and a medical history cannot reliably identify all patients infected with HIV or other blood borne pathogens. In the emergency care setting especially, the risk of blood exposure is increased and the infection status of the patient is usually not known. Universal precautions are intended primarily to

prevent parenteral, mucous membrane, and non-intact skin exposures of health care workers to blood borne pathogens; therefore, they apply to blood and to other body fluids containing visible blood. Blood is the single most important source of HIV, HBV, and other bloodborne pathogens in the occupational setting. Universal precautions also apply to the following:

- Tissues
- Semen
- Vaginal secretions
- Cerebrospinal fluid
- Pleural fluid
- Synovial fluid
- Pericardial fluid
- Peritoneal fluid
- Amniotic fluid

Universal precautions do not apply to the following list of substances **unless** they contain visible blood. The risk of transmission of HIV and HBV from these fluids and materials is extremely low or nonexistent:

- Feces
- Nasal secretions
- Sputum
- Sweat
- Tears
- Urine
- Vomitus
- Human breast milk
- Saliva

Gloves need not be worn when feeding patients or wiping saliva from skin; although it is recommended that dentists use special precautions since in their profession contamination of saliva with blood is predictable. Health care workers may want to wear gloves if they work in situations in which exposure to breast milk might be frequent.

1. Immediately and thoroughly wash hands and other skin surfaces that are contaminated with blood, body fluids containing blood, or other body fluids to which universal precautions apply. Wash hands immediately after gloves are removed.
2. Use protective barriers to prevent skin and mucous membrane exposure to blood, body fluids containing blood, and other fluids to which universal precautions apply. The type of protective barrier(s) should be appropriate for the procedure being performed and the type of exposure anticipated.
 - Wear gloves when touching blood or body fluids, mucous membranes, or non-intact skin of all patients.
 - Wear gloves when handling items or surfaces soiled with blood or body fluids.
 - Wear gloves when performing venipuncture and other vascular access programs.
 - Wear gloves for performing phlebotomy if cuts, scratches, or other breaks in the skin are present.
 - Wear gloves in situations in which contamination with blood may occur--for example, when performing phlebotomy on an uncooperative patient.
 - Wear gloves for performing finger or heel sticks on infants and children.
 - Change gloves after contact with each patient.
 - Do not wash or decontaminate disposable gloves for reuse.
 - Wear masks and protective eyewear or face shields during procedures that are likely to generate splashing or droplets of blood or other body fluids to prevent exposure of mucous membranes of the mouth, nose, and eyes.
 - Wear gowns or aprons when you anticipate splashing of blood or other body fluids to which universal precautions apply.

3. Take care to prevent injuries when using, handling, or cleaning needles, scalpels, and other sharp instruments or devices.
 - o Do not recap used needles by hand.
 - o Do not remove used needles from disposable syringes by hand.
 - o Do not bend, break, or otherwise manipulate used needles by hand.
4. Place used disposable syringes and needles, scalpel blades, and other sharp items in puncture-resistant, leak-proof, labeled or color-coded containers for disposal. Locate these containers close to the use area and replace routinely.
5. To minimize exposure during emergency mouth-to-mouth resuscitation, ensure that protective mouthpieces or manual resuscitator bags are available for use in areas in which the need for resuscitation is predictable.
6. Refrain from direct patient care or handling of patient-care equipment if one has exudative lesions or weeping dermatitis.
7. For laboratory specimens, consider all blood and other body fluids from all patients to be infective. Put these specimens in a well-constructed container with a secure lid to prevent leakage during transport. Avoid contaminating the outside of the container and place laboratory requisitions outside of container.

CONSIDERATIONS FOR NURSES

Some other important considerations for nurses are that they should use universal precautions when dialyzing all patients. Pregnant health care workers are at no greater risk of contracting HIV infection than other staff. However, if the pregnant health care worker develops HIV infection during pregnancy, the infant is at risk of HIV infection due to perinatal transmission

Postexposure Protocol

The Centers for Disease Control have put forth the following suggestions for exposure to HIV: If an accidental needlestick injury occurs, or if there is significant contact of a patient's blood with mucous membranes or nonintact skin surfaces, the health care worker should wash the affected area thoroughly. (This includes a splash in the eye or mouth.) The exposure should then be reported to the employee health service or infection control practitioner. If the source (patient) does not have a previous diagnosis of AIDS or a positive HIV antibody test, a clinical and social assessment of the patient's risk factors for AIDS should be undertaken. In the presence of any such factor, the patient should be told of the health care worker's exposure and an informed consent should be obtained for taking an HIV antibody test. The patient and the health care worker should be counseled regarding the implications of positive or negative results. Whether or not the test is obtained from the patient, the health care worker should consider obtaining a test himself or herself. In order to ensure complete confidentiality of test results, it might be preferable for physicians and nurses to be tested at an off-site test center rather than at their own institution. If the initial test is negative, the health care worker should be followed for a "flu like" illness for 12 weeks after the exposure. This has been the usual time for HIV infection to develop after a known exposure. Repeat HIV tests at 1, 3, and 6 months are recommended. Most infected persons are expected to seroconvert within the first 12 weeks after exposure.

The usual protocol for possible concomitant hepatitis B exposure should also be observed. The risk of work-related HIV conversion has been less than 1% in contrast to hepatitis B conversion, which is considerably higher, between 20% and 30%.

There is increasing evidence that HIV antibody conversion may not occur for up to 36 months after injection, at least in homosexual men. Therefore, many infectious patients may have a false negative test result; a negative antibody test does not definitively rule out infectivity.

Engineering and Work Practice Controls

Wherever there is a likelihood of exposure to HIV, HBV, and other bloodborne pathogens, it is strictly prohibited for an employee to eat, drink, smoke, apply cosmetics or lip balm, handle contact lenses, or store food and drink. All contaminated surfaces must be cleaned immediately as soon as feasible. Protective coverings must be replaced if overtly contaminated. Personal protective equipment should be removed immediately upon leaving the work area and placed in an appropriately designated area or container for storage, washing, decontamination, or disposal. All bins, pails, cans, and reusable receptacles must be decontaminated regularly. Sharps must be stored so that employees do not reach by hand into the container. Broken glassware cannot be picked up with the hands. Contaminated laundry has to be handled with a minimum of agitation and moved in labeled or color-coded bags or containers. Wet laundry requires leakproof containers. Fluorescent orange or orange-red warning labels must be affixed to containers of "regulated" waste, refrigerators, and freezers containing infectious materials and containers used to transport them. Labels must include the official **BIOHAZARD** legend.

Infection Control Precautions for Care Of the Patient with Acquired Immunodeficiency Syndrome (AIDS)

1. Patients with AIDS or AIDS-related complex (ARC) are at risk to acquire infection; therefore do not place them in a room with an infected patient.
2. A single room is not required unless the AIDS patient is immunocompromised, has poor hygiene, is incontinent, or has diarrhea.
3. Isolation procedures beyond universal precautions are not warranted for patients with AIDS or ARC unless they have another infection that requires isolation precaution (e.g. tuberculosis, Herpes Simples, or Cryptosporidia).
4. Hand washing before and after patient contact as well as after being soiled with any body secretions or excretions is the most important means of preventing infection among patients and staff.
5. Visitors should be advised not to share razors or toothbrushes with the patient.

EXPOSURE OF NURSING STAFF TO INFECTIOUS DISEASES

Nursing staff are at some risk for iatrogenic infection. Iatrogenic disorders are conditions caused by medical personnel or procedures or through exposure to the environment of a health-care facility. The infections most common in ICU nurses are hepatitis B virus (HBV) and herpes simplex. The most common type of occupational injury for nurses surpassing even sprains and strains, are injuries that occur as a result of being stuck by a needle. ICU nurses will need to be familiar with the following list of communicable diseases to which they may be exposed at work.

Hepatitis B Virus (HBV)

The highest percentage of HBV is found in blood and blood-derived body fluids and is transmitted parenterally, through mucous membranes or nonintact skin, sexually, and perinatally. Hepatitis B poses a serious threat to ICU nurses. The greatest bloodborne risk healthcare workers face is the HBV. The HBV can be transmitted from environmental surfaces (countertops, machines, etc.). These are a major source of HBV infection on certain units, such as hemodialysis units. A single needlestick injury of contaminated blood has as much as a 30% chance of transmitting the disease. Up to 7,400 health-care workers every year acquire HBV infections through occupational exposure. Universal precautions should be taken to protect against HBV. Nurses at high risk should be immunized with one of the HBV vaccines. The three-dose series of injections costs up to \$150. Employers are now required by an Occupational Safety & Health Administration rule to offer free HBV vaccine to every employee who can be reasonably anticipated to have skin, eye, mucous membrane, or parenteral contact with blood or other potentially infectious material.

Herpes Simplex Virus (HSV)

Critical care patients frequently have HSV infections especially if they are immunosuppressed. Nurses are at risk for HSV unless they practice careful hand washing and wear gloves on both hands when handling respiratory tract secretions or placing their fingers in patients' mouths. If the nurse has a break in the skin on a finger or around a cuticle the virus can invade and cause an infection called a herpetic whitlow. This infection causes vesiculopustular lesions at the junction of the nail bed and the skin. Since it is usually too painful to cover the lesions with a glove or dressing, the nurse cannot perform patient care duties. Before returning to work clearance should be given by the employee health service.

Cytomegalovirus (CMV)

A member of the herpes virus family, CMV is found in blood and body fluids and is transmitted by cutaneous or mucous membrane contact with infectious secretions. Hand washing is sufficient for prevention of transmission. Pregnant nurses should avoid contact with patients known to be infected with CMV because it causes obvious infection in newborns. Patients most likely to have CMV infection are those who are immunosuppressed, such as those having organ transplants, AIDS, or cancer.

Chickenpox (Varicella)

Employees who have not had chickenpox may acquire it from contact with a person who has active chickenpox or disseminated varicella zoster (shingles). The patient is also contagious in the last 48 hours of incubation before the typical vesicular rash occurs. If a nurse has had chickenpox as a child, he or she can usually be safely considered immune.

Rubella

Rubella is transmitted through inhalation of infected droplets of respiratory secretions. Nurses at the highest risk for acquiring rubella are those who work with infants and children and who are not immune to the rubella virus. If a pregnant woman contracts rubella during the first trimester of pregnancy, her fetus may develop major organ systems malformations. All nurses should be tested by their employers to determine rubella immunity. Nonpregnant nurses without immunity should be given a rubella vaccination.

Meningitis

Several viral and bacterial agents can cause meningitis, but only one requires hasty identification and follow up of exposed health care workers - *Neisseria meningitidis*. Meningococcal disease is transmitted via inhalation of infected droplets of respiratory secretions. Exposure can occur if a staff member comes from within three feet of a patient without wearing a face mask. Staff members have had high-risk exposure to meningococcal meningitis if they have provided the following care to an infected patient:

- mouth-to-mouth resuscitation
- intubation or suctioning
- Oral or fundoscopic exam
- Assistance during vomiting or when coughing directly at staff member
- Close patient care where the patient breathed directly on staff member

Prophylactic treatment for high-risk exposure is with rifampin, 600 mg orally twice daily for four doses. Staff members who choose not to take rifampin should be alert for signs of meningitis which include: upper respiratory tract infection, nausea, vomiting, fever, headache, malaise, lethargy, confusion, stiff neck, and petechiae.

Pertussis

Exposure to pertussis (whooping cough) may occur through respiratory secretions from face-to-face contact. A nurse who has been exposed will require Erythromycin prophylaxis because past immunization wanes with age and cannot ensure protection.

Tuberculosis (TB)

Tuberculosis infection occurs when aerosolized droplets containing viable organisms are inhaled by a person susceptible to the disease. A nurse may be exposed to TB if there has been face-to-face contact (without a mask) with a patient who has active laryngeal or pulmonary infection caused by *Mycobacterium tuberculosis*. If exposure is suspected, a purified protein derivative (PPD) skin test should be performed. If a change in PPD status has occurred, one year of isoniazid (INH) therapy may be recommended.

Infectious Diarrhea

Acute diarrhea is transmitted via the fecal-oral route. Most infectious diarrhea is caused by viruses and is of short duration. If the diarrhea persists, it may be bacterial (e.g. Salmonella, shigella). In such cases diagnosis will be confirmed by stool cultures.

Acquired Immunodeficiency Syndrome (AIDS)

AIDS is caused by the Human Immunodeficiency virus (HIV). The occupational risk for HIV infection among health care workers is minimal, although it does exist. By far, the most prevalent exposure has been through injury when stuck by a needle. A health-care worker has less than a 1% chance of infection from an HIV-contaminated needle-stick. Legislation has been passed directing the states to adopt new CDC guidelines that call on health-care workers to know their HIV status and to stop doing exposure-prone procedures if they are infected.

Methicillin-Resistant *Staphylococctits aureus* (MRSA)

MRSA and other resistant strains of *aureus* have become one of the most common causes of hospital and community acquired infections. MRSA is resistant to many antibiotics. It is likely that hospital staff carry MRSA from one patient to another on their unwashed hands. Another reservoir for MRSA is the inanimate environment. Everything in the room of a patient infected with MRSA can become infected. Nurses who care for patients infected with MRSA risk becoming carriers of the bacteria. In some hospitals nurses who become colonized with MRSA are assigned to care only for patients with MRSA or are removed from patient care until they are no longer colonized. Treatment of colonized (not infected) carriers include regimens such as: (1) oral antibiotics, (2) topical antibiotic ointments for the anterior nasal passages, and (3) bathing and shampooing with skin disinfectants.