



Police, anthropometry, and fingerprinting: the transnational history of identification systems from Rio de la Plata to Brazil

Mercedes García Ferrari

Professor and researcher, Institute of Sciences/
Universidad Nacional de General Sarmiento.
Juan María Gutierrez, 1150
Caixa Postal 1613
1613 – Los Polvorines – PBA – Argentina
mgarciaferrari@gmail.com

Diego Galeano

Professor, Department of History/
Pontifícia Universidade Católica do Rio de Janeiro.
Rua Marquês de São Vicente, 225
22451-900 – Rio de Janeiro – RJ – Brazil
dgaleano@puc-rio.br

Received for publication in August 2014.

Approved for publication in April 2015.

Translated by Diane Groszklaus Whitty.

<http://dx.doi.org/10.1590/S0104-59702016000500010>

GARCÍA FERRARI, Mercedes; GALEANO, Diego. Police, anthropometry, and fingerprinting: transnational history of identification systems from Rio de la Plata to Brazil. *História, Ciências, Saúde – Manguinhos*, Rio de Janeiro, v.23, supl., dez. 2016. Available at: <http://www.scielo.br/hcsm>.

Abstract

The article explores the transnational circulation of methods for identifying people in South America. It analyzes both the implementation of the anthropometric system at police departments in Argentina, Uruguay, and Brazil starting in the 1890s, as well as the criticisms that were aimed at this method when fingerprinting took hold in the region in the early twentieth century. In a context of a heavy worldwide flow of ideas, experts, and technologies in policing, “bertillonage” was discussed and underwent hybridization in Latin America. The history of the anthropometric system in these three countries involved many travels by physicians, jurists, and police agents to Paris, debates over its suitability to local contexts, and an open controversy about identification techniques.

Keywords: anthropometry; identification technologies; police; criminal records; transnational history.

“There are two men of genius in France: Pasteur and Bertillon,” the anthropologist and anatomist Léonce Manouvrier wrote in the early twentieth century (Locard, 1914, p.167). In this tiny pantheon, alongside the father of modern bacteriology, stood the name “Bertillon.” This was not a reference to Louis-Adolphe Bertillon, the physician and demographer who founded the Society of Anthropology of Paris (Société d’anthropologie de Paris), but to one of his children: Alphonse Bertillon (1853-1914). While coming from a long line of prestigious French scientists, Alphonse began his life as the family’s black sheep. After he failed to make a career as a physician, his father – then director of Statistics – was obliged to use his influence within the government bureaucracy to arrange a discreet post for Alphonse as a clerk in the Paris police prefecture, where he started working in 1879.

It was this obscure fate that, paradoxically, provided the springboard from which Alphonse Bertillon rose to fame and earned a place in the field of French science during the Belle Époque, even though he held no university degree. He soon began working in the criminal records office, where identification cards for those convicted by the courts were created and stored. Judges used these cards to verify whether someone in custody had a police record, since a repeat offense might result in a stiffer sentence. In the last quarter of the nineteenth century, the matter of recidivism and of “habitual offenders” had become a topic of scientific debate, fundamental at conferences on criminal anthropology and a major concern for state elites. While Bertillon was working at the police, a law was under discussion to provide for the deportation of recidivists to the French colonies; it was passed in 1885 (Soula, 2011).

“It does not suffice to write a law against recidivists,” wrote Bertillon (1883, p.1-2), “to condemn a recidivist to deportation, his identity must first be recognized.” With this text, the new police employee introduced the invention that he saw as affording a technical solution to a bureaucratic problem. Identification cards were being filed in alphabetical order by name and this criterion was proving inadequate for two reasons. The first was quantitative: as the number of cards on file grew, searches entailed an increasingly thorny process. The second problem stemmed from a subterfuge employed by the accused to avoid a tougher sentence, based on recidivism. According to the police, the use of an alias to cover up a prior record was a common practice that the authorities had been unable to circumvent.

Bertillon devised an identification method that found great response around the world, once it had overcome resistance in France. Since the 1870s, criminal records had included photographic portraits, a technology that lent a greater degree of sophistication to identification data, previously limited to “signalements” (physical descriptions), that is, a written record of age, height, skin color, scars, tattoos, and other “distinguishing marks.” Photography was a major ally in identification processes but afforded no advantage when it came to classifying the cards, which still had to be placed in alphabetical order. In response to this problem, Bertillon started experimenting with a new classification method based on the body measurements of those in custody. Influenced by physical anthropology and social statistics (especially the work of Paul Broca and Adolphe Quételet), he looked for a way to classify measurements of the human body.

Known as the “anthropometric system,” or “judicial anthropometry,” the Bertillon method was grounded on two basic premises: that the human bone structure is almost absolutely fixed from the age of 20 on and that dimensions vary enormously between people. As Bertillon

saw it, every adult male bears a kind of identification code, imprinted on his body. This technique for ascertaining a person's identity began with a series of millimetrically precise body measurements (height; breadth; height of bust; length and width of head; height and width of right ear; length of foot, middle finger, and left forearm); results were divided into three categories: small, medium, and large. These data were written on index cards, which were then classified into distinct categories, following an order that reduced the number of cards until there was a box containing only a dozen. The system also included: data from morphological and physiognomic observations; the notation of "distinguishing marks" (tattoos and scars); and, lastly, frontal and profile "metric photography," another Bertillon technique that was to have a long life in the police world.

Once Bertillon had succeeded in convincing the Paris police to implement his system in the 1880s (About, 2004), the procedure when the identity of someone in custody was unknown became to take him to the Identification Office, where staff would record his measurements. Files were searched to confirm any cases of recidivism and identity was then verified directly.

Owing to these techniques and other inventions related to crime scene investigations, Alphonse Bertillon is recognized as one of the founding fathers of modern scientific police work. Alexandre Lacassagne, the renowned forensic physician from the school of Lyon, coined the term "bertillonage"¹ to refer to this set of methods, which were tested out in a gray police room; he also introduced Bertillon into the most prestigious circles of European criminology (Kaluszynski, 2001). Bertillon laid out his ideas at the first Congress of Criminal Anthropology, held in Rome in 1885 and attended by Lacassagne and Lombroso. Neither a physician nor an attorney, Bertillon was a member of the steering committee for the second congress, convened in Paris in 1889, where – as we shall see – the anthropometric system for identifying individuals and proving recidivism won definitive international acclaim.

In the closing decade of the nineteenth century, bertillonage crossed borders in an intense process of transnationalization; anthropometric offices appeared around the globe, with Latin America standing out (Piazza, 2011). Buenos Aires implemented the first official service outside of France, an experience that was repeated in Uruguay, Brazil, Mexico, Ecuador, Peru, and Chile (Galeano, García Ferrari, 2011). In this article, we analyze implementation of the anthropometric system in Argentina, Uruguay, and Brazil, the Latin American countries where most European immigrants settled and where the debate over the consequences of anonymity in large cities was especially heated. We explore the main demographic and urban transformations that accounted for a fast-spreading interest in police identification systems under discussion around the world. We also analyze resistance to the adoption of bertillonage and the emergence of competing systems.

The main cities in Argentina, Uruguay, and Brazil with offices of anthropometric identification lay in Atlantic South America where maritime routes linked the two large Río de la Plata ports of Buenos Aires and Montevideo with Brazilian port cities. This was a territory where journeys of lives, languages, identities, and collective experiences intertwined. Migrants, militant anarchists, and a series of figures known by South American police as "traveling criminals" circulated through the area. Traveling these same routes, bertillonage was a central part of an unprecedented exchange of police knowledge among the three South American

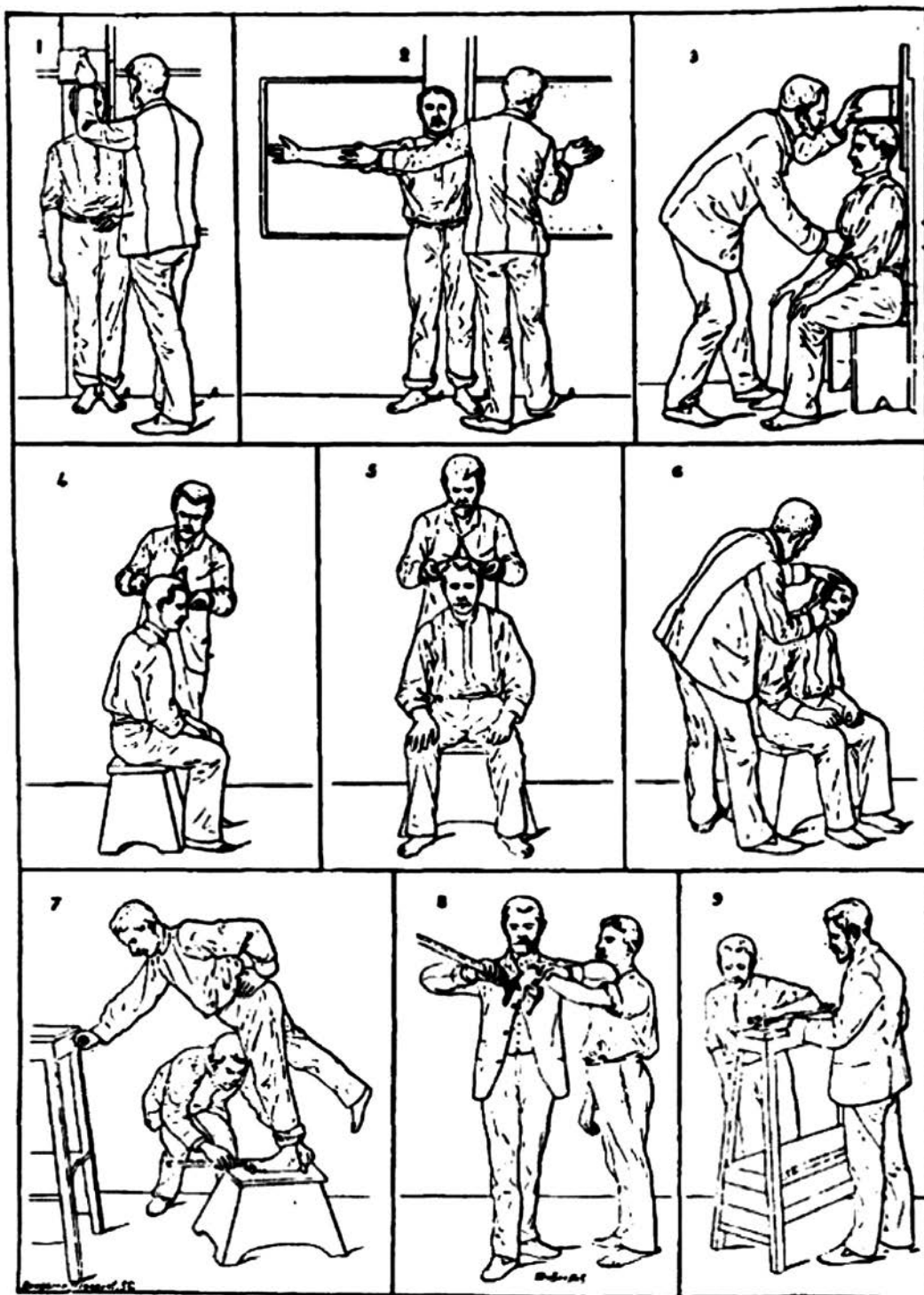


Figure 1: Anthropometric measurements (Bertillon, 1893, s.p.)

republics. Conjoining methodological strategies from comparative history and transnational history, we investigate these flows and exchanges in these pages.²

In recent decades, the study of transborder networks, exchanges, and ties has engendered thought-provoking research and a variety of methodological proposals: connected history,

global history, *histoire croisée* (crossed history). The so-called “transnational turn” encompasses diverse approaches, such as historical comparison, the analysis of international relations, and cultural transfers and flows (Ther, 2012; Pérez, 2015). This is a heterogeneous field of proposals with a shared conviction that historical and social processes cannot be understood if analysis is restricted to spaces whose frontiers are defined by geopolitical parameters, like “empire” or “nation-state.” In this regard, we believe that the transnational perspective offers a way to insert a slice of space into the real web of social relations under research. To cite Charles Tilly (1984), transnationality is not synonymous with “big structures, large processes, and huge comparisons,” nor is it an attempt to relegate nation-states to the shadows of history. The purpose is not, in the words of Pierre-Yves Saunier (2008, p.14), “to substitute a history of the nation-state with a history without or against the nation-state, but to find a way to study how nation-states and flows of all sorts are entangled components of the modern age.”

At the intersection of the scientific field and state bureaucracy, the international circulation of identification methods enables a discussion of two fundamental questions. On the one hand, we can problematize the interpretative key that explains scientific exchanges as a mere transfusion of ideas from a center that produces science to a periphery that receives it. On the other, we can analyze these circulations from the perspective of transnational history, showing that they were the result not of the modernizing impulses of a police bureaucracy that reproduced European experiences but rather of a concern with establishing cooperative mechanisms and solidifying networks of information exchange between the region’s police departments.

Recent studies have shown that the circulation of identification systems involved complex networks of transborder police cooperation on various continents (Breckenridge, Szreter, 2012; Brown, About, Lonergan, 2013).³ These exchanges are essential to understanding the transnational history of bertillonage in Argentina, Brazil, and Uruguay. Police departments in Atlantic South America were especially attentive to technological and legal innovations in neighboring countries, since they believed the space between Rio de la Plata and Brazil constituted a shared surveillance concern.

The interdependence of criminal and police realities among these three countries was the object of frequent dialogue between the region’s police. In 1899, for example, Félix Pacheco interviewed the chief of the Argentinean police, Francisco Beazley, for the newspaper *Jornal do Comércio*. Beazley, who was visiting Rio de Janeiro in the company of President Roca, had taken with him a proposal to tighten ties between the Brazilian and Argentinean forces. In his interview, he stated that Uruguay, Brazil, and Argentina – “the big centers of thievery [*gatunagem*] in South America” – were stitched together by invisible threads. When thieves in one of the countries were “energetically pursued by agents of the law,” they would move to a neighboring town, a place that became “a kind of *refugium peccatorum*” (Pacheco, 1899, p.3). As a journalist, Pacheco was defending the same point that he would later defend as director of Rio’s Identification Office: the way to combat the circulation of these criminals was to build a network of police cooperation. This would protect Atlantic South America and, he said in conclusion, “Brazil, Argentina, and Uruguay would dispatch back to Europe the pernicious element that it sends us” (p.3).

Police technologies beyond borders

In pace with the formation of nation-states in the nineteenth century, South American police institutions were built against a backdrop of ongoing dialogue with the “police models” then circulating internationally. Latin America joined in the dispute that was widespread in the northern hemisphere and that countered the French model – deemed a paradigm of centralization and militarism – with the Anglo-Saxon one, which took a more civil- and municipal-minded approach (Emsley, 1996). Latin American police discussed these ideas and wrote about these models in their own magazines. Many of their opinions were formed through their readings; a review of the card catalogues at public libraries in Argentina and Brazil detects the presence of various books on European police, added to the shelves during the nineteenth century (Galeano, 2009).

In addition to reading these texts, police agents traveled to Europe on official “study trips.” It is no accident that the main destinations of these travels were Paris and London. We know this thanks to some travel reports and books: texts by the Argentinean Agustín Drago published in the *Revista de la Policía de la Capital* in 1888; reports by Rio de Janeiro police chiefs João Brasil Silvado and João Baptista de Sampaio Ferraz; and an early twentieth-century report by Buenos Aires policeman Manuel Mujica Farías.⁴ The voyagers were usually police staff and members of the elites (mostly jurists and physicians), a twofold status that became more difficult and rare over the course of the twentieth century. As first-class excursions, these illustrious visits greatly resembled the “grand tours” that Latin America’s elites took to Europe, but the texts were distinguished by their focus on reporting the latest in police innovations observed abroad.

News of bertillonage reached South America owing to these travels, which often included visits to the anthropometric service in Paris and personal meetings with Alphonse Bertillon. A network of international contacts linking South American and European police gradually gained shape, but at its outset it was not exclusively a police network. The first contacts took place in 1885 at the Congress of Criminal Anthropology in Rome. The debates at the event quickly reached the south through intellectuals who were keen on the new ideas of the Italian school of criminology. Buenos Aires took the initiative by founding the Society of Forensic Anthropology in 1888 and launching a number of local publications (Olmo, 1992; Creazzo, 2007).

Members of the society had close ties with government personnel, including the chief of police. Attorney Luis María Drago, for example, wrote the first Latin American book on criminology, which was warmly received in European circles and soon translated to Italian, with a prologue by Lombroso (Drago, 1890). Luis María was a brother to Agustín Drago, who was sent to Europe by the government to study the medical services at several foreign police departments (Argentina, 1888, p.380). He met with Bertillon in Paris in late 1887 and upon return convinced the police administration that it would be opportune to create an anthropometric service. The internal order that officialized its inauguration made clear the intent to fall in step with Paris and other Old World capitals: the new office was seen as advancing the task of “adapt[ing] the police service to all improvements whose practice had yielded excellent results in European nations” (Orden..., 3 abr. 1889).

The second Congress of Criminal Anthropology was held in Paris in 1889 as part of the centennial celebrations of the French Revolution. Bertillon was the star of one table, while various attendees from different countries discussed whether his anthropometric system would be accepted worldwide as an identification method. The Argentinean delegate was assigned to read the proposal, and his address underscored the need to extend the system's reach beyond Paris, as had already been done in Buenos Aires and some US cities. Returning this kindness, Bertillon interjected that the Argentinean government had been the only one to open an official anthropometric service up to that point, whereas just a few private initiatives had been created in the United States.⁵

How was it that the first official anthropometric office to be established outside of France was in Buenos Aires? In 1880, Buenos Aires had become the definitive capital of Argentina, and the city's elites saw urban reforms as a grand political laboratory. The correlate to the ambitious projects that drew their inspiration from the Haussmannian model was the modernization of police institutions. The Buenos Aires police department was then 60 years old and during that time it had served as a security force for both the city and the vast province of the same name. When Buenos Aires took on the role of federal capital, a new capital had to be invented for the province, one that would have its own police department. What had previously been a single institution was therefore split in two: the Capital City Police (*Policía de la Capital*), headquartered in the city of Buenos Aires, and the Buenos Aires Provincial Police Department (*Policía de la Provincia de Buenos Aires*), whose central command was located in the new provincial capital: the city of La Plata.

From its inception, one of the goals of the metropolitan police was to set itself apart from the old provincial security force and become a "modern police force" that deployed all types of technological advances. In 1888, the central department moved into a luxurious new building, which still houses police headquarters today, and the anthropometric office was installed there. The overall context of police modernization is essential to understanding why bertillonage reached Buenos Aires so quickly. It is likewise important to take into account the ties that bound state elites with jurists and physicians who had tight connections both to international circuits where scientific innovations circulated and especially to the reception of criminology in Argentina. But no interpretation of this phenomenon can overlook the appeal of this identification system in a city overwhelmed by a massive influx of immigrants.

Although the United States was the country that received the most European immigrants from the mid-nineteenth through the early twentieth century in absolute numbers, immigration had greater relative importance in Argentina. In 1869, 12% of its population was foreign-born; by 1895, the figure had climbed to 25.5%; and by 1914, it had hit 30%. Much as these national data are striking, they conceal deep regional differences and in the city of Buenos Aires, the impact was even more marked: in 1869, 40% of its inhabitants were foreign-born, while by 1914 nearly half were. The population of the capital rose from roughly 200,000 to 1,500,000, making it the second-largest city in the Americas, outranked only by New York. As the size of the population changed, so too did its make-up. Young men formed the majority in this Babelic metropolis. According to the 1895 municipal census, 70% of the male population was under the age of 40 and nearly 85% of men aged 30 to 40

were foreign-born, mostly Italian or Spanish, though myriad languages were spoken in the town's bars and on its streets (Otero, 2006, p.153-154).

Despite government propaganda and discourses proclaiming the gamut of advances that European immigration would bring, the new arrivals were soon the brunt of various accusations and suspicions. Fears about the new inhabitants found expression in the press and popular literature. How could good people be distinguished from the "undesirable?" How could their histories be reconstructed and their origins traced? How could you know who was who in this city where appearances were deceptive? The police absorbed these questions and reformulated them as they saw fit. In this context, would it be possible to find anybody in the city? Amidst this flood of new faces, police asked themselves how they would recognize the "professional thieves," the ones who committed the same crimes time and again. How could they prevent a "crook" from passing himself off as an "honest citizen?" In Buenos Aires, bertillonage was presented as a potential answer to these anxious concerns on the part of the authorities.

In April 1889, exchanges with Bertillon bore fruit at the Buenos Aires police department with the opening of the Office of Anthropometric Identification (Oficina de Identificación Antropométrica). An internal order issued by the chief set out the terms of its operation: everyone taken into custody or arrested would be identified using the new system. From the perspective of the police administration, there were several reasons for inaugurating the service: demographic growth and its relation to rising crime; the need to provide judges with information to verify recidivism; and the contrast between the old, flawed systems of visual recognition and the new method based on "scientific criteria" (Orden..., 3 abr. 1889).

Science appeared to have the answer to a problem that had been prompting steadily greater police concern ever since immigration had intensified: anonymity. The old forms of identification based on personal knowledge seemed to founder in the face of demographic change and constant transformations in the police force itself. Throughout the second half of the nineteenth century, the Buenos Aires municipal police witnessed extremely high turnover among its recruits, equal to the annual renewal of its entire force, hampering officers' acquisition of the most basic knowledge of their craft (Gayol, 1996, p.123-138). The possibility of establishing technical offices that did not demand large numbers of specialized personnel consequently presented itself as an attractive solution for a police department characterized by a low level of professionalization among its rank and file (García Ferrari, 2010, p.36-54).

Police authorities had high hopes for the new service, yet resistance soon surfaced. Argentina's minister of justice, who was responsible for authorizing the identification of prisoners confined to different jails, often denied consent. Nor were judges very welcoming to the new system; in various cases, they impeded the identification of those charged, deeming that body measurements and judicial photography were an affront to a person's honor. Given all this resistance, the group of measurable subjects was substantially reduced, and it was quite random whether a new card would make it into the biometric files; in 1905 the office itself quit performing new identifications (Ruggiero, 2004, p.101-106; García Ferrari, 2007, p.99-133).

Despite this constant criticism of the Anthropometric Office at the turn of the century, a more thoroughgoing analysis of its daily operations reveals a separate reality. Before the

office opened its doors, police had used photographic portraits to identify "*ladrones conocidos*," that is, individuals who had been charged two or more times with crimes against property. In 1889, the photograph albums known as "rogues' galleries" held the images of roughly 300 individuals, but by 1900 the anthropometric service had measured and photographed over 15,000 people. Although its files were never one hundred percent complete, the office's roll of identified subjects grew remarkably; only members of the popular classes were found in the albums in the 1880s, while merchants and men who declared themselves members of the "liberal professions" occupied their pages by the early twentieth century (García Ferrari, 2007, p.128-144).

Why did the Anthropometric Office stir so much resistance? Signs of these criticisms are visible in the pages of police journals; the service, which had placed the Capital City Police among the world's most modern in the field of personal identification, was decried as a symbol of institutional backwardness at the dawn of the twentieth century. It had faced opposition from judges from the outset, yet its quantitative results were hardly negligible. It identified hundreds of repeat offenders every year, including some who had tried to conceal their identities behind aliases. The department's file of anthropometric cards kept growing. All indications are that interpreting the "failure" of anthropometry in Argentina means examining the country's other major police institution: the Buenos Aires Provincial Police Department.

In 1884, the provincial government set up its headquarters in the newly built city of La Plata, and its police department started down a long road of symbolic disputes with the Capital City Police. Juan Vucetich arrived in Argentina that same year. An immigrant from present-day Croatia, Vucetich was to play a fundamental role in the development of identification systems in Latin America. His personal profile differed greatly from Agustín Drago's; he was a member neither of the Buenos Aires leading elites nor of international scientific circuits, and he had no ties to the country's economic or political power. Though some authors consider Vucetich to have been part of a group of European scientists who traveled to Latin America in those years in search of suitable arenas for testing out new theories (Rodríguez, 2004), available biographic information suggests that the Croatian was an immigrant like so many others; the direction his career took was defined by the fact that he joined the police department and by the ensuing job opportunities that presented themselves. In 1888, he entered the financial area of the provincial police service on the basis of merit and one year later was promoted to head of the Statistics Office. It was undoubtedly his knowledge of mathematics and his interest in cultivating new theories that soon raised him to the ranks of the institutional elite, in a context where it was hard to recruit literate police officers.

Vucetich quickly set about studying the possibility of adopting one of the latest innovations in police science. He had read some publications by Paul Broca and Alphonse Bertillon, as well as an article that disseminated Francis Galton's theories on fingerprints (Varigny, 1891). After several visits to the Buenos Aires Anthropometric Office, which was still headed by Drago, he reached the conclusion that it would be very challenging to implement the anthropometric system properly. According to Vucetich, the measurements done at this office were often flawed and the same was undoubtedly the case throughout the Buenos Aires municipal police (Almandos, 1909, p.15-29). At the same time, the Province of Buenos Aires was so large geographically speaking that the infrastructure costs and skills

required to open local offices were prohibitive, and so it was hard to identify all who were taken into custody.

In September 1891, when an anthropometric identification service was inaugurated in La Plata and bertillonage became a routine part of the work there, Vucetich began recording prints from all ten fingers of those arrested – a pioneer endeavor on the world stage. Although it is hard to determine whether he classified the cards in the beginning, for the first time ever and in a small office in a city still under construction, ten fingerprints were systematically taken for police identification purposes. In this first moment, it is easy to perceive the eclectic approach that characterized Vucetich’s use of identification systems. Disseminated around the world in the early twentieth century, the invention of some of the great fingerprint identification systems – known as “Vucetich’s system,” “the Argentinean system,” and “the South American system” by some European criminologists – emerged from this impetus to adapt, combine, and innovate procedures, adjusting them to local institutions (García Ferrari, 2013, p.29-117).

Vucetich used both systems until 1896, taking anthropometric measurements and relying on Bertillon’s instructions to classify the cards. He employed judicial photography and recorded morphological descriptions. He also made prints of all ten fingers on a card

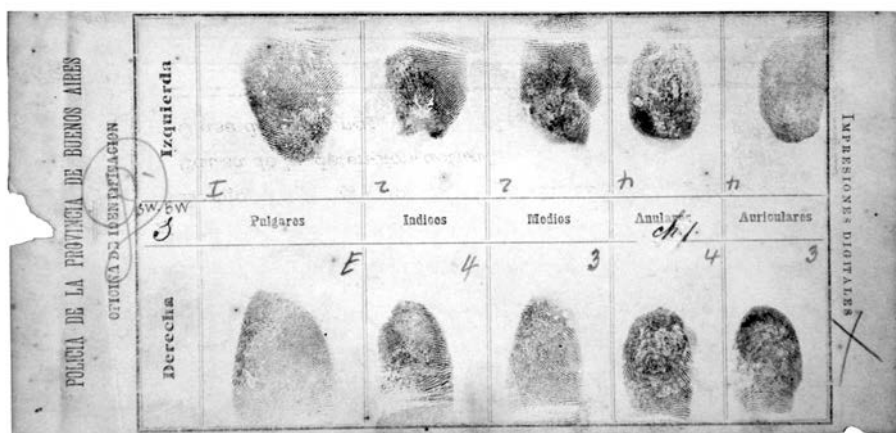


Figure 2: Front of an identification card from the La Plata identification office, which displayed fingerprints (Museo Policial de la Provincia de Buenos Aires, La Plata, 1891)

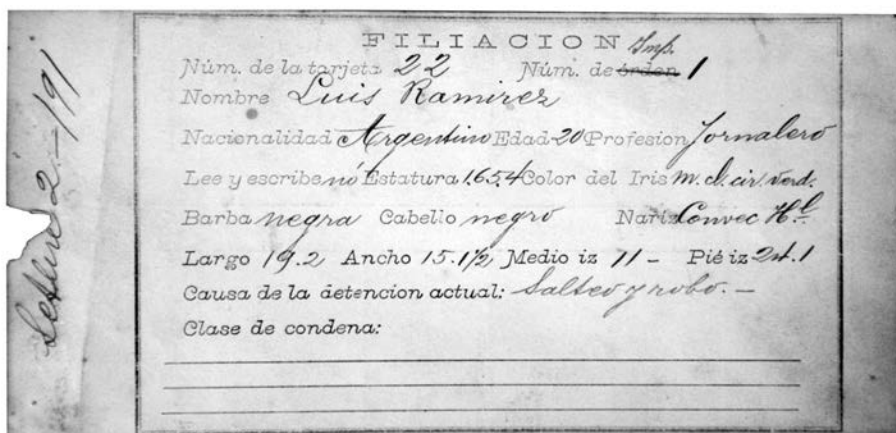


Figure 3: Back of an identification card from the La Plata identification office, which displayed anthropometric measurements (Museo Policial de la Provincia de Buenos Aires, La Plata, 1891)

and followed Galton's guidelines to classify the images. Over the course of the 1890s, he introduced some changes both to fingerprinting itself and to the classification of prints. This included the *pianito*, a wooden board with five grooves that fit the shape of each finger and facilitated fingerprinting; he also expanded the quantity of classifications proposed by Galton and thus moved away from his master's model (Vucetich, 1893).

The first truly major change to the anthropometric system came in 1895, when Vucetich proposed a physical description method called "Buenos Aires Province," in which he abandoned all body measurements except height. This meant discarding bertillonage, as its classification system was anchored in these measurements. Yet he maintained other features of the method devised by Bertillon, such as judicial photography and certain morphological descriptions. Cards were classified on the basis of distinguishing marks and scars, divided into 58 categories corresponding to the various regions of visible parts of the body. The identifier was supposed to note some striking characteristic of the subject and classify his card accordingly. During any subsequent identification procedure, the identifier was again to look for a striking feature and review the corresponding record. Other distinguishing marks mentioned on the description card were to be examined and, lastly, fingerprints and metric photographs taken. In 1896, the Buenos Aires Provincial Police Department stopped using the anthropometric system for most cases and officially adopted the new physical description system (Vucetich, 1896).

Disputes over identification systems

In the last decade of the nineteenth century, Vucetich solidified his reputation as an expert in identification in Latin America. The vast Province of Buenos Aires was divided into four legal

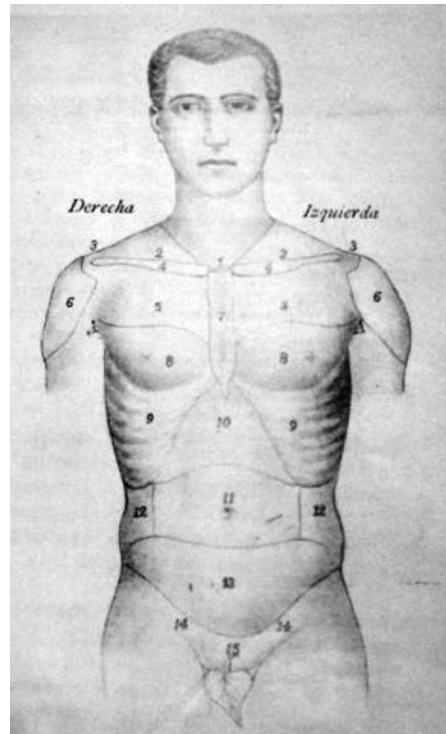


Figura 4: Regiões corporais segundo o sistema de Juan Vucetich (Vucetich, 1895, p.80)

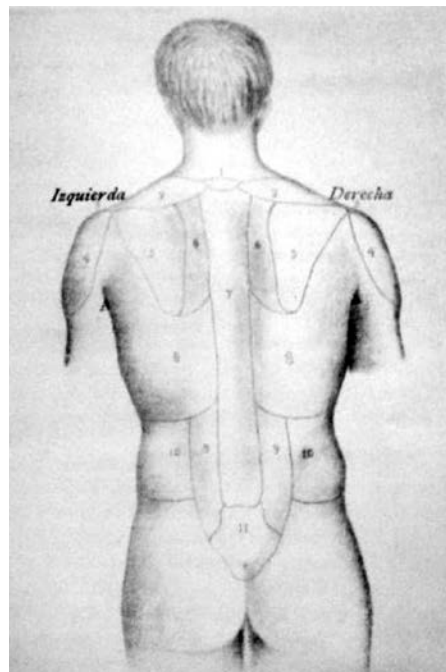


Figure 5: Regions of the body according to Juan Vucetich's system (Vucetich, 1895, p.84)

departments, requiring the police to open four identification offices. Vucetich published two instruction manuals for use in training personnel and disseminating the new methods. In 1891, he also launched the *Boletín de Estadística*, while the release of his book *Instrucciones generales para la identificación antropométrica* (Vucetich, 1893) brought the first Spanish-language presentation of bertillonage. Even though the pages on anthropometry offered nothing original but instead echoed Bertillon's work verbatim, the book had a section devoted to "Las impresiones digitales (según Francisco Galton)," where the method was included among tools for police identification for the first time. In 1895, he published *Instrucciones generales para el sistema de filiación "Provincia de Buenos Aires"* (Vucetich, 1895), where he sought to combine fingerprinting with identification through distinguishing marks. Both manuals were forwarded to numerous police departments and to experts on criminal matters in Latin America and Europe.

These 1890s works were enthusiastically received in Uruguay in the context of reforms intended to modernize the Montevideo police. The Identification and Anthropometry Office had been inaugurated there in 1895, although it was only the following year that the national government authorized its actual creation. The new office was directly attached to the police administration and was located at police headquarters (Casa Central de Policía), along with a photography service. All police stations were supposed to send those in custody for identification every day, and civil guards should record their anthropometric data on service sheets (Uruguay, 1896).

A letter from Vucetich and the receipt of his book *Instrucciones generales* (1895) had convinced Uruguay's new chief of police to launch a reform of the identification service, whose operations were precarious. The police administration requested Vucetich's "personal cooperation" and asked him to forward a budget indicating the needed instruments, personnel, and overhead costs. The backing of the renowned Argentinean expert was vital to negotiating authorization from national authorities to equip the new office (Sánchez, 25 abr. 1896).

This was not the first time that Vucetich's efforts to disseminate his work in other countries positioned him as a regional expert and a possessor of the hands-on knowledge needed to set up an identification office. In 1893, after sending the police chief in Santiago de Chile a copy of *Instrucciones generales* (Vucetich, 1893), Vucetich's advice had been similarly sought on how to "implement in all its scope" an anthropometric service in that city (Prefectura..., 8 ago. 1893). His role as a regional expert was undoubtedly greatly strengthened in the early twentieth century with the advent of fingerprinting and his radical opposition to anthropometry, but his reputation had initially gained shape in South America during the 1890s, linked to his knowledge of bertillonage.

Uruguay was the South American country where Vucetich's ideas met with greatest resistance. The police department's identification service was quickly closed following an attempted revolution that had Uruguayan society in turmoil in 1897. Starting in 1898, identification was assigned to an office of the Prison Council and applied solely to those who had been convicted. The service was headed by physician Alfredo Giribaldi, a steadfast proponent of anthropometry; bertillonage was better than fingerprinting, he argued, because of its scientific characteristics and because it furnished physical information on recidivists

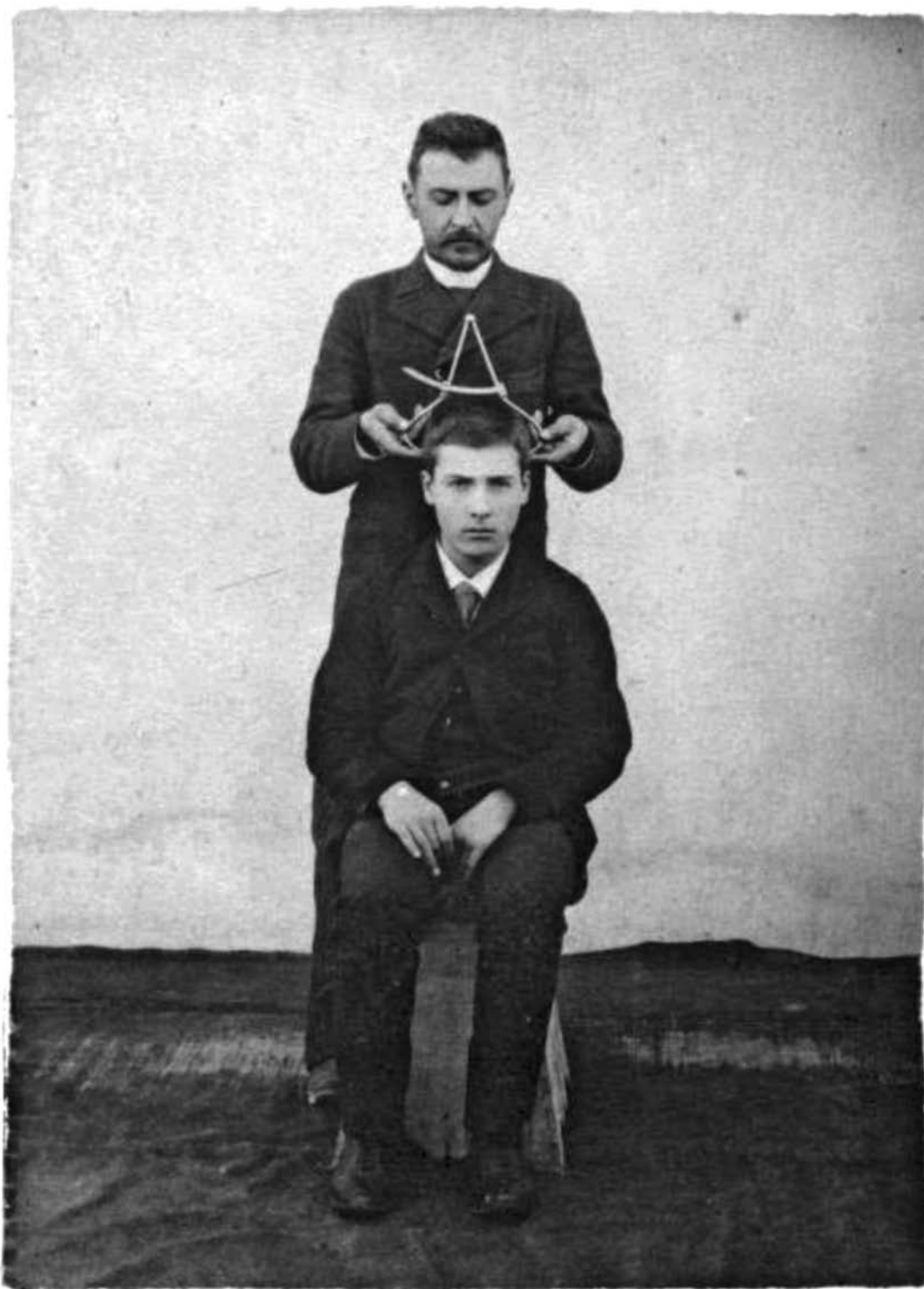


Figure 6: Juan Vucetich taking anthropometric measurements (Vucetich, 1893, s.p.)



Figure 7: Juan Vucetich taking anthropometric measurements (Vucetich, 1893, s.p.)

that could be used in criminological studies.⁶ In 1901, during the second Latin American Scientific Congress in Montevideo, Vucetich presented his fingerprinting system to the local scientific community for the first time. Although he hoped that the congress would recommend adoption of his method throughout South America, its final report only stated that the technique was a “useful complement in the identification of persons and extremely practical in the identification of corpses” (Reunión..., 1901, p.146). Limited as it was, this was the first legitimization of fingerprinting in the context of Latin American scientific conferences, as well as the beginning of a fierce clash between Vucetich and Giribaldi.

The armed struggles between the *colorados* and *blancos* in Uruguay came to an end in 1904. President José Batlle y Ordóñez ushered in an era of far-reaching modernization of the state, characterized by the centralization of power in Montevideo. The police department in the nation’s capital took the same path and in fact attempted to keep step with recent institutional reforms in other South American police forces, especially in Argentina. The *Revista de Policía* was launched in November of that year and accompanied the administration of police chief José Bernassa y Jerez under Batlle y Ordóñez’s first term (1903-1907). “Now that the war has fortunately ended,” reads the first issue of the magazine, “Coronel Jerez has taken the first step toward unifying both police forces” – a reference to alignment with the Argentinean police (Charles, 15 nov. 1904).

However, in 1905, when various countries in the region agreed to use fingerprinting in the transnational exchange of police records, along with the “Buenos Aires Province” system of description, Giribaldi was intractable in his opposition and managed to defer the adoption of fingerprinting in Uruguay. “Vucetichism” propelled the complete replacement of one system for the other, except for photography. Its advocates saw bertillonage as associated with the “dark forces of old Europe,” resistant to the triumph of the system that was being touted worldwide as a police trophy held by the new republics of the south. “It would be highly advantageous to replace all the old systems with the plain and simple application of fingerprinting” was the recommendation of the plenary session of the third Latin American Scientific Congress, convened in Rio de Janeiro in 1905 (Seção..., 1907, p.56). This marked the definitive scientific legitimization of the fingerprint system created by Juan Vucetich in Latin America and greatly boosted police department efforts to coordinate the exchange of biometric information (Seção, 1907). Giribaldi’s perseverance in defending the compatibility of the two systems made him a lone voice, in sharp contrast with the South American consensus over Vucetich’s method.⁷

Many factors can account for Uruguay’s unique position within the region. On the one hand, the police were taken to task for their political allegiances during the civil wars that stretched until 1904. On the other, while the major cities in the Rio de la Plata region were then undergoing demographic and urban transformations, the impacts of these processes differed in each case. Montevideo saw its influx of immigrants peak before Buenos Aires and La Plata; it reached its apex in 1860 and then dropped off. Consequently, the effects of the new identification technologies were felt at a time when worries about anonymity were on the decline. In the 1890s, Uruguayan authorities were more concerned about how to attract immigrants, who preferred to come ashore in the lovely city of Buenos Aires, lured by higher wages and the possibility of climbing the social ladder. Uruguay’s apprehensions were

focused both on its status as a “border country” wedged between the two giants of Argentina and Brazil and, especially, on Montevideo’s location on the map of Atlantic South America, since it was a transit destination for the “traveling criminals,” seamen, and prostitutes that circulated about the region (Pellegrino, 2003; Galeano, 2012).

Uruguay’s political system also displayed significant differences. Unlike its neighbors, it was not a federal country. The government itself, its judicial and prison bureaucracies, and therefore identification practices were centralized in its capital, Montevideo. This centralization enhanced the efficiency of anthropometric identification processes, which Giribaldi oversaw personally. Lastly, likewise figuring large were the facts that medicine had been assigned a key role in state building under Batlle y Ordóñez and that the local elites’ were closely involved in technical decisions regarding the identification of criminals. If the resistance of physicians was soon silenced in Argentina, doctors never lost control in Uruguay. Indeed, the “medical class” – as this professional group called itself in the late nineteenth century – played an essential part in the construction of the Uruguayan state. From 1900 to 1930, Uruguayan physicians occupied various government spaces, thanks to the nearly unconditional support of the *colorado* governments, and their participation was vital to the project to “civilize” popular urban sectors under Batlle y Ordóñez (Barrán, 1992). As a result, Giribaldi – doctor and personal friend of President Claudio Williman – had enough political capital to preserve his anthropometric office in the context of a regional groundswell of support for fingerprinting.

In contrast with Uruguay, the strong support enjoyed by fingerprinting in Brazil came hand in hand with criticisms of the interference of physicians in the field of police identification. During the first years of the Brazilian Republic, in a context of modernization of judicial and police bureaucracies, attempts were made to put bertillonage into practice. In 1889, the physician Henrique Monat (1903) submitted to the Rio de Janeiro chief of police a report on the workings of this system, which he had had the opportunity to study in France. Two years later, Barros Guimarães – professor at the Recife School of Law (Faculdade de Direito de Recife) – sent the government another sizeable report recommending its implementation. As in Buenos Aires, the latter proposal received the support of the Association of Criminal Anthropology and Assistance (Associação de Antropologia e Assistência Criminal), through a committee composed of Cândido Mendes, Maria Teixeira, and Souza Gomes (Identificação..., 1900, p.2).

This is why Félix Pacheco (30 dez. 1902), Brazil’s most ardent proponent of fingerprinting, criticized defenders of bertillonage with the cry “always anthropology!”, a phrase that summed up a complaint about the interference of scientificism in a field that some considered eminently a police matter. In the discourse of Brazilian advocates of the anthropometric system and in the voices of its most emphatic critics, there lay a blurry region where the differences between a police classification system for ascertaining identity and a scientific practice for studying criminals vanished.

It was this second possibility that bothered Pacheco and that in fact lay behind his preference for fingerprinting, which he viewed as a purely police system of identification, uncontaminated by scientificism. In Brazil, one of the main foundations of the anthropometric system had derived from the medical field. The first identification service to adopt Bertillon’s

method opened up in the town of Ouro Preto in 1893. Implementation took longer to reach Rio de Janeiro because of strong opposition from liberal jurists, who thought body measurements were humiliating. Standing up to this opposition, members of the National Academy of Medicine (Academia Nacional de Medicina) defended bertillonage and were successful in having an anthropometric office established in the federal capital in 1894. Thomaz Coelho, police physician, was put in charge of the service, which operated inside the forensic medicine facility. “Always physicians!” protested Pacheco again (30 dez. 1902, p.2), although the office only managed to survive a few months and produced a paltry total of 19 identification cards.

Other indications confirm that, in stark contrast with advances in Argentina, bertillonage did not move beyond the threshold of proposals in Brazil until the late 1890s. In 1895, Silvado wrote that the absence of an anthropometric office in the Brazilian capital deviated from the situation in Buenos Aires. He lamented this gap, given the magnitude of relations between the two capitals and the “mutual flow of passengers.” He believed that anthropometry could come to constitute an “international system” and a “single language” that would allow South American police forces to forge firm ties (Silvado, 1895, p.105). Shortly thereafter, when the Vienna chief of police sent a letter to his Brazilian counterpart inquiring about the status of anthropometry in Rio, the answer was that the office had been closed due to a lack of funds and that the only identification instrument being used was photographic portraits of repeat offenders (Kremenac, 7 maio 1898).

Around this time, however, anthropometric services began to appear in other major Brazilian cities, like Porto Alegre (1895) and São Paulo (1897). Both of these offices were set

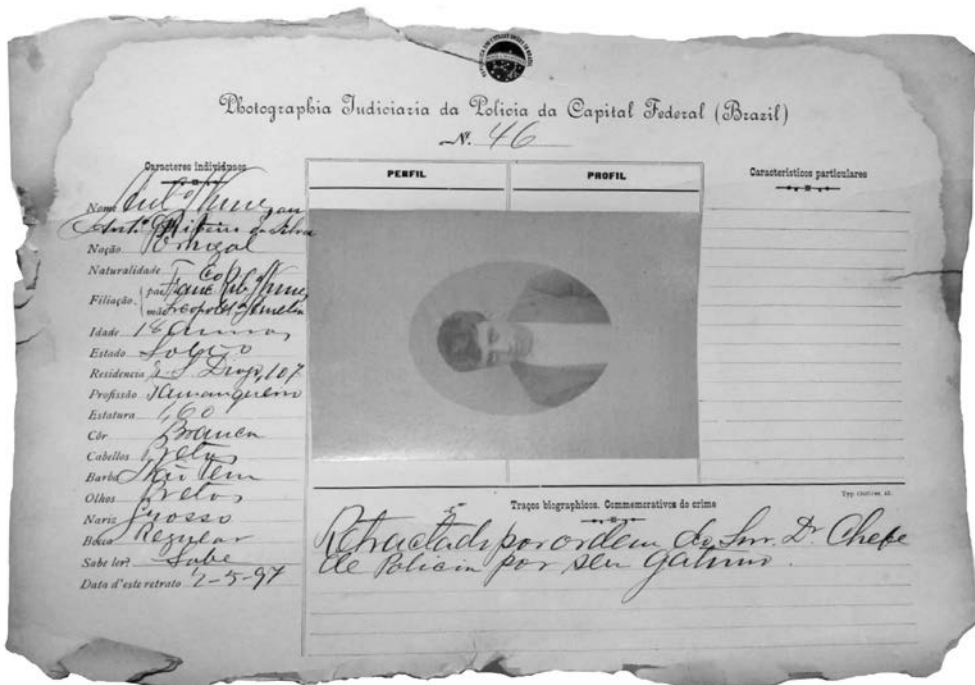


Figure 8: Identification card from the Rio de Janeiro police (Fundo Gifi, documentos de policia; 6C26. Arquivo Nacional, Rio de Janeiro. 1898)

up inside prisons, and their directors employed anthropometric measurements to perform criminological experiments on the bodies of detainees, in parallel with identification. This was the case, for example, with the forensic physician Sebastião Leão (1897, p.190), director of the prison office in Porto Alegre, who explained that once the anthropometric service had opened, he planned to devote himself to “studies in criminal anthropology.” The São Paulo office – which amassed nearly 5,000 anthropometric cards during its first ten years of operation – was headed by another physician, Evaristo da Veiga, who Félix Pacheco (30 dez. 1902) called the “champion of anthropometry” and accused of directing identification practices toward the “study of a given criminal from the viewpoint of his individual morphology and psychopathology.”

We call attention to the criticisms lodged by Pacheco because we believe they hold the keys to understanding the failure of anthropometry in Brazil and, concomitantly, the success of fingerprinting in the early twentieth century. “Always anthropology, always physicians!” was an exclamation that could be heard both as a grievance about identification services voiced by the police empire and as a desire to create distance from the heavy load that anthropometry bore in Brazil, given its close relationship with the racial studies of physical anthropology (Cunha, 2005).

This is why it is no surprise that it was hard to keep the anthropometric system in use at the Rio de Janeiro police. Following the frustrated experience of 1894, a second attempt was made in 1899, when Silvado took over as chief in Rio and decided to re-open the office. With Renato Carmil and Souza Gomes at the helm, the new office proved more industrious: from August to December 1899, it produced 1,060 cards (including both alphabetical and anthropometric). The office’s second report shows that another 1,752 cards were filled out in 1900 (Brasil, 1901, p.160-161). These promising beginnings aside, the office stopped operations the next year. All indications are that the new failure of bertillonage in Rio de Janeiro can be blamed on resistance to the system among leading Republican jurists and politicians, like Rui Barbosa and Cândido Barata Ribeiro. This reading seems grounded in the very words of office directors; Carmil (1897, p.4) expressed his surprise that body measurements were viewed as a humiliating practice in a country where, “at the simple command of the chief of police,” photographic portraits of suspects were displayed “in theaters, cafés, train stations, and the most public of places, accompanied by captions like ‘thief, pimp’.”

In the early twentieth century, as part of an overall reform of the police department in the federal capital, the Identification and Statistics Office (Gabinete de Identificação e Estatística) was opened; under the command of Félix Pacheco, it took its place as a bastion of the Vucetich system in Latin America (Bretas, 1997, p.49-57). Fingerprinting was proclaimed a step toward progress in “scientific policing” that would overcome the limitations of anthropometry. But the preference for the “Argentinean system” could also be traced to certain operational considerations, with which South American police were quite familiar: the challenges inherent to building a foundation of skilled, well-trained rank-and-file police officers and recruiting personnel who were technically qualified to produce standardized photographic portraits and perform precise body measurements. Elysio de Carvalho (1908, p.64) made this loud and clear when he justified the triumph of fingerprinting, a phenomenon that he attributed to the fact not only that fingerprinting afforded “more positive, conclusive proof of a person’s

identity” but also that application of the technique was “of an admirable simplicity and its implementation not at all costly.”

After Vucetich’s resounding success at the third Latin American Scientific Congress in Rio de Janeiro in 1905, fingerprinting gained ground across Brazil, and the office in Rio and its director, Félix Pacheco, served as publicist. The regulations of the office left no room for doubt when they stated that “the identification of criminals shall be performed through reliance on a combination of all systems used by the most advanced countries” but “subordinated to dactyloscopic classification according to Juan Vucetich’s method” (Brasil, 1907, p.107). As had transpired with the Argentinean police and bertillonage, Brazil now took pride in being Vucetich’s best student worldwide.

Final considerations

At the dawn of the twentieth century, fingerprinting sparked enthusiasm similar to what had been triggered by the arrival of bertillonage in South America. Inevitably, the number of European missions fell sharply during the war period, but regional visits by police between Buenos Aires, Montevideo, Santiago de Chile, and Rio de Janeiro grew steadily. If the first two congresses on criminology had been important in disseminating anthropometry internationally, these South American events were vital to solidifying the legitimacy of the fingerprinting method, tightening ties between police, and accelerating the exchange of information. At the Latin American scientific congress in Montevideo in 1901, a group of jurists and police agents proclaimed that fingerprinting was a complement to bertillonage; shortly thereafter, at the second event, held in Rio de Janeiro in 1905, they declared it foremost. At the same time, they sowed the ground for organization of the first South American Police Conference, convened in the city of Buenos Aires in 1905, where police departments from Argentina, Brazil, Uruguay, and Chile signed an agreement involving the exchange of police records of individuals classified as “dangerous” (García Ferrari, 2010, p.155-185; Galeano, 2012, p.192-207).

These exchanges forged a transnational space for the joint intervention of South American police forces. Police surveillance of the “dangerous” and “undesirable” individuals that traveled the same Atlantic routes as immigrants became regional in scale and was facilitated by a series of laws for expulsing foreigners, passed in Argentina and Brazil in the early years of the twentieth century (Menezes, 1996; Bonfá, 2008). New identification technologies played a valuable role in the formation of this inter-police network. Neighboring countries kept a close eye on the incipient implementation of anthropometry in Buenos Aires, capital of Argentina, viewed as a beacon of Latin American modernity. Police identification technologies thus surged onto the agendas of South American police, even before Bertillon himself had won official support for his system in France.

The diversity of political, social, institutional, economic, and even geographic contexts guided the differing paths taken by the anthropometric system in Buenos Aires, La Plata, Montevideo, and Rio de Janeiro. In all cases, however, the multilateral ties between police departments in these cities were in large part formed in pace with innovations in the field of identification. Through the attempts to create anthropometric offices, solid bonds were

built between offices and experts in police identification in the 1890s. The following decade, the heated debate between advocates of anthropometry and of fingerprinting mirrored the concern with transnational cooperation and its goals and limitations. Lastly, the main topic at South America's first police conference was the selection of an identification system on which to base the exchange of police records. Even if bertillonage came out the big loser of the 1905 agreement, its swift implementation in Latin America had opened up a space that would be enlarged by fingerprinting.

The regional trend to drop anthropometry was grounded in practical obstacles, but Vucetichism had also been transformed into a "South American system" and the touchstone for an inter-police network. At the interface of science and state bureaucracy, the legitimacy of these identification methods was decided in various realms. Decisions made at scientific congresses were indispensable to upholding the validity of one system or another, but when it came to their everyday application at police and prison institutions, the decisions made by the experts were heavily constrained by the political web of actors. In 1905, relations between police departments strengthened and state authorities pushed policies to repress social practices perceived as new threats. The fact is that the overwhelming victory of the fingerprinting system was not born of a thoroughgoing scientific debate over the method's features. Nor was the erosion of bertillonage grounded in, for example, criticisms of its statistical foundations. The main arguments for discarding the anthropometric system stemmed from the challenges of its practical application, the high costs of setting up and maintaining offices, and the problems in training operators. According to proponents, fingerprinting was better because its practicality had been proven through more than a decade of use at police offices and by scientists around the world. By gaining legitimacy at regional congresses, the identification system created at a peripheral office inside a South American country became one of the main scientific innovations to emerge from Latin America in these years.

Although these regional circuits cannot be seen as autonomous, they were part of a complex web of transnational ties that enabled adoption of the anthropometric system in the late nineteenth century and the rapid transnational expansion of fingerprinting in the early twentieth. Implementation of bertillonage in Latin America reflects the diversity of strategies developed in the region in an endeavor to solve the problems of identifying repeat offenders. In some cases, the French system was received acritically; in others, its reception was more selective; and in certain places it was questioned, modified, hybridized, and subjected to new experiments. Analysis of the pathways of the anthropometric system in Atlantic South America suggests that far from constituting a linear process of dissemination from a European center to a Latin American periphery, local dynamics were essential to its application and scientific legitimization. At the same time, the later success of fingerprinting highlights the importance of regional circuits in the context of a broader network of asymmetrical relations among distinct centers of scientific production. The triumph of the "South American system" over bertillonage required the support of a number of European scientists, evincing both the autonomous and heteronomous dimensions of Latin American scientific and institutional circuits.

NOTES

¹ Lacassagne (1906, p.217) would later be an advocate of Vucetich's fingerprinting method. He also coined the term "vucetichism."

² We maintain that approaching the exchange of ideas, technologies, and experts across borders from the perspective of transnational history does not require a point-blank rejection of the methodological strategies of comparative history. See debates on this topic in Siegel (2005), Purdy (2012), Saunier (2013), and Barros (2014).

³ Anthropometry was also part of a vast realm of worldwide circulations in the field of physical anthropology (Souza, Santos, 2012). Other studies have analyzed the role of medical and scientific conferences and shown that in the early twentieth century, these encounters played a central role in fostering exchange among Latin American scientists (Almeida, 2006, p.733-757; Isaza, 2011, p.86-113).

⁴ These travel articles and reports by policemen include: Drago (1 jul. 1888, p.22-23; 15 jul. 1888, p.27-28); Silvado (1895); Ferraz (1949); and Mujica Farías (1901). On these travels, see Galeano (2012, p.111-125).

⁵ Bertillon's comments notwithstanding, the anthropometric office in Argentina was established under an internal police order and not a law, and this fact was identified as one of the problems constraining its operation (Quesada, 1901, p.117-145).

⁶ As in Uruguay, in Mexico anthropometry and fingerprinting long lived side by side (Speckman Guerra, 2011).

⁷ In 1905, when Latin American police departments agreed to use Juan Vucetich's fingerprinting system in the transnational exchange of criminal records, the Medical Society of Montevideo evaluated the agreement and endorsed it (Giribaldi, 1906; Saráchaga, 1906). Nonetheless, anthropometry remained the official identification method in the prison system until 1912. That year, the National Register of Recidivism was created; while it incorporated the use of fingerprints, it also relied on anthropometric measurements of those convicted (Uruguay, 1930).

REFERENCES

- ABOUT, Ilsen.
Les fondations d'un système national d'identification policière en France (1893-1914). *Genèses*, n.54, p.28-52. 2004.
- ALMANDOS, Luis Reyna.
Dactiloscopia argentina: su historia e influencia en la legislación. La Plata: Joaquín Sesé. 1909.
- ALMEIDA, Marta de.
Circuito aberto: ideias e intercâmbios médico-científicos na América Latina nos primórdios do século XX. *História, Ciências, Saúde – Manguinhos*, v.13, n.3, p.733-757. 2006.
- ARGENTINA.
Policía de la Capital. *Memoria del Departamento de Policía de la Capital, 1887-1888*. Buenos Aires: Imprenta del Departamento de Policía de La Capital. 1888.
- BARRÁN, José P.
Medicina y sociedad en el Uruguay del novecientos, t.1: El poder de curar. Montevideo: Ediciones de la Banda Oriental. 1992.
- BARROS, José D'Assunção.
História comparada. Rio de Janeiro: Vozes. 2014.
- BERTILLON, Alphonse.
Identification anthropométrique: instructions. signalétiques. Melun: Imprimerie Administrative. 1893.
- BERTILLON, Alphonse.
L'Identité des récidivistes et la loi de relégation. Paris: G. Masson. 1883.
- BONFÁ, Rogério Luis G.
"Com lei ou sem lei": as expulsões de estrangeiros e o conflito entre o Executivo e o Judiciário na Primeira República. Dissertação (Mestrado em História) – Universidade Estadual de Campinas, Campinas. 2008.
- BRASIL.
Secretaria da Polícia do Distrito Federal. Gabinete de Identificação e Estatística. Regulamento da Secretaria da Polícia do Distrito Federal, aprovado pelo decreto n.4.764 (Capítulo XVIII). In: Brasil. *Coleção das leis da República dos Estados Unidos do Brasil*. Rio de Janeiro: Imprensa Nacional. 1907.
- BRASIL.
Ministério da Justiça e Negócios Interiores. *Relatório apresentado ao presidente da República dos Estados Unidos do Brasil pelo ministro de Estado da Justiça e Negócios Interiores (1900-1901)*. Rio de Janeiro: Imprensa Nacional. 1901.
- BRECKENRIDGE, Keith; SZRETER, Simon (Ed.).
Registration and recognition: documenting

the person in world history. Oxford: Oxford University Press. 2012.

BRETAS, Marcos L.

Ordem na cidade: o exercício cotidiano da autoridade policial no Rio de Janeiro, 1907-1930. Rio de Janeiro: Rocco. 1997.

BROWN, James; ABOUT, Ilse; LONERGAN, Gayle (Ed.).

Identification and registration practices in transnational perspective: people, papers, practices. Oxford: Palgrave Macmillan. 2013.

CARMIL, Renato.

Relatório sobre o serviço de identificação antropométrica, apresentado ao cidadão ministro da Justiça e Negócios Interiores. *Diário Oficial dos Estados Unidos do Brasil*, n.91, p.107-108. 1897.

CARVALHO, Elysio de.

O problema da identificação no Brasil. *Renascença*, n.49, p.63-67. 1908.

CHARLES.

Relaciones policiales: sembrar es fecundar. *Revista de Policía*, v.7, n.1, p.5. 15 nov. 1904.

CREAZZO, Giuditta.

El positivismo criminológico italiano en la Argentina. Buenos Aires: Ediar. 2007.

CUNHA, Olívia Gomes da.

The stigma of dishonor: individual records, criminal files, and identification in Rio de Janeiro, 1903-1940. In: Cualfield, Sueann; Chambers, Sarah C.; Putnam, Lara (Ed.). *Honor, status, and law in Modern Latin America.* Durham: Duke University Press. p.295-316. 2005.

DRAGO, Agustín.

Determinación de la identidad: sistema de los señalamientos antropométricos. *Revista de la Policía de la Capital*, v.1, n.3, p.27-28. 15 jul. 1888.

DRAGO, Agustín.

El servicio antropométrico de París. *Revista de la Policía de la Capital*, n.2, p.22-23. 1 jul. 1888.

DRAGO, Luis María.

I criminali nati: con introduzioni dei dottori Ramos Mejia e Cesare Lombroso. Torino: Fratelli Bocca. 1890.

EMSLEY, Clive.

The English police: a political and social history. London: Longman. 1996.

FERRAZ, João Baptista Sampaio.

Do delito, código penal e organização policial na Inglaterra (1898). *Revista do Arquivo Municipal*, n.76, p.33-51. 1949.

GALEANO, Diego.

Criminosos viajantes, vigilantes modernos: circulações policiais entre Rio de Janeiro e

Buenos Aires, 1890-1930. Tese (Doutorado em História Social) – Instituto de Filosofia e Ciências Sociais, Universidade Federal do Rio de Janeiro, Rio de Janeiro. 2012.

GALEANO, Diego.

Escritores, detectives y archivistas: la cultura policial en Buenos Aires, 1821-1910. Buenos Aires: Biblioteca Nacional; Teseo. 2009.

GALEANO, Diego; GARCÍA FERRARI, Mercedes.

Cartographie du bertillonage: le système anthropométrique en Amérique latine: circuits de diffusion, usages et résistances. In: Piazza, Pierre (Ed.). *Aux origines de la police scientifique: Alphonse Bertillon, précurseur de la science du crime.* Paris: Karthala. p.308-331. 2011.

GARCÍA FERRARI, Mercedes.

Juan Vucetich y el surgimiento transnacional de la dactiloscopia, 1888-1913. Tese (Doctorado en Historia) – Universidad de San Andrés, Buenos Aires. 2013.

GARCÍA FERRARI, Mercedes.

Ladrones conocidos, sospechosos reservados: identificación policial en Buenos Aires, 1880-1905. Buenos Aires: Prometeo. 2010.

GARCÍA FERRARI, Mercedes.

Una marca peor que el fuego: los cocheros de la ciudad de Buenos Aires y la resistencia al retrato de identificación. In: Caimari, Lila (Ed.). *La ley de los profanos: delito, justicia y cultura en Buenos Aires (1870-1940).* Buenos Aires: Fondo de Cultura Económica. p.99-133. 2007.

GAYOL, Sandra.

Entre lo deseable y lo posible: perfil de la policía de Buenos Aires en la segunda mitad del siglo XIX. *Estudios Sociales*, v.6, n.10, p.123-138. 1996.

GIRIBALDI, Alfredo.

Contribución al tópico médico-legal de la identidad: extracto de una polémica. Montevideo: El Siglo Ilustrado. 1906.

IDENTIFICAÇÃO...

Identificação de criminosos pelo sistema antropométrico (resumo histórico). *Boletim do Serviço de Identificação Judiciária*, v.1, n.1, p.1-3. 1900.

ISAZA, Oscar Calvo.

Conocimiento desinteresado y ciencia americana: el congreso científico (1898-1916). *Historia Crítica*, n.45, p.86-113. 2011.

KALUSZYNSKI, Martine.

Republican identity: bertillonage as government technique. In: Caplan, Jane; Torpey, John (Ed.). *Documenting individual identity: the development of state practices in the modern world.* Princeton: Princeton University Press. p.123-139. 2001.

- KREMENAC, Jules de Bombiero.
Carta do cônsul-geral da Áustria-Hungria ao chefe da polícia da Capital Federal. Fundo Gifi; documentos de polícia; 6C23 (Arquivo Nacional do Brasil, Rio de Janeiro). 7 maio 1898.
- LACASSAGNE, Alexandre.
Précis de médecine légale. Paris: Masson. 1906.
- LEÃO, Sebastião.
Relatório do doutor Sebastião Leão, médico da polícia, anexo ao relatório da Secretaria de Estado dos Negócios do Interior e Exterior do Rio Grande do Sul. (Museu da Polícia Civil Major Febeliano Faibes da Costa, Porto Alegre). 1897.
- LOCARD, Edmond.
L'œuvre d'Alphonse Bertillon. *Archives d'Anthropologie Criminelle*, n.243, p.167-186. 1914.
- MENEZES, Lená Medeiros de.
Os indesejáveis: desclassificados da modernidade: protesto, crime e expulsão na Capital Federal (1890-1930). Rio de Janeiro: Eduerj. 1996.
- MONAT, Henrique.
Carta de 30 jul. 1903. *Diário Oficial dos Estados Unidos do Brasil*, n.117, p.17-18. 1903.
- MUJICA FARIAS, Manuel.
La policía de París. Buenos Aires: Arnold Möen. 1901.
- OLMO, Rosa del.
Criminología argentina: apuntes para su reconstrucción histórica. Buenos Aires: Depalma. 1992.
- ORDEN...
Orden del día 3 de abril de 1889. Polícia de la Capital; *Libro de Órdenes del Día, 1889*. (Archivo y Biblioteca de la Policía Federal Argentina, Buenos Aires). 3 abr. 1889.
- OTERO, Hernán.
Estadística y Nación: una historia conceptual del pensamiento censal de la Argentina moderna, 1860-1914. Buenos Aires: Prometeo. 2006.
- PACHECO, Félix.
O problema da identificação. *Jornal do Comércio*, p.2. 30 dez. 1902.
- PACHECO, Félix.
Entrevista com o Dr. Beazley. *Jornal do Comércio*, p.3. 10 ago. 1899.
- PELLEGRINO, Adela.
Caracterización demográfica del Uruguay. Montevideo: Universidad de la República. 2003.
- PÉREZ, María Cristina.
Presentación del dossier "Redes y conexiones en la historia", *Historia Crítica*, n.55, p.13-17. 2015.
- PIAZZA, Pierre.
Introduction générale. In: Piazza, Pierre (Ed.). *Aux origines de la police scientifique: Alphonse Bertillon, précurseur de la science du crime*. Paris: Karthala. p.11-24. 2011.
- PREFECTURA...
Prefectura de Policía de Santiago. Carta a Juan Vucetich. Arquivo Juan Vucetich, série Correspondência Bolívia, Chile, Paraguai, Uruguai; pasta Chile (Museo de la Policía de la Provincia de Buenos Aires, La Plata). 8 ago. 1893.
- PURDY, Sean.
A história comparada e o desafio da transnacionalidade. *Revista de História Comparada*, v.6, n.1, p.64-84. 2012.
- QUESADA, Ernesto.
Comprobación de la reincidencia. Buenos Aires: Coni Hermanos. 1901.
- REUNIÓN...
Segunda reunión del Congreso Científico Latino Americano: celebrada en Montevideo del 20 al 31 de marzo de 1901, t.1: organización y resultados generales del Congreso. Montevideo: Al Libro Inglés. 1901.
- RODRIGUEZ, Julia.
South Atlantic crossings: fingerprints, science, and the state in turn-of-the-century Argentina. *The American Historical Review*, v.109, n.2, p.387-416. 2004.
- RUGGIERO, Kristin.
Modernity in the flesh: medicine, law and society in turn-of-century Argentina. California: Stanford University Press. 2004.
- SÁNCHEZ, Gregorio S.
Carta a Juan Vucetich. Arquivo Juan Vucetich, série Correspondência Bolívia, Chile, Paraguai, Uruguai; pasta Uruguai (Museo de la Policía de la Provincia de Buenos Aires, La Plata). 25 abr. 1896.
- SARÁCHAGA, Alejandro.
Dactiloscopia y Convenio Internacional de Policía. Montevideo: El Siglo Ilustrado. 1906.
- SAUNIER, Pierre-Yves.
Transnational history. Basingtoke: Palgrave Macmillan. 2013.
- SAUNIER, Pierre-Yves.
Learning by doing: notes about the making of the Palgrave Dictionary of Transnational History. *Journal of Modern European History*, v.2, n.6, p.159-180. 2008.
- SEÇÃO...
Seção de Ciências Jurídicas e Sociais; anexo 4. In: *Relatório geral*, t.7: terceira reunião do Congresso Científico Latino-americano celebrado na cidade

do Rio de Janeiro. Rio de Janeiro: Imprensa Nacional. p.55-57. 1907.

SIEGEL, Micol.

Beyond compare: comparative method after the transnational turn. *Radical History Review*, n.91, p.62-90. 2005.

SILVADO, João Brasil.

O serviço policial em Paris e Londres. Rio de Janeiro: Imprensa Nacional. 1895.

SOULA, Mathieu.

Récidive et récidivistes depuis deux siècles. In: Alline, Jean-Pierre; Soula, Mathieu (Ed.). *Les récidivistes*. Rennes: Presses Universitaires de Rennes. p.11-19. 2011.

SOUZA, Vanderlei Sebastião de; SANTOS, Ricardo Ventura.

Corpos, medidas e nação: antropologia física na capital da República brasileira na primeira metade do século XX. *Boletim Museu Paraense Emílio Goeldi, Ciências Humanas*, v.7, n.3, p.639-643. 2012.

SPECKMAN GUERRA, Elisa.

En la inmensa urbe y el laberinto de los archivos: la identificación de criminales en la ciudad de México. In: Galeano, Diego; Kaminsky, Gregorio (Ed.). *Mirada (de) uniforme: historia y crítica de la razón policial*. Buenos Aires: Teseo. p.111-151. 2011.

THER, Philipp.

Comparisons, cultural transfers, and the study of networks: toward a transnational history of Europe. In: Haupt, Heinz-Gerhard; Kocka, Jürgen (Ed.). *Comparative and transnational history*. New York: Berghahn. p.204-225. 2012.

TILLY, Charles.

Big structures, large processes, huge comparisons. New York: Russell Sage. 1984.

URUGUAY.

Registro Nacional de Reincidencias. Ley n.4.056. In: Armand Ugon, Enrique et al. *Compilación de leyes y decretos*, t.32: 1912. Montevideo: Cámara de Representantes de la República del Uruguay. p.361-364. 1930.

URUGUAY.

Jefatura Política y de Policía de la Capital. Orden del día n.1.550. In: República Oriental del Uruguay. *Memoria de la Jefatura Política y de Policía de la Capital, 1895-1896*. Montevideo: Imprenta a Vapor de La Nación. p.87-88. 1896.

VARIGNY, Henry de.

Anthropologie: les empreintes digitales, d'après M.F. Galton. *Revue Scientifique*, v.47, n.18, p.557-562. 1891.

VUCETICH, Juan.

Instrucciones generales para el sistema de filiación "Provincia de Buenos Aires". La Plata: Solá, Seré. 1896.

VUCETICH, Juan.

Instrucciones generales para el sistema de filiación "Provincia de Buenos Aires". La Plata: Imprenta de la Policía de la Provincia de Buenos Aires. 1895.

VUCETICH, Juan.

Instrucciones generales para la identificación antropométrica: basadas en los sistemas de Alfonso Bertillon y Francisco Galton. La Plata: Tipografía de la Escuela de Artes y Oficios de la Provincia. 1893.

