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Table 2. Modes of Transmission of Organisms in Child Care Setting

Mode of transmission	Bacteria	Viruses	Other
Fecal-oral	<i>Campylobacter</i> organisms <i>Clostridium difficile</i> <i>E. coli</i> O157:H7 <i>Salmonella</i> organisms <i>Shigella</i> organism	Astrovirus, Calicivirus Enteric adenoviruses Enteroviruses Hepatitis A virus Rotaviruses	<i>Cryptosporidium parvum</i> <i>Enterobius vermicularis</i> <i>Giardia lamblia</i>
Respiratory	<i>Bordetella pertussis</i> <i>H. influenzae</i> type b <i>M. tuberculosis</i> <i>N. meningitidis</i> <i>S. pneumoniae</i> Group A streptococcus	Adenovirus Influenza Measles Mumps Parainfluenza Parvovirus B19 Respiratory syncytial virus Rhinovirus Rubella Varicella-zoster virus	
Person-to-person via skin contact	Group A streptococcus <i>S. aureus</i>	Herpes simplex virus Varicella-zoster virus	Agent causing pediculosis scabies, and ringworm
Contact with blood, Urine and/or saliva		Cytomegalovirus Hepatitis B and C virus Herpes simplex virus	

From American Academy of Pediatrics. Children in out-of-home child care. In : Pickering LK, editor. 2000 Red book : Report of the committee on infectious diseases. 25th ed. Elk Grove Village, 2000:105-19

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Table 3. Infectious Diseases in the Child-Care Setting

Disease	Increased incidence with childcare
Respiratory tract infections	Otitis media Sinusitis Pharyngitis Pneumonia
Gastrointestinal tract infections	Diarrhea <sup>*</sup> Hepatitis A
Skin diseases	Impetigo Scabies Pediculosis Tinea(ringworm)
Invasive bacterial infections	<i>H. influenzae</i> type b <i>Neisseria meningitidis</i> <i>Streptococcus pneumoniae</i>
Aseptic meningitis	Enteroviruses
Herpesvirus infections	Cytomegalovirus Varicella-zoster virus Herpes simplex virus
Blood-borne infections	Hepatitis B HIV
Vaccine-preventable diseases	Measles, mumps, rubella Diphtheria, pertussis, tetanus Polio <i>H. influenzae</i> type b Varicella

From Pickering LK, Laborde DJ. Child care and communicable diseases. In : Behrman RE, Kliegman RM, Jenson HB, editors. Nelson textbook of pediatrics. 16th ed. Philadelphia: Saunders, 2000:1092-4

<sup>\*</sup>Diarrhea; rotavirus, *Giardia lamblia*, *Shigella*, *E coli* O157:H7, and less commonly enteric adenoviruses, *Aeromonas*, *Campylobacter*, *Clostridium difficile*, and *Bacillus cereus*

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Table 4. Immunizations for Day Care Employees

Vaccine	Personnel	Schedule
Diphtheria, tetanus	All	Every 10 years
Measles, mumps, rubella	All	Evidence of prior infection or two doses at least 1 month apart
Varicella	Nonimmune	Two doses 1 month apart
Polio	All	Primary immunization with inactivated polio vaccine if needed Consider booster if previously immunized
Influenza A/B	If older than 55 years of age	Annually
Hepatitis B	Advised	0, 1, and 6 months or 0, 1, and 2 months
Hepatitis A	All	Two doses 1 month apart

From Wald ER. Infections in day care environments. In :Feigin RD, Cherry JD, editors. Textbook of pediatrics infectious diseases. 4th ed. Philadelphia : Saunders, 1998:2826-41

Table 5. Indications and Guidelines for Rifampin Chemoprophylaxis for Contacts of Index Cases of Invasive *Haemophilus influenzae* Type b(Hib) Disease

Chemoprophylaxis not recommended
<ul style="list-style-type: none"> <li>▪ Occupants of households with no children younger than 4 years of age other than the index patient</li> <li>▪ Occupants of households when all household contacts younger than 48 months of age have completed their Hib immunization series*</li> <li>▪ Nursery and child care center contacts of 1 index case, especially those older than 2 years of age</li> <li>▪ Pregnant women</li> </ul>
Chemoprophylaxis recommended
<ul style="list-style-type: none"> <li>▪ All household contacts(except pregnant women)<sup>†</sup>, irrespective of age, with at least 1 contact younger than 4 years of age who is unimmunized or incompletely immunized<sup>*</sup> The index patient also should receive chemoprophylaxis</li> <li>▪ All members of a household with a child younger than 12 months of age, even if the primary series has been given</li> <li>▪ All occupants of a household with an immunocompromised child, irrespective of the child's Hib immunization status</li> <li>▪ Nursery and child care center contacts, irrespective of age, when 2 or more cases of invasive disease have occurred within 60 days</li> </ul>

\* Complete immunization is defined as having had at least 1 dose of conjugate vaccine at 15 months of age or older; 2 doses between 12 and 14 months of age; or a 2- or 3-dose primary series when younger than 12 months with a booster dose at 12 months of age or older

<sup>†</sup> Defined as persons residing with the index patient or nonresidents who spent 4 or more hours with the index case for at least 5 of the 7 days preceding the day of hospital admission of the index case

Table 6. Indications and Guidelines for Contacts of Index Cases of Invasive Meningococcal Disease

Chemoprophylaxis recommended

- Household contact: especially young children
- Child care or nursery school contact during previous 7 days
- Direct exposure to index patient's secretions through kissing or sharing toothbrushes or eating utensils, markers of close social contact
- Mouth-to-mouth resuscitation, unprotected contact during endotracheal intubation during 7 days before onset of the illness
- Frequently sleeps or eats in same dwelling as index patient

Chemoprophylaxis not recommended

- Casual contact : no history of direct exposure to index patient's oral secretions, eg, school or work mate
- Indirect contact : only contact is with a high-risk contact, no direct contact with the index patient
- Health care personnel without direct exposure to patient's oral secretions

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