FREQUENTLY ASKED QUESTIONS ABOUT ANIMAL BITE & RABIES

1. Is it permissible to change the vaccine type during the course of vaccination with ARV?

Ans: It is desirable that the same type of modern rabies vaccine is used through the full course of vaccination with ARV. However, when completion of PEP with the same vaccine is not possible, switching may be done. It does not necessitate fresh starting of the course. [Note that only the cell culture vaccines that are approved by Govt. of India are recommended for ID route vaccination]. Please also note that a course of vaccine should be either ID or IM. Switching from IM to ID or reverse, in the middle of the course, is not advisable but may be done if absolutely required.

2. A monkey bite patient received the first two doses of ARV on time (on days 0 and 3) and also RIG on day 0. Then he defaulted for the third dose of ARV (day 7). However, the patient comes back on day 9. What should be done?

Ans: In this case, day 0 and 3 inj. were given and inj. due on day 7 could not be given as the patient did not turn up. When he comes back on day 9, the two remaining doses of vaccine must be given as close to the original dates of the schedule as possible i.e. the pending 3rd dose on day 9 itself and the fourth dose on day 28 as usual.

The first two doses of ARV are the most important. For the 3rd or 4th doses two or three days deviation may be accepted (although not recommended). So the running schedule can be resumed if a patient comes back a few days late.

3. A boy bitten by a cat received the first three doses of ARV in time (Day-0, Day-3 and day 7). In between 3rd and 4th shot of vaccine the boy got scratched again by a monkey drawing blood. What should be done?

Ans: No need to repeat the vaccine schedule. Just complete the usual vaccination up to 4th dose as per schedule. As first 3 doses of vaccination would be enough to produce antibodies, immunoglobulin is not needed for the latter incident.

4. If for some reason, IDRV (intradermal rabies vaccine) cannot be given in deltoid region, what are the alternative sites?

Ans: The two doses of ID injection have to be given at two sites that do not share the same lymphatic drainage. So, deltoid region of the two arms are all right. However, if deltoid region cannot be used for some reason, ID inj. can be given in suprascapular region or anterolateral aspect of thigh.

5. Where is IM regimen of ARV particularly recommended i.e. ID regimen is contraindicated?

Ans: In immune-compromised persons, ID route is not recommended for PEP. IM regimen is to be used in such persons. The same is true for persons who are on chloroquine for treatment or prophylaxis of malaria.

6. Why is RIG considered as life-saving?

Ans: Administration of Anti-Rabies Vaccine stimulates production of neutralizing antibodies by the patient`s immune system. Protective levels of antibodies (of more than 0.5 IU/ml of serum) appear as late as 7 to 14 days after the initial doses of vaccine (window period). Therefore, in case of shorter incubation period the patients are vulnerable to develop rabies during this window period of 7 to 14 days. RIGs are readymade anti-rabies antibodies and provide immediate passive immunity to rabies.

7. A boy bitten by a dog, has come to a PHC-OPD 3 days after the bite. Is wound washing necessary at this stage?

Ans: Yes. Since the rabies virus can persist and even multiply at the site of bite for a long time, wound washing must be performed even if the patient reports late.

8. A man, complaining of scratches by a monkey drawing blood, comes to the OPD 4 days after the incident. The M.O. examines the wound and decides to give anti-rabies vaccine. Should he also be given RIG although it is 4 days late?

Ans: Yes. RIG should be given at the first opportunity (but not beyond 7 days of initiation of ARV).

9. An animal bite patient presented at BPHC on the day of bite itself and has been given ARV inj on the day of bite. The second dose of ARV has also been given on Day-3. But RIG was not available at that time and would become available after Day-5. Can it be administered on Day-6 to that patient?

Ans: Yes. it can be administered up to the seventh day after the administration of the first dose of ARV, but not beyond that. Although it is recommended that RIG be administered on day 0 itself (i.e. the day of first dose of ARV), it is not essentially required that RIG and first ARV are given on the same day.

10. Why RIG should not be administered after seventh day of first vaccination?

Ans: Beyond the seventh day (after 3 doses of ARV have been administered), RIG is not indicated since an antibody response to ARV would have occurred by that time and administration of RIG at this stage can suppress the immune response of the patient to the ARV received.

11. Can RIG alone be administered if inj. ARV is not available at that time?

Ans: If the category of bite deserves administration of RIG (as per treatment protocol), the same should be given as early as possible even if inj. ARV is not available at that time. However, inj. ARV should follow at the earliest opportunity.

12. Splash of animal saliva in eye or on lips: What to do?

Ans: Contact of cornea or conjunctiva with animal saliva constitutes Category III exposure.

Thorough rinsing with water is to be done immediately.

Thereafter RIG is to be instilled as drops in the eye in normal dilution (as is used for injection).

If animal saliva falls on lips, the saliva is to be washed away thoroughly with water and mouth is to be rinsed well. Then the lips may be rinsed with RIG in normal dilution.

13. Why is observation of 10 days recommended in dog or cat, but not in bite by any other animal?

Ans: The observation period of 10 days is valid only for dogs and cats due to the fact that the incubation period of rabies is known and quite specific in dogs & cats, unlike in other animals. If the biting dog or cat had rabies virus in its saliva when it did the biting, research shows that it would die or show clinical signs of rabies within 10 days of bite.

However, this observation period does not come to any help if ID route is used for ARV administration, since the course of ID vaccination does not vary with the status of the animal.

14. Can rabies be transmitted from human- to- human?

Ans: Human-to-human transmission has never been confirmed other than organ transplantation. Organ transplanted from rabies –infected donors can transmit the infection to the organ recipient. Individuals with symptoms of encephalitis before death should, therefore be excluded as organ donors. However people who have been exposed closely to the secretions of a patient with rabies may be offered PEP as a precautionary measure.

15. What is the purpose of Pre Exposure Prophylaxis (PrEP)? Who should take PrEP?

Ans: Purpose of PrEP is to pre-immunize the persons who are at high risk of getting infection so that they can get protection against rabies exposure.

High risk group includes: Veterinarians, Laboratory staff handling the virus and infected materials, Clinicians and persons attending to human rabies cases , Animal handlers and catchers, wildlife workers ,Quarantine officers and Travelers from rabies free areas to rabies endemic areas.

16. **Co administration of other Vaccines with Rabies vaccine?**

Ans: Evidence supports safe co-administration of rabies vaccines with other inactivated vaccines, such as diphtheria–tetanus–pertussis, inactivated Japanese encephalitis and poliomyelitis vaccines, and live vaccines such as measles–mumps–rubella vaccine. Separate syringes and different injection sites should be used. If RIG is used, live vaccines should be postponed for 3–4 months. Rabies vaccine can also be given concomitantly with COVID-19 vaccines in adults. Currently, there is insufficient evidence for a recommendation on concomitant administration of COVID-19 vaccines in children and adolescents, however as rabies is fatal it should be administered first if co-administration is not recommended.