Toronto Public Health

PHYSICIAN INSTRUCTIONS FOR ADMINISTERING RABIES POST–EXPOSURE PROPHYLAXIS (PEP)

CASE INFORMATION

TPH File No.: _____ Public Health Inspector Name: _____

Date of Delivery: _____

PATIENT INFORMATION

Last Name: _____ First Name: _____

Date of Birth: _____ (YYYY / MM / DD) Weight: _____ ❑ kg ❑ lbs

PACKAGE CONTENTS

_____ doses of rabies **VACCINE**

❑ ImoVAX® Rabies (HDCV) *or*

❑ RabAvert® (PCECV)

_____ vials of rabies **IMMUNE GLOBULIN**

❑ ImoGAM® 150 IU/mL (2 mL) *or* ❑ KamRAB® 150 IU/mL (2 mL) *or*

❑ HyperRAB® 150 IU/mL (2 mL) *or* ❑ HyperRAB® 300 IU/mL (1 mL)

For more information on animal bites, risk assessments, and rabies PEP, health care providers should visit: www.toronto.ca/rabies.

Additional information is included on the second page of this document regarding:

- **Administering rabies vaccine**
- **Administering rabies immune globulin**
- **Serology testing**
- **Schedule deviations**

****NOTE: AN IMMUNIZATION CARD IS INCLUDED FOR THE VICTIM TO TRACK THEIR DOSE SCHEDULE WITH THE PHYSICIAN**

ADMINISTRATION SCHEDULE

Note 1: The patient should receive all doses as NACI recommends in the patient-specific schedule below (read left to right beginning with Day 0).
Note 2: Not all doses may be delivered in the same delivery and the patient should follow up with their primary care provider for subsequent doses.

Patient is	Day 0 Included in this delivery: Y ❑ N ❑	Day 3 Included in this delivery: Y ❑ N ❑	Day 7 Included in this delivery: Y ❑ N ❑	Day 14 Included in this delivery: Y ❑ N ❑	Day 28 Included in this delivery: Y ❑ N ❑
❑ **Not previously** immunized against rabies AND **immunocompetent**	Rabies Vaccine **AND** Rabies IMMUNE GLOBULIN	Rabies VACCINE	Rabies VACCINE	Rabies VACCINE	**NO FURTHER ACTION**
❑ **Not previously** immunized against rabies AND **immunocompromised or on antimalarial drugs***	Rabies VACCINE **AND** Rabies IMMUNE GLOBULIN	Rabies VACCINE	Rabies VACCINE	Rabies VACCINE	Rabies VACCINE
❑ **Previously** immunized with a **documented** complete course of rabies vaccine (HDCV/PCECV).^	Rabies VACCINE	Rabies VACCINE	**NO FURTHER ACTION**	**NO FURTHER ACTION**	**NO FURTHER ACTION**
❑ **Previously** immunized with a complete course of rabies vaccine **without documentation***	Serology prior to administering: Rabies VACCINE **AND** Rabies IMMUNE GLOBULIN	Rabies VACCINE	If an acceptable antibody concentration (0.5 IU/mL or greater) is demonstrated, the vaccine course may be discontinued, provided that at least two doses of vaccine have been given. Otherwise, administer the complete series based on patient immune status (as set out above).		

^Documentation of complete immunization with other types of rabies vaccine, or with unapproved schedules of HDCV/PCECV rabies vaccine, with demonstration of acceptable serology requires AMOH consult. *Prior to initiating Day 0: for persons who may have previously completed a full course of rabies immunization (without documentation).

How to Administer Rabies IMMUNE GLOBULIN (RabIg)

- Rabies IMMUNE GLOBULIN is supplied in 150 IU/mL (2 mL) or 300 IU/mL (1 mL) vials (check vial label).
- RabIg should be administered as soon as possible (on Day 0).
- There is no value in administering RabIg after Day 7 (i.e., 8 days or more) after the first dose of rabies vaccine was administered as it could interfere with immune response to the vaccine.

- Calculate the dose required:

  For 150 IU/mL IMMUNE GLOBULIN in 2 mL vials:
  *20 IU/kg x (client wt in **kg**) ÷ 150 IU/mL = dose in mL OR*
  *9.09 IU/lb x (client wt in **lb**) ÷ 150 IU/mL = dose in mL*

  For 300 IU/mL IMMUNE GLOBULIN in 1 mL vials:
  *20 IU/kg x (client wt in **kg**) ÷ 300 IU/mL = dose in mL OR*
  *9.09 IU/lb x (client wt in **lb**) ÷ 300 IU/mL = dose in mL*

- You will need to administer multiple vials of RabIg on Day 0. **The calculated dose should not be exceeded; discard the remainder.**
- **DO NOT administer RabIg at the same anatomical site as the vaccine.**
- RabIg comes as a liquid and should not be reconstituted.
- Infiltrate as much immune globulin as anatomically possible into and around the wound(s), similar to freezing a wound. **Ensure to use a different syringe and needle than for the vaccine.**
- Any remaining volume of RabIg should be injected intramuscularly (IM), using a new needle, at one or more site(s) distant from the site of vaccine administration (e.g., gluteal area, anterolateral thigh).
- If there are multiple or extensive wounds present, RabIg can be diluted in a diluent permitted by the specific product labelling in order to provide the full amount of RabIg required for thorough infiltration of all wounds.
- Other considerations:
  - Where there is no obvious wound (as may be the case for bat exposures), infiltrate as much RabIg as possible into the location(s) of the direct contact/exposure and the remainder intramuscularly, as described above.
  - Where there is no obvious wound, nor site of direct contact and rabies PEP is felt to be indicated (consult TPH for the risk assessment), the entire calculated dose of RabIg should be administered intramuscularly. As noted above, **DO NOT administer RabIg at the same anatomical site as the vaccine.**

How to Administer Rabies VACCINE

- Administer one dose of 1.0 mL rabies vaccine on each scheduled day of the rabies PEP series schedule.
- **Use a different syringe and needle than for the RabIg.**
- **DO NOT administer rabies vaccine at the same anatomical site as RabIg on Day 0.** The limb with the IM RabIg injection(s) can be used for subsequent doses of rabies vaccine in the vaccination series after Day 0.
- **DO NOT administer rabies vaccine in the gluteal muscle.**
- For patients 2 years of age and older: administer one dose (1 mL) IM in the deltoid.
- For patients between 1 year and 2 years of age: one dose (1mL) of rabies vaccine should be given IM in the anterolateral thigh, or in the deltoid if there is sufficient muscle mass.
- For patients less than 12 months of age: one dose (1 mL) of rabies vaccine should be given IM in the anterolateral thigh.

Vaccine schedule deviations

Vaccination schedules for post-exposure prophylaxis should be adhered to as closely as possible. It is essential that all doses be received. Doses should not be given early to allow for sufficient immune response between doses.

If a dose of vaccine is delayed, it should be given as soon as possible and the schedule resumed, preserving the spacing between intervals for subsequent doses. If there has been a significant deviation from the recommended vaccination schedule, immunity can be assessed with serology testing 7 to 14 days after the last vaccine dose.

When to Perform Serology

Serology should be performed as follows:

- Prior to initiating Day 0: for persons who may have previously completed a full course of rabies immunization (without documentation)
- Seven (7) to fourteen (14) days after last dose:
  - For persons vaccinated using vaccines other than HDCV / PCECV or by the intra-dermal route.
  - For persons who are immunocompromised or are taking immunosuppressive agents (e.g., anti-malarial chloroquine)
  - For persons who had substantial deviation in their vaccine course (e.g., by several days or more).

**Ship the specimen immediately, and separately from routine specimens.
Clearly mark packaging with **"Priority for WRA-Immuno Laboratory".

Contraindications and precautions

There are no contraindications for rabies vaccine or RabIg after significant exposure to a proven rabid animal; however, care should be taken if PEP is to be administered to persons who are hypersensitive to the products or to any ingredient in the formulation or component of the container, including the following potential allergens:

- Imovax® Rabies vaccine: neomycin, phenol red
- RabAvert® vaccine: amphotericin B, chick protein, chlortetracycline, neomycin, polygeline (gelatin)
- Imogam® Rabies immune globulin: latex in vial stopper

Imovax® Rabies vaccine is preferred for patients with a history of hypersensitivity reactions to eggs or egg products. RabAvert® vaccine should only be administered to these persons if Imovax® rabies is not available and with strict medical monitoring.