

Transnational Medicine: The Rockefeller Foundation and Cuba, 1913-1950

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Incorporated in 1913, the Rockefeller Foundation (RF) was established to address the biological threat posed by tropical diseases to developing regions throughout the world. The RF participated in efforts to promote public health, scientific discovery and research. They established various commissions aimed at addressing issues of science, modernity, and development. At the end of the nineteenth century, Cuba was under military occupation by the United States immediately following the conclusion of Spanish-American war. U.S. participation in Cuba continued past the period of formal occupation in the form of non-profit organizations. Initially working on yellow fever research, scientists from the United States and Cuba collaborated on eradication efforts. Decades later, Cuba was again the site of tropical disease research on malaria. These groups, including the RF and its subsidiary, the International Health Commission (IHC), established programs to advance technology, while dealing with public health and scientific education within Cuba.

While the United States military was stationed in Cuba and Panama, scientists were able to make headway in the goal of eradicating yellow fever. With high incidences of soldiers contracting yellow fever, the U.S. had a vested interest in advancing scientific research. In Cuba, yellow fever was found to be transmitted by the mosquito, and not tainted water as previously believed. This was a success claimed by the United States and the RF. Cuba became the initial test case for study and prevention in a model that was used for decades. Despite not initially being a primary recipient of

RF funding, Cuba increasingly played a central role in the interests and narrative of this organization, part of a transnational relationship that spanned much of the first half of the 20th century.

Focusing on the first half of the 20th century, this essay will examine the role of Cuba within the larger institutional narrative of the RF. Cuba was one part of a continuing trend of U.S. involvement within Latin America. Even after the conclusion of the U.S. occupation, the RF remained interested in Cuba. U.S. business interests forged strong connections with members of the Cuban government and with the previous American military administration. As a result, these groups were able to continue to work within the society.

Cuba was repeatedly discussed for its role in housing major efforts to address the threat of yellow fever within RF annual reports. Consequently, Cuba became a central figure within the scientific research portion of the organization. As a result of its unique positioning, Cuba was the site of future experiments on malaria, and was the recipient of additional funding and support for public health programs in the middle of the 20th century.

Rockefeller Foundation Origins

After amassing a large fortune, John D. Rockefeller, a successful American industrialist, started to participate in philanthropy in earnest at the turn of the 20th century. Not unlike other wealthy capitalists of the period, Rockefeller wanted to use developed countries in less developed regions of the world.¹ Demonstrating an early interest in biomedical research, in 1901, John D. Rockefeller, Sr. announced the creation of a laboratory designed to address contagious diseases that had plagued the United States and business interests abroad.² Rockefeller's primary financial adviser, Frederick T. Gates, persuaded him to support efforts to promote modernization. As a result, Rockefeller established the Rockefeller Institute for Medical Research (RIMR), along

with the Rockefeller Sanitary Commission for the Eradication of Hookworm Disease, designed to address the disease related issues facing the American South. Serving as a forerunner for later projects, the RIMR and the Sanitary Commission displayed an interest in public health.³

As part of its 1913 charter, the RF established a clear agenda, with a large budget, while forming specific commissions designed to address certain primary concerns or interests of the organization. Prior to its creation, John D. Rockefeller, Sr. set aside \$3.2 million dollars for the future organization. After its incorporation in 1913, Rockefeller donated an additional \$100 million dollars in the form of bonds and securities.⁴ Among its assets, the RF had stock in the Galena-Signal Oil, Standard Oil Company, Solar Refining Company, Illinois Central Railroad. By the end of 1913, the RF's assets totaled nearly \$36 million dollars.⁵

The RF's structure, leadership, and agenda were established in its original charter. Accountable to a board of trustees, the organization included Director-Generals of various subsidiaries, along with regional representatives and researchers, and institution staff.⁶ As part of the incorporation process, the RF consolidated some of its previous projects into larger divisions. Having existed for several years prior, the Sanitary Commission was an organization designed to deal with outbreaks of hookworm throughout the American South. However, as part of the new organizational structure, the International Health Commission (IHC) absorbed the entire organization, adding a domestic component to a largely international effort.⁷ Consequently, as the scope of the institution widened, the scientific interests of the group transformed as well.

Over the next decade, RF program interests shifted from dysentery to hookworm to yellow fever. In an article published in 1902, the RF maintained that "the ravages of yellow fever are chiefly limited to the West Indies and the Spanish Main." On another occasion, the RF argued that dysentery deserved immediate attention due to the fact that the "plague has the widest of

distributions, and is never entirely absent from Western nations.” At the same time, the article maintained that during the “War of the Rebellion” dysentery was exceptionally prevalent and destructive to the army, claiming thousands of casualties.⁸

However, by 1913, the primary concerns of the RF addressed a different threat. In the RF’s first annual report, the organization singled out hookworm as being the focus of initial efforts at treatment and eradication. Hookworm was chosen because of the large number of infected parties and the availability of cheap, efficient treatment, which up until that point had not been effectively distributed.⁹

The priorities of the RF rapidly shifted and after 1915 yellow fever increasingly captured the focus and funding of the organization. Different from prior assertions that yellow fever was strictly a West Indies and Spanish Main disease, the RF’s 1915 annual report argued, “For more than 200 years the tropical and sub-tropical regions of America had been subject to devastating epidemics of infections, while serious outbreaks had occurred as far north as Philadelphia and Boston, and as far away from the epidemic centers as Spain, France, England, and Italy.”¹⁰ For the next several decades, yellow fever was a priority for the RF. Essential to the discovery of a treatment for yellow fever, Cuba played a significant part in the disease’s narrative, and thus in the history of the RF as well.

Historiography: The Rockefeller Foundation and Cuban Public Health

Although current research evaluates the transformation of public health systems within Latin America, Cuba has rarely been addressed directly. Scholarship has tended to chronicle either a sweeping history of medicine in the country over several hundred years, or has primarily focused on the post-1959 era. Many works detailing the Cuban Republic have generally overlooked the significance of the transnational scientific discourses. While the Caribbean has been examined by

scholars, other islands including Haiti, Jamaica, and Puerto Rico have been the focal points of those projects. Scholars who have addressed issues of public health delivery in Latin America have often chosen to analyze the philanthropic actions of prominent families including the Rockefellers and their contributions to scientific programs. Texts detailing U.S. involvement starting with the war of independence create a context for change in the health care system. Current scholarship has tended to view the presence of the United States in Cuba as scientific imperialism. In reality, the discourse was far more complex, and the RF's activities provide an opportunity for scholarly analysis.

The transformation of public health systems has been addressed through regionally oriented scholarship. In 1965, *The Caribbean: Its Health Problems*, edited by A. Curtus Wilgus, detailed a wide array of issues spanning climate, nutrition, sanitation, disease, and health administration.¹¹ Other works have focused on Latin America and other developing areas comparatively. Both edited works, Carlos Gerardo Molina and José Núñez del Arco's *Health Services in Latin America and Asia* and Mack Lipkin and William A. Lybrand's, *Population-Based Medicine* examine public health by focusing on development and health care administration.¹² At the same time, Donna Guy's *White Slavery and Mothers Alive and Dead* brings a gendered perspective to what has been generally a genderless field of analysis.¹³

Scholarship on Cuban medicine is diverse. Research addressing the first half of the 20th century has provided a national overview or a demographic-based analysis rather than an institutionally based analysis. Dividing the transformation of Cuban medicine into a series of stages starting in 1521, Ross Danielson's 1979 text *Cuban Medicine* describes the significance of yellow fever, along with the formation of hospitals and clinics within the country.¹⁴ Published in 1983, Sergio Díaz-Briquet's *The Health Revolution in Cuba* provides a demographic analysis of the state of health within the country through the examination of mortality rates.¹⁵ This text demonstrates

national trends over time which could be correlated to the threat posed by tropical diseases during this period and the success of programs aimed to address these deadly contagions.

Scholarship on Cuban public health has tended to focus on major transformations that occurred after the 1959 Revolution using a case study approach. Lydia Cabrera's *La medicina popular de Cuba*, Marta Rojas' *El médico de la familia en la Sierra Maestra*, Miguel Alejandro Figueras and Omar Everleny Pérez Villanueva's *La realidad de lo imposible* chronicle the transformation of a less developed public health program. These works detail challenges with traditional therapies, often religiously based, along with the difficulties of rural health care.¹⁶ Some of these are scholarly efforts by university researchers. Others are produced by administrators of Cuban state agencies and are, not surprisingly, frequently critical of the public health efforts of pre-Revolutionary administrations.

Also, some scholarship has provided an anthropological or political evaluation of Cuba's public health care system after 1959. Julie Margot Feinsilver, Katherine Hirschfield, Linda M. Whiteford and Laurence G. Branch have conducted anthropological surveys both praising and criticizing the post- revolutionary medical system, while analyzing how the transformation took place. Feinsilver examined the transformation of the socialist health system as being a "moral" imperative. At the same time, Whiteford and Branch analyzed how an advanced public health care program develops in an authoritarian regime. Hirschfield conducted an anthropological study on the progressive health care system in Cuba and found that, in order to understand the current status of public health care, it was necessary to trace its roots to the end of the 19th century. For the most part, these authors portray public health prior to the Revolutionary period as antiquated.¹⁷

At the same time, other scholars have provided an institutional history of the RF and the International Health Commission, often from the perspective of a single individual. Published in

1952, Raymond Fosdick's *The Story of the Rockefeller Foundation* provides a survey of the organization.¹⁸ Robert Shaplen's *Toward the Well-Being of Mankind* was published in 1964 as a tribute to the RF, not as a critical review.¹⁹ Also, Charles S. Bryan's *A Most Satisfactory Man* (1996) analyzes the contribution of Theodore Brevard Hayne to yellow fever research.²⁰ Additionally, Henry Hanson's 1961 autobiography, *The Pied Piper of Peru*, also addresses efforts to treat the disease from the perspective of a medical professional and public health administrator.²¹ Published in 1945, *Drainage for Health in the Caribbean Area* chronicles Estus H. Magoon's sanitation infrastructure projects within Cuba. Frequently, Magoon's work was in conjunction with the RF.²²

Over the last half century, the efforts of the RF have increasingly been the subject of academic inquest, particularly with regard to public health. Published in 1979, E. Richard Brown's *Rockefeller Medicine Men* uses Rockefeller philanthropy to examine the nature of early 20th century capitalism.²³ Conversely, John Etting's 1981 work, *The Germ of Laziness*, focuses on the Sanitary Commission in the American South and describes the short-lived program and its lasting impact on the region.²⁴ Similarly, Marco Cueto's 1994 edited work, *Missionaries of Science: The Rockefeller Foundation and Latin America* primarily focuses on the IHC's involvement in Brazil and Mexico.²⁵

Other researchers have examined the transnational nature of medical technology. Focusing on Puerto Rico, Guillermo Arbona's 1978 *Regionalization of Health Services* evaluates regional contributions and experiences. Similarly, other works have used the relationship between the IHC and the experiences of a population to demonstrate the transnational nature of scientific and medical technology.²⁶ Anne-Emmanuelle Birn has published numerous works addressing this issue, including *Marriage of Convenience* which deals with Revolutionary Mexico.²⁷ Steven Palmer's *Launching*

Global Health, Laura Briggs' *Reproducing Empire*, and Lily Kay's *The Molecular Vision of Life* all examine the application of developed public health concepts in developing regions. Each of these authors addressed issues of scientific imperialism within their central arguments.²⁸ Some scholars, including Palmer, chose to overlook questions of intent raised by other historians and instead focused on the agency of individuals and local communities where programs were carried out. However, despite the growing body of scholarship examining the IHC, Cuba remains largely absent from the narrative, despite the presence of numerous programs and officials working there.

Scholars have continued to question the motivation behind Rockefeller philanthropy. Some scholars, including Marcos Cueto, have contested the reasons behind Rockefeller's commitment to this issue, skeptical of the public image of the organization. Cueto claimed that the RF had political aims and was using its work to advance U.S. interests abroad.²⁹ At the same time, E. Richard Brown argued that Rockefeller's philanthropy was a "moral" obligation, a demonstration of the need for an active elite, supervising and promoting self-improvement.³⁰ By contrast, John Ettling argued that Rockefeller was motivated to establish these programs in order to counter negative publicity by reform movements within the United States.³¹

More recently, the RF has been included as one of several components in a larger narrative regarding the transformation of public health systems during the 20th century. In her research, Lily Kay details the spread of new biomedical knowledge as part of an imperial process using Caltech and the RF as case studies.³² Focusing on efforts to combat tropical disease, John Farley's *Bilharzia* uses a wider scope in detailing the development of more advanced medical programs and approaches to disease prevention and cures.³³ Similarly, Randall M. Packard has also researched those same issues while focusing on malaria.³⁴ As a result, by emphasizing scientific imperialism,

scholars have frequently undermined the contributions of scientists in Cuba and Latin America to scientific discourses.

Research Methodology and Resources

This project uses the archives of transnational organizations, along with documentation from leaders of research and public health projects, so that a more thorough understanding of this discourse can be constructed. The IHC was one of many U.S. organizations with projects throughout Latin America. Scientific knowledge was facilitated through the IHC and its contacts. As part of my pre-dissertation investigation, I received a grant-in-aid to conduct research at the Rockefeller Archive Center, where I found a vast array of documents that served as a starting point for my project. The relevant documents included annual reports, personal correspondence, external evaluations of the University of Havana Medical School by RF officials, demographic data, photographs, maps, scientific experiments, library inventories of health facilities, project budgets, and newspaper articles.

Through these materials, I have started to uncover key actors and organizations within this transnational framework and can now pursue collections containing additional relevant sources. Requests by individuals for specific research papers, proposals, and texts were frequently made through the RF, demonstrating an awareness of similar research interests in surrounding regions.

The Rockefeller Foundation: Latin America and the World

Over several decades, the focus of the RF's International Health Commission shifted to include programs to eradicate yellow fever and malaria. At the same time, they also were involved in efforts to increase sanitation and construct public health programs within local communities. Regionally oriented, the IHC worked with local officials providing funding, field staff positions,

and medical and scientific expertise. Individual communities conducted research, established public health programs, and provided treatment for infected populations. From the beginning, Latin America was central in the bureaucratic framework and the general focus of the organization. Despite changes to personnel and intraregional shifts, IHC participation within Latin America progressively increased from the creation of the organization through 1940.

With the eradication of hookworm as its primary objective, the IHC provided modern medical technology and training throughout much of the developing world. The IHC was divided into six administrative positions including Director-General, an Assistant Director-General, a Director of Surveys and Exhibits, Directors for Latin America, the West Indies, and the East.³⁵ As Director for Latin America in 1914, Joseph H. White was a medical doctor, as were all the other regional directors.³⁶ In order to take the position with the RF, White took a yearlong leave of absence from his position in the United States Public Health Service.³⁷ Key bureaucratic positions within the IHC were largely filled by medical doctors and scientists throughout its first decades of existence.

During its first year of operation, efforts to ensure solid relationships with colonial authorities were established with Western European powers, particularly Great Britain. The IHC first addressed colonial powers prior to approaching local communities regarding programs. At the same time, regional directors traveled to their respective administrative locations. J. H. White was sent to evaluate the situation in various Central American countries including Panama, Costa Rica, Guatemala, and Nicaragua in order to forge connections with the local governments.³⁸ Local experts were relied upon to portray the scope of the regional hookworm crisis and to contribute suggestions regarding treatment, if previous successes were experienced.³⁹ Thanks to these connections, the IHC

was able to establish the scope of the hookworm crisis in order to demonstrate the threat posed by this particular disease.

Statistical reports detailed the presence of hookworm within the United States, Latin America, East Asia, and the West Indies. The primary justification for its agenda focused on the threat of hookworm, particularly the presence of over half a million rural children in the South, of which almost 40 percent were infected with the disease. Statistics were even higher for developing countries. Within Colombia 90 percent of the country at certain altitudes were also infected. The report also noted the presence of the disease in British Guiana, Dutch Guiana, Egypt, India, Nepal, Ceylon, China, Malaya, and Fiji.⁴⁰ Thanks to the RF's efforts, hookworm was regarded as a serious contagion. This inclusion also demonstrates the broad geographic scope of IHC interests.

Within its first year of existence, the International Health Commission established relationships with various regional governments, while allowing for a decentralized approach to disease eradication. In the case of Panama, the IHC reported that "the Government of Panama thereupon asked the Commission to lend assistance for conducting operations in that Republic. The invitation was accepted April 28, 1914. It was agreed that the work would be carried on as a subdivision of the National Department of Health....This provided \$15,038.50 for conducting the work. The Republic of Panama is furnishing offices and other facilities, as well as the medicine needed for treatment."⁴¹ Much of the initial work was exploratory to determine the conditions of sanitation and sewage systems within the country, as well as to determine what percentage of the population was actually infected with the disease. Individual directors were assigned to oversee the work conducted within each state. Methods used in Panama were consistent with those used throughout the region.⁴² In its first 18 months of operation, the IHC had expenditures of \$157,731.08, of which two-thirds was spent on establishing hookworm eradication programs.⁴³

By 1920, however, the focus of the IHC had shifted to address the threat of other diseases, malaria and yellow fever.⁴⁴ Also General Director, Wickliffe Rose continued to head the administrative state for the IHC in 1920. At this point, the position of Director for Latin America had been entirely eliminated and a Director for the United States was added. At the same time, an Associate Regional Director for Brazil was created.⁴⁵ In Latin America there remained a significant number of field staff positions. Within Brazil, there were five posts that were regionally based. Also, Colombia, Jamaica, Guatemala, Nicaragua, Panama, Puerto Rico, Salvador, and Santo Domingo each retained one field staff member assigned to address hookworm eradication efforts.

In order to deal with both malaria and yellow fever, additional field positions were also established. Assigned to monitor malaria control efforts, field representatives in Nicaragua and Puerto Rico were the only two locations outside of the United States.⁴⁶ The only field positions were based in Latin America and addressed yellow fever.⁴⁷ Shortly after the creation of disease eradication programs, the IHC described its work “Promoting Health in Many Lands” noting how “the Board ...took up the fight against yellow fever in Mexico; continued it in Guatemala, Honduras, Nicaragua, and Salvadore; brought to successful conclusion the effort to free Guayaquil and Ecuador of the infection.”⁴⁸ As a result of their continued success in implementing eradication programs, the IHC pledged to continue its efforts while also describing progress made.

Throughout the 1920s, buoyed by early successes in addressing yellow fever in particular, the scope of IHC programs generally expanded. By 1925, a separate China Medical Board was established outside of the IHC. However, Latin America still functioned centrally within the focus of the organization. Frederick Russell assumed control over the organization replacing Rose as the General Director.⁴⁹ The number of field positions and travelling fellowships to Latin America increased dramatically. More countries were incorporated within their programs. Extensive

statistical data is provided regarding infection rates among populations studied and treated by the IHC.

Throughout the 1930s, the IHC continued its programs designed to eradicate yellow fever while progressively shifting the focus to malaria. The officials argued that their disease eradication efforts were largely successful. Detailing the position of the RF within the global community, the 1930 annual report claimed that “because of its world-wide public health activities the RF is in a unique position to increase human knowledge by collecting, collating, and studying facts concerning various diseases in many parts of the world.”⁵⁰ The report explained efforts by scientists and physicians to understand yellow fever and malaria, detailing particular experiments and new discoveries, which were frequently conducted in a field research setting.⁵¹

While not an initial location of eradication efforts, Cuba remained present within the larger narrative of the IHC, particularly due to its role in breakthroughs regarding yellow fever transmission. Increasingly incorporated within the organizational efforts during the 1930s, Cuba’s position within the RF’s work was closely related to the experience of the entire IHC during this period.

Cuba and the International Health Commission: Analysis and Findings

Despite not being a primary recipient of RF funding during its first years of operation, Cuba played a significant role in the narrative of the organization as its first major success. Occupied by the United States several times at the turn of the 20th century, U.S. military scientists were brought to the island by Leonard Wood to address the continued health problems of troops. The RF claimed that was through the work of Colonel Walter Reed and General William C. Gorgas that the origin of yellow fever was discovered, which eventually lead to a cure.⁵² Due to their research in Cuba, “Gorgas demonstrated that yellow fever control was possible in Habana in 1901, twenty years

elapsed [sic] conceptions of Reed, Gorgas, Carter, White, and others--that the extermination of the disease was possible simply through control in key points or endemic foci-- made it economically feasible to consider a program of eradication.”⁵³ The RF reserved praise specifically for scientists and physicians with the U.S. military. However, they also regarded Cuba as intrinsically connected with the discovery and success of yellow fever research. Cuba was touted as the ultimate example of scientific and medical perseverance throughout decades of annual reports.⁵⁴

As one of the first locations targeted with disease eradication procedures, Havana not only served as a model for protocol in other regions. Success in Havana had a dramatic impact on surrounding regions. As a major port city and transit center, Havana maintained significant connections throughout Latin America. With its initial removal from Havana and Panama, other regions, including Colombia, immediately saw a reduction or a complete cessation of yellow fever cases.⁵⁵ Additionally, RF actions further demonstrated the depth of the Cuban experience with the disease and its treatment. In 1921, the only member of the Yellow Fever Advisory Council outside of the United States was Juan Guiteras, a medical doctor and Secretary of the Department of Health and Charities in Cuba.⁵⁶ In the RF’s 1922 Annual Report, the success with the Havana experiment with eradication inspired Dr. Oswaldo Cruz. A physician, Cruz worked to implement the same methods in Rio de Janeiro.⁵⁷ Consequently, the RF asserted that “by international concert of effort the infection, so far as the Western Hemisphere is concerned, has been pretty well delimited and its boundaries are being steadily driven in.”⁵⁸ With the gradual elimination of the yellow fever threat, the International Health Commission began to turn its focus and its funding elsewhere.

As the International Health Commission gradually shifted to address malaria, Cuba was an important site of ground-breaking experiments. Throughout its early years, Cuba was a frequent stop on special tours conducted by the International Health Commission.⁵⁹ In 1926, a field staff

position was held by M. E. Conner, who was stationed in Cuba. Fundamental to combating the disease, field research was one of two primary components in the disease eradication plan, regardless of the specific disease or threat. The program also promoted local organizations and health programs, while being conscious of cultural medical practices.⁶⁰

Including Cuba as a participant in such measures, the International Health Commission also established education programs for foreign scientists, along with evaluation protocols aimed at calculating the effectiveness of medical school curricula. Medical professionals and educators were encouraged to visit North American facilities as part of the IHC agenda. In 1927, a group of scientists from Havana participated in the program. The visitors included Dr. Solano Ramos, dean of the University of Havana Medical School, along with Professor Carlos Finley, from the department of clinical medicine, Professor Aristides Agramonte, who specialized in research and laboratory science, and Professor Felix Martín, from the Havana School of Engineers and Architects. By 1929, an awareness program regarding “conditions in medical education in other parts of the world” was conducted by a local staff member in Cuba.⁶¹ Included as part of the educational exchange services provided by the organization, Cuban students received funds for nursing or other medical professional training.⁶² While the country continued to receive training opportunities and fellowships from the IHC, Cuba was also a primary participant in field research.

Throughout the 1930s, Cuba received progressively increased funding for public health programs, fellowships, and educational support. Thanks to continued success of the programs, Cuba was able to benefit financially, technologically, and medically. In 1934 Cuba was granted \$10,250.00 to conduct “Investigations and Surveys” on malaria. Researchers actually received payments totaling \$7,626.56. Additionally, Cuba continued to receive funding for yellow fever research. However, despite being allocated \$1,255.00, only \$300.00 was actually spent.⁶³ Several

years later, a Malaria Commission was formed as a division of the Secretariat of Health and Welfare in July 1936. While implementing preventative measures against the disease, the Malaria Commission examined various areas of the country, including Marianao, Bayamo, Manzanillo, and Holguin.⁶⁴

During the 1930s, Cuba was a site of continued attempts to address the threat of malaria, through education, local health service funding, and field research. In 1936, health units designed to provide local health services and education for health workers, also received funding and support from the IHC.⁶⁵ By the end of the decade, Cuba was incorporated in two of the three project categories used by the International Health Commission. Although the country did not house educational programs for public health, Cuba did receive aid for local and regional public health centers and also participated in malaria field research.⁶⁶ Based on several years of laboratory research, an experiment was conducted by the Malaria Commission of Cuba outside of Havana involving the use of trees as a means to limit the mosquito population in the region.⁶⁷ As a result, in 1938 RF reported that, “today, after three years of concerted effort, mosquitoes are rapidly disappearing from the area. And the work is being accomplished not by means of palliative expedience such as larvicides, but in large part by devices which, once installed, may be regarded as permanent.”⁶⁸

The Rockefeller Foundation and Cuba – Conclusions:

Despite receiving little initial funding, Cuba played a central role in RF efforts. Connections forged during the U.S. occupation of Cuba allowed for the continued presence of Cuba within the institutional narrative of the International Health Commission. Through the IHC’s yellow fever and malaria programs, Cuba established itself as a field research site. At the same time, Cuba also received funding for medical education and health care programs. Cuba built relationships as a

result of the U.S. military presence at the turn of the 20th century. Havana was able to gain prominence thanks to its early eradication of yellow fever and for the immediate and long term results impressed on surrounding regions. As a result, the Cuban public health sector benefited greatly from the funding and support provided by the RF. However, the U.S. – Cuban relationship in this case was reciprocal. Cuba provided the RF with an environment for field research and success that was later modeled throughout the Latin America.

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ENDNOTES:

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2. New York Daily Tribune, *Rockefeller's New Endowment*. New York: New York Daily Tribune, 1901, p. 6 The original name for the Institute varies depending on the source. The name given in the NY Daily Tribune article is the Rockefeller Medical Institute, but the now entitled Rockefeller University maintains that its original title was, "The Rockefeller Institute for Medical Research."
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5. The Rockefeller Foundation, *Annual Report 1913–1914*, pp. 130 and 132.
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 38. The Rockefeller Foundation, *Annual Report 1913–1914*, pp. 133–135.
 39. The Rockefeller Foundation, *Annual Report 1913–1914*, pp. 135.
 40. The Rockefeller Foundation, *Annual Report 1913–1914*, pp. 130–131. According to their calculations, around 50 percent of the British Guianian population was infected with hookworm, with higher numbers among Chinese indentured servants comprising a large percentage of the afflicted. Additionally, portions of Dutch Guiana and Ceylon have infection rates at 90 percent, while around half of the Egyptian and (East) Indian population were infected. Estimates were at around 60 percent for the populations of Malaysia and Fiji, whereas the percentages of infection in regions of China ranged from 60 to upwards of 75 percent.
 41. The Rockefeller Foundation, *Annual Report 1913–1914*, pp. 183–184.
 42. The Rockefeller Foundation, *Annual Report 1913–1914*, pp. 183–187.
 43. The Rockefeller Foundation, *Annual Report 1913–1914*, p. 217.
 44. By 1920, the International Health Commission was renamed the International Health Board. Similarly by 1930, the organization changed names again to the International Health Division. Generally referred to by scholars as the International Health Commission, this essay uses the title the International Health Commission for the sake of consistency and to prevent confusion within the analysis.
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57. The Rockefeller Foundation, *Annual Report 1922*, p. 45 See also, The Rockefeller Foundation, *Annual Report 1924*, pp. 34–35. As noted in their 1924 Annual Report, Cruz was ultimately unsuccessful in applying the same methodology used in Havana to Brazil.
58. The Rockefeller Foundation, *Annual Report 1921*, p. 97.
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