

CICLO CARLOS CHAGAS

DE PALESTRAS

12ª EDIÇÃO

100+15: O TEMPO NÃO PARA
Informação, controle, cuidado e eliminação:
diferentes estratégias para uma doença com
múltiplas dimensões

LIVRO DE RESUMOS

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RESUMO 13

EVALUATION OF DIZZINESS AND RINGING IN THE EARS IN CHAGAS DISEASE

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Although there is a variety of studies linking Chagas Disease (CD) with its main clinical manifestations, there are no significant works directly associating the disease with otoneurological manifestations, especially the symptom of dizziness/vertigo and/or ringing in the ears. The objective of this study was to investigate the cause of dizziness/vertigo and ringing in the ears in patients with CD to try to answer the following question: Are vestibulocochlear complaints secondary to vestibular or cardiovascular etiology? Patients with CD treated at INI-Fiocruz from November 2021 to July 2022, who presented complaints of dizziness/vertigo/instability/imbalance associated or not with ringing in the ears, were evaluated through an otoneurological research protocol that included tonal and vocal audiometry, Video Head Impulse Test (VHIT), and posturography. The results of these exams were correlated with the clinical forms (indeterminate, cardiac, or digestive) of the disease and comorbidities. 123 patients with CD were seen in the otorhinolaryngology clinic. The average age was 64 years, with a predominance of females (68.9%). An association was found between the cardiac form and dizziness ($p=0.019$), as well as between the complaint of dizziness and abnormalities in VHIT ($p=0.002$) and posturography ($p=0.003$). On the other hand, ringing in the ears was not associated with any clinical form of CD. Ringing in the ears is not directly associated with CD but rather with present comorbidities, especially metabolic alterations. Regarding dizziness, there is an association with cardiac abnormalities in these patients, with a lower positivity of otoneurologic exams indicating vestibular dysfunction, suggesting a possible cardiac etiology for these patients. Therefore, otoneurological manifestations in individuals with CD have a direct connection with cardiac alterations related to the disease.

Evaluation of dizziness and ringing in the ears in Chagas disease

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Introduction

Although there is a variety of studies linking Chagas Disease (CD) with its main clinical manifestations, there are no significant works directly associating the disease with otoneurological manifestations, especially the symptom of dizziness/vertigo and/or ringing in the ears. The objective of this study was to investigate the cause of dizziness/vertigo and ringing in the ears in patients with CD to try to answer the following question: Are vestibulocochlear complaints secondary to vestibular or cardiovascular etiology?

Methodology

Patients with CD treated at INI-Fiocruz from November 2021 to July 2022, who presented complaints (associated or not with ringing in the ears) of:

- Dizziness;
- Vertigo;
- Instability;
- Imbalance;

Patients were evaluated through an otoneurological research protocol that included:

- Video Head Impulse Test (VHIT);
- Posturography;
- Tonal and Vocal Audiometry;

The results of these exams were correlated with the clinical forms (indeterminate, cardiac, or digestive) of CD and comorbidities.

Result of exams performed on patients with CD (n = 123), INI-Fiocruz,

VARIABLE	RESULT (%)
<u>VHIT</u>	
NORMAL	83 (67,4)
WITH AMENDMENT	16 (13,0)
EXAM NOT DONE	24 (19,6)
<u>POSTUROGRAPHY</u>	
NORMAL	47 (38,2)
WITH AMENDMENT	39 (31,7)
EXAM NOT DONE	37 (30,1)
<u>AUDIOMETRY</u>	
NORMAL	23 (18,7)
WITH AMENDMENT	81 (65,8)
EXAM NOT DONE	19 (15,5)

Association of dizziness with the clinical form of CD

Variable	Dizziness		p-value
	Yes n (%)	No n (%)	
Clinical Form of CD			0,019
Cardiac	36 (29,3)	11 (8,9)	
Digestive	9 (7,3)	6 (4,9)	
Indeterminate	27 (21,9)	20 (16,3)	

Results

123 patients with CD were seen in the otorhinolaryngology clinic. The average age was 64 years, with a predominance of females (68.9%). An association was found between the cardiac form and dizziness ($p=0.019$), as well as between the complaint of dizziness and abnormalities in VHIT ($p=0.002$) and posturography ($p=0.003$). On the other hand, ringing in the ears was not associated with any clinical form of CD.

Conclusion

Ringing in the ears is not directly associated with CD but rather with present comorbidities, especially metabolic alterations. Regarding dizziness, there is an association with cardiac abnormalities in these patients, with a lower positivity of otoneurologic exams indicating vestibular dysfunction, suggesting a possible cardiac etiology for these patients. Therefore, otoneurological manifestations in individuals with CD have a direct connection with cardiac alterations related to the disease.