Measles Post-Exposure Prophylaxis Instructions

Live measles vaccine (MMR) may prevent disease if given within 72 hours of exposure.

Immune Globulin Recommendations

Immune globulin (IG) may prevent or modify disease and provide temporary protection if given within 6 days of exposure.

- The recommended dose of IG given intramuscularly is 0.5 mL/kg of body weight (maximum dose = 15 mL). A weight of 30kg (66lbs) equates to the maximum dose of 15mL. Individuals who are at risk for severe disease and complications from measles (e.g., infants <12 months of age, pregnant women without evidence of measles immunity, and severely immunocompromised persons regardless of vaccination status because they might not be protected by the vaccine) should receive IG. IG administered intramuscularly (IGIM) is recommended for infants <12 months of age, and IG administered intravenously (IGIV) for severely immunocompromised persons and pregnant women who are exposed to measles. The dose of IGIV is 400mg/kg. Gammagard is provided in 300 mL (30g) vials. Gammagard package insert
- For infants aged 6 through 11 months, MMR vaccine can be administered in place of IG if administered within 72 hours of exposure. IGIM can be given to other persons who do not have evidence of measles immunity, but priority should be given to persons exposed in settings with intense, prolonged, close contact (e.g., household, daycare, classroom). However, postexposure use of IGIM might be limited because of volume limitations; persons who weigh >30 kg will receive less than the recommended dose and will have lower titers than recommended. IG should not be used to control measles outbreaks.

Any person without presumptive evidence of immunity exposed to measles who received IG PEP should subsequently receive MMR vaccine. MMR vaccine should be administered no earlier than six months after IGIM or eight months after IGIV, provided the person is then ≥12 months of age and the vaccine is not otherwise contraindicated.

Immune globulin (Human) (GamaSTAN) is a sterile solution of immune globulin for intramuscular administration. It is supplied in 10 mL single dose vials which are preservative-free and latex-free. GamaSTAN should be stored at 2-8° C (36-46° F) before use. GamaSTAN package insert.

Immune Globulin IM (IGIM) Administration

- IG is administered intramuscularly, preferably in the vastus lateralis and the deltoid muscles. The gluteal region should not be used routinely as an injection site because of the risk of injury to the sciatic nerve.
- Doses over 10mL should be divided and injected into several muscle sites to reduce local pain and discomfort. An individual decision as to which muscle is injected must be made for each patient based on the volume of material to be administered. If the gluteal region is used when

very large volumes are to be injected or multiple doses are necessary, the central region **must** be avoided; only the upper, outer quadrant should be used.

- Suggested volumes:
  - Deltoid:
    - Average 0.5 mL
    - Range 0.5–2 mL
  - Vastus Lateralis:
    - Average 1–4 mL
    - Range 1–5 mL
- Pediatric populations: limit to **<3mL per injection site**

Immune Globulin IV (IGIV) Administration

- IGIV is recommended for severely immunocompromised persons and pregnant women who are exposed to measles.
- Immune globulin (Human) (GAMMAGARD) is a sterile solution of immune **globulin for intravenous infusion. It can be stored refrigerated** 2-8° C (36-46° F) for up to 36 months before use or at room temperature up to 25°C [77°F] for up to 24 months. Expiration dates are printed on the outer carton and vial label. Do not use beyond expiration dates.
- The dose of IGIV is 400mg/kg. Reference the GAMMAGARD package insert for infusion rates and detailed IV administration guidance.