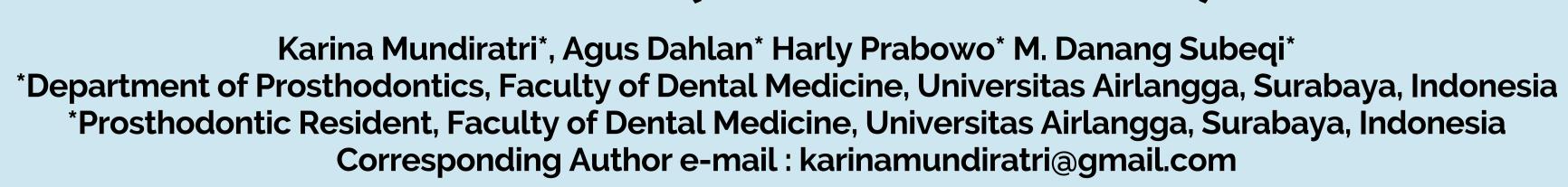


# SURGICAL OBTURATOR PROSTHESIS FOR POST-HEMIMAXILLECTOMY PATIENT (A CASE REPORT)





## **BACKGROUND**

One of the most frequent treatment for oral cancer is removal of the affected area with surgery, which can cause defect and cause difficulties in speech, swallow, and mastication. Surgical obturator inserted immediately after surgical can support soft tissue healing, minimize contractions of the wound, and promote rehabilitation of oral functions.

## **OBJECTIVE**

This case report describe prosthodontic treatment of post hemimaxillectomy patient with surgical obturator.

#### CASE REPORT

Patient: male, 44 years old

referred to prosthodontic specialist clinic by head and neck surgery department Dr.Soetomo general hospital intra oral examination: ulceratic mass on the hard palate. The remaining teeth were in good condition history: Six months earlier, the patient had been diagnosed with localized oral squamous cell carcinoma in anterior region of the maxilla, then the infected site were removed through surgery. Three months after the first surgery, the patient found another persistent ulcer on the upper mucolabial fold region and the hard palate.

Diagnosis: recurrent squamous cell carcinoma on the upper jaw (after histopathology examination)

#### CASE MANAGEMENT

- Pre-operative impression taking using irreversible hydrocolloid material (alginate) in stock tray to produce model cast
- the cast was sent to head and neck surgeon to delineate the area of resection, and drew the outline of resection, then was reduced based on the outline





- Mounting the cast into average articulator
- Fabricate the adam's clasp on both upper molar
- Teeth arrangement
- Acrilyc packing
- Finishing and polishing the surgical obturator
- perforate along the peripheral border of the surgical obturator



- surgical obturator was soaked in antiseptic solution before surgery.
- After the hemimaxillectomy surgery, surgical obturator were adjusted in the patient.
- wire were inserted into the anterior, posterior right and posterior left holes, then the obturator adjusted in the site
- attached the wire to the zygomatic bone







- Then suture were performed along the peripheral holes continue to close the surgical site with suture.
- debridement of the wound.
- Patient was scheduled for routine recall appointments for the examination of the healing tissues and adjustment of the obturator.

## DISCUSSION

Reconstruction of the hemimaxillectomy with an obturator has several advantages. Besides replacing the missing soft and hard tissues, it enables the patient to swallow, masticate, and speak approximately in the normal way. It also forms a barrier between nasal and oral cavities. [1], [2] Prosthodontic rehabilitation of maxillary acquired defects could be organized into three stages of treatment. For each step a different type of obturator is fabricated. [3]

Surgical obturator is one of the type of appliance that is constructed from an impression obtained prior to the operation day and inserted at the conclusion of resection of the maxilla. Many benefits of using immediate surgical plate can be gained including: provision of a stable matrix for the surgical packing; it can form a barrier between the oral cavity and wound during the initial healing, and also enables the patient to speak and swallow more effectively. [3], [4] For this case, the immediate surgical obturator was fabricated before surgery and inserted at the day of surgery immediately after. The obturator designed with teeth arrangement, to maintain facial appearance, and gain positive physiological effect on patients.

## CONCLUSION

Proper diagnosis and proper treatment planning will result in good rehabilitation of patient after the surgery and improve the patient's quality of life. Surgical obturator also improve tissue healing progress, and minimize facial disfigurement. Surgical obturator can improve the rehabilitation process such as speaking, swallowing, and chewing food. In this case, the treatment outcome was good, and the patient was scheduled to receive the definitive obturator treatment three months after that .

#### REFFERENCES

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