Outcome of Transcutaneous Retrobulbar Injection of Liposomal Amphotericine B in Post COVID-19 Rhino-Orbital Cerebral Mucormycosis - Our Experience at GMC Akola

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1. Introduction

Mucormycosis is extremely aggressive and potentially fatal invasive fungal infection. Most common clinical manifestation of mucormycosis is Rhino-orbital-cerebral mucormycosis.

Transcutaneous retrobulbar injection of amphotericine B is treatment of choice along with intravenous antifungal.

Epidemiology

Global burden of rhino-orbital cerebral mucormycosis was seen during pandemic of 2nd wave of COVID-19.

0.4 MILLIONS OF CASES SEEN AFTER COVID-19.


Risk factors for Rhono-orbital cerebral mucormycosis.

1) Immunocompromised individuals
2) Post COVID-19 patient due to indiscriminate use of immunosuppressant

2. Aims and Objective

1) To assess outcome and response with transcutaneous retrobulbar injection of liposomal Amphotericine B.
2) To assess prognosis of disease.

Study Design

Intervention single center retrospective study

Duration-3 month (MAY 2020-JULY 2020)

Inclusion Criteria

Previously COVID-19, RT-PCR POSITIVE Patient

Exclusion criteria

Pregnant pt.

3. Materials and Methodology

Total 25 patients were selected in thus study from previously recorded data.

4. Observation and Discussion

According to Sion hospital grading system patient were categorized into mild moderate and severe grade, 6 (25%) pt were in mild, 13 pt (52%) pt were in moderate 6 pt were in severe grade of rhinoorbital cerebral mucormycosis cases.

Firstly 1 ml of injection lignocaine given retrobulbar space.

Then 1ml of 3.5 mg of injection of liposomal amphotericin B retrobulbar space for 3 cosecutive days.

5. Result

25 patient of rhino orbital cerebral mucormycosis treated with transcutaneous retrobilbarinjection if liposomal amphotericin B.

No side effect was seen.

Improvement was seen in mild to moderate grade of cases.

6. Conclusion

TRAMB-Transcutaneous retrobulbar injection of amphhtericine B, is viable option in patient, where orbital exenteration or debridement is not indicated.

Positive effect if TRAMB:
1) Reduced need for orbital exenteration
2) Intracranial spread is reduced
3) Improve visual prognosis
4) Improved severity score, and life expectancy.