

POLITEKNIK KESEHATAN TANJUNGPINANG
JURUSAN TEKNIK GIGI

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Pembuatan *Full Denture* Resin Akrilik Dengan Kasus Linggir Datar

Xvii + 64 Halaman + 53 Gambar + 3 Tabel + 5 Lampiran

RINGKASAN

Kehilangan gigi secara menyeluruh berdampak pada penurunan fungsi pengunyahan, estetika, dan kualitas hidup pasien. Gigi tiruan lengkap lepasan menjadi salah satu pilihan rehabilitatif, namun pada kasus *resorpsi* tulang alveolar dengan bentuk linggir datar, tantangan muncul terkait dengan retensi dan stabilitas protesa akibat minimnya dukungan jaringan keras.

Laporan tugas akhir ini bertujuan untuk mengetahui desain gigi tiruan yang sesuai, cara mencapai retensi dan stabilitas yang optimal, teknik penyusunan gigi yang tepat, serta kendala dan solusi dalam proses pembuatannya.

Prosedur pembuatan *full denture* resin akrilik pada kasus linggir datar, yang dilaksanakan di Laboratorium Teknik Gigi RSPAD Gatot Soebroto. Prosedur meliputi pencetakan awal, pembuatan sendok cetak perorangan, pembuatan *bite rim*, penanaman artikulator, penyusunan gigi, *flasking, boiling, curing, deflasking, finishing* dan *polishing*. Kendala berupa kurangnya retensi dan stabilitas terjadi akibat tidak dilakukan *outline* sendok cetak perorangan, *post dam, remounting*, serta *selective grinding*. Solusinya dilakukan prosedur *relining* langsung dengan resin akrilik *self cure* agar basis gigi tiruan dapat menyesuaikan dengan jaringan mukosa pasien.

Hasil pembuatan *full denture* pada kasus linggir datar dilakukan sesuai prosedur laboratorium, dengan memperhatikan aspek retensi, stabilitas, dan kenyamanan. Desain basis *full plate* dan *horse shoe* dipilih untuk meningkatkan kontak jaringan dan memberikan ruang bagi lidah. Pemilihan elemen gigi disesuaikan dengan SPK serta karakteristik pasien. *Relining* langsung terbukti efektif dalam meningkatkan adaptasi dan kenyamanan penggunaan gigi tiruan. Kendala, tidak retensi pada rahang atas karena tidak dibuat *post dam* dan sendok cetak perorangan rahang atas tidak sesuai anatomi lengkung rahang. Saran, mengikuti prosedur laboratorium sesuai dengan kasus yang akan dikerjakan.

Kata Kunci: *Full Denture*, Resin Akrilik, Linggir Datar, Retensi, *Relining*
Referensi: 54 (1970–2024)

**TANJUNGKARANG POLYTECHNIC HEALTH
DENTAL TECHNOLOGY DEPARTMENT**

Final Project Report, June 2025

Helen Kurniati

Fabrication Of Acrylic Resin Full Denture With Flat Ridge

Xvii + 64 Pages + 52 Figures + 3 Tables + 5 Appendices

ABSTRACT

Complete tooth loss results in decreased masticatory function, aesthetics, and quality of life. A removable complete denture is one of the rehabilitative options, but in cases of alveolar bone resorption with a flat ridge, challenges arise regarding the retention and stability of the prosthesis due to the lack of hard tissue support.

This final project report aims to determine the appropriate denture design, how to achieve optimal retention and stability, appropriate tooth preparation techniques, and obstacles and solutions in the manufacturing process.

Procedure for fabrication an acrylic resin full denture in the case of a flat ridge, which was carried out at the Dental Technician Laboratory of Gatot Soebroto Army Hospital. The procedure includes initial moulding, individual tray fabrication, bite rim fabrication, articulator placement, tooth arrangement, flasking, boiling, curing, deflasking, finishing and polishing. Obstacles such as lack of retention and stability occurred as a result of not performing individual tray outline, postdam, remounting, and selective grinding. The solution is a direct relining procedure with self cure acrylic resin so that the denture base can adjust to the patient's mucosal tissue.

The fabrication of the full denture in the flat plate case was performed according to laboratory procedures, considering aspects of retention, stability, and comfort. Full plate and horse shoe base designs were chosen to improve tissue contact and provide space for the tongue. The selection of dental elements was adjusted according to the work order and patient characteristics. Direct relining proved effective in improving denture adaptation and comfort. Obstacles, no retention in the maxilla because no postdam was made and the individual tray did not conform to the anatomical contour of the maxilla. Suggestion, follow laboratory procedures according to the case to be worked on.

Keywords: Full Denture, Acrylic Resin, Flat Ridge, Retention, Relining

References: 54 (1970-2024)