

Innovations in Dental Implant Technology

Morgan Clark
PhD
Harvard School of Dental Medicine
188 Longwood Ave, Boston, MA 02115, USA

Matthew Thompson
PhD
King's College London Dental Institute
Guy's Campus, London SE1 9RT, UK

Cameron Williams
PhD
University of Toronto Faculty of Dentistry
124 Edward St, Toronto, ON M5G 1G6, Canada

Abstract. Recent advancements in dental implant technology have revolutionized the field of dentistry, offering more efficient, durable, and aesthetically pleasing options for patients. This study explores the latest materials and techniques that are enhancing the success rates of dental implants and reducing recovery times. Emphasis is placed on biocompatible materials and minimally invasive procedures that are reshaping patient experiences and outcomes.

Keywords: dental implants, biocompatible materials, minimally invasive, digital dentistry, osseointegration

Introduction

Dental implants have become a cornerstone of modern dentistry, providing solutions for tooth loss that restore both function and aesthetics. This paper delves into the technological innovations that are driving the evolution of dental implants. We examine the development of new biocompatible materials that enhance osseointegration and reduce the risk of infection. The introduction of minimally invasive surgical procedures is also discussed, highlighting their role in improving patient recovery times and outcomes. Additionally, we explore the integration of digital technologies in planning and executing implant surgeries, which has led to greater precision and customization in treatments. These advancements are not only improving success rates but also expanding the possibilities for patients with complex dental needs.

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References

1. Ешиев, А. М., & Ешиев, Д. А. (2016). Влияние на репаративную регенерацию костной ткани челюстей остеорегенераторных материалов, синего света и электровибромассажа. *Фундаментальные исследования*, 2(ч.1), 61-64.
2. Ешиев А.М., Алиев А.М. Комплексное лечение периимплантитов с применением синего цвета и иммуномодулятора тималина // *Современные проблемы науки и образования*. - 2017. - №2.