

## Rondon, Einstein's Letter and the Nobel Peace Prize

*Rondon, a Carta de Einstein e o Prêmio Nobel da Paz*

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**Abstract:** We briefly discuss a letter written by physicist of German origin Albert Einstein (1879-1955) to the Norwegian Nobel Committee nominating the Brazilian military officer, geographer, explorer and peacemaker Candido Mariano da Silva Rondon (1865-1958). Einstein nominated other eleven scientists, and all them were Nobel Prizes laureates. We also examine and discuss the Nobel Peace Prize Nominators and Nominees from 1901 to 1964. Just taking into account data up to the year of the Nobel Prize, the highest number of nominations was awarded to an organization, the *Permanent International Peace Bureau* in 1910, with a total of 103 nominations, followed by two women: Bertha von Suttner (101 nominations, 1905) and Jane Addams (91 nominations, 1931). Data show that the average number of nominations per Nobel Prize awarded was 17.7, and only 18 of the total 62 laureates exceed this average. At the other extreme there were often prizewinners who had just zero, one, two or three nominations - a highly subjective indicator. We also verified that there were at least 25 nominations by National Parliaments, there were determinants for some winners. Considering the results presented, it is possible to affirm that Rondon received sufficient nominations to be awarded the Nobel Prize, even not considering Einstein's letter.

**Keywords:** Rondon, Einstein, Nobel Prize, Nominees and Nominators, Peace.

**Resumo:** Discutimos brevemente uma carta escrita pelo físico de origem alemã Albert Einstein (1879-1955) ao Comitê Norueguês do Prêmio Nobel indicando o oficial militar, geógrafo, explorador e pacificador brasileiro Candido Mariano da Silva Rondon (1865-1958). Einstein indicou outros onze cientistas, e todos foram laureados com Prêmios Nobel. Também analisamos e discutimos os Nomeadores e Nomeados ao Prêmio Nobel da Paz desde 1901 até 1964. Apenas tendo em conta os dados até o ano do recebimento do Prêmio Nobel, é notável que o maior número de indicações foi concedido a uma organização, o *Gabinete Internacional Permanente para a Paz* (*Permanent International Peace Bureau*) em 1910, com um total de 103 indicações, seguido por duas mulheres: Bertha von Suttner (101 nomeações, 1905) e Jane Addams (91 indicações, 1931). Os dados mostraram que o número médio de indicações por Prêmio Nobel concedido foi de 17,7, e apenas 18 do total de 62 laureados excederam esta média. No outro extremo, observou-se frequentemente que em muitos anos

houve premiados com zero, uma, duas ou três nomeações - um indicador de alta subjetividade. Verificamos também que pelo menos 25 nomeações, feitas por Paramentos Nacionais, foram determinantes para laurear alguns vencedores. Considerando os resultados apresentados, é possível afirmar que Rondon recebeu indicações suficientes para ser agraciado com o Prêmio Nobel, mesmo sem considerar a carta de Einstein.

**Palavras chave:** Rondon, Einstein, Prêmio Nobel, Nomeados e Laureados, Paz.

## 1. INTRODUCTION

domain.

During a brief stay in Brazil in the city of Rio de Janeiro, the well-know physicist of German origin Albert Einstein (1879 – 1955, Figure 1) wrote a letter to the Norwegian Nobel Committee about the Brazilian military officer, geographer, explorer and peacemaker Candido Mariano da Silva Rondon (1865 – 1958, Figure 2) [1]. In his travel diary on May, 11, 1925, Einstein wrote about how really impressed he was with Rondon's attempts to integrate Indian tribes to civilization without the use of force. He wrote saying: "great cinematic presentation of Indian life and its exemplary development by General Rondon, a philanthropist and first order leader" [1]. He spent more than 50 days in a trip to South America, and visited the Republics of Argentine, Uruguay and Brazil. This letter, written on May 22, 1925, is now at the *Einstein Archives Online* (<http://alberteinstein.info>) number 71-113. Part of the translation, done by Abraham Pais [2] is:

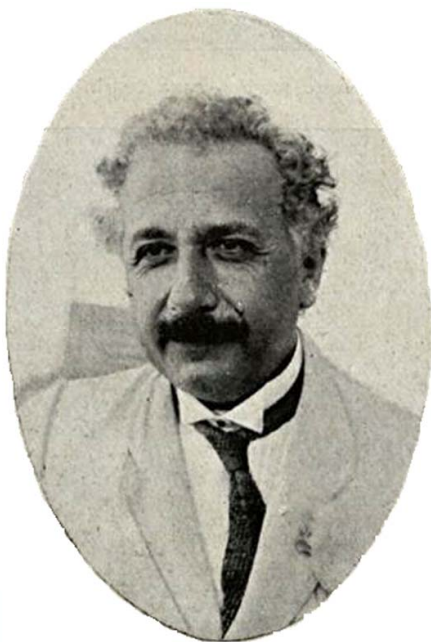


Figure 1: Albert Einstein on his visit to Rio de Janeiro, in March 25, 1925. *Source:* *Fon-Fon* magazine, March 28, 1925, year XIX, number 13, page 50. *Credit:* Biblioteca Nacional (Brazilian National Library): [www.bn.br](http://www.bn.br), in the public



Figure 2: The young Cândido Mariano da Silva Rondon in Amazonia, before 1891 (picture in the public domain).

To the Chairman of the Norwegian Nobel Committee,  
22.V.25  
Dear Sir!

I take the liberty to draw your attention to the activities of General Rondon from Rio de Janeiro, since, during my visit to Brazil, I have gained the impression that this man is highly worthy of receiving the Nobel Peace Prize. His work consists of adjusting Indian tribes to civilized world without the use of weapons or coercion. The information I have is based on what I heard from professors at the Higher Technical School in Rio de Janeiro, who spoke with great enthusiasm about the man and about his work. Some things I also have been shown on film. Rondon himself, I have not met.

I can provide more detailed information if it is your wish, but it would be better if you could get additional information through the Norwegian representation.

With the highest regards,

Prof. Dr. A. Einstein  
*Haberlandstr. 5, Berlin*

Einstein received 62 nominations (45 of them during the period 1910 - 1921 [3]) and was awarded the Nobel Physics

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Prize in 1921. He nominated 10 physicists (11 nominations, twice for Schrödinger) and one chemist between 1919 and 1954 – all them were laureates, see Table 1. Our intention is to shed light on Rondon's nomination process, based on official information from the Nobel Prize site about nomi-

nators and nominees in the period between 1901 and 1964. We also analyze and discuss the Nobel Peace Prize (NPP) Nominators and Nominees from 1901 to 1964.

Nominee	Country	Year Nomination	Nobel Prize
Max Planck	Germany	1919	Physics 1918
James Franck	Germany	1924	Physics 1925
Gustav Hertz	Germany	1924	Physics 1925
Arthur Holly Compton	United States	1926	Physics 1927
Werner Heisenberg	Germany	1932	Physics 1932
Erwin Schrödinger	Austria	1932, 1933	Physics 1933
Otto Stern	United States	1940	Physics 1943
Isidor Isaac Rabi	United States	1940	Physics 1944
Wolfgang Pauli	Austria	1945	Physics 1945
Walther Bothe	Germany	1954	Physics 1954
Carl Bosch	Germany	1929	Chemistry 1931

Table 1. All Einstein's nominations. All them were Nobel Prize laureates.

## 2. A BRIEF BIOGRAPHY ON RONDON

Marshal Rondon is most celebrated for his exploration of the Brazilian state of Mato Grosso and the Western Amazon Basin, and his permanent support of Brazilian native populations.

In 1890, he was an army engineer with the Telegraphic commission and helped to build the first telegraph line across the state of Mato Grosso. Just ten years before as a first lieutenant, between 1900 and 1906, Rondon was commissioned to lay the telegraph line from Brazil to Bolivia and Peru. In this period he had his first contact with the uncivilized and warlike Bororo tribe of western Brazil [4], pacifying them and finishing the telegraphic line. From challenges such as walking through dense forests without roads and full of wild animals, he was put in charge of extending the telegraph wires from Mato Grosso to the Amazon, 4,000 miles of lines. In his work he discovered, at that time as Colonel, dozens of rivers [4], for example Juruena (an important tributary of the Tapajos river) and the Doubt river. Later, in 1914, he returned to the same place in a scientific expedition with the American statesman, author, explorer, soldier, naturalist and president Theodore Roosevelt (1858 – 1919 [4]), who had been awarded the Nobel Peace in 1906 - the river was renamed Roosevelt. Additionally, Rondon made contact with several Indian tribes, most of them hostile, including the Arikén, Botocudo, Caiamo, Guaicuru, Kaingáng, Kepkiriwát, Nambikwara, Paresi, Parintintim, Parnawát, Pianocoti, Quinquinau, Rama-Rama, Tirió, Uachiri, Umutina, Urubu, Urumi, Xavante and Xokleng.

In his lifelong career, it is important to note that he had Indian blood because he was a descendent of the Bororo and Terena tribes. Maybe due to this the Indians found him a great protector and friend, in spite of the fact that he was originally a soldier. He carried out important geographical, geological, mineralogical and anthropological researches, surveys and studies. He was the founder and first director of Brazil's Indian Protection Bureau (*SPI*: Serviço de Proteção ao Índio, or "Indian Protection Service", see

www.FUNAI.gov.br, main source of such achievements) and supported the creation of the first Brazilian National Park, named Xingu. Shortly before his death, he was awarded the title of Marshall, the highest military rank in Brazil at that time. He was also honored with the title "Patron of the Communications Corps of the Brazilian Army", by Brazilian Decree N<sup>o</sup>. 51,960, on April 26, 1963, signed by the President of the Chamber of Deputies. The Brazilian state of Rondonia, covering an area similar to that of the United Kingdom, is named in his honor.

## 3. ONE TRIP AND TWO BRIEF STAYS OF EINSTEIN IN BRAZIL

The invitation to come to South America (a month long trip) came from the Argentine Republic where there was a more mature [5] scientific community unlike in Brazil. According to Tolmasquim and Moreira [6], Brazilian scientists came mostly from engineering schools and had only a self-taught background on the new physics theories, such as Relativity or *Quanta*. Just to remember, two of the first Brazilian physicists with a recognized international impact of their works were too young at that time: Mario Schenberg (1914 - 1990) was eleven years old and Cesare Mansueto Giulio Lattes (1924 - 2005) just a small child [3]. The trip was organized and partly financed by the Latin-American Jewish communities, but the formalization of the invitation included local Universities and academic institutions.

*Cap Polonio* was the vessel that brought Einstein to Brazil, landing in Rio de Janeiro for maintenance [1]. He stayed for one day visiting the city on March 22, 1925 and made references to the Brazilian flora that "surpasses the 1,001 night dreams" of the Botanic Garden, to the "delicious ethnic mixture in the streets" about the White - Indian - Black Brazilian miscegenation, to the "majestic impression of the fantastic cliffs", or to the influence of the warm and humid climate on the human behavior in his notes.

After leaving Brazil for a while to visit Montevideo and Buenos Aires, he returned to Rio in another ship, the *Valdivia* and stayed just enough time to explore the magnificent Brazilian capital at that time. Both stays in the Marvelous City (as Rio de Janeiro is also known) were very commented on due to his fame and charisma and were registered by the local press. He visited tourist spots such as Pão de Açúcar, Tijuca Forest, Corcovado, etc. During his second stay, he met the President Artur da Silva Bernardes (1875 - 1955), and some ministers, writing his experiences and impressions in a travel diary of South America, fully published by Tolmasquim [1].

Due to the excellent climatic conditions of the Brazilian town of Sobral, Ceara (the other chosen place was the Principe Island, off the coast of Africa), the observation of the total eclipse of the Sun on May 29, 1919 [7], allowed the team of astronomers and physicists of an international expedition to prove the Theory of General Relativity (TGR), which was, at the time, only speculation. TGR was concluded by Einstein in 1915 and published in 1916 [8]. Such expedition helped to consolidate Einstein's fame, that of course, had great repercussion with the Brazilian press. In particular, Einstein met some members of the Brazilian team at Sobral, including the French-Brazilian astronomer and engineer Henri "Henrique" Charles Morize (1860-1930), at that time director of the National Observatory [9].

On his visit to the Botanical Garden, Einstein talked to the Brazilian journalist, lawyer, politician and diplomat Francisco de Assis Chateaubriand Bandeira de Mello (1892 - 1968) about the solar eclipse recorded by a team of British, Brazilian and American astronomers and scientists and how the population was proud of such an expedition to the town of Sobral, in Ceara [6]. Specifically about this meeting, Einstein replied to Chateaubriand and then registered in a piece of paper: "*Die Frage, die meinen Kopf entsprang, hat Brasilien sonniger Himmel beantwortet*" ("the idea that my mind conceived was proven in the sunny sky of Brazil"), Figure 3. Such quotation was published at *Fon Fon* magazine, in March 28, 1925.

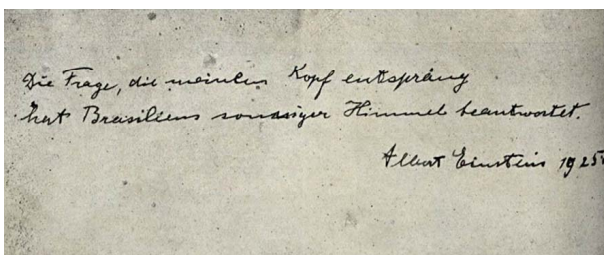


Figure 3: Einstein's quotation: "*Die Frage, die meinen Kopf entsprang, hat Brasilien sonniger Himmel beantwortet*" ("the idea that my mind conceived was answered by the bright sky of Brazil"), published in *Fon Fon* magazine, in March 28, 1925, year XIX, number 13, page 50. Credit: Biblioteca Nacional (Brazilian National Library): [www.bn.br](http://www.bn.br), in the public domain.

Einstein also visited the National Museum of Rio de Janeiro ([www.MUSEUNACIONAL.ufrj.br](http://www.MUSEUNACIONAL.ufrj.br)), the National Observatory ([www.ON.br](http://www.ON.br)), the Brazilian Academy of Sciences ([www.ABC.org.br](http://www.ABC.org.br)) and the Oswaldo Cruz Institute ([www.fiocruz.br/IOC](http://www.fiocruz.br/IOC)). He also participated in two confer-

ences about relativity: one at Largo de São Francisco's Polytechnic School (current Rio de Janeiro's Federal University's Polytechnic School) and the other at Rio's Engineering Club. However, a third conference, at ABC, was the most significant of his scientific commitments, according to Tolmasquim and Moreira [6, 9]. He wrote a paper in German on May 7, 1925, but held the conference in French, giving a short lecture on the reality of light quanta: "*Bemerkungen zu der gegenwärtigen Lage der Theorie des Lichtes*" ("Remarks on the Present situation of Light Theory") which was translated into Brazilian Portuguese and published in the first issue of the new ABC journal[10].

After an interview, he wrote for a Brazilian journalist his impressions of Brazil: "*Est ist interessant fur einen Europeuer, ein Land zu sehen, das im Begriffe ist, sich seine Formen und Sitten selbst neu zu bilden*" ("It is interesting for a European to visit a new country that begins for itself to make and to show its forms", Figure 4).

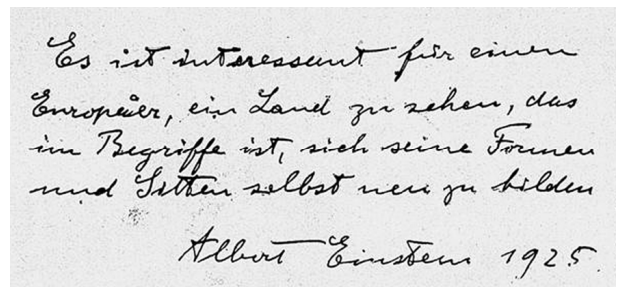


Figure 4: Einstein's impressions about Brazil in an interview with journalist Jorge Santos ("Um Sábio na Intimidade" or "The Intimacy of a Wise Man"): "It is interesting for an European to visit a new country that begins for itself to make and to show its forms" ("*Est ist interessant fur einen Europeuer, ein Land zu sehen, das im Begriffe ist, sich seine Formen und Sitten selbst neu zu bilden*"). Source: *Ilustração Brasileira* magazine, June, 1925, year XIX, number 58, page 50. Credit: Biblioteca Nacional (Brazilian National Library): [www.bn.br](http://www.bn.br), in the public domain.

#### 4. THE NOBEL PRIZE IN PEACE NOMINATORS AND NOMINEES FROM 1901 TO 1964

To shed light on Einstein's letter nominating Rondon and the reasons why he was not awarded the Nobel Prize, it is worth taking into account the official Nobel website public data from the first prize in 1901 up to 1964. The Nobel Peace Prize nomination process is briefly described on the home page ([www.nobelprize.org](http://www.nobelprize.org)), demonstrating that nominations by invitation are not required, and people or organizations can nominate – but all are analyzed by the Norwegian Nobel Committee which is composed of five members appointed by the Norwegian parliament. A nomination is considered valid if it is submitted by one of the following: *i*) Members of national assemblies and governments of states; *ii*) Members of international courts; *iii*) University rectors; professors of social sciences, history, philosophy, law and theology, directors of peace research institutes and foreign policy institutes; *iv*) People who have been awarded the No-

bel Peace Prize; v) Board members of organizations which have been awarded the Nobel Peace Prize; vi) Active and former members of the Norwegian Nobel Committee; vii) Former advisers to the Norwegian Nobel Committee. No one can nominate her/himself, and the prize can be shared by up to three persons / organizations – however, only two Peace Prizes have been shared by three in more recent years (1994 and 2011). The names of the nominees and other information about the nominations are in the public domain only after fifty years (a secrecy rule); however, it is still hard to obtain analyses and studies from such lists [11-16].

For example, Garfield [11] was one of the first to search bibliometric studies in an effort to clarify the profile of laureates by describing not only candidates but also winners, the former considered as a subset of “Nobel class” scientists. It was found that this set of scientists did not diverge in citation data occurrence from what can be considered as “average” scientist [12] until awarded by a Nobel Prize.

Gingras and Wallace [13] made a bibliometric study of prizewinners in Physics from 1901 to 2007 based on citation data from their profiles. These results have significant predictive power *a posteriori*, though many of the studies are not capable to envisage a laureate. However, a number of the studies can recognize a set of probable candidates to be a prizewinner [13]. A generalization of the citation statistics results was done by Ashton and Oppenheim [14], including non-first authors’ analyses for prizewinners in Chemistry.

We explored only some issues regarding of the Brazilian peacemaker, using the nominations and nominees database in the public domain from the Nobel Foundation. We found that Roosevelt never nominated Rondon and that Rondon did not nominate anyone. In fact, using the Nobel Prize *site* we were able to access all of ten of Rondon’s nominations. Ta-

ble 2 displays all nominators, countries, nominees and years. Rondon was nominated in 1953 by Emily Greene Balch of the USA, who also nominated Mahatma Gandhi in 1948. She was awarded the Nobel Peace Prize 1946 for her work with the *Women’s International League for Peace and Freedom*. Her motivation for choosing Rondon, according Nominations Database, was: “he promotes peace in the territorial dispute between Colombia and Peru. He also works with the Indian Protection Service”. Alvaro Pereira de Souza Lima (1890 - 1968) nominated Rondon and he was a Brazilian engineer, politician and Minister of Transports in President Getulio Dornelles Vargas’s government (1882 - 1954) between 1951 and 1953. Rondon was nominated in 1953 and 1957 by Damiao Antonio Peres (1889-1976), a professor of History at the University of Lisbon, Portugal. Jean Silvan-dre (1896 - 1960) was a French politician and Member of the National Assembly in France from 1946-1955. Nereu de Oliveira Ramos (1888 - 1958) was a Brazilian politician, Vice President of the Republic between 1946 and 1951, Pres-ident between 1955 - 1956, and Minister of Justice in Brazil in 1956 - 1957. Mario Faria (1912 - 1988) was a Brazilian professor of Law from Sao Paulo working at the Catholic University of Santos; he was also a poet and writer. Henry P. de Vries (1911 - 1986) was professor of International Law at Columbia University, NY. Raul Jobim Bittencourt (1902 - 1985) was a Brazilian politician and professor of History. Cesar Salaya y de la Fuente (1895 - c. 1958) was Professor of Law at University of Havana, Cuba. There is no record of either Alvaro Lima, Jean Silvan-dre, Nereu Ramos, Mario Faria, Henry de Vries, Raul Bittencourt or Cesar Salaya sub-mitting other indications in the Nominations Database during the period analyzed.

Nominator	Country	Nominee	Year
Emily Greene Balch	USA	Candido Mariano de Silva Rondon	Peace 1953
Alvaro Pereira de Souza Lima	Brazil	Candido Mariano de Silva Rondon	Peace 1953
Damiao Antonio Peres	Portugal	Candido Mariano de Silva Rondon	Peace 1953
Jean Silvan-dre	France	Candido Mariano de Silva Rondon	Peace 1953
Nereu de Oliveira Ramos	Brazil	Candido Mariano de Silva Rondon	Peace 1957
Mario Faria	Brazil	Candido Mariano de Silva Rondon	Peace 1957
Henry P. de Vries	USA	Candido Mariano de Silva Rondon	Peace 1957
Raul Jobim Bittencourt	Brazil	Candido Mariano de Silva Rondon	Peace 1957
Damiao Antonio Peres	Portugal	Candido Mariano de Silva Rondon	Peace 1957
Cesar Salaya y de la Fuente	Cuba	Candido Mariano de Silva Rondon	Peace 1957

Table 2. All ten of Rondon’ nominators from 1953 to 1957, according to the Nobel Prize Nominators Database. Emily Balch (1867 - 1961) was an American economist, sociologist and pacifist. She was awarded with the Nobel Peace Prize 1946. Alvaro de Souza Lima (1890 - 1968) was a Brazilian engineer, politician and Minister of Transports of President Getulio Dornelles Vargas (1882 - 1954) between 1951 and 1953. Damiao Peres (1889-1976) was professor of History at the University of Lisbon, Portugal. Jean Silvan-dre (1896 - 1960) was a French politician and Member of the National Assembly in France from 1946-1955. Nereu Ramos (1888 - 1958) was a Brazilian politician, Vice President of the Republic between 1946 and 1951, President between 1955-1956, and Minister of Justice in Brazil in 1956-1957. Mario Faria (1912 - 1988) was a Brazilian professor of Law at the Catholic University of Santos, as well as poet and writer from Sao Paulo. Henry de Vries (1911 - 1986) was professor of International Law at the Columbia University, NY. Raul Bittencourt (1902 - 1985) was a Brazilian politician and professor of History. Cesar Salaya (1895 - c. 1958) was Professor of Law at University of Havana, Cuba.

Database. Some prizewinners received further nominations

Table 3 shows other data from the NPP Nomination

after the Nobel Prize, such as the *Permanent International Peace Bureau* and Carl von Ossietzky with 136 and 93 nominations respectively. Nevertheless, in this research, we did not take into account nominations after receiving the NPP because it could have been caused by a simple delay or even a nominator's desire for a second prize. It was also observed that another particular situation occurred, *i.e.*, there were no awards on 16 occasions in the period analyzed: in 1914-1916, 1918, 1923, 1924, 1928, 1932, 1939-1943, 1948 and 1955-1956. Only one organization received the NPP three times: the *International Committee of the Red Cross*

(*Comité International de la Croix Rouge*) in 1917, 1944 and 1963 (20 nominations between 1901-1963). From this table, it is also possible to observe that there was a minimum of 0 nominations (in 1944, won by the *International Committee of the Red Cross*) and a maximum of 213 nominations (in 1963, shared between the *International Committee of the Red Cross* and the *League of Red Cross Societies*). In fact, the lowest number of nominations was also zero and this occurred three times during World War II: in 1940, 1942 and 1943. Figure 5a shows the nominations in this period.

Year	Winner	Country	Number of nominations that year	Total Number of Nominees	Period of Nominees
1901	Jean Henri Dunant	Switzerland	137	10	1901-1901 <sup>□</sup>
1901	Frédéric Passy	France	137	41	1901-1901 <sup>□</sup>
1902	Élie Ducommun	Switzerland	105	17	1901-1902 <sup>□</sup>
1902	Charles Albert Gobat	Switzerland	105	7	1901-1902 <sup>□</sup>
1903	William Randal Cremer	United Kingdom	65	26	1901-1903 <sup>□</sup>
1904	Institute of International Law (Institut de Droit International)	Belgium	69	53 <sup>*</sup>	1901-1904
1905	Bertha Felicitas Sophie Freifrau von Suttner	Austria-Hungary	82	101	1901-1905 <sup>□</sup>
1906	Theodore Roosevelt	United States	87	7	1906-1906
1907	Ernesto Teodoro Moneta	Italy	83	70	1902-1907 <sup>□</sup>
1907	Louis Renault	France	83	15	1904-1907
1908	Klas Pontus Arnoldson	Sweden	71	25	1902-1908 <sup>□</sup>
1908	Fredrik Bajer	Denmark	71	51	1901-1908 <sup>□</sup>
1909	Auguste Marie François Beernaert	Belgium	46	1 <sup>*</sup>	1909-1909 <sup>□</sup>
1909	Paul Henri d'Estournelles de Constant	France	46	26	1904-1909 <sup>□</sup>
1910	Permanent International Peace Bureau (Bureau International Permanent de la Paix)	Switzerland	71	103 <sup>§</sup>	1901-1910 <sup>□</sup>
1911	Tobias Michel Karel Asser	Netherlands	67	2	1911-1911
1911	Alfred Hermann Fried	Austria-Hungary	67	30	1909-1911
1912	Elihu Root	United States	64	1 <sup>▲</sup>	1909-1912
1913	Henri Marie La Fontaine	Belgium	77	23	1910-1913
1914	Not awarded due to World War I		66		
1915	Not awarded due to World War I		73		
1916	Not awarded due to World War I		27		
1917	International Committee of the Red Cross (Comité International de la Croix Rouge)	Switzerland	22	3	1901-1917
1918	Not awarded due to World War I		25		
1919	Thomas Woodrow Wilson	United States	28	12 <sup>△</sup>	1918-1919
1920	Léon Victor Auguste Bourgeois	France	33	26	1908-1920
1921	Karl Hjalmar Branting	Sweden	17	7	1906-1921 <sup>□</sup>
1921	Christian Lous Lange	Norway	17	7	1914-1921 <sup>□</sup>
1922	Fridtjof Nansen	Norway	42	2 <sup>▶</sup>	1922-1922 <sup>□</sup>
1923	Not awarded		91		
1924	Not awarded		53		
1925	Joseph Austen Chamberlain	United Kingdom	73	0 <sup>▷</sup>	
1925	Charles Gates Dawes	United States	73	0 <sup>◻</sup>	
1926	Aristide Pierre Henri Briand	France	72	12 <sup>■</sup>	1926-1926
1926	Gustav Stresemann	Germany	72	10	1926-1926
1927	Ferdinand Édouard Buisson	France	37	9	1925-1927

1927	Ludwig Quidde	Germany	37	37	1924-1927 <sup>Ⓜ</sup>
1928	Not awarded		50		
1929	Frank Billings Kellogg	United States	79	3 <sup>□</sup>	1929-1929
1930	Lars Olof Jonathan Söderblom	Sweden	73	19	1926-1930 <sup>Ⓜ</sup>
1931	Jane Addams	United States	75	91	1916-1931
1931	Nicholas Murray Butler	United States	75	11	1930-1931
1932	Not awarded		74		
1933	Ralph Norman Angell Lane	United Kingdom	85	18 <sup>•</sup>	1912-1933
1934	Arthur Henderson	United Kingdom	103	4	1931-1934
1935	Carl von Ossietzky	Germany	111	7 <sup>◇</sup>	1935-1935 <sup>Ⓜ</sup>
1936	Carlos Saavedra Lamas	Argentina	196	11	1935-1936
1937	Edgar Algernon Robert Gascoyne-Cecil	United Kingdom	63	17	1923-1937 <sup>Ⓜ</sup>
1938	The Nansen International Office for Refugees (Office international Nansen pour les Réfugiés)	League of Nations	90	11	1936-1938 <sup>Ⓜ</sup>
1939	Not awarded due to World War II		59		
1940	Not awarded due to World War II		0		
1941	Not awarded due to World War II		3		
1942	Not awarded due to World War II		0		
1943	Not awarded due to World War II		0		
1944	International Committee of the Red Cross (Comité International de la Croix Rouge)		0	0	1918-1944
1945	Cordell Hull	United States	18	31	1936-1945
1946	Emily Greene Balch	United States	31	13	1946-1946
1946	John Raleigh Mott	United States	31	14	1911-1946 <sup>Ⓜ</sup>
1947	Friends Service Council	United Kingdom	25	6	1937-1938
1947	American Friends Service Committee	United States	25	6	1937-1938
1948	Not awarded <sup>†</sup>		79		
1949	John Boyd Orr	United Kingdom	48	2 <sup>•</sup>	1947-1949
1950	Ralph Johnson Bunche	United States	77	1	1950-1950
1951	Léon Jouhaux	France	103	9	1938-1951
1952	Albert Schweitzer	France	77	29 <sup>•</sup>	1930-1952
1953	George Catlett Marshall, Jr.	United States	101	2	1950-1953
1954	Office of the United Nations High Commissioner for Refugees	United Nations	54	2	1954-1954
1955	Not awarded		66	0	
1956	Not awarded		53		
1957	Lester Bowles Pearson	Canada	37	2	1952-1957
1958	Dominique Pire	Belgium	52	2	1957-1957
1959	Philip John Noel-Baker	United Kingdom	43	9	1952-1959
1960	Albert John Luthuli	Southern Rhodesia	69	0 <sup>+</sup>	1961-1961 <sup>Ⓜ</sup>
1961	Dag Hjalmar Agne Carl Hammarskjöld	Sweden	131	11	1957-1961 <sup>Ⓜ</sup>



1962	Linus Carl Pauling	United States	77	3 <sup>o</sup>	1961-1962
1963	International Committee of the Red Cross (Comité international de la Croix Rouge)	Switzerland	213	17	1945-1963 <sup>o</sup>
1963	League of Red Cross Societies (Ligue des Sociétés de la Croix-Rouge)	Switzerland	213	8	1937-1953
1964	Martin Luther King, Jr.	United States	92	2	1964-1964 <sup>o</sup>

Table 3. All Nobel Peace Prize nominations from 1901 to 1964, and the respective total number of nominees in a specific period (up to the Nobel Prize year), according to the Nobel Prize Nominators Database. (\*) The Institute of International Law received other 6 nominations for Peace between 1905 and 1938; (●) The only vote for Auguste Marie François Beernaert was given by 151 members of the Belgian parliament, Cabinet Ministers and Senators; (§) The Permanent International Peace Bureau received other 33 nominations for Peace between 1920-1948; (▲) Elihu Root received one more nomination in the next year after winning the Nobel Prize; (△) Thomas Woodrow Wilson received 10 other nominations for Peace in 1920; (►) Fridtjof Nansen received one additional nomination for Peace in the next year; (▷) Joseph Austen Chamberlain received 10 nominations for Peace in the next year; (||) Charles Gates Dawes received 2 nominations for Peace in the following year; (■) Aristide Pierre Henri Briand received 2 additional nominations for Peace in 1931; (□) Frank Billings Kellogg received additionally 10 nominations after winning the Nobel Prize; (◆) Ralph Norman Angell Lane received 2 more nominations in the following year; (◇) Carl von Ossietzky received 86 additional nominations in the following year; (†) Not awarded because “there was no suitable living candidate.” This was a tribute to the recently assassinated Mahatma Mohandas Karamchand Gandhi in India, since the prize cannot be awarded posthumously. Gandhi was nominee in 12 nominations for Peace between 1937-1948; (●) John Boyd Orr received two more nominations for Physiology or Medicine in 1947; (✕) Albert Schweitzer received one nomination for Literature in 1952 and another nomination for Peace in 1953; (✚) Albert John Luthuli received 17 nominations for Peace in the next year; (✳) Linus Carl Pauling received one additional NPP nomination for the following year – he also obtained a Nobel Prize in Chemistry in 1954 with 65 nominations. (⊠) Prizes awarded with votes from members of the Norwegian, Swedish, French, Danish or Italian Parliaments (among others), totaling 25 laureates.

The highest number of nominations (taking into account data up to the year of the Nobel Prize) was received by the *Permanent International Peace Bureau* in 1910, with a total of 103 nominations. From Figure 5b we can observe that many years, there were prizewinners with three, two, one or even zero nominations. In fact, 32 of the 62 awards from 1901 to 1964 received up to 10 nominations, the same number of nominations received by Rondon, and they were certainly all great peacemakers. There were a total of 4,191 NPP nominations in the period analyzed, resulting in an average of 17.7 nominations for each prize – but only 18 of the laureates exceed this average, as indicated in Figure 5b. In addition, we did not analyze nominators who nominated some nominees more than once (there are many cases to cite). As only very few nominees received so many nominations, there is a high level of subjectivity in the selection process for the Nobel Peace Prize, based on the data presented in Table 3 and Figure 5. The same was seen analyzing the Nobel Prize

in Physics during a similar period (1901-1963) [3]. These results corroborate the subjectivity noted by Garfield [15] and Nascimento [3].

There is another point associated with birthplace / location. The first NPP to someone outside Europe or America was awarded to Carlos Lamas (1878-1959) in 1936 who was from Argentina; and the second to Albert Luthuli (or Lutuli, c. 1898 - 1967) in 1960 who was from Southern Rhodesia. The results in Table 3 are in agreement with Rablen and Oswald's [16] work which analyzed the prevalence of people from European countries (approximately 55% of awarded peacemakers), especially France and Switzerland, between 1901 and 1950. Just fifteen of the Nobel Peace prizes were from the United States. This percentage is lower compared to around 70% for Nobel Prize physicists, mostly from Germany [3]. Table 3 also shows that the number of nominations for Rondon was not low because at least half of the prizewinners received fewer nominations. Figure 5b illustrates this particular analysis more precisely.



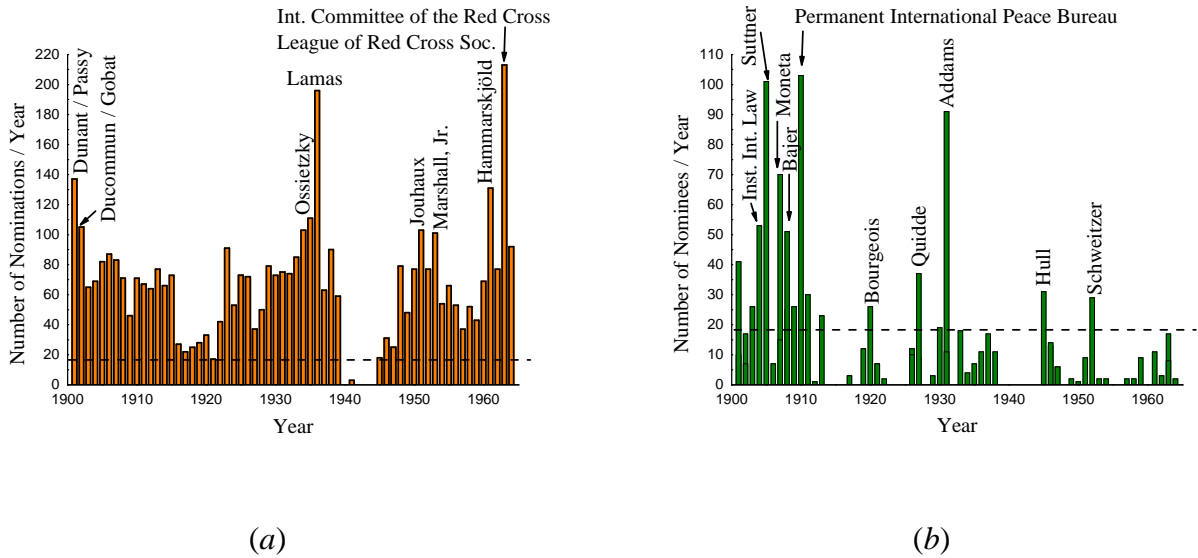


Figure 5. The number of nominations (a) and nominees (b) from 1901 to 1964, according to the Nobel Prize Nominators Database. A horizontal dashed line indicates the average number of 17.7 nominations per Nobel Prize awarded. Only 18 from a total of 62 prizewinners surpassed this average and are indicated. No Nobel Prizes were awarded in 1914-1916, 1918, 1923, 1924, 1928, 1932, 1939-1943, 1948 and 1955-1956.

As the same database shows that some laureates received more than one nomination for the same person, as was the case noted by Rondon; however, it is possible to observe that the same nominee received more than one nomination from the same person in the same year – one clear example was the Nobel Peace Prize 1947, shared between the *Friends Service Council* and the *American Friends Service Committee* – each received six nominations from the same person: Cornelius Bernhard Hanssen (1864-1939); he was a Norwegian ship-owner, politician and member of the Nobel Committee between 1913-1939. Furthermore, Gandhi was nominated twelve times from 1937 to his assassination in 1948, and he is certainly a missing laureate due to his notable omission, as the Nobel Committee declared: The result was no prize in 1948 simply because “there was no suitable living candidate”.

Certainly Einstein did not fill any of the nominator categories of the Norwegian Committee for the Nobel Peace Prize, even though he indicated eleven other scientists – with the detail that all them were laureate, as shown in Table 1. With this we conclude that Rondon was another notable omission. In addition, the results in Table 3 show that some Nobel Prizes were chosen because of political motivations, because 25 awarded prizes were chosen by members of National Parliaments, such as Norwegian, Swedish, French, Danish or Italian politicians, among others in the period analyzed. Heffermehl [17] in a recent book about the subject writes: “115 years later Nobel’s approach to peace and security is a more urgent necessity than ever before. The error of the Nobel committee is not in adapting to a modern age, but in failing to understand the point of departure for this exercise. What they should have developed was Nobel’s idea of peace, not their own”. And he concludes: “Nobel wished to support those working to realize a world without weapons,

warriors and war, the ‘champions of peace’”.

## 5. CONCLUSIONS

We analyzed data on Nobel prizewinners and nominees in Peace between 1901 and 1964. An average number of 17.7 nominations per each Nobel Prize laureate was found, and only 18 of the 62 awards surpassed this average. Experts in bibliometric studies suggest that there is a high level of subjectivity regarding Nobel Prize nominations. In fact, due to its political nature, the Nobel Peace Prize has been the subject of controversies, and the analysis done only reinforces this impression. It is important to remember that Nobel had a friendship with Bertha von Suttner – a peace activist and also someone who inspired such a prize – she was also a laureate in 1905 with 101 nominations. Both had in mind the idea of awarding “champions of peace”. However, most probably due to political reasons, during the period 1901-1964 analyzed, at least 25 laureates had strong (and at least decisive) support from National Parliaments.

Regrettably, the history of the Nobel Peace Prize includes numerous great peacemakers who were only nominated and not awarded such as Gandhi, the most notable omission. According to the data presented, Rondon received enough nominations to be a prizewinner during his lifetime. Rondon’s famous *motto* was: “die if necessary, but never kill”, follows Nobel’s idea of a ‘champion of peace’. He was certainly a friend of the Indians, bringing them together in a young and multiracial nation. He deserved a Nobel Peace Prize, as Einstein noted and indicated in his visit in Rio de Janeiro, Brazil.

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- [1] A. T. Tolmasquim. *Einstein - o Viajante da Relatividade na América do Sul* ("Einstein, the Traveler of Relativity in South America"). Vieira & Lent (2003) 255 pgs (in Brazilian Portuguese).
  - [2] A. Pais. *Subtle Is the Lord: The Science and the Life of Albert Einstein*. Oxford University Press (2005) 576 pgs.
  - [3] M. L. F. Nascimento. On the "Missing Letter" to Lattes and the Nobel Prize in Physics. *Ciência Soc.* **3** (2015) 35-42.
  - [4] C. Millard. *The River of Doubt: Theodore Roosevelt's Darkest Journey*. Knopf Doubleday Publishing Group (2009) 432 pages.
  - [5] R. Saraiva. Ver é Relativo (Seeing is Relative). *Rev. Pesq. Fapesp* **124** (2006) 90-92 (in Brazilian Portuguese).
  - [6] A. T. Tolmasquim, I. C. Moreira. Einstein in Brazil: the Communication to the Brazilian Academy of Sciences on the Constitution of Light. History of Modern Physics, Proceedings of the XX<sup>th</sup> International Congress of History of Science, H. Kragh, G. Vanpaemel, P. Marage (Eds.), Brepols: Turnhout, Belgium (2002) 229-242.
  - [7] F. W. Dyson, A. S. Eddington, and C. Davidson. A Determination of the Deflection of Light by the Sun's Gravitational Field, from Observations Made at the Total Eclipse of May 29, 1919. *Phil. Trans. Royal Soc. London* **220** (1920) 291-333.
  - [8] A. Einstein. Grundlage der allgemeinen Relativitätstheorie ("The Foundation of the General Theory of Relativity"). *Ann. Physik* **354** (1916) 769-822 (in German).
  - [9] A. T. Tolmasquim, I. C. Moreira. Um Manuscrito de Einstein no Brasil. *Ciencia Hoje* **21** (1996) 22-29 (in Brazilian Portuguese).
  - [10] A. Einstein. Observações Sobre a Situação Atual da Teoria da Luz. *Rev. Acad. Bras. Ciencias* **1** (1926) 1-3 (in Brazilian Portuguese).
  - [11] E. Garfield. "Are the 1979 prizewinners of Nobel class?" *Essays of an Information Scientist* **4** (1980) 609-617.
  - [12] E. Garfield, A. Welljams-Dorof. "Of Nobel class: A citation perspective on high-impact research authors". *Theoretical Medicine* **13** (1992) 117-135.
  - [13] Y. Gingras, M. L. Wallace. "Why it has become more difficult to predict Nobel Prize winners: a bibliometric analysis of nominees and winners of the chemistry and physics prizes (1901–2007)." *Scientometrics* **82** (2010) 401-412.
  - [14] S. V. Ashton, C. Oppenheim. "A method of predicting Nobel prizewinners in chemistry". *Social Studies of Science* **8** (1978) 341-348.
  - [15] E. Garfield. "Do Nobel Prize winners write citation classics?" *Essays of an Information Scientist* **9** (1986) 182-187.
  - [16] M. D. Rablen, A. J. Oswald. "Mortality and immortality: The Nobel Prize as an experiment into the effect of status upon longevity". *J. Health Economics* **27** (2008) 1462-1471.
  - [17] F. S. Heffermehl. *The Nobel Peace Prize – What Nobel Really Wanted*. Praeger (2010) 239 pages.