

# AUDIOLOGICAL PROFILE OF MUSICIANS PLAYING ON ROCK BANDS, A LITERATURE REVIEW



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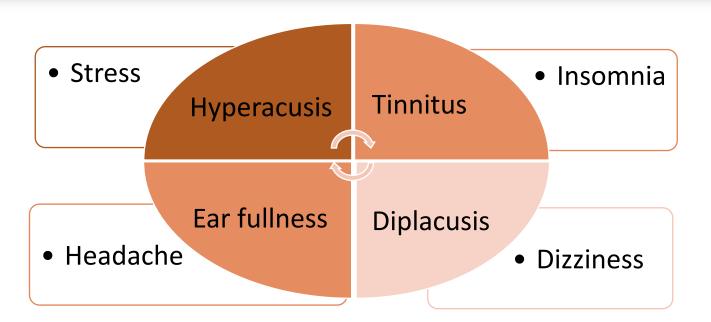
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## INTRODUCTION

Music is the combination of rhythm, harmony and melody, a set of aspects that make it an art. However, if heard at high intensity, it can become a potential threat to the human ear. Depending on the intensity, time and daily frequency of this exposure, the musician can develop hearing loss and other extra auditory aspects harmful to the health of exposed individuals. Therefore, early detection of the triggering of this loss is very important, and prevention is always ideal.



**Table 1**. Symptoms that can occur as a consequence of harmful noise exposure

## **OBJECTIVE**

Evaluate the audiological profile of musicians who play in rock music bands.

## METHODS

A systematic review was carried out to collect data on the audiological profile of musicians who play in rock bands, through a bibliographic survey, in the MEDLINE, PUBMED and VHL databases. Twenty-three articles dated from 1998 to 2021 with health descriptors (DeCS) were included: Hearing, Hearing Loss, Noise and music-induced hearing loss.

## RESULTS

In the articles researched, many professionals reported difficulty in understanding speech in a noisy environment, intolerance to loud sounds, tinnitus, ear fullness, earache and dizziness. When studying the implications of hearing loss in musicians, it is possible to see that any degree of hearing loss is irreversible and can affect professional performance and trigger permanent organic and psychological changes.

#### REFERENCE:

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#### Alteration otoacoustic emissions

• Transient emissions at 2KHz and distortion product and 0.75, 1, 4 and 6KHz statistically significant difference.

#### Alteration of acoustic reflexes

 Increase or absence of response at frequencies of 2, 3, 4 and 6HKz.

#### Alteration in tonal threshold

• Presence of notch, uni or bilateral, especially at the frequency of 6000 Hz in 21.7% of musicians.

#### Incidence of hearing loss

• Musicians were 3.51 times more likely to develop hearing loss per sound pressure level.

#### Incidence of tinnitus

• Musicians had 1.45 times more tinnitus than the general population.

 Table 2. Main audiological findings in musicians who play in rock bands

## CONCLUSION

The findings of this review indicate that there is a trend towards a higher incidence of hearing loss in musicians than in the general population and that tinnitus is the most disturbing auditory symptom after the concert. However, as in any evaluation, the answers must be analyzed together with other findings and as the number of articles found in this population is small, further studies need to be carried out.