

Case Report

Embedded earrings as a result of misuse: Case report

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ABSTRACT

Earrings-related complications are mostly caused by piercing. To our knowledge, there is no report regarding embedded earrings without the effect of piercing in the English-language literature. In this report, we describe two cases of embedding of earring pins while wearing but not having resulted from piercing.

KEY WORDS

Ear, instrument, complication.

INTRODUCTION

Human beings, who have wanted to have a more beautiful appearance, have used numerous accessories since the ancient times. In particular, earrings are one of these accessories which are known to have some complications. These complications which usually result from piercing are well documented and may involve local infection, sepsis, keloid scar formation, sarcoid granulomas, cyst formation, bifid ear lobe deformity, and organizing hematoma.¹

As mentioned above, earrings-related complications are mostly caused by piercing. To our knowledge, there is no report regarding embedded earrings without the effect of piercing in the English-language literature. In this report, we describe two cases of embedding of earring pins while wearing but which have not resulted from piercing.

CASE REPORTS

Patient 1: A 14-year-old female was admitted with an embedded earring pin in her left ear lobe. Her ears

had been pierced when she was 5 years old. She described pain and redness in the left ear lobe for a week, in which an earring was worn one month ago. Medical history of the patient revealed the same complaints and the removal of an embedded earring pin from the right ear lobe by herself 15 days before the office visit. The disappeared pin was palpated by physical examination, and it was removed by a small posterior incision under local anesthesia. The removed material was 6 x 3 x 3 mm in size (Figure 1). The incision was sutured with a non-absorbable suture. A seven-day local and systemic antibiotic treatment was administered to the patient after suturing. She was free of symptoms on follow-up examinations.

Patient 2: A 16-year-old female presented with an embedded earring pin in her right ear lobe. She said her ears were pierced when she was a young child and she had been using earrings since her early childhood. She had a 2-day history of pain and swelling on her right ear lobe on admission. A 6 x 3 x 3 mm earring pin identical to that found in Patient 1 was removed under local anesthesia (Figure 1). A seven-day antibiotic

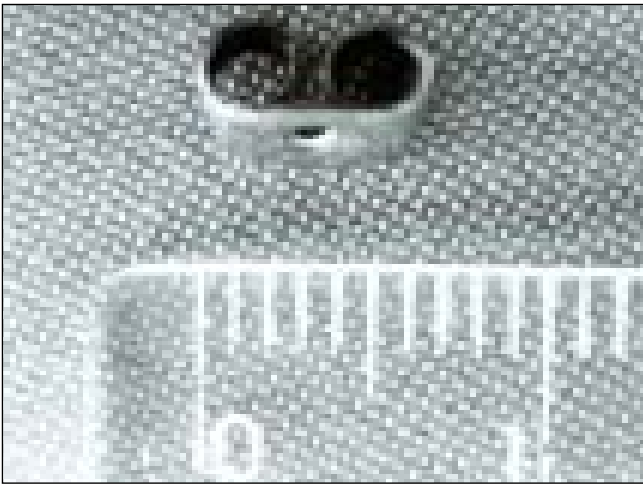


Figure 1: Photography (macro mode) of an embedded pin removed from ear lobe of patient 1. The pin of other patient was identical.

treatment was given for local infection. After the treatment no further complaint was noted.

DISCUSSION

Several risks are associated with ear piercing. Saleeby et al reported a variety of complications: local infection, keloid scar formation, nickel dermatitis, sarcoid granulomas, cyst formation, bifid ear deformity, organizing hematoma, staphylococcal sepsis, osteomyelitis, and hepatitis.¹ These complications usually resulted from wrong application of ear-piercing techniques which include needles, safety pins, sharpened studs, self-piercing kits, and spring-loaded guns. Particularly, the usage of spring-loaded guns was reported to result in an increased frequency of the complication of the earring training stud becoming embedded in the ear lobe several weeks following ear piercing.^{2,3} Tearing of the ear lobe is also a complication of earring misuses which require surgical repair.⁴

Folz et al have reported medical complications through jewelry in a series of 35 consecutive patients.⁵ In their patients, embedded studs were removed from the ear lobe, nasal ala, and the lower lip. The ear was affected in 17 of the 35 patients in their study, 10 of whom sustained complications in the area of the auricular cartilage after high ear piercing; 6 patients had complaints after lobular piercing. They concluded that the main causes for embedding are usually seen in

localized infections, the application of ornaments with spring-loaded guns, improperly trained personnel performing the application of the ornament, application of the ornament with excess pressure, and also application of inadequate ornaments.

Although the above mentioned complications were seen during or following ear piercing, our two patients experienced embedding of earrings and infection while wearing them. Both patients' ear lobes had been pierced long before the earring complications. Besides, because of the delayed discovery of complete embedding in our patients, they were not able to remove the rings at the first sign of embedding. To our knowledge, this kind of earring complication has not been reported previously in the literature.

Earring-pin instruments probably exert high pressure on the soft tissue, since the lobe is compressed between the earring stud and its asymmetrical backing. Various authors have suggested that the frequency of complications from commercial earring use may be the result of improper aseptic technique and earring use in young children.⁶⁻⁸ The complications of our two adolescent patients had resulted from usage, but not piercing. Despite our patients not having described a known cause for embedding, the wearing of ornaments while sleeping might have caused this problem. Regarding this, we suggest use of earrings without pins, and, if used, to remove these during the night, especially in case of young children.

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