

Title: INCOMPLETE AND IMPROPER POST EXPOSURE TREATMENT
LEADING TO RABIES:A CASE STUDY

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Keywords

Abstract Rabies is a vaccine preventable viral disease which occurs across more than 150 countries of the world. Human mortality from rabies was estimated to be 20,000 in India. There are about 55,000 cases of deaths due to rabies per year with 56% of deaths estimated to occur in Asia and 44% in Africa

Case Report

INCOMPLETE AND IMPROPER POST EXPOSURE TREATMENT LEADING TO RABIES: A CASE STUDY

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Introduction

Rabies is a vaccine preventable viral disease which occurs across more than 150 countries of the world. Human mortality from rabies was estimated to be 20,000 in India¹. There are about 55,000 cases of deaths due to rabies per year with 56% of deaths estimated to occur in Asia and 44% in Africa.²

Rabies is a highly fatal disease caused by rabies virus (lyssa virus type I). It is transmitted to man by bites and licks of rabid animals. Though it is a fatal disease yet the prophylaxis for animal bite is available. It is available at Govt. hospitals free of cost.

In spite of complete effective post exposure prophylaxis being available yet a number of rabies cases still occur which is very depressing. The large number of deaths due to rabies can be attributed to the fact that in spite of availability of effective post exposure prophylaxis, people are not aware of the various aspects of the disease and its prevention.³ Though complete post exposure prophylaxis is available yet there is some gap in the knowledge of prevention because of which in spite of free treatment being available still cases of rabies keep occurring.

Case Profile

A 30 year old woman of middle socio-economic status came to the ARC OPD of SCB Medical College, Cuttack on 18.12.2013 with a complaint of aerophobia, photophobia, problem of speech articulation and hydrophobia. On eliciting the history it, was found that the victim was bitten by a stray dog on her scalp, frontal region on 28.11.13 around 7 P.M. at her residence in Nayagarh by a suspected rabid stray dog. The dog first attacked the child of the woman who was bitten on the face. The woman tried to save her child from the dog and in the process got bitten by the dog on the head in the frontal region. The wounds of both mother and son were

of Cat. III bite wounds according to WHO classification.

She went to DHQ hospital the next day morning on 29.11.12 at Nayagarh and was not given the first AID of wound washing with soap and water and her scalp was stitched. Before stitching immunoglobulin was not administered at the wound site. She was also given 1st dose intradermal IDRV on both her arms. Her son also received the IDRV 1st dose. The wound of the son was not washed with soap and water also. No immunoglobulin was given to the Cat. III bite wound of the son. The son did not receive any stitch on his face.

The lady completed 3 doses of IDRV at Nayagarh DHQ hospital and on 16.12.13 the lady developed mild fever and irritability. Next day she became more irritable and was brought to the SCB MCH ARC OPD on 18.12.13. On examination it was found that the lady was suffering from aerophobia, hydrophobia and photophobia. She was referred to Medicine department but her relatives took her to a private hospital where she died the next day. The child was given immunoglobulin and he completed the anti rabies treatment at SCB Medical College & Hospital, ARV OPD after taking subsequent doses of IDRV vaccine.

The child was again started with anti rabies vaccine afresh by ID route at SCB MCH, Cuttack. He completed the vaccine schedule at SCB MCH, ARV OPD.

This shows a very depressing state of affairs. The gap in knowledge of prophylaxis is seen here to be the lack of awareness of importance of first AID. Thorough wound cleaning with soap & water for ten minutes which decreases the viral load of the wound is a very important procedure by which the chances of development of the disease are greatly decreased. After that a virucidal agent should be applied on the wound. The lady or her family members did not know the importance of first aid neither the staffs of DHQ hospital

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were aware of the importance of washing the wound with soap and water for decreasing the virus load of the wound. RIGs are life saving biologicals scarce and expensive especially human RIGs. Worldwide less than 3% of at risk dog bite cases receive RIGs and its often still not injected into wounds^{4,5} It is sensible and advisable to continue the existing practices of administration of RIGs, the dosage of which is calculated on the body weight of the patient and based on the recommendation of WHO. The stitches were given without the cover of immunoglobulin which shows that the importance of immunoglobulin administration plays such a vital part for which one important life was lost.

Though the mother died the next day, the child survived after completing the course.

Conclusion

The lack of awareness about prophylaxis of rabies could claim such a young life. There exists the gap in knowledge on the part of public and also health care personnel about the first aid procedure of wound washing with soap & water and applying virucidal agents on the wound. These gaps in knowledge should

be bridged by extensive awareness programmes. According to National guidelines for management of animal bites suturing of wound should be avoided as far as possible. If unavoidable minimum loose sutures should be applied after adequate local treatment along with proper infiltration of anti rabies serum⁵. The Immunoglobulin must be given in all category III animal bites without fail. There should be extension awareness generation of health care professionals of peripheral health institutions about the First aid and immunoglobulin application of animal bite cases.

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