

- (b) Gloves
 - i. Gloves must be worn for touching blood and body fluids, mucous membranes, or non-intact skin of all patients, and for handling items or surfaces soiled with blood or body fluids and vascular access procedures.
 - ii. Gloves must be changed after contact with each patient and hand hygiene must be performed after gloves are removed.
 - iii. Gloves must be changed between tasks and procedures on the same patient if moving from a dirty site to a clean site.
- (c) Masks and protective eyewear or face shields
 - i. Masks and eye protection must be worn during procedures that are likely to generate droplets of blood or other body fluids to prevent exposure of mucous membranes of the mouth, nose, and eyes.
- (d) Impervious gowns
 - i. These gowns must be worn during procedures that are likely to generate splashes of blood or other body fluids.
 - ii. Discard after each patient contact and perform hand hygiene.
 - iii. Do not reuse gowns.
- (e) Sharps safety
 - i. Used syringes, needles, and other such objects are to be placed in designated biohazard containers at the point of use.
 - ii. Never recap, bend, break, or otherwise manipulate any sharps type items.
 - iii. Never force additional sharps into an overflowing disposal box. If container is full, obtain a new container from Environmental Services.
- (f) Patient resuscitation
 - i. Use a mouthpiece, resuscitation bag, or other ventilation device to prevent contact with oral secretions.
- (g) Teaching
 - i. Patients, families, and visitors should be taught about the basic concepts of standard precautions, hand hygiene, and the need for additional categories of precautions as described below (when applicable).

(b) Transmission-Based Precautions

The following categories of precautions must be used when Standard Precautions alone may not interrupt the transmission of pathogens: **Airborne, Droplet, Droplet Plus, Contact, and Contact-D**. See Appendix A for empiric transmission-based precautions for certain syndromes.

(i) Specific requirements for Transmission-Based Precautions:

- (a) **Airborne Precautions** are used to prevent the transmission of infections, such as *M. tuberculosis*, that are transmitted by organisms that can remain suspended in the air for considerable lengths of time and may be dispersed over long distances.

Components of Airborne Precautions include:

- 1) Room: Use a private Airborne Infection Isolation Room (AIIR) (i.e., negative pressure ventilation). The door must be kept closed at all times. If a private AIIR is not available, contact Infection Prevention immediately.
- 2) Notifications: Place Airborne Precautions sign on the door of the room.
- 3) Monitoring of AIIR: If the room is not functioning properly in negative pressure, keep the door closed and notify Facilities Management Department immediately by calling 383-5353. Document negative pressure room daily inspection using [Airborne Isolation Room Daily Monitor checklist](#). (This form may be found by clicking the link or on the Controlled Air Purifying Respirator-CAPR cart)
- 4) Respiratory Protection: All personnel entering the room must wear either a NIOSH- approved N-95 respirator or CAPR. Order CAPR cart through the online Equipment Requests. Those wearing the N-95 respirator for patient contact or care must have a documented fit test on file within the prior 12 months.
- 5) Personal Protective Equipment (PPE): In addition to respiratory protection, wear gowns and gloves only when indicated (e.g., concomitant contact precautions).
- 6) Transport and procedures: Patient should remain in the room except for essential therapeutic or diagnostic procedures. For essential procedures, schedule for the last test or surgery of the day. When out of the room, the patient must wear a surgical mask. Notify receiving departments of required precautions.
- 7) Patient Equipment: Use a disposable thermometer.
- 8) Cleaning: Routine cleaning with staff wearing the proper respiratory protection (NIOSH-approved N-95 or CAPR). At discharge, the door is to remain closed for a minimum of 30 minutes before personnel can enter without proper respiratory protection. Cleaning may be completed within this 30-minute window, providing staff wear appropriate respiratory protection.
- 9) Discontinuing precautions: See Appendix B below and see [Tuberculosis Control Plan](#) for *M. tuberculosis* cases. Infection Prevention may be contacted for questions.
- 10) Visitors: Limit visitors and offer surgical masks to visitors. Hand Hygiene is required when entering and exiting the room. Visitors are required to wear a surgical mask while in the patient's room.

- (b) **Droplet Precautions** are used to prevent diseases, such as seasonal influenza, that are transmitted by contact of the conjunctiva or mucous membranes of the nose and mouth with large-particle droplets that do not remain suspended in the air and travel only short distances (usually less than 3 feet).

Components of Droplet Precautions include:

- 1) Room: Use a private room. Door does not need to remain closed.
- 2) Notifications: Place Droplet Precautions sign on the door of the room immediately.
- 3) Respiratory Protection: Surgical masks should be worn when entering the room.
- 4) Personal Protective Equipment (PPE): In addition to respiratory protection, wear gowns and gloves only when indicated (e.g., concomitant contact precautions).
- 5) Patient Equipment: Use a disposable thermometer.
- 6) Transport and procedures: Patient should remain in the room except for essential therapeutic or diagnostic procedures. For essential procedures, schedule for the last test or surgery of the day. Notify receiving departments of required precautions. The patient must wear a surgical mask while out of room.
- 7) Cleaning: Re-useable instruments should be thoroughly cleaned before using on another patient using appropriate disinfectant wipes (e.g., PDI Sani wipes). Routine cleaning should be done with staff wearing the proper personal protective equipment (PPE).
- 8) Discontinuing precautions: See Appendix B below for specifications. Infection Prevention may be contacted for questions.
- 9) Visitors: Limit visitors and offer surgical masks to visitors. Hand hygiene is required when entering and exiting the room.

- (c) **Droplet Plus Precautions** are used to prevent the transmission of infections, such as COVID-19, that are transmitted by organisms that can be breathed in when in close proximity to an infected person who is exhaling small droplets that contain the organism or virus. Transmission can also occur by having small droplets that contain the organism or virus contact the conjunctiva or mucous membranes of the nose and mouth or by touching the conjunctiva or mucous membranes of the nose and mouth with hands that contain the organism or virus.

Components of Droplet Plus Precautions include:

- 1) Room: Use a private Airborne Infection Isolation Room (AIIR) or negative pressure ventilation if the patient has aerosolizing procedures. The door must be kept closed at all times. If there are no treatments or aerosolizing procedures, a regular room may be used. Staff shift assignment should not also include caring for severely immunocompromised patients (e.g., kidney transplant).

- 2) Notifications: Place Droplet Plus Precautions sign on the door of the room.
- 3) Monitoring of AIIR or negative pressure ventilation (when applicable): If the patient requires a negative air ventilation room and air flow is not effectively working, keep the door closed and notify Facilities Management Department immediately by calling 383-5353. Document negative pressure room daily inspection using [Airborne Isolation Room Daily Monitor checklist](#). (This form may be found by clicking the link or on the Controlled Air Purifying Respirator-CAPR cart)
- 4) Respiratory Protection: All personnel entering the room must wear either a NIOSH- approved N-95 respirator or CAPR. Order CAPR cart through the online Equipment Requests Those wearing the N-95 respirator for patient contact/care must have a documented fit test on file within the prior 12 months. After use, discard the mask in the proper receptacle outside of the room after exiting.
- 5) Personal Protective Equipment (PPE): In addition to respiratory protection, gown and gloves must be worn by all personnel when entering the room. Gowns are not to be re-used. After use, discard the gowns in the proper receptacle inside in the room. Eye protection (e.g., goggles or face shield) must be worn.
- 6) Transport and procedures: Patient should remain in the room except for essential therapeutic or diagnostic procedures. For essential procedures, schedule for the last test or surgery of the day. Notify receiving departments of required precautions. When transport is necessary, the patient must wear a surgical mask. If they are on a ventilator, do not place a mask. Respiratory Therapist will apply a filter to the exhaust port. Remove and dispose of contaminated PPE and perform hand hygiene prior to transporting patients. Take clean PPE and don clean PPE to handle the patient at the transport destination.
- 7) Patient Equipment: Use a disposable or designated thermometer, blood pressure cuffs and stethoscopes—these must be used and kept in room. No patient care items or equipment can be shared with other patients until cleaned with an appropriate disinfectant.
- 8) Cleaning: Routine cleaning with staff wearing the proper respiratory protection (NIOSH-approved N-95 or CAPR) and gloves and gown. At discharge, the door is to remain closed for 60 minutes (30 minutes if in negative pressure room or AIIR room) before personnel may enter without proper respiratory protection. Cleaning may be completed within this time window, providing staff wear appropriate respiratory protection and eye protection.
- 9) Discontinuing precautions: Use the COVID-19 Isolation Decision Algorithm. Infection Prevention can be contacted for questions.

- 10) Visitors: One visitor allowed daily during designated time frame. End-of-life circumstances are allowed up to two visitors with no time restrictions. Approval for special circumstances must be approved by supervisor or designated unit director. Visitors must wear a hospital provided mask along with a gown and gloves prior to entering the room. Hand Hygiene is required when entering and exiting the room.
- (d) **Contact Precautions** are used to prevent transmission of pathogens from infected or colonized patients by direct or indirect contact. Such pathogens include methicillin-resistant *S. aureus* (MRSA) and Carbapenem-resistant Enterobacteriaceae (CRE).

Components of Contact Precautions include:

- 1) Room: Use a private room. Door does not need to remain closed. When a private room is not available, place patient in a room with a patient who has the same microorganism and same resistance patterns and no additional organisms. Consult with Infection Prevention before cohorting.
- 2) Notifications: Place Contact Precautions sign on the door of the room immediately.
- 3) Personal Protective Equipment (PPE): Gown and gloves must be worn by all personnel when entering the room. Gowns are not to be re-used. After use, place gowns trash before exiting room.
- 4) Patient Equipment: Disposable thermometers, blood pressure cuffs and stethoscopes must be used and kept in room. No patient care items, or equipment can be shared with other patients until cleaned with an appropriate disinfectant.
- 5) Transport and procedures: Patient should remain in the room except for essential therapeutic or diagnostic procedures. For essential procedures, schedule for the last test or surgery of the day. Notify receiving departments of required precautions. When transport is necessary, ensure that infected or colonized areas of the patient's body are contained and covered. Remove and dispose of contaminated PPE and perform hand hygiene prior to transporting patients. Take clean PPE and don clean PPE to handle the patient at the transport destination.
- 6) Cleaning: Re-useable instruments should be thoroughly cleaned with appropriate hospital-approved disinfectant wipes before using on another patient and when removed from room. Routine cleaning should be completed wearing gown and gloves.
- 7) Discontinuing precautions: See Appendix B below for specifications. Contact Precautions are used for patients with colonization or infections with any multidrug-resistant organisms (MDROs) within 1 year. The exception is CRE patients. Patients colonized or infection with CRE, will remain in Contact

Precautions during subsequent hospital admissions indefinitely. Surveillance testing will be performed for hospital roommates (if applicable) of newly identified CRE positive patients.

- 8) Visitors: Visitors should wear gown and gloves when participating in patient care. Hand hygiene is required when entering and exiting the room.
- (e) **Contact Precautions-D** are used to prevent transmission of diarrhea-causing pathogens from infected or colonized patients by direct or indirect contact. The pathogens include *C. difficile*.

Components of Contact Precautions-D include:

- 1) Room: Use a private room. Door does not need to remain closed. Consult with Infection Prevention before cohorting.
- 2) Notifications: Place Contact Precautions-D sign on the door of the room immediately.
- 3) Personal Protective Equipment (PPE): Gown and gloves must be worn by all personnel when entering the room. Gowns are not to be re-used. After use, place gowns in trash can before exiting patient room.
- 4) Patient Equipment: Disposable thermometers, blood pressure cuffs and stethoscopes must be used and kept in room. No patient care items or equipment can be shared with other patients until cleaned with a bleach wipe or an approved disinfectant.
- 5) Transport and procedures: Patient should remain in the room except for essential therapeutic or diagnostic procedures. For essential procedures, schedule for the last test or surgery of the day. Notify receiving departments of required precautions. When transport is necessary, ensure that infected or colonized areas of the patient's body are contained and covered. Remove and dispose of contaminated PPE and perform hand hygiene prior to transporting patients. Take clean PPE and don clean PPE to handle the patient at the transport destination.
- 6) Cleaning: Use disposable equipment if possible. Re-usable equipment is to be cleaned with bleach wipes (exception: glucometer). Routine cleaning should be done with bleach, with staff wearing proper personal protective equipment. Environmental Services will continue to clean the room with bleach for 3 days after the patient is discharged.
- 7) Hand Hygiene: Use soap and water to wash hands instead of alcohol-based solutions when exiting patient room.
- 8) Discontinue Contact-D Precautions: Contact Precautions-D will not be discontinued during a hospital admission. Asymptomatic patients do not require Contact Precautions-D during subsequent admissions.

- 9) Visitors: Visitors should wear gown and gloves when participating in patient care. Hand hygiene is required when entering and exiting the room. Hand hygiene with soap and water must be used when exiting the room.

(i) **Work practices** related to Transmission-Based Precautions.

- (a) Transmission-Based Precautions can be initiated by any physician or nurse. A physician order should be placed in the patient chart within 24 hours.
- (b) Patient care equipment must be handled with caution and cleaned before use with other patients. Gloves should always be worn when handling equipment with visible contamination, followed by hand hygiene. Ensure that single use items are discarded properly and ensure reusable equipment is not used on another patient until it has been properly cleaned.
- (c) Transmission Precautions carts are available for use in each department and can be ordered using the online Equipment Requests form.
- (d) The appropriate sign should be placed on the entrance to the room.
*NOTE: All signs must remain on the doors of the room after patient discharge or transfer and are to be removed by Environmental Services after room has been cleaned per policy.
- (e) Documentation of patient education is required when Transmission-Based Precautions is initiated.
- (f) Linen does not require special handling. (Exception is rooms for bed bugs - dissolvable bags are used for all linen). Contaminated linen should be placed in approved impermeable linen bags at the locations of use and in a manner to prevent exposure to skin and mucous membranes. Avoid contamination of clothing.
- (g) Trash does not require special handling. If items have significant contamination with blood or bodily fluids, then these items should be placed in red biohazard bags.
- (h) Inpatient privacy curtains must be changed as part of the room cleaning process when a patient in Transmission-Based Precautions is transferred or discharged. The curtain will also be changed routinely according to the Cleaning Procedure: Cubical Curtain and Drapes.
- (i) Patient food trays must be removed and placed onto the dirty food cart immediately after leaving the room. Appropriate PPE must be worn to retrieve the tray.

(c) **Protective Precautions** are used to prevent transmission of diseases to severely immunocompromised patients as defined:

- Patients on anti-rejection therapy following solid-organ transplant.

- Patients who are receiving myelosuppressive chemotherapy for treatment of malignancy.
- Patients on prolonged high dose steroid treatment (prednisone).
- Patients with malignancy and absolute neutrophil count (ANC) < 1,000.

(i) Components of Protective Precautions include:

- (a) Room: Use a private room. Door does not need to remain closed. Avoid use of Airborne Infection Isolation Room (AIIR) whenever possible unless patient has indication that would require Airborne Precautions. Plants and dried or fresh flowers are not permitted.
- (b) Notifications: Place Protective Precautions sign on the door of the room immediately.
- (c) Personal Protective Equipment (PPE): Masks must be worn upon entry to the room when the patient has an ANC < 1,000. Infection-specific precautions should be used for patients with signs and symptoms of certain infections.
- (d) Healthcare workers: Staff with signs or symptoms of a respiratory infection (e.g., fever, cough, runny nose) should avoid caring for patients in Protective Precautions. If the healthcare worker must provide care, he/she must wear a surgical mask. Ensure masks are changed when visibly soiled or moist.
- (e) Patient Equipment: No patient care items, or equipment can be shared with other patients until cleaned with an appropriate disinfectant.
- (f) Transport and procedures: For appointments off the unit, the destination area will be notified that the patient is on Protective Precautions. Wait times should be kept to a minimum. All patients will be advised to wear a mask when leaving the room. However, a mask will be required if the patient's ANC < 1,000 or if the patient is leaving the room during construction activities.
- (g) Cleaning: Housekeeping practices will be performed in a manner to prevent dust generation (e.g., damp mopping and dusting).
- (h) Visitors: Will be screened and not permitted to visit:
 - i. With signs and symptoms of respiratory illness and/or conjunctivitis (e.g., fever, cough, sneezing and or runny nose)
 - ii. In the incubation period following exposure to communicable diseases (e.g., chickenpox, measles, or pertussis)
 - iii. If not able to comply with Standard Precautions and hygienic practices

Appendix A: Clinical Syndromes or Conditions Warranting Empiric Transmission-Based Precautions In Addition To Standard Precautions Pending Confirmation of Diagnosis*

Clinical Syndrome or Condition	Potential Pathogens**	Empiric Precautions
Diarrhea		
Acute diarrhea with a likely infectious cause in an incontinent or diapered patient	Enteric pathogens***	Contact-D Precautions
Meningitis	<i>Neisseria meningitidis</i>	Droplet Precautions for first 24 hrs of antimicrobial therapy; mask and face protection for intubation
	Enteroviruses	Contact Precautions
	<i>M. tuberculosis</i>	Airborne Precautions if pulmonary infiltrate Airborne Precautions plus Contact Precautions if potentially infectious draining body fluid present
Rash or Exanthems, Generalized, Etiology Unknown		
Petechial/ecchymotic with fever (general)	<i>Neisseria meningitidis</i>	Droplet Precautions for first 24 hrs of antimicrobial therapy
Suspected viral hemorrhagic fever	Ebola, Lassa, Marburg viruses	Droplet Precautions plus Contact Precautions, with face/eye protection, emphasizing safety sharps and barrier precautions when blood exposure likely. Use N95 or higher respiratory protection when aerosol-generating procedure performed If high risk for Ebola: See: http://www.cdc.gov/vhf/ebola/healthcare-us/hospitals/infection-control.html and Max Surge Plan EP -08-017 at http://www.utoledo.edu/depts/safety/docs/EP-08-017.pdf
Vesicular	Varicella-zoster, herpes simplex, variola (smallpox), vaccinia viruses	Airborne plus Contact Precautions
	Vaccinia virus	Contact Precautions only if herpes simplex, localized zoster in an immunocompetent host or vaccinia viruses most likely
Maculopapular with cough, coryza and fever	Rubeola (measles) virus	Airborne Precautions
Respiratory Infections		
Cough/fever/upper lobe pulmonary infiltrate in an HIV-negative patient or a patient at low risk for human immunodeficiency virus (HIV) infection	<i>M. tuberculosis</i> , Respiratory viruses, <i>S. pneumoniae</i> , <i>S. aureus</i> (MSSA or MRSA)	Airborne Precautions plus Contact Precautions
Cough/fever/pulmonary infiltrate in any lung location in an HIV-infected patient or a patient at high risk for HIV infection	<i>M. tuberculosis</i> , Respiratory viruses, <i>S. pneumoniae</i> , <i>S. aureus</i> (MSSA or MRSA)	Airborne Precautions plus Contact Precautions Use eye/face protection if aerosol-generating procedure performed or contact with respiratory secretions anticipated. If tuberculosis is unlikely and there are no AIIRs and/or respirators available, use Droplet Precautions instead of Airborne Precautions Tuberculosis more likely in HIV-infected individual than in HIV negative individual
Cough/fever/pulmonary infiltrate in any lung location in a patient with a history of recent travel (10-21 days) to countries with active outbreaks of SARS, avian influenza, or MERS-CoV	<i>M. tuberculosis</i> , severe acute respiratory syndrome virus (SARS-CoV), avian influenza, MERS-CoV	Airborne plus Contact Precautions plus eye protection. If SARS, MERS-CoV and tuberculosis unlikely, use Droplet Precautions instead of Airborne Precautions
Respiratory infections, particularly bronchiolitis and pneumonia, in infants and young children	Respiratory syncytial virus, parainfluenza virus, adenovirus, influenza virus, Human metapneumovirus	Contact plus Droplet Precautions; Droplet Precautions may be discontinued when adenovirus and influenza have been ruled out
Skin or Wound Infection		
Abscess or draining wound that cannot be covered	<i>S. aureus</i> (MSSA or MRSA), group A streptococcus	Contact Precautions Add Droplet Precautions for the first 24 hours of appropriate antimicrobial therapy if invasive Group A streptococcal disease is suspected

* Adapted from CDC Clinical Syndromes or Conditions Warranting Empiric Transmission-Based Addition to Standard Precautions Pending Confirmation of Diagnosis: <http://www.cdc.gov/hicpac/pdf/isolation/Isolation2007.pdf#page=119>

**The organisms listed under the column "Potential Pathogens" are not intended to represent the complete, or even most likely, diagnoses, but rather possible etiologic agents that require additional precautions beyond Standard Precautions until they can be ruled out.

*** These pathogens include enterohemorrhagic *Escherichia coli* O157:H7, *Shigella* spp, hepatitis A virus, noroviruses, rotavirus, *C. difficile*.

APPENDIX B: TYPE AND DURATION OF TRANSMISSION-BASED PRECAUTIONS FOR SELECTED INFECTIONS AND CONDITIONS

*Type of precautions: A, Airborne Precautions; D, Droplet Precautions; C, Contact Precautions; CD, Contact-D Precautions; S, Standard Precautions; D+, Droplet Plus. When A, D, C, D+, and C-D are specified, also use S.

† Duration of precautions: CN, until off antimicrobial treatment and culture-negative; DI, duration of illness (with wound lesions, DI means until wounds stop draining); DE, until environment completely decontaminated; U, until time specified in hours (hrs) after initiation of effective therapy; Unknown: criteria for establishing eradication of pathogen has not been determined.

Infection/Condition	Type *	Duration†	Precautions/Comments
Abscess			
Draining, major	C	DI	No dressing or containment of drainage; until drainage stops or can be contained.
Draining, minor or limited	S		Dressing covers and contains drainage.
Acquired human immunodeficiency syndrome (HIV)	S		Post-exposure chemoprophylaxis for some blood exposures https://www.cdc.gov/niosh/topics/bbp/guidelines.html
Actinomycosis	S		Not transmitted from person to person.
Adenovirus infection (see agent-specific guidance under gastroenteritis, conjunctivitis, pneumonia)	D, C	DI	
Amebiasis	S		Person to person transmission is rare.
Anthrax	S		Infected patients do not generally pose a transmission risk.
Cutaneous	S		Transmission through non-intact skin contact with draining lesions possible, therefore use Contact Precautions if large amount of uncontained drainage. Handwashing with soap and water preferable to use of waterless alcohol-based antiseptics since alcohol does not have sporicidal activity.
Pulmonary	S		Not transmitted from person to person.
Environmental: aerosolizable spore-containing powder or other substance		DE	Until decontamination of environment complete. Wear respirator (N95 mask or CAPRs), protective clothing; decontaminate persons with powder on them (Notice: Occupational Health Guidelines for Remediation Workers at Bacillus anthracis-Contaminated Sites — United States, 2001–2002) Hand hygiene: Handwashing for 30-60 seconds with soap and water or 2% chlorhexidine gluconate after spore contact (alcohol hand rubs inactive against spores).
Antibiotic-associated colitis (see <i>Clostridium difficile</i>)			
Arthropod-borne viral encephalitides (eastern, western, Venezuelan equine encephalomyelitis; St Louis, California encephalitis; West Nile Virus) and viral fevers (dengue, yellow fever, Colorado tick fever, Zika)	S		Not transmitted from person to person except rarely by transfusion, and for West Nile virus by organ transplant, breastmilk or transplacentally. See CDC guidance for Zika update.
Ascariasis	S		Not transmitted from person to person.
Aspergillosis	S		Contact Precautions and Airborne Precautions if massive soft tissue infection with copious drainage and repeated irrigations required.
Avian influenza (see influenza, avian below)			
Babesiosis	S		Not transmitted from person to person except rarely by transfusion.
Blastomycosis (cutaneous or pulmonary)	S		Not transmitted from person to person.

Infection/Condition	Type *	Duration†	Precautions/Comments
Botulism	S		Not transmitted from person to person.
Bronchiolitis (see respiratory infections in infants and young children)	C	DI	Use mask according to Standard Precautions.
Brucellosis	S		Person to person transmission is rare. Provide antimicrobial prophylaxis following laboratory exposure. Call on-call Infectious Diseases.
Campylobacter gastroenteritis (see gastroenteritis)			
Candidiasis (all forms)	S		
Cat-scratch fever	S		Not transmitted from person to person.
Cellulitis	S		
Chancroid (<i>H. ducreyi</i>)	S		Transmitted sexually from person to person.
Chickenpox (see varicella)			
Chlamydia trachomatis			
Conjunctivitis	S		
Genital (lymphogranuloma venereum)	S		
Pneumonia (infants < 3 mos. of age))	S		
<i>Chlamydia pneumoniae</i>	S		Outbreaks in institutionalized populations rarely reported.
Cholera (see gastroenteritis)			
Closed-cavity infection			
Open drain in place; limited or minor drainage	S		Contact Precautions if there is copious uncontained drainage.
No drain or closed drainage system in place	S		
<i>Clostridium</i>			
<i>C. botulinum</i>	S		Not transmitted from person to person.
<i>C. difficile</i> (see Gastroenteritis)	CD	DI	Contact-D Precautions for the duration of hospital stay.
<i>C. perfringens</i>			
Food poisoning	S		Not transmitted from person to person.
Gas gangrene	S		Person to person transmission is rare. Contact Precautions if wound drainage is extensive.
Coccidioidomycosis			
Draining lesions	S		Not transmitted from person to person except under extraordinary circumstances.
Pneumonia	S		Not transmitted from person to person except under extraordinary circumstances.
Colorado tick fever	S		Not transmitted from person to person.
Congenital rubella	C	Until 1 yr of age	Standard Precautions if nasopharyngeal & urine cultures neg. after 3 mos. of age.
Conjunctivitis			
Acute bacterial	S		
Chlamydia	S		

Infection/Condition	Type *	Duration†	Precautions/Comments
Gonococcal	S		
Acute viral (acute hemorrhagic)	C	DI	Adenovirus most common. Highly contagious.
Corona virus associated with SARS (SARS-CoV) (see severe acute respiratory syndrome)			
Coxsackie virus disease (see enteroviral infection)			
Creutzfeldt-Jakob disease CJD, vCJD	S		Use disposable instruments or special sterilization/disinfection for surfaces, objects contaminated with neural tissue if CJD or vCJD suspected and has not been R/O. No special burial procedures.
Croup (see resp. infection in infants and young children)			
Crimean-Congo Fever (see Viral Hemorrhagic Fever)	S		
Cryptococcosis	S		Not transmitted from person to person, except rarely via tissue and corneal transplant.
Cryptosporidiosis (see gastroenteritis)			
Cysticercosis	S		Not transmitted from person to person.
Cytomegalovirus infection, including in neonates and immunosuppressed patients	S		No additional precautions for pregnant HCWs.
Decubitus ulcer (see Pressure ulcer)			
Dengue fever	S		Not transmitted from person to person.
Diarrhea, acute-infectious suspected (see gastroenteritis)			
Diphtheria			
Cutaneous	C	CN	Until 2 cultures taken 24 hrs. apart negative.
Pharyngeal	D	CN	Until 2 cultures taken 24 hrs. apart negative.
Ebola virus (see viral hemorrhagic fevers)			Consult current UTMC Infectious Disease Agent and Max Surge Plan .
Echinococcosis (hydatidosis)	S		Not transmitted from person to person.
Echovirus (see enteroviral infection)			
Encephalitis or encephalomyelitis (see specific agents)			
Endometritis (endomyometritis)	S		
Enterobiasis (pinworm disease)	S		
Enterococcus species (see MDRO if epidemiologically significant or vancomycin resistant)			
Enterocolitis, <i>C. difficile</i> (see <i>C. difficile</i> , gastroenteritis)	CD	DI	
Enteroviral infections (i.e., Group A and B Coxsackie viruses and Echo viruses) (excludes polio virus)	S		Use Contact-D Precautions for diapered or incontinent children for duration of illness and to control institutional outbreaks.
Epiglottitis, due to <i>Haemophilus influenzae</i> type b	D	U 24 hrs	See specific disease agents for epiglottitis due to other etiologies.
Epstein-Barr virus infection (infectious mononucleosis)	S		
Erythema infectiosum (see Parvovirus B19)			
<i>Escherichia coli</i> gastroenteritis (see gastroenteritis)			

Infection/Condition	Type *	Duration†	Precautions/Comments
Food poisoning			
Botulism	S		Not transmitted from person to person.
<i>C. perfringens</i>	S		Not transmitted from person to person.
Staphylococcal	S		Not transmitted from person to person.
Furunculosis, staphylococcal	S		Contact if drainage not controlled. Contact Precautions for MRSA.
Infants and young children	C	DI	
Gangrene (gas gangrene)	S		Not transmitted from person to person.
Gastroenteritis	S		Use Contact-D Precautions for diapered or incontinent persons for the duration of illness or to control institutional outbreaks caused by all of the agents below.
Adenovirus	S		Use Contact-D Precautions for diapered or incontinent persons for the duration of illness or to control institutional outbreaks.
Campylobacter species	S		
Cholera (<i>Vibrio cholerae</i>)	S		
<i>C. difficile</i>	CD	DI	Contact-D Precautions for the duration of hospital stay. Discontinue antibiotics if appropriate. Handwashing with soap and water preferred.
Cryptosporidium species	S		Use Contact Precautions for diapered or incontinent persons for the duration of illness or to control institutional outbreaks.
<i>E. coli</i>			
Enteropathogenic O157:H7 & other shiga toxin producing Strains, other species	S		
<i>Giardia lamblia</i>	S		
Noroviruses	CD	DI	Use Contact Precautions-D for diapered or incontinent persons for the duration of illness or to control institutional outbreaks. Persons who clean areas heavily contaminated with feces or vomitus may benefit from wearing masks since virus can be aerosolized from these body substances; ensure consistent environmental cleaning and disinfection with focus on restrooms even when apparently unsoiled. Hypochlorite solutions may be required when there is continued transmission. Alcohol is less active, but there is no evidence that alcohol antiseptic hand rubs are not effective for hand decontamination. Cohorting of affected patients to separate airspaces and toilet facilities may help interrupt transmission during outbreaks. See CDC https://www.cdc.gov/infectioncontrol/guidelines/norovirus/index.html
Rotavirus	CD	DI	Ensure consistent environmental cleaning and disinfection and frequent removal of soiled diapers. Prolonged shedding may occur in both immunocompetent and immunocompromised children and the elderly.
Salmonella species (including <i>S. typhi</i>)	S		Use Contact-D Precautions for diapered or incontinent persons for the duration of illness or to control institutional outbreaks.
Shigella species (Bacillary dysentery)	S		
<i>Vibrio parahaemolyticus</i>	S		
Viral (if not covered elsewhere)	S		
<i>Yersinia enterocolitica</i>	S		

Infection/Condition	Type *	Duration†	Precautions/Comments
German measles (see rubella; see congenital rubella)			
Giardiasis (see gastroenteritis)			
Gonococcal ophthalmia neonatorum (gonorrheal ophthalmia, acute conjunctivitis of newborn)	S		
Gonorrhea	S		
Granuloma inguinale	S		
Guillain-Barré' syndrome	S		Not an infectious condition.
<i>Haemophilus influenzae</i> (see disease-specific recommendations)			
Hand, foot, and mouth disease (see enteroviral infection)			
Hantavirus pulmonary syndrome	S		Not transmitted from person to person.
<i>Helicobacter pylori</i>	S		
Hepatitis, viral			
Type A	S		Provide hepatitis A vaccine post-exposure as recommended.
Diapered or incontinent patients	CD		Contact-D Precautions in infants and children <3 yrs. of age for duration of hospitalization; for children 3-14 yrs. of age for 2 weeks after onset of symptoms; >14 yrs. of age for 1 week after onset of symptoms.
Type B-HBsAg positive	S		See specific recommendations for care of patients in hemodialysis centers.
Type C (and other non-A, non-B)	S		See specific recommendations for care of patients in hemodialysis centers.
Type D (seen only with hepatitis B)	S		
Type E	S		Use Contact-D for diapered or incontinent individuals for the duration of illness.
Type G	S		
Herpangina (see enteroviral infection)			
Hookworm	S		
Herpes simplex (<i>Herpesvirus hominis</i>)			
Encephalitis	S		
Mucocutaneous, disseminated or primary, severe	C	Until lesions dry and crusted	
Mucocutaneous, recurrent (skin, oral, genital)	S		
Neonatal	C	Until lesions dry and crusted	Also, for asymptomatic, exposed infants delivered vaginally or by C-section and if mother has active infection and membranes have been ruptured for more than 4 to 6 hrs until infant surface cultures obtained at 24-36 hrs. of age negative after 48 hrs incubation.
Herpes zoster (varicella-zoster) (shingles)			
Disseminated disease in any patient. Localized disease in immunocompromised patient until disseminated infection ruled out.	A, C	DI	Susceptible HCWs should not enter room if immune caregivers are available; no recommendation for protection of immune HCWs; no recommendation for type of protection, i.e., surgical mask or respirator; for susceptible HCWs.

Infection/Condition		Type *	Duration†	Precautions/Comments
	Localized in patient with intact immune system with lesions that can be contained/covered.	S	DI	Susceptible HCWs should not provide direct patient care when other immune caregivers are available.
Histoplasmosis		S		Not transmitted from person to person.
Human immunodeficiency virus (HIV)		S		
Human metapneumovirus		C	DI	HAI reported, but route of transmission not established. Assumed to be Contact transmission as for RSV since the viruses are closely related and have similar clinical manifestations and epidemiology.
Impetigo		C	U 24 hrs	
Infectious mononucleosis		S		
Influenza				
Human (seasonal influenza)		D	Symptom resolution OR 7 days from symptom onset (whichever is longer)	See http://www.cdc.gov/flu/professionals/infectioncontrol/healthcaresettings.htm for current seasonal influenza guidance.
Avian (e.g., H5N1, H7N9 strains)				See http://www.cdc.gov/flu/avianflu/novel-flu-infection-control.htm for current avian influenza guidance.
Pandemic influenza (also a human influenza virus)				See http://www.pandemicflu.gov for current pandemic influenza guidance.
Kawasaki syndrome		S		Not an infectious condition.
Lassa fever (see viral hemorrhagic fevers)				
Legionnaires' disease		S		Not transmitted from person to person.
Leprosy		S		
Leptospirosis		S		Not transmitted from person to person.
Lice				See http://www.cdc.gov/ncidod/dpd/parasites/lice/default.htm
Head (pediculosis)		C	U 24 hrs	
Body		S		Transmitted person to person through infested clothing. Wear gown and gloves when removing clothing; bag and wash clothes according to CDC guidance above.
Pubic		S		Transmitted person to person through sexual contact.
Listeriosis (<i>Listeria monocytogenes</i>)		S		Person-to-person transmission rare; cross-transmission in neonatal settings reported.
Lyme disease		S		Not transmitted from person to person.
Lymphocytic choriomeningitis		S		Not transmitted from person to person.
Lymphogranuloma venereum		S		
Malaria		S		Not transmitted from person to person except rarely through transfusion and through a failure to follow Standard Precautions.

Infection/Condition	Type *	Duration†	Precautions/Comments
Marburg virus disease (see viral hemorrhagic fevers)			
Measles (rubeola)	A	4 days after onset of rash; DI ¹	¹ : Duration of illness for immune compromised. See CDC's Immunization of Healthcare Personnel: Recommendations of the Advisory Committee on Immunization Practices (ACIP) See CDC https://www.cdc.gov/infectioncontrol/guidelines/measles/index.html
Melioidosis (all forms)	S		Not transmitted from person to person.
Meningitis			
Aseptic (nonbacterial or viral)	S		Contact for infants and young children.
Bacterial, Gram-negative enteric, in neonates	S		
Fungal	S		
<i>Haemophilus influenzae</i> , type b known or suspected	D	U 24 hrs	
<i>Listeria monocytogenes</i> (See Listeriosis)	S		
<i>Neisseria meningitidis</i> (known or suspected)	D	U 24 hrs	See meningococcal disease below.
<i>Streptococcus pneumoniae</i>	S		
<i>M. tuberculosis</i>	S		Concurrent, active pulmonary disease or draining cutaneous lesions may necessitate addition of Contact and/or Airborne Precautions; for children, airborne precautions until active TB ruled out in visiting family members (see tuberculosis below).
Other diagnosed bacterial	S		
Meningococcal disease: sepsis, pneumonia, meningitis	D	U 24 hrs	Postexposure chemoprophylaxis for household contacts, HCWs exposed to respiratory secretions; post-exposure vaccine only to control outbreaks.
Middle East Respiratory Syndrome Coronavirus (MERS-CoV)	A, D+, C	DI plus 10 days after resolution of fever, provided respiratory symptoms are absent or improving	MERSCoV: https://www.cdc.gov/coronavirus/mers/infection-prevention-control.html
Molluscum contagiosum	S		
Monkeypox	A, C	A-Until monkeypox confirmed and smallpox excluded C-Until lesions crusted	See www.cdc.gov/ncidod/monkeypox for most current recommendations. Transmission in hospital settings unlikely 269. Pre- and post-exposure smallpox vaccine recommended for exposed HCWs.

Infection/Condition	Type *	Duration†	Precautions/Comments
Mucormycosis	S		
Multidrug-resistant organisms (MDROs), infection or colonization (e.g., MRSA, VRE, VISA/VRSA, ESBLs, resistant <i>S. pneumonia</i> , CRE)	C		Contact Precaution for MDR Gram-negatives, ESBL-producing organisms, MRSA or VRE colonization or infection within 1 year. Patients colonized or infected with Carbapenem-Resistant Enterobacteriaceae (CRE) will remain in Contact Precautions during subsequent hospital admissions.
Mumps (infectious parotitis)	D	U 5 days	After onset of swelling; susceptible HCWs should not provide care if immune caregivers are available. See CDC https://www.cdc.gov/mmwr/preview/mmwrhtml/mm5740a3.htm
Mycobacteria, nontuberculosis (atypical)			Not transmitted person-to-person.
Pulmonary	S		
Wound	S		
Mycoplasma pneumonia	D	DI	
Necrotizing enterocolitis	S		Contact Precautions when cases clustered temporally.
Nocardiosis, draining lesions, or other presentations	S		Not transmitted person-to-person.
Norovirus (see gastroenteritis)			
Norwalk agent gastroenteritis (see gastroenteritis)			
Orf	S		
Parainfluenza virus infection, respiratory in infants and young children	C	DI	Viral shedding may be prolonged in immunosuppressed patients. Reliability of antigen testing to determine when to remove patients with prolonged hospitalizations from Contact Precautions uncertain.
Parvovirus B19 (Erythema infectiosum)	D		Maintain precautions for duration of hospitalization when chronic disease occurs in an immunocompromised patient. For patients with transient aplastic crisis or red-cell crisis, maintain precautions for 7 days. Duration of precautions for immunosuppressed patients with persistently positive PCR not defined, but transmission has occurred.
Pediculosis (lice)	C	U 24 hrs after treatment	
Pertussis (whooping cough)	D	U 5 days	Single patient room preferred. Cohorting an option. Post-exposure chemoprophylaxis for household contacts and HCWs with prolonged exposure to respiratory secretions.
Pinworm infection (Enterobiasis)	S		
Plague (<i>Yersinia pestis</i>)			
Bubonic	S		
Pneumonic	D	U 48 hrs	Antimicrobial prophylaxis for exposed HCWs.
Pneumonia			
Adenovirus	D, C	DI	In immunocompromised hosts, extend duration of Droplet and Contact Precautions due to prolonged shedding of virus.
Bacterial not listed elsewhere (including gram-negative bacterial)	S		

Infection/Condition		Type *	Duration†	Precautions/Comments
	<i>B. cepacia</i> in patients with CF, including respiratory tract colonization	C	Unknown	Avoid exposure to other persons with CF; private room preferred. Criteria for D/C precautions not established. See CF Foundation guideline.
	<i>B. cepacia</i> in patients without CF(see Multidrug-resistant organisms)			
	Chlamydia	S		
	Fungal	S		
	<i>Haemophilus influenzae</i> , type b			
	Adults	S		
	Infants and children	D	U 24 hrs	
	<i>Legionella</i> spp.	S		
	Meningococcal	D	U 24 hrs	See meningococcal disease above.
	Multidrug-resistant bacterial (see multidrug-resistant organisms)			
	<i>Mycoplasma</i> (primary atypical pneumonia)	D	DI	
	Pneumococcal pneumonia	S		Use Droplet Precautions if evidence of transmission within a patient care unit or facility.
	<i>Pneumocystis jiroveci</i> (<i>Pneumocystis carinii</i>)	S		Avoid placement in the same room with an immunocompromised patient.
	<i>Staphylococcus aureus</i>	S		For MRSA, see MDROs.
	<i>Streptococcus</i> , group A			
	Adults	D	U 24 hrs	See streptococcal disease (group A <i>streptococcus</i>) below. Contact precautions if skin lesions present.
	Infants and young children	D	U 24 hrs	Contact Precautions if skin lesions present.
	Varicella-zoster (See Varicella-Zoster)			
	Viral			
	Adults	S		
	Infants and young children (see respiratory infectious disease, acute, or specific viral agent)			
	Poliomyelitis	C	DI	
	Pressure ulcer (decubitus ulcer, pressure sore) infected			
	Major	C	DI	If no dressing or containment of drainage; until drainage stops or contained by dressing.
	Minor or limited	S		If dressing covers and contains drainage.
	Prion disease (See Creutzfeld-Jacob Disease)			
	Psittacosis (ornithosis) (<i>Chlamydia psittaci</i>)	S		Not transmitted from person to person.
	Q fever	S		

Infection/Condition	Type *	Duration†	Precautions/Comments
Rabies	S		Person to person transmission rare; transmission via corneal, tissue & organ transplants has been reported. If patient has bitten another individual or saliva has contaminated an open wound or mucous membrane, wash exposed area thoroughly & administer post exposure prophylaxis.
Rat-bite fever (<i>Streptobacillus moniliformis</i> disease, <i>Spirillum minus</i> disease)	S		Not transmitted from person to person.
Relapsing fever	S		Not transmitted from person to person.
Resistant bacterial infection or colonization (see multidrug-resistant organisms)			
Respiratory infectious disease, acute (if not covered elsewhere)			
Adults	S		
Infants and young children	C	DI	
Respiratory syncytial virus infection, in infants, young children and immunocompromised adults	C	DI	Wear mask according to Standard Precautions. In immunocompromised patients, extend the duration of Contact Precautions due to prolonged shedding. Reliability of antigen testing to determine when to remove patients with prolonged hospitalizations from Contact Precautions uncertain.
Reye's syndrome	S		Not an infectious condition.
Rheumatic fever	S		Not an infectious condition.
Rhinovirus	D	DI	Droplet most important route of transmission. Outbreaks have occurred in NICUs and LTCFs. Add Contact Precautions if copious moist secretions and close contact likely to occur (e.g., young infants).
Rickettsial fevers, tickborne (Rocky Mountain spotted fever, tickborne typhus fever)	S		Not transmitted from person to person except rarely through transfusion.
Rickettsialpox (vesicular rickettsiosis)	S		Not transmitted from person to person.
Ringworm (dermatophytosis, dermatomycosis, tinea)	S		Rarely, outbreaks have occurred in healthcare settings. Use Contact Precautions for outbreak.
Ritter's disease (staphylococcal scalded skin syndrome)	C	DI	See staphylococcal disease, scalded skin syndrome below.
Rocky Mountain spotted fever	S		
Roseola infantum (exanthem subitum; caused by HHV-6)	S		
Rotavirus infection (see gastroenteritis)			
Rubella (German measles) (also see congenital rubella)	D	U 7 days after onset of rash	Susceptible HCWs should not enter room if immune caregivers are available. No recommendation for wearing face protection (e.g., a surgical mask) if immune. Pregnant women who are not immune should not care for these patients 17, 33. Administer vaccine within three days of exposure to non-pregnant susceptible individuals. Place exposed susceptible patients on Droplet Precautions; exclude susceptible healthcare personnel from duty from day 5 after first exposure to day 21 after last exposure, regardless of post-exposure vaccine.

Infection/Condition	Type *	Duration†	Precautions/Comments
Rubeola (see measles)			
Salmonellosis (see gastroenteritis)			
Scabies	C	U 24	
Scalded skin syndrome, staphylococcal	C	DI	See staphylococcal disease, scalded skin syndrome below.
Schistosomiasis	S		
Severe acute respiratory syndrome (SARS)	A, D+C	DI plus 10 days after resolution of fever, provided respiratory symptoms are absent or improving	Airborne Precautions preferred; D if AIIR unavailable. N95 or higher respiratory protection; surgical mask if N95 unavailable; eye protection (goggles, face shield); aerosol-generating procedures and "supershedders" highest risk for transmission via small droplet nuclei and large droplets. Vigilant environmental disinfection (see http://www.cdc.gov/sars/index.html).
Shigellosis (see gastroenteritis)			
Smallpox (variola; see vaccinia for management of vaccinated persons)	A, C	DI	Until all scabs have crusted and separated (3-4 weeks). Non-vaccinated HCWs should not provide care when immune HCWs are available; N95 or higher respiratory protection for susceptible and successfully vaccinated individuals; post exposure vaccine within 4 days of exposure protective.
Sporotrichosis	S		
<i>Spirillum minor</i> disease (rat-bite fever)	S		Not transmitted from person to person.
Staphylococcal disease (<i>S aureus</i>)			
Skin, wound, or burn			
Major	C	DI	No dressing or dressing does not contain drainage adequately.
Minor or limited	S		Dressing covers and contains drainage adequately.
Enterocolitis	S		Use Contact Precautions for diapered or incontinent children for duration of illness.
MRSA	C		See MDRO.
Pneumonia	S		
Scalded skin syndrome	C	DI	Consider healthcare personnel as potential source of nursery, NICU outbreak.
Toxic shock syndrome	S		
<i>Streptobacillus moniliformis</i> disease (rat-bite fever)	S		Not transmitted from person to person.
Streptococcal disease (group A <i>streptococcus</i>)			
Skin, wound, or burn			
Major	C, D	U 24 hrs	No dressing or dressing does not contain drainage adequately.
Minor or limited	S		Dressing covers and contains drainage adequately.
Endometritis (puerperal sepsis)	S		
Pharyngitis in infants and young children	D	U 24 hrs	
Pneumonia	D	U 24 hrs	

Infection/Condition	Type *	Duration†	Precautions/Comments
Scarlet fever in infants and young children	D	U 24 hrs	
Serious invasive group A strep disease	D	U 24 hrs	Outbreaks of serious invasive disease have occurred secondary to transmission among patients and HCWs. Contact Precautions for draining wound as above; antimicrobial prophylaxis in selected conditions.
Streptococcal disease (group B <i>streptococcus</i>), neonatal	S		
Streptococcal disease (not group A or B)	S		
Strongyloidiasis	S		
Syphilis			
Latent (tertiary) and seropositivity without lesions	S		
Primary/Secondary, skin and mucous membrane, congenital	S		
Tapeworm disease			
<i>Hymenolepis nana</i>	S		Not transmitted from person to person.
<i>Taenia solium</i> (pork)	S		
Other	S		
Tetanus	S		Not transmitted from person to person.
Tinea (e.g., dermatophytosis, dermatomycosis, ringworm)	S		Rare episodes of person-to-person transmission.
Toxoplasmosis	S		Transmission from person to person is rare; vertical transmission from mother to child, transmission through organs and blood transfusion rare.
Toxic shock syndrome (staphylococcal disease, streptococcal disease)	S		Droplet Precautions for the first 24 hours after implementation of antibiotic therapy if Group A <i>streptococcus</i> is a likely etiology.
Trachoma, acute	S		
Transmissible spongiform encephalopathy (see Creutzfeld-Jacob disease, CJD, vCJD)			
Trench mouth (Vincent's angina)	S		
Trichinosis	S		
Trichomoniasis	S		
Trichuriasis (whipworm disease)	S		
Tuberculosis (<i>M. tuberculosis</i>)			
Extrapulmonary, draining lesion	A, C		Discontinue precautions only when patient is improving clinically, and drainage has ceased or there are three consecutive negative cultures of continued drainage. Examine for evidence of active pulmonary tuberculosis.
Extrapulmonary, no draining lesion, meningitis	S		Examine for evidence of pulmonary tuberculosis. For infants and children, use Airborne Precautions until active pulmonary TB in visiting family members ruled out.

Infection/Condition		Type *	Duration†	Precautions/Comments
Pulmonary or laryngeal disease, confirmed		A		Discontinue precautions only when patient on effective therapy is improving clinically and has three consecutive sputum smears negative for acid-fast bacilli collected on separate days (MMWR 2005; 54: RR-17. http://www.cdc.gov/mmwr/preview/mmwrhtml/rr5417a1.htm?s_cid=rr5417a1_e).
Pulmonary or laryngeal disease, suspected		A		Discontinue precautions only when the likelihood of infectious TB disease is deemed negligible, and either 1) there is another diagnosis that explains the clinical syndrome or 2) the results of 3 sputum smears for AFB are negative. Each of the 3 sputum specimens should be collected 8-24 hours apart, and at least 1 is early a.m. specimen.
Skin-test positive with no evidence of active disease		S		
Tularemia				
Draining lesion		S		Not transmitted from person to person.
Pulmonary		S		Not transmitted from person to person.
Typhoid (<i>Salmonella typhi</i>) fever (see gastroenteritis)				
Typhus				
<i>Rickettsia prowazekii</i> (Louse-borne typhus)		S		Transmitted from person to person through close personal or clothing contact.
<i>Rickettsia typhi</i>		S		Not transmitted from person to person.
Urinary tract infection (including pyelonephritis), with or without urinary catheter		S		
Vaccinia (vaccination site, adverse events following vaccination) *				Only vaccinated HCWs have contact with active vaccination sites and care for persons with adverse vaccinia events; if unvaccinated, only HCWs without contraindications to vaccine may provide care.
	Vaccination site care (including autoinoculated areas)	S		Vaccination recommended for vaccinators; for newly vaccinated HCWs: semi-permeable dressing over gauze until scab separates, with dressing change as fluid accumulates, ~3-5 days; gloves, hand hygiene for dressing change; vaccinated HCW or HCW without contraindication to vaccine for dressing changes.
	Eczema vaccinatum	C	Until lesions dry and crusted, scabs separated	For contact with virus-containing lesions and exudative material.
	Fetal vaccinia	C		
	Generalized vaccinia	C		
	Progressive vaccinia	C		
	Postvaccinia encephalitis	S		
	Blepharitis or conjunctivitis	S/C		Use Contact Precautions if there is copious drainage.
	Iritis or keratitis	S		
	Vaccinia-associated erythema multiforme (Stevens Johnson Syndrome)	S		Not an infectious condition.

Infection/Condition		Type *	Duration†	Precautions/Comments
	Secondary bacterial infection (e.g., <i>S. aureus</i> , group A <i>streptococcus</i>)	S/C		Follow organism-specific (strep, staph most frequent) recommendations and consider magnitude of drainage.
	Varicella Zoster	A, C, S	Until lesions dry and crusted	Susceptible HCWs should not enter room if immune caregivers are available; no recommendation for face protection of immune HCWs; no recommendation for type of protection, i.e., surgical mask or respirator for susceptible HCWs; In immunocompromised host with varicella pneumonia, prolong duration of precautions for duration of illness. Post-exposure prophylaxis: provide post-exposure vaccine ASAP but within 120 hours; for susceptible exposed persons for whom vaccine is contraindicated (immunocompromised persons, pregnant women, newborns whose mother's varicella onset is <5days before delivery or within 48 hrs after delivery) provide VariZIG, ASAP when available, ideally within 96 hours (up to 10 days); Use Airborne Precautions for exposed susceptible persons and exclude exposed susceptible healthcare workers beginning 8 days after first exposure until 21 days after last exposure or 28 if received VariZIG, regardless of postexposure vaccination. See CDC https://www.cdc.gov/mmwr/preview/mmwrhtml/mm6228a4.htm
	Variola (see smallpox)			
	<i>Vibrio parahaemolyticus</i> (see gastroenteritis)			
	Vincent's angina (trench mouth)	S		
	Viral hemorrhagic fevers due to Lassa, Ebola, Marburg, Crimean-Congo fever viruses	S, D, C	DI	Single-patient room preferred. Emphasize: 1) use of sharps safety devices and safe work practices, 2) hand hygiene; 3) barrier protection against blood and body fluids upon entry into room (single gloves and fluid-resistant or impermeable gown, face/eye protection with masks, goggles or face shields); and 4) appropriate waste handling. Use N95 or higher respirators when performing aerosol-generating procedures. Largest viral load in final stages of illness when hemorrhage may occur; additional PPE, including double gloves, leg and shoe coverings may be used, especially in resource-limited settings where options for cleaning and laundry are limited. Notify public health officials immediately if Ebola is suspected.
	Viral respiratory diseases (not covered elsewhere)	S		
	Whooping cough (see pertussis)			
	Wound infections			
	Major	C	DI	No dressing or dressing does not contain drainage adequately.
	Minor or limited	S		Dressing covers and contains drainage adequately.
	<i>Yersinia enterocolitica</i> gastroenteritis (see gastroenteritis)			
	Zoster (varicella-zoster) (see herpes zoster/shingles)			
	Zygomycosis (phycomycosis, mucormycosis)	S		Not transmitted person-to-person.

References: HICPAC Guideline for Isolation Precautions: Preventing Transmission of Infectious Agents in Healthcare Settings 2007
<https://www.cdc.gov/infectioncontrol/pdf/guidelines/isolation-guidelines-H.pdf> and http://www.cdc.gov/hicpac/2007IP/2007ip_appendA.html