



INTRODUCTION

- Trauma related injuries are vast and cases of bilateral ears avulsion were relatively under-reported or rare.
- Most of the cases reported were unilateral ear injuries and the successful surgical interventions in preserving the structure of the ear cosmetically.
- Unsuccessful cases of reconstruction were rather not reported. This is a case report of bilateral ears avulsion with inevitable amputation of bilateral ears.

THE CASE

A 40 years old man with no known medical illness presented to the Emergency Department via ambulance after involved in a road traffic accident. Initial examination revealed that he has sustained bilateral ear avulsion and mild head injury with no other obvious injuries. There was bleeding from the left ear, however as the structure was totally distorted, direct compression bandaging was done instead of trial of suturing and direct closure of the wound. No cerebrospinal fluid leakage was seen. CT imaging was done revealing right parietal subarachnoid haemorrhage with thin subdural haemorrhage at the occipital region with no other skull or cervical spine fractures. GCS remains stable and unchanged. He went for an operation for both of his ears condition by ORL team and the structures were deemed unfavourable for reconstruction. Both of his ears were removed and primary closure were done as the amputated segment was missing and microsurgery was not available. He was admitted for observation and further evaluation.

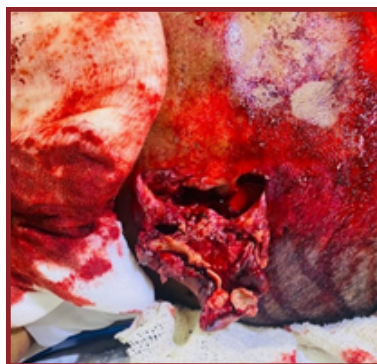


Figure 1 : Left ear



Figure 2 : Right ear



Figure 3 : Left ear post op



Figure 4 : Right ear post op

The management of traumatic ear amputations requires a multifaceted approach, prioritizing rapid hemorrhage control and timely surgical intervention for ear salvage. Careful consideration of the patient's individual circumstances and the available treatment options are essential to optimize outcomes.

CONCLUSION

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DISCUSSION

Immediate hemorrhage control in traumatic ear amputations is critical to prevent hypovolemic shock and death. Multiple techniques are available and compression dressing being the common initial measure, hemostatic suturing and hemostatic dressing application would be the other choice for haemorrhage control. In this case, as the ear structure was totally distorted, compression dressing was done instead of suturing and limitation of hemostatic dressing availability. Tranexamic acid (TXA) administration had been proven to reduce the mortality in trauma patients, TXA may be given via intravenously or topically. Salvage of amputated ears focuses on functional outcomes and quality of life. Successful reattachment, reported with rates of 50%-80%, depends on injury severity, time since amputation, and the surgical expertise. Al-Ali et al. had developed an algorithm for surgical management of traumatic auricular avulsion injuries in the acute settings as shown in Figure 5. In this case, primary closure was opted as the amputated segment was missing and microsurgery was not available.

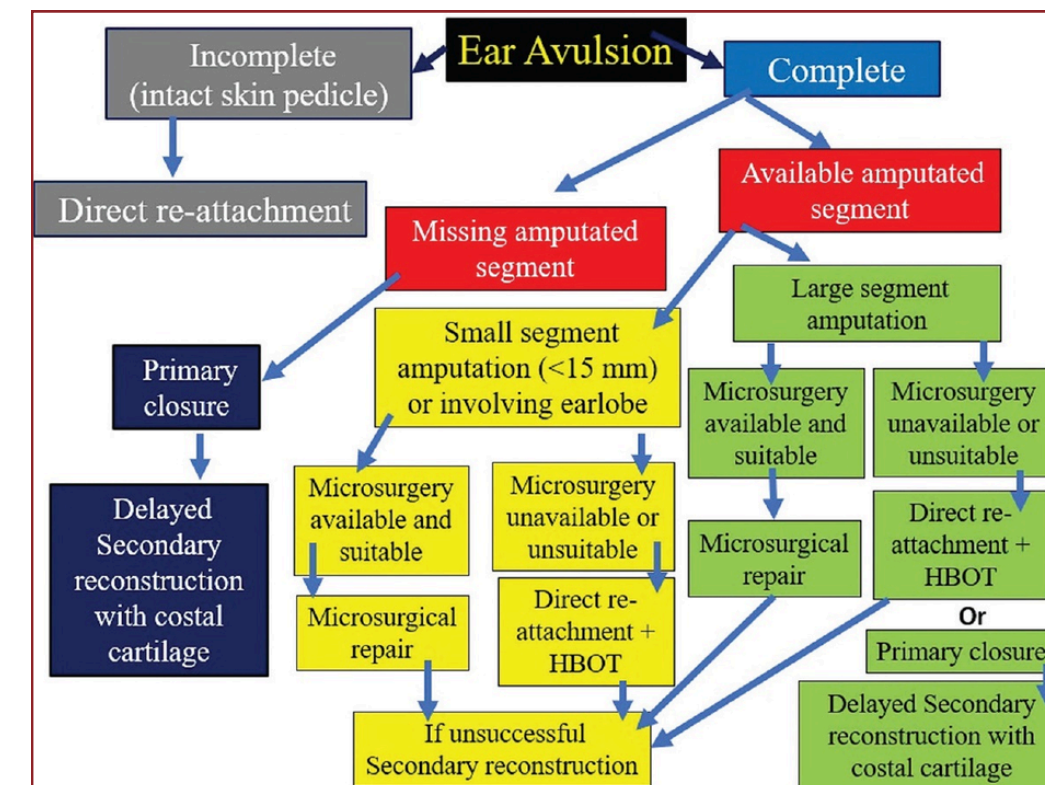


Figure 5 : A developed algorithm for surgical management of traumatic auricular avulsion injuries in the acute settings depending on the degree of the avulsion, size of the amputated segment, and availability of microsurgery facility and expertise. HBOT: Hyperbaric oxygen therapy

REFERENCES

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