

## The Non-Award of the Nobel Prize of 1921 to Carlos Chagas: A Tragic Mistake

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### Abstract

Carlos Chagas discovered the disease, which has been named after him (Chagas disease), in 1909. He was indicated to the Nobel Prize in 1912 and in 1921, but never won the Nobel Prize. The non-award of the prize in 1921 strengthened Chagas detractors in Brazil to the point that the disease fallen into oblivion after Chagas' death in 1934. The socioeconomic importance of this new disease was only recognized many years later, what made that many lives were unnecessarily lost. A posthumous Nobel Prize to Chagas could help to eradicate the disease.

**Keywords:** Chagas disease; Nobel Prize; *Trypanosoma cruzi*

### Introduction

The Brazilian doctor Carlos Ribeiro Justiniano Chagas discovered a new disease in 1909, which is now known as Chagas disease. Working in Brazilian hinterland during 11 years as a leader of a scientific team, he was able to discover the etiology, the vector, the reservoir, the morphological features, the clinical aspects, and to herald the social economic impact of this new disease. Such a scientific achievement has never been got by other medical scientist [1].

Because of this, Chagas discovered was acknowledged throughout the world, culminating with the award of the Schaudinn Prize in 1912, the most important scientific prize of that time. Not surprisingly, Chagas was also indicated for the Nobel Prize four times, although the Karolinska Institute officially recognized only two indications (made in 1912 and in 1921, respectively) [2].

In 1912, Chagas was indicated for the discovery of *Trypanosoma cruzi*, the etiologic agent of the new disease. At that time, it was already known that Trypanosomes could induce disease in animals, and cause the well-known sleeping sickness in Africans [3]. In 1912, apart from the discovery of the etiology of this new disease, Chagas highlighted the presence of arrhythmia, AV Block, and sudden cardiac death in young persons as the distinctive features of the clinical picture of the disease [1].

It is claimed that the importance of Chagas disease had not been become clear by 1912, and that for this reason the Karolinska Institute did not award the prize to Chagas. Nevertheless, it must be pointed out that Bruce had been indicated more than 30 times for the prize during the same period for having discovered only the etiology and the vector of a well-known disease: the sleeping sickness [2]. Therefore, I believe that Chagas did not win the Nobel Prize because he was working at the world periphery.

The situation would be completely different in 1921. At that time, Chagas had established the principal characteristics of the new disease, highlighting the importance of heart disease as the dominant clinical picture as well as the importance of the disease from a socioeconomic

viewpoint. Furthermore, Chagas had published their scientific works in the most important scientific European journals of the time, so that their works were certainly known by the members of the Nobel Committee of the Karolinska Institute [2].

I visited the Nobel Committee of Karolinska Institute to understand the reasons by which a discovery like that made by Chagas was not awarded with the Nobel Prize. Chagas was evaluated by Gunar Hedrén, a member of the Nobel Committee of Karolinska Institute. Surprisingly, there was no written report on Chagas evaluation [2]. Thus, we will never know why Chagas did not win the Nobel Prize in 1921 when no scientist received the prize.

Certainly, the grandiosity of Chagas discovery was not perceived by the Nobel Committee of Karolinska Institute. However, it is conceivable to shed some lights on this fact. First, in 1921, the Nobel Committee decided to save money for the building of the Nobel Institute Research, which had the mission to check the discoveries made by scientists indicated to the Nobel Prize. Second, the Nobel Committee did not consider the indication made by Cypriano de Freitas, which reached the Nobel Committee some days following the deadline for indication for the prize. In that letter, the assumptions to award a scientist established by Alfred Nobel-the discovery that benefit the human being made clear in the year before indication- had clearly been fulfilled. Third, the potential incompetence of Hedrén to evaluate Chagas' work, as he had no scientific skills [2]. Finally, Chagas public position against the idea that races living in the tropics were inferior to the others living outside, what was contrary to the idea embraced by some members of the Nobel Committee favoring eugenics.

Chagas disease fell progressively into oblivion following Chagas' death in 1934. The situation would certainly be different had he won the Nobel Prize. In practice, this means that millions of people could be saved. Today, Chagas disease affects about 10 million people in South America, and has spread throughout the world because international immigration, mainly to the United States. The world social costs of Chagas disease are greater than that of all types of cancer, except for lung and breast neoplasia [4].

A posthumous Nobel Prize to Carlos Chagas would be important for two reasons:

- It would pressure the governments to do what Chagas had highlighted 100 years ago: to provide houses with walls covered with cement as a means to eradicate the disease.
- To make justice to the scientist who made the most complete medical discovery of all times. Otherwise, the humanity will continue to pay a high price for neglecting Chagas disease.

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## References

1. Bestetti RB, Martins CA, Cardinalli-Neto A (2009) Justice where justice is due: A posthumous Nobel Prize to Carlos Chagas (1879-1934), the discoverer of American Trypanosomiasis (Chagas' disease). *Int J Cardiol* 134: 9-16.
2. Bestetti RB, Couto LB, Cardinalli-Neto A (2013) When a misperception favors a tragedy: Carlos Chagas and the Nobel Prize of 1921. *Int J Cardiol* 169: 327-330.
3. Lilejstrand G (1951) The prize in physiology and medicine. In: Schuck H, Sohlman R (eds.) *Nobel — the man and his prizes*. Nobel Foundation, Stockholm.
4. Lee BY, Bacon KM, Botazzi ME, Hotez PJ (2013) Global economic burden of Chagas disease: a computational simulation model. *Lancet Infect dis* 13: 342-348.