

# Dmitriy Litvak Leon Warnerke: Perhaps the greatest banknote counterfeiter ever.

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## **Abstract**

What one man can make, another can copy; where one man can copy, another can tell a copy was made. This story is all about 35-year career of a late-nineteenth-century master forger Leon Warnerke, who may be the greatest banknote counterfeiter ever.

In 1991 an extraordinary collection, consisting of banknotes, printing trials, watermarks, papermaking moulds, letters, receipts, a memorandum book, and ink trials, was find in London during the demolition of old house.

Our story covers the physical investigation of these subjects by Peter Bower<sup>1)</sup>. The interpretation of those findings and uncovering the real name of Leon Warnerke made by Paramonov-Kuznetzov<sup>2)</sup>, Furthermore, it include the resent developments made by A. Balachenkova<sup>3)</sup> who established connection between Warnerke and EZGB. As well as facts regarding Leon Warnerke biography written by photography historian Josef Maria Eder<sup>4</sup>.

Reference were made to some famous historical cases.

<sup>&</sup>lt;sup>1</sup> Peter Bower 1) Economic warfare: banknote forgery as a deliberate weapon//The Banker's Art. Studies in Paper Money/ed. by V. Hewitt. L., 1995. P. 46—63; 2) Beating the Forger: Case Studies in Forensic Paper Investigation//Looking at Paper: Evidence and Interpretation: Symposium proceedings (Toronto, May 13—16, 1999)/ed. by J. Slavin et al. Toronto, 1999 P. 154—170.

<sup>&</sup>lt;sup>2</sup> O. Paramonov, A. Kuznetsov "Speckled cards in the "Big Game". English forgeries of Russian credit tickets in the XIX century.//Almanac of Society «ROH». Issue 2. M., 2014. P. 5—126 // O. Paramonov "The case of Leon Warnerke. Documentary Evidence of the largest economic sabotage associated with the forgery of Russian credit cards in London in the second half of the XIX century."

<sup>&</sup>lt;sup>3</sup>) A. Balachenkova (St. Petersburg, University of Technology and Energy), A. Bogdanov (St. Petersburg, Goznak)LEON WARNERKE AND THE STATE PAPER PROCUREMENT EXPEDITION (EZGB). S-Pb. 2019

<sup>&</sup>lt;sup>4</sup> Josef Maria Eder History of Photography, Dover Publications, Inc. New York, 1945, ISBN# 0-486-23586-6.

## Introduction

The deliberate forgery by one government or power of another's currency is not new. As early as 1470, Duke Galeazzo Sforza of Milan counterfeited the money of Venice to damage the respectability and reputation of Venetian bankers. The British have a long, if not honorable, history of such activity. During the eighteenth century the British struck gold Louis coins at Birmingham, and they also printed the currency of the newborn United States during the War of Independence. On 10 May 1775, the Continental Congress had decided to issue paper money; within five years these 'continentals' had almost completely lost their value. Washington himself wrote that: "a whole wagon full of paper money barely suffices to buy a wagon load of food".5 One of the most successful of these ventures was the forging by the British of assignats, the paper currency of the French Revolution.<sup>6)</sup> However, these were not the only pressures that brought financial chaos to revolutionary France. Perhaps the biggest single factor was an idea, that of destroying the financial stability of a country by flooding it with forged currency. This would be an operation carried out by a mixture of private enterprise and government.

By 1795, when assignats were withdrawn from circulation, the economic plight of France was disastrous. Two million, four hundred thousand livres of a new paper currency, mandats territoriaux, were issued, but these depreciated so rapidly that by early 1797, when they were withdrawn, they were only worth one percent of their face value. Beggars would not take them, and peasants wanted metal coin for their produce, saying that they would only take 'the other stuff' if their horses would eat it.

During the occupation of Vienna in 1806, Napoleon had plates of currency notes issued by the Wiener-Stadt-Banco copied; he later printed this Austrian currency in both Paris and Italy. Napoleon also had both 25-and 50-rouble Russian Empire assignats counterfeited between 1805 and 1812 in an effort to destabilize a financial system already burdened by massive devaluation. There is some

<sup>&</sup>lt;sup>5</sup> Quoted in Kranister, W. 1989. The Moneymakers. Cambridge: Black Bear Publishing. 296.

<sup>&</sup>lt;sup>6</sup> Bower, P. 1995. Economic warfare: Banknote forgery as a deliberate weapon. In The Banker's Art: Studies in Paper Money, ed. Virginia Hewitt. London: British Museum. 46-63.

evidence that he also attempted the forgery of English banknotes during the same period.<sup>7)</sup>

During the Second World War, the United States counterfeited Japanese currency and the author John Steinbeck tried to persuade Franklin D. Roosevelt to flood Germany from the air with marks. The Germans themselves, in both Operation Andrew and Operation Bernhard, produced the best forgeries of British banknotes ever produced.

Forgery for personal gain has always attracted its fair share of skilled but flawed individuals: the Austrian Peter Ritter von Behr, Charles Black from Britain, Victor Baranov from USSR, American Art Williams<sup>8</sup>, Frenchman Victor Bojarski etc.

But Leon Warnerke was a completely different calibre individual.

In 35 years of activity producing Russian, French, and English banknotes, between c.1865 and 1900, he was never caught - but came very close. In fact, it is only in the 1990s that his activities have come to light, with the discovery of a hoard of his printing trials, notes, letters, documents, and equipment.

In the early 1990, during the demolition of an old house in London, workers discovered a carefully camouflaged heavy chest. Contrary to their expectations, instead of gold, they are found bundles of letters, receipts, banknotes, photographs, negatives, and newspaper clippings, in fact, a kind of archive. The workers sold it as is to the philatelist dealer.

In turn, the dealer put up for sale part of this archive at «Phillips» auction.

After studying the materials the experts of the auction house found out that the archive belonged to the once famous photographer-inventor, a member of the British Royal Photographic Society, Leon Warnerke. He was a highly respected member of the London societies who was awarded in 1882 for outstanding services in the field of photography with the *Medal of Progress*. In the history of photography Leon Warnerke left his name as the creator of the world's first film photographer with roller cassettes (11 years before "Kodak") and as the inventor of sensitometer

<sup>&</sup>lt;sup>7</sup> As late as 1852 Napoleon's grandson, Emperor Napoleon III, was paying a pension to Mille de Montant, the daughter of the engraver involved in this particular project, to ensure her silence about his predecessor's activities.

<sup>&</sup>lt;sup>8</sup> Jason Kersten The Art of Making Money. The Story of a Master Counterfeiter. Gotham Books, 2009

- the device for photosensitivity measurements. He had his own companies registered in England and Russia, and published articles in European magazines. In October 1991, a lot with the archive of Leon Warnerke was put up for auction by Phillips Auction<sup>9)</sup> and was sold to the buyer from Finland.
- In 1991 an extraordinary collection, consisting of banknotes, printing trials, watermarks, papermaking moulds, letters, receipts, a memorandum book, photographic material, press cuttings and ink trials, was brought to my attention, wrote Peter Bower.<sup>10</sup>

Seventeen years later, in 2008, the heirs of the philatelist dealer sold through the London auction house "Spink" the remaining part of the archive, consisting only of banknotes.

# The beginning

It is a well-known fact that the propaganda war between the Russian Empire government and Mr. Hertzen used the thesis that he and other nihilists were engaged in printing counterfeit money.<sup>11)</sup>

Such statements were, among other things, the reports of Henry Michalowski, a Polish emigrant who worked in London at bookselling firm of N. Trübner, which was engaged in the distribution of products of the Free Russian Printing House.<sup>12)</sup>

In a secret letter to the governor of the Kingdom of Poland A. Gorchakov dated August 14, 1857, Michalowski wrote about the addressees where illegal literature was received. Also he mentioned the "counterfeiter of bank notes from London" known to him. For this information, he asked 100 pounds. An official from the Russian Embassy met with Henry Michalowski, but the question of counterfeit banknotes remained the uncertain. <sup>13)</sup>

<sup>&</sup>lt;sup>9</sup> Phillips, London, Friday 4 Oct 1991. Lot 277.

<sup>&</sup>lt;sup>10</sup> Offered at auction at Phillips, London, 4 October 1991, lot 277. It is now in a private collection. The description was written up for Phillips in Bower Report No. 29 91 15.

<sup>&</sup>lt;sup>11</sup> S.-Peterburgskie vedomosti, 1870. January 6. p. 1

<sup>&</sup>lt;sup>12</sup> Free Russian printing house was located in London at 82, Judd Street, Brunswick

<sup>&</sup>lt;sup>13</sup> N. Eidelman, Stories about the Bell. The writer talks about science. – M. 1969.

# Władysław Malachowski

In Kobrin powiat<sup>14)</sup>, Grodno Governorate, in the family of landowner Julian Malachowski and his wife Theophilia (maiden name - Jakubowska) was born son Władysław. The data on the date of birth of Władyslaw Malachowski are vary. According to one source he was born in 1827, according to others in 1830 or 1839. He refers to the date of May 27, 1837.

Young Malachowski studied in schools located in Pruzhany, Drohochin and Svisloch, and then he was admitted to the St. Petersburg Institute of Railway Engineers. This institute, at that time, was a kind of educational institution based on the model of military cadet corps.

On June 4, 1859, Władysław Malachowski was graduated with the rank of engineer-lieutenant and sent to serve on the St. Petersburg-Warsaw Railway. In August 1859 he was appointed as the head of the distance of the III class in the II department of the Warsaw Line (line "Dinaburg-Landvarov-Orany-Warsaw-Verzhbolovo") with a salary of 1200 Rubles per year.

Malachowski stayed in this position for two years, until November 1<sup>st</sup>, 1862, having established himself as a good worker Due to elimination of this line he was dismissed, and in recognition of his merits he was paid a bonus in the amount of two months wages.

Malachowski's dismissal coincided with the beginning of Polish unrest. Apparently, he took an active part in it, by being a member of secret societies since the time he was the student in St. Petersburg. He was on a leading role in the hierarchy of insurgents. In mid-January he visited the capital where he met with members of the committee "Zemlya i Volya" ("The Earth and Will").

On January 22<sup>nd</sup>, 1863, the uprising began. Communication with Warsaw was interrupted. The insurgents with the help of Polish workers destroyed and burned railway bridges and stole steam locomotives.

To prevent disruptions in the railways communication the authorities decided to transfer all Polish railway engineers inland and replace them with Russians and

<sup>&</sup>lt;sup>14</sup> Powiat is an administrative and territorial unit in the Kingdom of Poland and the western provinces of the Russian Empire.

Germans. Malachowski obtained the doctor note and pretends to be sick to remain in Vilno.

The leadership of the insurgents in the Vilno province was carried out by the Lithuanian provincial committee headed by Vincent Kalinowski, and Władysław Malachowski was a ranking member of this committee.<sup>15)</sup>

On May 31<sup>st</sup>, 1863, "energetic unbendable and ready to extreme measures" Malachowski was appointed as a head of the city of Vilno, but in July, after suppression of the uprising Malachowski fled.

On August 3<sup>rd</sup>, he arrived in St. Petersburg, and a week later, on August 11, a wire from Muravyov<sup>i</sup> came to the Main Directorate of Communications: "I'm requesting you to send under arrest, to Vilno lieutenant Władysław Malachowski, who left here for St. Petersburg in August 1<sup>st</sup>". <sup>17)</sup>

On a next morning Staff Captain I. Kridener arrived at Malachowski's apartment to arrest him. However, an apartment was empty...

On August 18, a letter from Malachowski addressed to the manager Lieutenant-General P. Melnikov was received in the Main Directorate of Communications. Malachowski wrote that he is "beyond the sea" but did not concur his participation in the rebellion. 18)



Fig.1 Władysław Malachowski, 1860-s

During the hunt for Malachowski, as one of the leaders of the uprising, all possible measures were taken. Including such a novelty of the time as sending photos of the criminal. Ironically, these were photographic portraits found during an examination of Malachowski's apartment in Vilno. The fact that in his St. Peterburg apartment, in which he

<sup>&</sup>lt;sup>15</sup> Wincenty Konstanty Kalinowski (1838-1864) "authorized commissar of Lithuania", one of the leaders of the uprising in the North-Western Territory. In Belarusian history he is known as Kastus Kalinovsky.

<sup>&</sup>lt;sup>16</sup> Oh. Aweide. Testimonies and notes on the Polish uprising of 1863 (collection of documents). Zeznania sledcze i zapiski o powstaniu styczniowym M.: Izdanie AN USSR, 1961.

<sup>&</sup>lt;sup>17</sup> RGIA F.221 Op.1. D.818. P.28.

<sup>&</sup>lt;sup>18</sup> V. Nilova, Y. Stackelberg Two lives of polish conspirator // Slavyanskii almanakh 2004. M., 2005. pp. 128–129.

managed to live only for a couple days, they found "three bottles with special liquids for photo processing" talks about Malachowski's fascination with photography. In the old-fashioned way, together with the portrait a written description was also sent: "Signs of Lieutenant Malachowski: 35 to 40 years old, average height, hair on the head dark, smoothly combed, with a parting on the left side, the face is round, full, the forehead is narrow, wears small sideburns, with a shaved chin, the expression of the face is serious. <sup>19)</sup>

A reward of 10,000 Rubles was appointed for Malachowski's capture. Later, in the autumn of the same year, the chief of gendarmes, V. Dolgorukov, ii on the basis of foreign intelligence information, informed Muravyov that Malachowski residing in Paris and out of Russian jurisdiction. In December 1863, a trial was held in St. Petersburg, which sentenced Władysław Malachowski to death in his absence. On March 12, 1868, his belongings were sold at auction for 14 Rubles 95 Kopecks.

According to unconfirmed reports, Malachowski left St. Petersburg on English boat.<sup>20)</sup>

After spending some time in Prussian Königsberg, where he participated in the publication of the newspaper "Glos z Litwy" ("Voice of Lithuania") and was engaged in the purchase of weapons for the Polish rebels. Later, Władysław Malachowski comes to Paris where his trace was lost...

## Leon Warnerke

In 1866 (according to other sources in 1869 and 1871<sup>iii</sup>), a resident of the Austro-Hungarian crown Leon Warnerke, the son of Vincent and Mary, appeared in London. In his own words, he was born on May 27, 1837, in the town of Weiskirchen in Moravia, then a province of the Habsburg Empire. An immigrant from the mainland settled in south London, at 10 Linden Grove, Peckham Rye. Later, he and his family moved to the Silverhowe, Champion Hill, Camberwell, London S.E.

<sup>&</sup>lt;sup>19</sup> Ukrainian State Historical Archives(УГИА). Ф. 442. Оп. 813(1863). д. 217. л. 2.

<sup>&</sup>lt;sup>20</sup> Groziska Karolina, Polskie Groby na cmentarzach Londynu. Polska Akademia Umijenosti (PAU), 1995, s. 208.



Fig. 2: Portrait of Leon Warnerke from the Supplement to the British Journal of Photography, 18 January 1884. Courtesy of Paramonov-Kuznetzov

The whole question of Warnerke's true identity is a complex and multifaceted problem. His public persona is briefly documented in various sources which provide a very striking image of a man of singular talent and

character.

During his lifetime, few people knew about his fate - the conspiracy made itself felt.

Bernard Jones in the Encyclopedia of Photography published in 1911 wrote that Warnerke "was born, by his own description, in 1837, in Moravia, then one of the provinces of the Austro- Hungarian Empire. Died at Geneva, 1900.<sup>21)</sup>

At the same time magazine "Photo-London" stated: "Born in Moravia, Austria, 1837. Naturalized as a British national on 24 February 1890... Died in Geneva, Switzerland, in October 1900(?)... ». The magazine also mentioned his wife's name: "Mary J. (1835-1901) » and the address of his studio: «16 Poplar Walk, Herne Hill, and Lambeth 1887-1891».

According to Eder, Leon Warnerke was born in 1837 in Russia. He was a civil engineer but devoted himself entirely to photography. He spent his youth in St. Petersburg and came to London in 1870. He then started a private photo-chemical laboratory, inventing the roll holder with silver-bromide collodion stripping paper. His entry in the 1881 census places him at Silvenhall, Champion Hill, Camberwell, and lists him as Austrian.<sup>22)</sup>

His return for the 1891 census at the same address, this time spelt Silverhowe House, Champion Hill, Camberwell, lists his place of birth as Moravia, Austria.<sup>23)</sup>

<sup>&</sup>lt;sup>21</sup> Bernard Edward Jones, Cassell's Cyclopedia of Photography (Reprint of the 1911 ed. Published by Cassell, London, New York) Ayer Publishing 1973, p.559.

<sup>&</sup>lt;sup>22</sup> Public Record Office. 1881 Census Records. RG II/674.

<sup>&</sup>lt;sup>23</sup> Public Record Office. 1891 Census Records. RG12/466.

In both these returns there are considerable discrepancies between the entries for all the members of the Warnerke family.<sup>24)</sup>

The photography historian Joseph Eder was convinced that Warnerke was Russian by birth, on the basis of conversations with Eder's collaborator, Joseph Plener, who had also worked with Warnerke in London.<sup>25)</sup>

Eder says that Joseph Plener convinced him that Warnerke was a Russian by birth. Plener was a Pole in Czarist Russia. He fled to London as a Russian emigrant. He devoted himself to photography and invented his centrifugal machine for using silver bromide in the production of gelatin emulsions.

In 1882 he came to Vienna to work in Eder's Laboratory. Later he started the dry plate factory Lowy-Plener, in Vienna, the firm which first manufactured Eder's orthochromatic erythrosine plates. In London, Plener had close personal contact with Warnerke, with whom he was able to converse in Russian, his mother tongue, and he always described Warnerke as a Russian.<sup>26)</sup>

The fact that Władysław Malachowski and Leon Warnerke are the same person is evidenced by many facts and, first of all, letters from the archive found in the cache of the old house.

Among a whole series of letters relating to a court case, one in particular to Marie, Warnerke's wife, is of special interest. It was from Nicolai Pogolski, a one-time friend and co-conspirator with Warnerke who sometimes stayed with him at Champion Hill.<sup>27)</sup>

By 1897 Pogolski and Warnerke were no longer friends; the court case was an acrimonious affair, involving blackmail.

One of Pogolski's letters shed much light on various groups of documents, relating to a certain Wladislaw Malachowski that had previously been difficult to interpret. He writes to Marie Warnerke in Polish, accusing Warnerke of having several aliases:

<sup>&</sup>lt;sup>24</sup> Warnerke's wife Marie, who was 45 in 1881, is 52 in 1891 (ten years later), while Sophie lost two years going from 12 years of age in 1881 to 20 in 1891. Marie had originally given her place of birth as Belgium and Sophie's as France; by 1891 they were both registered as having been born in Austria.

<sup>&</sup>lt;sup>25</sup> Eder. 1945. 451.

<sup>&</sup>lt;sup>26</sup> Eder. 1945. 782, note 2.

<sup>&</sup>lt;sup>27</sup> The 1891 census places a Nicolas Pogolski as a 'visitor' in the house on the census date. The census describes him as 'living on own means' and as having been born in 'Russia S Petersburg.

9th November 1897

Most respected Lady,

Enough of this!! This comedy makes us a laughingstock, diminishes us in the eyes of foreigners. I will bring this comedy to an end. At this moment I am busy preparing three documents, one for the Judge, one for the lawyer and the third will be lying on my desk. In each one I mention everybody, beginning with Wladyslaw Malachowski, alias Fr. Schultz from Tor. Av.; alias Fr. Wolf from Springfield Ter, alias Warnerke of Silverhowe etc. one after the other...

#### Peter Bower wrote:

- One of these aliases, Wladyslaw Malachowski, was already familiar to me from reading some of the earlier letters, a series in Polish dating from the late 1860s to the early 1870s from a Josef Horodice to Wladyslaw Malachowski.

Also, there are many other Malachowski family documents, including the Last Will and Testament of Julian Simon Malachowski, Wladyslaw's father, dated 26 April 1865. There are repeated references in Warnerke's own letters to obtaining his father's family papers, including land grants and the details of various properties in Poland. But the political situation, the Russianization of that part of Poland where the family estates lay (now Belarus) and the uprisings by the Poles against the Russian occupation made it very difficult for Warnerke/Malachowski to claim his inheritance. Wladyslaw, like Joseph Plener mentioned earlier, had to flee into exile, but, unlike his friend, he felt he should make a new identity for himself, an identity which might then have been compromised by claiming his inheritance.

#### "Warnerke and Co."

In the 1880s in the suburbs of London, the attention of pedestrians was attracted by the villa, on the facade of which, when it got dark, its name "Silverhowe". <sup>28)</sup> The entire first floor was occupied by the photographic firm "Warnerke and Co." Here they made the usual photographic materials and accessories, but they also did something else. Behind the face of a respectful company was hiding another, highly successful enterprise. This secret was revealed only a century later.

Warnerke received a prize from the Association Belge de Photographie (Handbuch,

<sup>&</sup>lt;sup>28</sup> Henry Baden Pritchard. The photographic studious of Europe. Piper & Carter, 1882, p105.

1927 II (2), 200 and 311). Belgium in 1877 for his work with silver-bromide collodion and, in 1881, the Progress Medal of the Royal Photographic Society of Great Britain. He had in 1875 invented a film-roll holder. He produced in that year (Phot. News, 1875, Nos. 876,877) silver bromide films on gelatinized paper and exposed them in roll holders. He gave lectures before the photographic societies of England, France, Belgium, and Germany, but Austro-Hungary.<sup>29)</sup>

He used a base of alternate collodion and India rubber coatings, on which he flowed the collodion emulsion. When finished, he strengthened the film with a gelatine coating and stripped it of the paper. In this roll holder of Warnerke's it is easy to recognize the original model of the Kodak and other modern film-roll holders.

Sensitometry became of actual value only with invention of gelatine silver bromide plates with their different degrees of sensitivity. The first practically serviceable device for measuring exposures was the sensitometer invented in 1880 by Leon Warnerke, which was placed on a market in its final form in England.<sup>30)</sup>

## Another quotes from Eder:

His actinometer and his sensitometer are well known (Handbuch, 1912, Vol. I. Part 3.). It was Warnerke who personally introduced in England the Goerz double anastigmat constructed by the Berlin optician Goerz; he also was the first to demonstrate there the Lippmann color process, and in 1893 he also showed Lumiere's autochrome process.

Leon Warnerke, a Russian living in England, made in that same year a much more important report on the property of gelatine film tanned with pyro developer (*Phot. News, 1881, Phot. Mitt., XVIII,65,98,235*).

This process was thoroughly elaborated by the ingenious amateur photographer Leon Warnerke and demonstrated by practical proofs. The Royal Photographic Society of London awarded him a prize for the process, but it met with no success commercially. He extended his experiments by introducing the "silver pigment process" for intaglio etching of cooper plates but was no more successful in this that in the earlier process.<sup>31)</sup>

<sup>&</sup>lt;sup>29</sup> Josef Maria Eder History of Photography, Dover Publications, Inc. New York, 1945, ISBN# 0-486-23586-6, p380.

<sup>&</sup>lt;sup>30</sup> Eder, "Sensitometrie", in Handbuch (1930), Vol. III, Part 4.

<sup>&</sup>lt;sup>31</sup> Eder. History of Photography. P.436, 450-452.

The Warnerke's company opened its branches in Paris, Berlin, Brussels, and Moscow. In 1880 he founded a photographic firm and a technical journal in St. Petersburg. Warnerke was one of the founding members of the V (photographic) Department of the Imperial Russian Technical Society.<sup>32)</sup> He was proud that, along with many prominent figures of the Russian photography was mentioned his name – "Warnerke Lev Vikentievich, a British citizen".<sup>33)</sup>

- Official photography was advanced especially by the Imperial Russian Technical Society at St. Petersburg, which consisted of several sections, each of which dealt with one of the different technical fields as its subject proper. Urged by Warnerke, the fifth group of the Society, "The Photographic Section" was established in 1880. It became the important center of the photographic industry and of the various branches of industrial, artistic, and scientific photography. From here were published the reports of the "Office for the Production of Government Papers," St. Petersburg, and of the cartographic section of the General Staff, which had in its service studios and efficient reproduction technicians.<sup>34)</sup>





Fig. 3: On a left: Advertisement of "WARNERKE & CO. Limited", London.

Fig. 4 On a right: Advertisement of "BAPHEPKE и Ko", St. Petersburg.

#### **Courtesy of Paramonov-Kuznetzov**

In the Russian capital, the photographic laboratory "BAPHEPKE и Ko" (Warnerke and Co.) was located at Voznesensky Prospekt, 31, apartment 2599. He was also financially interested in the manufacture of dry plates in Russia. The first Russian gelatin dry-plate factory was erected by A. Felisch in 1881. Then Warnerke, with

<sup>&</sup>lt;sup>32</sup> In 1866, by the initiative of Russian scientists, to "promote the development of technology and technical industry in Russia" the Imperial Russian Technical Society (IRTO) was established. In April 1878, the V Department of the IRTO "Light Recording and Its Applications", the oldest photographic association in Russia was created.

<sup>&</sup>lt;sup>33</sup> The Personnel of the V Department of the Imperial Russian Technical Society. Photographer, 1880. No 1. pp. 32-33.

<sup>&</sup>lt;sup>34</sup> Eder. 1945.

Stresnowsky, established a gelatin silver-bromide plate factory in St. Petersburg to which he later added the manufacture of gelatin silver-chloride papers.

In St. Petersburg Warnerke maintained closest ties with George Scamoni.

The lithographer and photographer from Würzburg, later, the inventor of heliography and, ironically "verificator" – the device for recognizing counterfeited banknotes, George Scamoni joined the EZGB in 1863.<sup>35)</sup>

Thanks to Scamoni, the products of Warnerke's photographic company were actively acquired by the Expedition. For example, shortly after his invention the EZGB bought a "Warnerke's Film Camera" which was known to be the prototype of the Kodak apparatus.<sup>36)</sup>

At photographic exhibitions in Paris, led by Scamoni, the phototechnical workshop of the Expedition exhibited photographs on orthochromatic plates produced by "Warnerke and Co." <sup>37)</sup>

In 1882, his laboratory was awarded with a silver medal at the "All-Russian Exhibition" in Moscow, as well as received awards at exhibitions in 1889, 1890 and 1892.

Warnerke actively participated in scientific congresses and exhibitions, published articles in various Russian and foreign journals.<sup>iv</sup>

In 1877, at the photographic exhibition in London, Leon Warnerke's work was displayed under number 414.<sup>38)</sup>

Perhaps one of the reasons for such a bold behavior of a person previously sentenced to death sentence was that Malakhovsky-Warnerke appeared in Russian Empire only after Alexander II and then Alexander III had already signed decrees on amnesty for the participants of the Polish rebellion.<sup>39)</sup>

Some evidence in several of the letters suggests that work was also being done in France and Poland, but the heart of the conspiracy was here in England in a large

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<sup>&</sup>lt;sup>35</sup> L. Nemirovsky "Invention of Johannes Guttenberg" pp. 300–301.

<sup>&</sup>lt;sup>36</sup> ЦГИА СПб. Ф. 1458. Оп. 2. Д. 2507: Regarding review and inspection of buildings and machines, and examination of the availability of monetary funds of EZGB in1883.

<sup>&</sup>lt;sup>37</sup> Index of the Fifth photographic exhibition organized by the V Department of IRTO. 2nd Ed. S-Pb. 1898. p. 54.

<sup>&</sup>lt;sup>38</sup> Photo Engraving (impression from a letter-press block, produced after a steel-plate engraving) by Leon Warnerke. // Exhibitions of the Royal Photograph Society. Catalogue records from the annual exhibitions. // The Photographic Journal. Oct. 9, 1877. P.9

<sup>&</sup>lt;sup>39</sup> O. Paramonov, A. Kuznetsov "Speckled cards in the "Big Game". English forgeries of Russian credit tickets in the XIX century.//Almanac of Society «ROH». Issue 2. M., 2014. P. 78.

and comfortable private house on a quiet and secluded road in Camberwell, where a very civilized and popular gentleman, well respected by his friends and neighbors, lived an extraordinary double life.

#### Which one?

The answer to this question can be given by the documents found during the demolition of the building in which he previously lived. Later, these documents were sold at «Phillips» action.

## The third side of the coin

During the analysis of the archive, along with photographs, letters, newspaper clippings and old banknotes, were discovered numerous clichés for printing Russian Empire credit notes, proofs, essays, forms, and templates for the production of paper and watermarks and samples of various printing inks.

To get acquainted with the rest of the materials of the archive, the organizers of the auction asked Peter Bower, the prominent member of the British Association of Paper Historians (BAPH) and expert of auction houses Christie's and Sotheby's to evaluate the findings.

## Peter Bower's report

As a result of his research work, Bower prepared and published report, as well as he wrote number of articles. The results of his research were sensational!

It became abundantly clear that for several decades of his life in Europe, from at least 1865 to 1899, Leon Warnerke produced and distributed counterfeit Russian Empire credit notes. He was not alone, but part of the large organization, which included Polish and Russian emigrant revolutionaries and British citizens. Bower called them "an alliance of survivors of the Paris Commune, anarchists, Polish exiles, rebels fighting the 'Russianization' of their country and gangsters out for what they could get."

The problems of communication between the conspirators were immense. Among the mass of documentation in this collection there are groups of letters

which relate to each other specifically. Some of these pieces provide extraordinary insight into the risks to which some of those involved in this scheme were exposed. One such group, for instance, consisting of drafts for coded letters, invisible-ink letters, and a press clipping, all refer to the arrest of a certain Josephine Dobrovolska on the Polish-Russian border.<sup>40)</sup>

The press clipping, two copies of which were tucked into a notebook perhaps sent to Warnerke by colleagues on the continent, is from an undated, unnamed French-language newspaper. The notebook contains many such cuttings in English, French, Polish and Russian, all referring to the forging of banknotes and covering quite a long period of time. The Polish and Russian articles were primarily concerned with warning the public of the specific details of various forged notes, while the French and English are more general, talking in terms of the threat to economic stability posed by such anarchistic projects.<sup>41)</sup>

One letter, written in invisible ink under a perfectly innocuous covering letter and then treated by the recipient to make it legible, is essentially an appeal for funds, with the writer asking for money to be sent to him so he can stay free.<sup>42)</sup>

<sup>&</sup>lt;sup>40</sup> Josephine Dobrovolska was a survivor of the Paris Commune.

<sup>&</sup>lt;sup>41</sup> For example, a French-language clipping dated 20 April 1897, subtitled 'une nouvelle maneouvre anarchiste,' describing a massive plot to undermine the economies of France, Belgium, Germany, and Russia.

<sup>&</sup>lt;sup>42</sup> This letter is part of a group of letters, all unsigned and undated and all written in invisible ink by the same hand. They all appear to come from the same period, are all writ-ten on the same paper, and all have been given the same chemical preparation and later treatment.

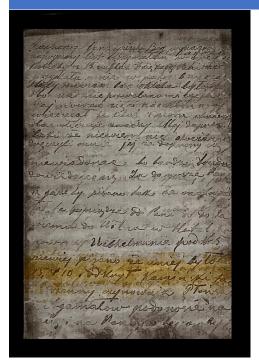


Fig. 5 Letter written in invisible ink describing the arrest of Josephine Dobrovolska. Two sets of writing are visible. The fainter lines are the letter that was written on top of the hidden message. After the letter was chemically treated, the true message appears darker, and the ordinary words fade away. (Ultraviolet-light photograph taken by Marcus Leith.) Courtesy of Peter Bower.

The use of invisible ink seems to have been common, at least in the early stages of this giant conspiracy. There are other examples in different hands, and also examples where letters have been tested to see if

such invisible messages are present. Another letter in particular actually talks of preparing the paper, and is perhaps worth quoting in full for the light it sheds on the organization:

#### "2nd September My dear Sir

Although we still haven't received any letters from Max 43

- Don't forget that he has left here under the impression that our position is possibly dangerous. It would be best to re-assure him. And as Jos. 44 is aware that we will use the new ink it is necessary that you prepare the paper. It seems to me that the best means of dispatch would be by [indecipherable] Send him the address today in invisible ink and coded. He will address the letter to himself. [crossed out: Ask Madame to write a smokescreen of a letter in French.]

When you have the paper ready send it to us with the smokescreen of what you want to say. Don't forget to write to us.

**H...** \*\* 45

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<sup>&</sup>lt;sup>43</sup> Max (or Maj) is frequently mentioned in several letters. He appears to have been travelling in Europe under an assumed name. (PB)

<sup>&</sup>lt;sup>44</sup> Possibly Joseph Horodice. (PB)

<sup>&</sup>lt;sup>45</sup> The signature, which is very difficult to decipher, is possibly Herve.(PB)

The secret of the accuracy with which Warnerke copied credit notes was in the method he invented for making a fake cliché, which with a very high accuracy repeated the real notes.

Here are the flattering words from S. Levitsky<sup>46)</sup>, who was lavished by Warnerke's skills and proclaimed them at the first meeting of the V Photographic Department of the IRTO: "The perfection with which Mr. Warnerke managed the emulsion process. At his demonstrations, he, like a magician, performed all the manipulations and caused a photographic image to appear".<sup>47)</sup>

Warnerke, with his intrinsic skills, photographed the whole credit note, or its individual elements, receiving high-quality images on the glass plates. From this kind of photo form the image was transferred to specially developed by him celluloid film.<sup>48)</sup>



Fig. 6: Sketch of watermark drawn with a pen on celluloid film. Courtesy of Paramonov-Kuznetzov. Fragments of Fig.6 is used in the design of the cover of the book.

After that, the engraver cut out or etched, the image on it. Most likely it was Frederick Wagner - an employee of the famous British printing

house "Bradbury & Wilkinson", who visited the Warnerke's house quite often until 1896. 49)

The result was a ready-made matrix for clichés made of very hard plastic. With this method, all the smallest details from the original were transmitted to the matrix and with the high qualification of the engraver possibility of errors were minimized. This form, in fact, was a matrix for making clichés for galvanoplasty.

<sup>&</sup>lt;sup>46</sup> Levitsky Sergey Lvovich (1819-1898) - one of the founders of photography in Russia. In the 1840s in Paris, under the guidance of L. Daguerre, he studied the basics of photography. In 1849 he founded in St. Petersburg the first "daguerreotype institution" where he became known as a photo portraitist.

<sup>&</sup>lt;sup>47</sup> "The writing by light". (Светопись). Addendum to the journal "Light" 1878, No 6, p.27.

<sup>&</sup>lt;sup>48</sup> Celluloid (from cellulose, French: "cellulose"; Latin: "celulla" i.e. cell) is a plastic based on nitrocellulose which containing a plasticizer and dye. A solid mixture of nitrocellulose and camphor was created by John Wesley Hyatt and registered under the brand name "Celluloid" in 1870.

<sup>&</sup>lt;sup>49</sup> The National Archives, Kew, UK. FO 27 3529 087.

On December 24, 1838, Jacobi patented the process of galvanoplasty, and in May 1839, the world's first galvanoplastic workshop was created in the EZGB to reproduce copper stereotypes.

Just as it was done in the Galvanoplastic department of the EZGB in St. Petersburg, Warnerke in London used his celluloid matrix immersed in an electrolyte, to obtain a copper plate that exactly replicated the image carefully prepared by him.

He planted a thin copper plate on a soft metal, like a garth<sup>50)</sup>, which was soldered to the steel plate. That was the required cliché. In a similar way, he received clichés for high printing and for intaglio.

#### **Production of watermarks**

Very interesting are the results of studying the technology which Warnerke using for the production of watermarks at his forgeries.

Peter Bower divided them into three groups. The first, and the most intriguing are the counterfeits of the 10-rouble 1866. Many of these were printed on English-made paper watermarked "J WHATMAN", but they also contain the normal lined and patterned 10-rouble mark. (Fig.21)

Close examination of the two marks shows that the "J WHATMAN" mark is on the wire side of the sheet, as one would expect in a handmade sheet. The style and scale of the letterforms visible suggest that this Whatman sheet was made by "W & R Balston" at Springfield Mill, Kent. Balstons were supplying Russian Empire with some handmade writing papers in the nineteenth century, but never banknote paper.

The real curiosity lies in the relationship between the two watermarks. The Russian mark is on the opposite (felt) side. No papermaking process, then or now, allows watermarking from two sides of the sheet (Fig. 7).

<sup>&</sup>lt;sup>50</sup> The garth is an alloy of lead, tin and antimony used in printing for casting fonts.

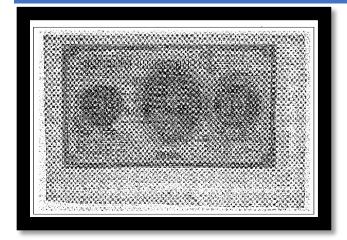


Fig.7
Lined and patterned 10-rouble watermark and J
WHATMAN watermark found in the same
untrimmed sheet used for the 1866 10-rouble
note. Letter fragments of the J WHATMAN
watermark are just visible along the bottom edge.
(Transmitted-light image by Marcus Leith.) Best
available copy. Courtesy of Peter Bower.

There is, however, an explanation for this apparent conundrum. A friend and colleague of Warnerke, who sat on various Royal Photographic Society committees with him and lived nearby in Camberwell, was Walter Woodbury, inventor of the Woodburytype method of reproducing photographs. Woodbury also developed a further refinement of his technique which he called photofiligrane. Woodbury's technique used a relief of hardened gelatin in which the lights and shades of any photograph were reproduced by varying the thickness of the gelatin.

When such a gelatin film was placed in contact with a sheet of already made paper and the two were subjected to very heavy pressure, the paper was more impressed where the gelatin was thicker, and less impressed where it was thinner, thus producing a picture, on first impression, exactly like a watermark.<sup>51)</sup>

It is possible that Warnerke, who well understood the properties of gelatin and paper as well as the techniques of photography, adapted or utilized his own version of Woodbury's technique for the watermarks in some of the earlier forgeries, although he was later to make true watermarks on moulds.

When Woodbury's invention was first brought out, many bankers and others who depended on watermarking as a security device were very concerned about the possible use of this technique by forgers. Unfortunately, Woodbury's technique suffered from one fault; when the marked paper was moistened the image disappeared. It does appear, however, that the longer the period of time since the image was first impressed onto the paper, the more stable it becomes. Some of the

<sup>&</sup>lt;sup>51</sup> Richard Brown of Brown, Barnes & Bell, working independently of Woodbury, also devised and patented a similar photo-filigrane process, but ran into a little trouble with the police when he tried to persuade the Bank of England to buy up and suppress his method on the grounds that it would facilitate forgery. (PB)

French Woodbury-type photo-filigrane made by Rives in the 1870s and 1880s are now very stable

The painstaking accuracy Warnerke strove for is well illustrated by the large numbers of photographic negatives and positive prints also found in this collection. Many of these bear the marks of additional alterations and the working out of specific details by hand.

Another of his special areas of knowledge, and essential to anyone wishing to forge the banknotes of the period, was the use and preparation of the gelatin used for sizing the sheets of paper.

In a report on a lecture given by Thomas Bolas as part of the Bolt Court series,<sup>52)</sup> we find the chairman of the meeting asking Warnerke to round the meeting off by describing a method of purifying gelatin that Warnerke had recently tested:

Mr. Warnerke said that the method in question consisted of making a solution of gelatin or glue in hot water, to which was added alum in excess, which would cause the gelatin to precipitate. In this state it could be thoroughly washed in hot water, after which it was strained out and a little citric acid added. This rendered the gelatin again soluble. The next step was to allow the gelatin to set, and to wash it in cold water to remove the excess of citric acid. The final result would be a gelatin of very considerable purity.<sup>53)</sup>

Warnerke was a frequent visitor to such meetings throughout his life and, as an article about him states:

- Mr. Warnerke is of the most sociable and genial disposition, and ever ready to assist by his advice or otherwise, in any matters photographic; and few of the regular frequenters of the meetings of the metropolitan photographic societies, or of those who have enjoyed his hospitality, but have cause to be grateful for his kind assistance in some photographic difficulty.<sup>54)</sup>

<sup>&</sup>lt;sup>52</sup> Thomas Bolas gave the fourth Bolt Court Lecture, Gelatin as the leading colloid for process work - Compounds of chromium. The Bolt Court School later became part of the London College of Printing, now the London Institute.

<sup>53</sup> anon. 1898. The Process Photogram & Illustrator 54 (June): p.87-89

<sup>&</sup>lt;sup>54</sup> anon. 1884. The British Journal of Photography 18 (January) p.39.

The second group of technological varieties of fake watermarks was the area, where Warnerke most fully manifested himself as the professional photographer and inventor is the construction of watermarks for 100 Ruble 1866.



Fig. 8: Meticulously copied drawing of watermarks from 100 Rubles 1866. Courtesy of Paramonov-Kuznetzov. Fragments of Fig.8 is used in the design of the cover of the book.

The overall work on the 100 Ruble credit note was never completed, nevertheless, the technology of the production of the

watermark was prepared at the highest level. The authentic watermark was transferred directly from the original to the celluloid film using pen and ink.

The watermark has been traced directly from a genuine note onto celluloid film using pen and ink. Warnerke was well aware, however, that all paper shrinks as it dries, and when he constructed the watermark on the mould surface he had to take this shrinkage into account (Fig.27).

The notebook found among his papers shows several examples of such calculations Comparisons of the handwriting identified as Warnerke's in some of the letters with the writing in this notebook shows that these calculations were all made by Warnerke. They were crucial to the success of counterfeiting this particular issue, as the printed image on the recto of the note had to align precisely with various parts of the watermark (Fig. 9).



Fig. 9 Mould used by Leon Warnerke for producing forged 100-rouble notes during the 1890s. In this mould the watermark has been produced by building up layers of enamel paint and carving it down, rather than using wire. Courtesy of Peter Bower.

The actual method of watermark construction is of great interest. Rather than using bent and soldered wire, which would normally be used, he employed what appears to be an enamel paint, building it up in layers and then carving it down to the correct shape.

This would have been an extraordinarily laborious process, but it had the advantage of allowing very fine adjustments to the actual form of the watermark by the addition or subtraction of minute amounts of the enamel.

The contemporary expert, having carefully studied the forms for casting paper, made by Leon Warnerke, recognized the skill and genius of the author - even in modern conditions it is incredibly difficult to make such filigrees with semitones, not to mention the fact that it is practically impossible for an ordinary person in the XIX century to get wire used for this kind of work.

To fabricate credit notes of other denominations, Warnerke did not limit himself to printed imitation of filigree making already "real" watermarks on the new paper. The watermark used for the 1866 50-rouble note, which on close examination of the sheet shows every indication of having been produced by wires and by raising and lowering the three oval or circular areas of the wire. Unfortunately the mould for this note has not survived. This use of different levels of wire can also be seen on the forming surface of the 100-rouble mould.

The precision to which Warnerke aimed was well illustrated by the large number of photonegatives and typographic prints of banknotes of varying degrees of readiness that were found in his archive.

#### **Production Line**

The first in a line forgery, among Warnerke's various products was Russian State credit notes of 1843. The multiple examples of them were find in the archive.

Until recently the 50 Ruble credit notes of 1866 were considered as the most successful product of Warnerke and most accurately copying the real banknote. There is an opinion that the only reason for the termination of this issue was the appearance of this "super note".

Nevertheless, today there are a number of features that allow you to recognize a forgery, even without comparing it with a genuine banknote. Among other things, this is a typo in the word "рублей"- «руеелей». 55) Так же в написании фамилии



нет точки над буквой «i», Also in the spelling of the word «Ламанскій» (Lamansky) there is no dot over the letter "i". Another error is a period instead of the comma after the word «безостановочнымъ.» On the reverse side there are some differences (see Fig.10).

Fig10. Genuine banknote on a top, Counterfeit on a bottom. Courtesy of Paramonov-Kuznetzov.

In 1888 due to the appearance in circulation of a very large number of high-quality forgeries, issuing of 50 Ruble 1866 was discontinued. As of 1888 in circulation was only 4000 pieces. <sup>56</sup>

The most difficult to identify forgeries produced by Leon Warnerke, a real "super forgery", were 25 Rubles 1866 and 1876. A well-readable high-quality imitation of watermark and intaglio printing, a smooth micro font, a perfect portrait - all these

<sup>&</sup>lt;sup>55</sup> Some notes exist with the error «*pyeeneŭ*» *located* in the lower left corner of banknote, as well as forgeries without this error.

<sup>&</sup>lt;sup>56</sup> Russian ruble. Two centuries of history. Edited by N.P. Zimarina - M., 1994, p. 131.

technical tricks caused a lot of trouble with attribution, both to the Russian Empire authorities 150 years ago, and to present collectors.

#### 25 Rubles 1866

By the decree of Emperor Alexander II from November 15, 1880 "On the merging of the Department of State Police and Executive Police into one institution" the new department was created. The department was divided into three divisions: the first one (administrative) also investigated cases of the manufacturing and distribution of counterfeit money.

In May-August 1881, the employee of the 1<sup>st</sup> Division, prosecutor Emmanuel Vuich was sent to Prussia and Warsaw for a comprehensive acquaintance with the case of the smuggling from London counterfeited State credit notes and their subsequent distribution. <sup>57</sup>

In 1876, due to the appearance in circulation of a very large number of the counterfeited notes of high quality, the 25 Rubles 1866 were withdrawn from the circulation. Instead, extremely unusual notes 25 Rubles 1876 were issued. These credit notes were put into circulation on January 15, 1881. They were ornamented completely unusual compared to the elegance of Russian Empire paper money. White color paper without tinting and absence of any images on the reverse side, stylized gothic fonts, capital text, layout of mandatory for the Russian Empire design elements, italicized declarative text, complex watermarks - all this, taken together, made this issue very similar to the pound sterling notes issued by the Bank of England at the same period of time.

<sup>&</sup>lt;sup>57</sup> Vuich Emmanuel Ivanovich (184-1930), graduated from the Faculty of Law of the University of St. Petersburg, entered the civil service in 1871. In 1905-1906 he served as a director of the Police Department. //PΓИΑ. Φ. 1405. On. 544. д. 2553. л. 17; List of the service of Senator, Hofmeister of the Court of His Imperial Majesty Emmanuel Ivanovich Vuich / "From the depths of time". Almanac, 1996. No 7. p. 203-209





Fig11: On a left State Credit Note (Russian Empire) 25 Rubles 1876

Fig12: On a right: Bank of England 5 Pounds 1879

For thirteen years, "pound type" credit cards were legal tender in the Russian Empire. However, the "Warnerke's Company" took very little time to master the release of their version of this credit note.

The line of "products" was constantly expanding. This is evidenced by the cliché of the regional Russian currency 3 Maark 1875 of the Grand Duchy of Finland which was found in the Warnerke's Archive.

#### Other documents

As follows from the documents found in the archive - Warnerke carefully searched for and collected all articles in the Russian and European press, more or less related to the detection of the counterfeited credit notes.

"Forged papers.

We are asked the question: what to do with 25 Ruble credit notes? Newspapers reports of the large number of forgeries of these tickets. The State Bank and Treasury had stopped issuing them obviously undermined the credibility of these "pieces of paper".

We are told that many groceries and tobacco shops evade receiving or exchanging these 25 Rubles. Some spread this distrust of the 5 Rubles either."

(Undated newspaper clipping from the archive of Leon Warnerke).

"As local newspapers report: ... But, perhaps, it is more scandalous for the good glory of these purple color papers that at the box office of the St. Petersburg

Mariinsky Theater an announcement was posted that "The box office does not accept 25 Rubles when selling ticket".

(Excerpt from the article with Leon Warnerke handwriting: "Oct12/24. News").

Since the beginning of 1893, Russian newspapers increasingly began to announce the discovery of counterfeit 100 Rubles in circulation. These annotations from Russian and Polish newspapers Leon Warnerke methodically collected and keeping them in his archive.

"From the Ministry of Finance,

Due to appearance in circulation of counterfeited 100 Rubles, the Ministry of Finance announces to the public the main distinguishing features between forgeries and genuine notes:

- the word "cmo" (hundred) printed in brown in the upper right corner at the front side of the note (above the number "100"), is positioned incorrectly: the letter "c" crosses the word "кредитный" between the letters к and p, and not between p and e, as on a genuine note,
- 2) the stroke in the signature of the manager of «**Ю. Жуковский**» (Y. Zhukovsky) on a forgery reaches almost the letter "**y**" in the word "**рублей**", and
- 3) the serial number on valid 100 Rubles do not exceed 200,000 and it is having signature of the cashier "Tumos" (Titov).

Regardless of these, special attention should be paid to the engraving of the reverse side of the note (portrait of Empress Catherine); the finish of this engraving on a forgery is much rougher and much less distinct (especially in the face of Empress Catherine) than on a valid ticket." (Fig. 13)

Newspaper clipping from the archive of Leon Warnerke with a pencil note: "Pet. newspaper. 7 Oct 1895".

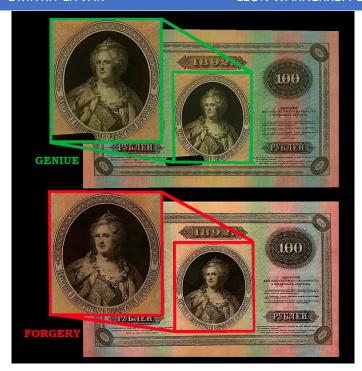


Fig. 13: "the engraving of the reverse side of the note (portrait of Empress Catherine); the finish of this engraving on a forgery is much rougher and much less distinct (especially in the face of Empress Catherine) than on a valid ticket." Courtesy of Paramonov-Kuznetzov

# The Jansen's case (19th Type of forgeries)

At the end of 1868, alarming signals about the discovery of counterfeited 10- and 50-Rubles dated mainly "1864" and "1865" began to arrive more and more often. At first, these counterfeits were discovered in Warsaw and St. Petersburg. Later, similar forgeries were found in Łódź, Pskov, Revel, Novgorod, Yaroslavl, and Moscow.

Counterfeits were very skillful: the paper of the counterfeits closely duplicate the quality of genuine notes,<sup>58)</sup> and the high quality of printing made the engraver's flaws invisible without special optics. In general, the quality of imitations was characterized by experts as extraordinary.

The counterfeited 10 Rubles 1843 were studied by EZGB experts and classified as a forgery of the "17th Type". They belonged to the 17<sup>th</sup> registered counterfeiter of this denomination, the existence of which became known. 50 Rubles were attributed to the forgery of the "19th Type" (Fig.14)

<sup>&</sup>lt;sup>58</sup> Since 1852, according to the Decree of April 27, 1851, all State Credit Notes were printed on specially prepared "polished paper". (On the Printing of State Credit Notes of All Merits on Specially Prepared Polished Paper. Of April 27, 1851 (Published January 1852) PSORA 2. T. XXVI. Part 1 of Art. 25163. p. 329-330).



Fig. 14: Stamp EZGB "19th Type of forgery"

For some period of time, there was no indication that the fabrication of the "17th Type" of 10 Rubles and "19th Type" of 50 Rubles was made by the same source. The indirect evidence of this was only the high quality of forgeries of both types and the simultaneity of their appearance.

By February 1869, 647 pieces of counterfeited 50 Rubles were discovered and withdrawn from circulation<sup>59</sup>.

In September 1868, discovered in the small county town Putivl, suspicious 10 Rubles bills were sent for examination to the EZGB. The examination verified that these were forgeries of the "17th Type". An urgent message was sent to Putivl to the judicial investigator, demanding: "please take all appropriate measures to find and detain the perpetrators."

It turned out that the counterfeited 10 Rubles were distributed around the city from one place: the cashier of the workshop for the production of railway sleepers owned by the French citizen Augusto Jueo. He paid to the workers team a large sum for the finished job. A search conducted on the night of October 12, 1868, in the office and apartment of the French entrepreneur revealed ninety-two 10 Rubles notes in a locked bureau at Jueo's office. All notes having serial numbers in close proximity to those that the examination had previously recognized as a forgery. <sup>60)</sup>

During the investigation, the correspondence between August Jueo and Stanisław Jansen, the owner of a large apothecary warehouse in St. Petersburg, was discovered. In it, Jansen informed Jueo that he was sending to him "douching liquid" and shared plans for a trip to Paris to organize some "profitable enterprise".

<sup>&</sup>lt;sup>59</sup>A. Kony. Court Speeches. 4<sup>th</sup> Issue. S-Pb, 1905. P. 80.

<sup>&</sup>lt;sup>60</sup>Ibid., p. 81.

In the autumn of 1868, the undercover investigation of Jansen and his trading enterprise began. In the course of this painstaking and inconspicuous work was discovered that Jansen's income did not corresponding to the turnover of his enterprises.

On March 3<sup>rd</sup>, 1869, near the French embassy, the police detained the merchant of the first guild Stanislav Jansen and his son. The reason for the detention was the statement of the courier of the French embassy Eugene-Ludwig Aubrey. He reported that he had brought from Paris to Emile Jansen a parcel with counterfeited credit notes. During the detention, of Emil and his son was found a wooden box in which 360 counterfeited pieces of 50 Rubles 1864 and 1865 were found. During a search of Jansen's apartment, was found a 50 Rubles note with a serial number close to those found earlier. All belonged to the same "19th Type". But the most interesting was finding of the document, which by the expert opinion of the EZGB was documented as one of the most important evidence of the accusation.

EZGB developed two dozen checking procedures for verifying the authenticity of 50 Rubles credit notes using a stereoscope as per "*Dove method*", <sup>61)</sup> thereby providing experts with an effective method of quick verification of notes authentication. All these procedures for verification were top secret and were never disclosed (Fig.28). But the card discovered during the search of Stanislav Jansen's papers was an exact illustration of one of these methods! It was shown how to bend the genuine and verifiable bills, how to place them under the lenses of the stereoscope and what kind of pattern to consider. At the top was written: "*fig. 17th*". <sup>62)</sup>

In 1870, by a jury decision all the defendants were found guilty on all charges. This seemingly resounding victory of justice was, however, captured only ordinary distributors of counterfeits.

A curious detail: at the trial, Emil Jansen claimed in his defense that he knew nothing about the contents of the box transferred from Paris and that this parcel was intended for a Mr. Kulikov in St. Petersburg. He also claimed that "the gentleman, a

<sup>&</sup>lt;sup>61</sup> Heinrich Wilhelm Dove (1803-1873) – Doctor of Physics and Professor of University of Konigsberg developed an original way to verify the authenticity of paper banknotes by comparing its individual elements through stereoscopic lenses.

<sup>&</sup>lt;sup>62</sup>A. Kony The case of Stanislav and Emile Jansen, accused of importing counterfeited credit notes into Russia, and Herminia Akar, accused of putting such notes into circulation. S-Pb, 1905. p. 81-82.

bronze deal master, familiar to him only from meetings in different cafes." gave it to him. The gentleman was known to him as "Wernicke".

Leon Wernicke...<sup>63)</sup>

# Forgeries, forgeries, and forgeries ...

In the late 1880s, the constant and relentless struggle against the counterfeiters led to another change in the types of Russian Empire banknotes.

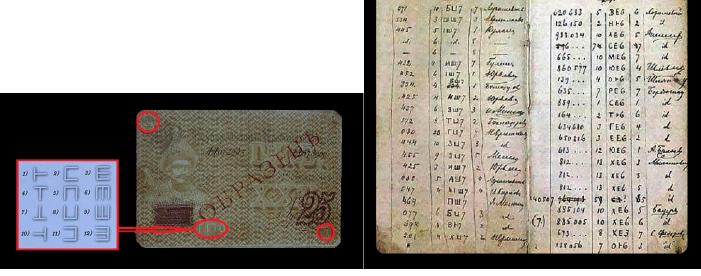
From January 1<sup>st</sup>, 1890, to January 1<sup>st</sup>, 1893, the credit notes issue of 1866 was exchanged for new notes issue of 1887.

As per Decree of November 13<sup>th</sup>, 1892, the term of exchange 1, 3-, 5-, 10- and 25-Rubles issue of 1866 was extended until May 1<sup>st</sup>, 1894, and the beginning of the exchange of 50 Rubles 1866.

Leon Warnerke also, was actively preparing for the exchange of Russian banknotes. In the discovered century later, there were found almost finished counterfeited 25 Rubles and uncut sheets of 10 Rubles 1887.

The crown of Leon Warnerke's activity, as a counterfeiter, was to be the largest denomination of Russian paper banknotes - 100 Rubles 1866 (Fig.24-25). The fact that Warnerke carefully prepared for its release evidenced by many entries in his notebook. There were calculations of credit notes sizes, paint selection, schemes, etc. Apart of it worth mentioning Warnerke's attempts to unravel the hidden combinations of letters, serial numbers, and cashier's signatures. All these items which were the ways to protect against counterfeiting of paper banknotes. In his notebook were many pages filled with statistics about such combinations. (Fig.16)

<sup>&</sup>lt;sup>63</sup>A. Kony Court Speeches. 4<sup>th</sup> Issue. S-Pb, 1905. p. 79.



A.

Fig. 15: On a left – genuine banknote with security feature of combination of two letters and between them – the "letter looks like symbol". Courtesy of Paramonov-Kuznetzov.

Fig. 16: On a right - Warnerke's attempts to unravel the combinations of the "letter looks like symbol" and corresponding cashier's signatures. Courtesy of Paramonov-Kuznetzov.

He also spent considerable time and effort to achieve the correct balance of inks for the 100-rouble rainbow note, listing in more than one place in his notebook the specific colors necessary.

The annotation of these color trial sheets in English, with the names of London Artists' colourmen, suggests that at least the trials and proofing were being done in England. The colors on the sheet illustrated bear such maker's names as J Winston Bronze 1893, Millar Blue, and Stanbury 1893, but most of the colors are simply labelled with their names (Fig.26).

The work on 100 Rubles was never completed. Even without comparison with the genuine banknotes, you can see the imperfection of the portrait of Catherine II in the vignette on the back, and a lot of small flows in clichés. The most noticeable among them is the uneven engraving of the right line of the letter "ы" in the word "кассы" (Fig.26)

The reason for this negligence against the background of the preceding brilliant works was the departure of the engraver Wagner to Germany. Probably, Warnerke

could not find a specialist of similar qualification to work on the 100 Rubles banknote.

In addition to small hard-to-distinguish differences in clichés and serial numbers, the distinctive features of Warnerke's forgeries, allowing us to judge their inauthenticity, is a violation of the geometry of the banknote, especially on its periphery. In the production of Russian banknotes the paper with the addition of hemp (1866), or silk threads (1887) was used. Warnerke used paper completely different composition and quality and from the different manufacturers (including reed paper from Japan). This desecration of technology also helps in identifying the forgeries.

The very high quality of this particular note and the 10-and 25-rouble notes from the same period suggests that at least during some periods in his career as a banknote forger Warnerke had access to some highly experienced papermakers, as well as to the necessary equipment and raw materials - if not to genuine material as well. Joseph Eder's account of Warnerke's time in St. Petersburg suggests just such a possible connection during the early 1880s, through the Imperial Russian Office of Government Papers (EZGB).<sup>64)</sup>

By that time, in Russian Empire, the impressive program of replacing old credit notes with new samples with a much greater extent of protection from the infringements by counterfeiters, was being completed. New credit notes were printed using the "Orlov print" - a method of multi-color printing from a single cliché, invented in 1890 by Ivan Orlov (Fig.28). This method turned out to be so difficult for counterfeiters that it is still used today in the manufacturing of banknotes and securities papers. Warnerke did not leave attempts to imitate the "Orlov print", but he did not go beyond the samples of the 10 Rubles 1894. Nevertheless, these experiments were made in large scale. There were more than thousand pieces of such test prints found in his archive.

Returning to the question of why Warnerke did not continue to fabricate almost perfect forgeries of 25 Rubles, we recall that the exchange of state credit notes issue of 1866 and 1876 was made only until May 1<sup>st</sup>, 1894.

**34** | Page

<sup>&</sup>lt;sup>64</sup> Eder. 1945.p.708-10. // A. Balachenkova, in her article "LEON WARNERKE AND THE EXPEDITION OF PROCUREMENT OF STATE PAPERS" convincingly proves that access to technologies and the latest equipment Warnerke received through his acquaintances in the EZGB. See the next part of this article.



Fig.17: Impression with imitation of relief guilloche mesh of the reverse side 100- Ruble 1894. Courtesy of Paramonov-Kuznetzov.

That is, to produce in 1899 his own the most successful counterfeit did not make sense. These notes could not be exchanged. Nevertheless, initially 100

Rubles 1866 were exchanged until December 31<sup>st</sup>, 1900, and then this period was extended until January 1<sup>st</sup>, 1903. At that time, Warnerke did not know this, so he tried to exchange those forgeries, the prototypes of which were still exchangeable.

## Leon Warnerke and EZGB<sup>65</sup>

The case of the secret part of the EZGB "The forgery of credit notes of 1866 by Warnerke" from the Goznak archive<sup>vi</sup> not only gives us an answer to some questions, but also offers a plot that surpasses the brightness of an adventurous novel. At the moment, it contains draft documents and working materials on the examination of forgeries of 100- Ruble 1866 and 10- Ruble 1887; correspondence of the administration of the State Bank and the Special Chancellery with the managers of the Expedition on the Warnerke case; samples of counterfeited 25- Ruble found in the Warnerke's house in London; The decision of the judicial investigator of the St. Petersburg District Court for Particularly Important Cases A. Burtsev with a petition to initiate criminal proceedings against Leon Warnerke in the UK. As it is follows from the surviving materials of the case from August 1895 it was the first time were the St. Petersburg office of the State Bank discovered "expertly forged" 100 Ruble 1866 credit notes. The cashier of the State Bank paid attention to its serial number. Its font size was more than on the genuine banknotes. To resolve his doubts, these

<sup>&</sup>lt;sup>65</sup> Cited from A. Balachenkova, A. Bogdanov LEON WARNERKE AND THE STATE PAPER PROCUREMENT EXPEDITION (EZGB). S-Pb 2019. <sup>66</sup> ΕΦΟД. Π. 1 r-1919/1. p. 8.

banknotes were transferred for further research to the EZGB, who had the exclusive right to inspect banknotes<sup>67</sup>.

EZGB experts recognized the banknotes as a counterfeit, made by mechanical means on the hand-cast paper with watermarks. According to the numbering of discovered counterfeits they attributed it to the "2nd Type" of forgery of 100 Rubles 1866.<sup>68)</sup> The forgeries of 100- Ruble 1889, 1890 and 1892, with a large number of small shortcomings of the printing form, revealed a clear technological affinity with valid banknotes.<sup>69)</sup>

After the publication of these discoveries, their distribution was temporarily stopped. However, starting from January 1896, forgeries of the same "**2nd Type**", but of a more advanced kind began to appear. On the new forgeries marked 1892 and 1894, some printing shortcomings were eliminated.<sup>70</sup>

EZGB attributed these forgeries to the "2a Type" of forgery of 100-Ruble banknotes, i.e. "Modified 2nd Type". The surviving materials of the examination conducted by the EZGB show that the paper of these forgeries was the handmade cast. The mixture was made of linen and hemp fibers, glued with animal and rosin glue while the genuine paper (at that time) was cast only from hemp fiber and glued only with animal glue. As a result of the analysis of the printing technique, it was found that on fakes, as well as on the genuine, where "6 seals": five typographic and one heliogravure<sup>71)</sup> - a portrait of the Empress and located on the right guilloche rosette, but the printing itself is "much worse than the real ones"<sup>72)</sup>.

Two years later in October of 1898, in Warsaw and Wilno, was discovered two counterfeit banknotes of the same"2nd Type". This time they were from 1896 and having a five-digit serial number.<sup>73)</sup>

<sup>&</sup>lt;sup>67</sup> ЦГИА СПб. Ф. 1458. Оп. 2. Д. 617. Л. 30: "On the development of a draft of a new procedure for the inspection and destruction of forged banknotes".

<sup>&</sup>lt;sup>68</sup> ЕФОД. П. 1 г-1919/1. Л. 8.

<sup>&</sup>lt;sup>69</sup> РГИА. Ф. 1682. Оп. 1. Д. 27. Л. 4—5 об. "Description of elements of the forgery of credit notes of 100 Rubles 1866."

 $<sup>^{70}</sup>$  РГИА.Ф.1682.Оп.1.Д.27.Л.20. The width of words under signages of «СТО» and «РУБЛЕЙ», which frame the number "100" on the right side of the front side of the note, has become closer to the width of these descriptions on a valid banknote.

<sup>&</sup>lt;sup>71</sup> On genuine banknotes, the portrait was made in a metallographic.

<sup>72</sup> ЕФОД. П. 1 г-1919/1. Л. 6—7.

<sup>&</sup>lt;sup>73</sup> РГИА. Ф. 1682. Оп. 1. Д. 27. Л. 26 a. In April 1900, after the completion of the judicial investigation of the Warnerke case, fake 100 Rubles were delivered to the Expedition and classified as the "2b Type". In comparison with "2a Type" were changed the "under signs" of the lower liner «РУБЛЕЙ».

In 1895 based on the discovery of counterfeited 100- Ruble the special investigator for the high priority cases of the St. Petersburg District Court, A. Burtsev opened a preliminary investigation. As a result of the examination he became to the following conclusions: 1) The counterfeiting is carried in a foreign country; 2) at least two or three persons were participating in this case; 3) The counterfeiters are professionals who are well acquainted with the paper production, ink technology, engraving, printing and photo reproduction techniques; 4) These forgeries are "a completely systematic imitation of the ways and techniques by which genuine banknotes are produced in the Expedition.<sup>74)</sup>

In 1897 the experts identify the similarity (and, consequently, the attribution to the same counterfeiter) the above-mentioned "2nd Type" forgery of 100- Ruble 1866 with the "1st Type" forgery of 10- Rubles 1887 which earned the EZGB an assessment of "the most perfect of all mechanical forgeries of banknotes of this denomination".<sup>75)</sup>

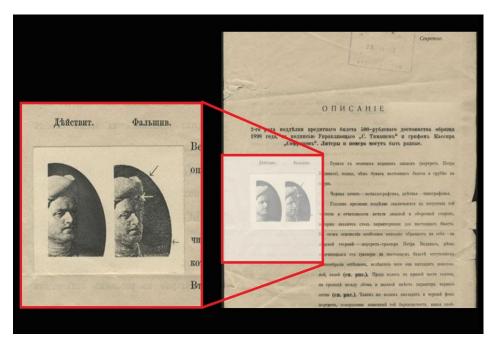


Fig.18: EZGB card which described differences between genuine and the counterfeit banknote. On a left side genuine portrait, on a right side – forgery:

Top Secret

#### **DESCRIPTION**

of the "2nd TYPE" of forgery of a credit note 500 Rubles 1898 with the signature of the manager S. Timashev, and the cashier Safronov. Letters and numbers can be different.

<sup>74</sup> ЕФОД. П. 1 г-1919/1. Л. 9.

 $<sup>^{75}</sup>$  ЕФОД.П.1r-1919/1.Л.9об. This forgery was first identified in March 1890. See: РГИА. Ф.1682.Оп.1.Д.24.Л.1. "Description of signs of forgery of 10 Rubles of 1887".

In addition to the fact that on both forgeries were printed signature of the cashier Safronov. His signature was not used on the genuine notes of these denominations and plate. Also, the similarities were in the methods of printing (typographic printing and heliogravure), the placement of the serial number by using a numbering device, and the paper.<sup>76)</sup>

In both cases the paper was made by hand, had watermarks imitating the genuine ones, and a similar composition of fibers. The mixture of hemp and linen fibers, with a predominance of linen.<sup>77)</sup>

Perhaps the name of the counterfeiter, who practiced "a completely systematic imitation of the methods and techniques by which genuine banknotes were produced in the Expedition", would have remained unknown if in January 1899, in Marseille, Leon Warnerke had been detained on suspicion of selling counterfeited 100 Rubles.

During the arrest, in addition to the "2nd Type" forgeries his personal correspondence was seized. Among the correspondents there were notable employees of the EZGB: G. Scamoni and V. Weisenberger (heads of the phototechnical and photochemical workshops of the Experimental Department respectively), as well as K. Chesterman, the manager of this Department.

Investigator A. V. Burtsev, who was interested in such acquaintances of Warnerke, interrogated under the oath, the above-mentioned persons.<sup>78)</sup> His interrogations revealed a completely unexpected fact: it was discovered that "having dear friends and acquaintances in the Expedition, Warnerke was granted full access there".<sup>79)</sup>

Since the Expedition actively used photomechanical processes in their work, many of its employees, such us: G. Scamoni, G. Frank, K. Chesterman, A. Popovitsky, A. von Brömsen, and K. Vakhrameev, together with Warnerke, were members of the "V Department IRTO".<sup>80)</sup>

<sup>&</sup>lt;sup>76</sup> РГИА. Ф. 1682. Оп. 1. Д. 24. Л. 1.

<sup>77</sup> ЕФОД. П. 1 г-1919/1. Л. 29.

<sup>&</sup>lt;sup>78</sup> A copy of the protocols of these interrogations has not been preserved. There are only drafts in case files. See: ЕФОД. П. 1 г-1919/1. р. 5.

<sup>&</sup>lt;sup>79</sup> Ibidem. P. 11.

<sup>&</sup>lt;sup>80</sup> See: Meeting minutes from January 13, 1899 "Meeting of permanent members of the V Department of the IRTO// Case file of IRTO № 3. p. 131; РГИА. Ф. 90. Оп. 1. Д. 450. Л. 9: "List of members of the 5th Department of the IRTO. 1908".

Warnerke almost annually visited the Expedition, where the doors to the workshops of the Experimental Department were "always opened for him".

During his last visit to St. Petersburg in November 1898 - January 1899, he has opportunity to look through albums of counterfeited watermarks as well as, he was present at the latest experiments of Scamoni, and Wiesenberger related to the selection of colors that make it difficult to reproduce by photomechanical methods for a new 50 Rubles (1899). 81)



Fig.19: Impression with imitation of relief guilloche mesh of the reverse side 100-Ruble 1894. Courtesy of Paramonov-Kuznetzov.

Thus, Warnerke could obtain the information he needed for his counterfeiting from the "first-hand". This fact refutes one of the main arguments of Paramonov and Kuznetsov in favor of the "British footstep" in the Warnerke's Case. They claimed that Warnerke received this information from the British Special Services and confirms the hypothesis of Peter Bower and Josef Maria Eder about the possible leakage of information to Warnerke from employees of the EZGB.<sup>82)</sup>

So, why did such a serious leak of information become possible? The likely answer is:

The end of the XIX century was still the era of positivism and the triumph of the natural sciences, the cultural heroes of which were people of science and engineers as carriers of positive knowledge. Scamoni, his subordinates, and his co-workers belonging to the same cultural circle, firmly believed that a gentleman, inventor,

<sup>&</sup>lt;sup>81</sup> ЕФОД. П. 1 г-1919/1. Р. 5, 11.

<sup>&</sup>lt;sup>82</sup> O. Paramonov, and A. Kuznetsov: Speckled cards in the "Big Game". p. 108. // P. Bower: Economic warfare: banknote forgery as a deliberate weapon. P. 58) //P. Bower: Beating the Forger: Case Studies in Forensic Paper Investigation // Looking at Paper. Evidence and interpretation. Symposium Proceedings, Toronto, 1999, p165.

and the engineer, who had done a lot for the development of photography in Russia, could not be a villain.

Apparently, it should have appeared many people such as Warnerke, equally involved in successful engineering activities and in active conspiratorial work, to change the principles of secrecy and protection of information at EZGB.

## **Grand Finale**

About 1898 Warnerke received a rather large sum of money (about 5000 pounds) in Russian banknotes as payment on account of photographic invention.<sup>83)</sup>

At the end of January 1899, Warnerke left London, and on January 27 arrived at Calais in northern France. Traveling in France, Warnerke never stopped for no more than two days in the same place.

On February 6<sup>th</sup>, Warnerke was in Toulouse, and on the 7<sup>th</sup> arrives in Marseille and stays at the Dela Costa Hotel. Next morning he visits Jean-Rose's store and exchanges three 100 Rubles banknotes for 795 Swiss Francs. Two hours later, Warnerke does the same with Mr. Boulvereau. He handed Warnerke 796 Swiss Francs.

Instead of following his own rule: leave Marseille and go to another city, Warnerke decides to stay and continue exchanging his forgeries. This decision led him to downfall.

It's happened that Jean-Rose on the same day sends by train received banknotes to Paris. Next morning he received an urgent telegram notifying him that all the Russian banknotes are forgeries. He manages to warn his colleagues in Marseille about the incident. When Warnerke appeared to the Marseille money exchanger Fiero – Jean-Rose and Boulvereau were waiting for him there. Warnerke readily returned all money which he exchanged the day before. Nevertheless, they handed over the photographer to the police.<sup>84)</sup>

<sup>&</sup>lt;sup>83</sup> Eder. 1945.p. 452

<sup>&</sup>lt;sup>84</sup> Archives departementales des Bouchées-du-Rhone, 2U2/374.

Leon Warnerke was detained. During the search, the French Police found twenty-five bills of 100 Rubles 1896. After examination, later in Paris, it was established that twenty-two bills were forgeries.<sup>85)</sup>

All the forgeries dated 1896 were with serial numbers running one after the other, but the two bills had the same numbers. Warnerke always had with him three genuine tickets in case to replace forgeries if the exchange went with suspicions. Buring the interrogation, Warnerke explained that the money that turned out to be counterfeited, in the amount of 20,000 Rubles, was lent to him earlier by his friend in St. Petersburg. He refused to call the name of a friend out of "moral motives", so as not to involve him in trouble.

When asked what he was doing in France, Mr. Warnerke said that he "traveled for his pleasure and in order to improve his health" and exchanged money in French cities because there was a more profitable exchange rate." <sup>87)</sup>

The detainee's explanations to Warnerke seemed unsatisfying to the police, and he was arrested. The French authority informed the interested parties - Great Britain and Russian Empire – about the incident.

The Foreign Office, together with the Ministry of Foreign Affairs of the British Government, sent a request to France and hired a French lawyer at the expense of the consulate.

The troubles of the British had an effect. Despite Warnerke was not released on bail, as requested by diplomats, yet on April 14<sup>th</sup> he was transferred from prison to a civilian hospital. Moreover, the prisoner was allowed to have money for personal needs and the personnel was ordered to treat him "gently and condescendingly."

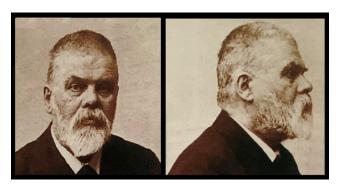


Fig.20: Leon Warnerke. 1899. Courtesy of Paramonov-Kuznetzov.

The representative of the Russian prosecutor's office went to Marseille, where

<sup>&</sup>lt;sup>85</sup> In the archive sold at auction, there were a little more than a hundred pieces of fake 100-rubles.

<sup>&</sup>lt;sup>86</sup> The National Archives, Kew, UK. FO 27 3529 070.

<sup>&</sup>lt;sup>87</sup> The National Archives, Kew, UK. FO 27 3529

he tried to persuade Warnerke to testify against his mysterious "comrade". The prosecutor explanation that the Russian law would not prosecute him, did not have the proper effect. Warnerke refused to cooperate. After that the Russian ambassador in London appealed to the British authorities with a request to search the house where Leon Warnerke lived.

The Home Office sent five Scotland Yard officers, led by Chief Inspector Walter Dinnie who was a specialist on counterfeiting and fraud. The search continued on April 27th and 28th, 1899. On April 4th Inspector Walter Dinnie sent his report to the Criminal Investigation Department of Scotland Yard.

The mansion, which located 20 meters from the road, was densely shrubbery and had the only one entrance. According to inspector's report the Silverhowe is a residence whose five out of the thirteen rooms were used for photographic purposes only. As a result of a thorough search, during which the constables even ripped the boards off the floor, a hoard was found, but it turned out to be empty. According to the inspector, things from the hoard were taken out literally on the eve of the police visit - this was clearly indicated by the absence of dust on the board under which the hoard was hidden and the presence of one on neighboring boards. Continuing the search the Scotland Yard officers, under a pile of garbage, found a photo of a 10 Rubles Russian banknote. Painstakingly inspecting scraps of paper wastepaper and "what was most likely paper for bills", the police find seven pieces of paper, each of which had a watermark of 25 Rubles banknote.

Interviewed by the inspector Warnerke's wife and daughter could not explain where the found things came from in their house and categorically denied their knowledge of it. Warnerke's wife could not even explain on what means they lived in London for three decades, saying that she knew nothing about the sources of her husband's income. Also, inspector Dinnie interviewed all the servants in the house. He reported on the results of the interrogations and discovered that the servants in the house were changed very often, and they also could not report anything about the case. There was no evidence of their involvement in the activities of Leon Warnerke, so they were released.

As the inspector found out, apart from some unidentified personalities, among the people who often visited "Silverhowe" whether F. Wagner - the chief engraver of

the company "Bradbury & Wilkinson" and Carter - an employee of the company "Waterloo & Sons".

Interviewing various London acquaintances of Warnerke, Inspector Dinnie came to the conclusion that, in recent times, Warnerke was very actively interested in buying equipment for the "Orlov press", having some meetings and negotiations with several English based firms.

In his report, Inspector Dinnie said:" Based on the results of the investigation, there are good reasons to assume that the "Leon Warnerke" is not the real name of the person imprisoned in Marseille prison.<sup>88)</sup>

On November 14<sup>th</sup>,1899, in the town of Aix-en-Provence, which is not far from Marseille, a trial was held, which found Leon Warnerke guilty of distributing knowingly counterfeit foreign money. The court sentenced Warnerke for two years of probation, and a fine of 100 Francs.<sup>89)</sup> The court explained such a mild punishment by the fact that the defendant had not previously been brought to criminal responsibility and has exceptionally positive characteristics and impressive recommendations.

Convicted Leon Warnerke was obliged to leave the territory of France, which he did on December 2<sup>nd</sup>, 1899, having previously notified the prison authorities that he was going to Switzerland.<sup>90)</sup>

After leaving France the documented traces of Warnerke are vanished.

In mid-October 1900, his wife Maria Warnerke informed the British authorities of her husband's death in Switzerland on October 7<sup>th</sup> of this year.

Not so long later, their daughter Sophia provided to the authorities evidence that "the widow of Leon Warnerke, the owner of a photographic institution" Maria-Josephine Warnerke died on February 14<sup>th</sup>, 1901, from liver cancer, having outlived her husband by 4 months.

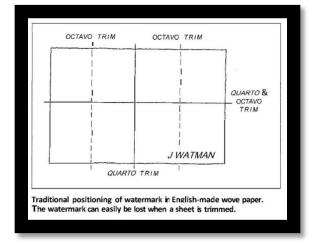
Soon traces of Sofia Warnerke were lost...

<sup>88</sup> The National Archives, Kew, UK. FO 27 3529 082.

<sup>89</sup> Archives departementales des Bouchées-du-Rhone, 2U2/66.

<sup>&</sup>lt;sup>90</sup>Archives departementales des Bouchées-du-Rhone, 2Y/255.

#### **End Notes**

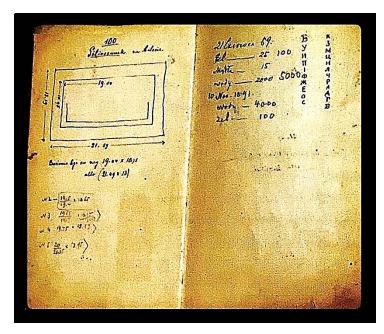


#### Note to the page 20

Many of these were printed on English-made paper watermarked "J WHATMAN"

#### Fig.21:

Traditional positioning of watermark in English-made wove paper. The watermark can easily be lost when a sheet trimmed. Courtesy of Peter Bower.



#### Note to the page 23

Warnerke was well aware, however, that all paper shrinks as it dries, and when he constructed the watermark on the mold surface he had to take this shrinkage into account.

Fig.22: Courtesy of Paramonov-Kuznetzov.

#### Note to the page 31

All these procedures for verification were top secret and were never disclosed.

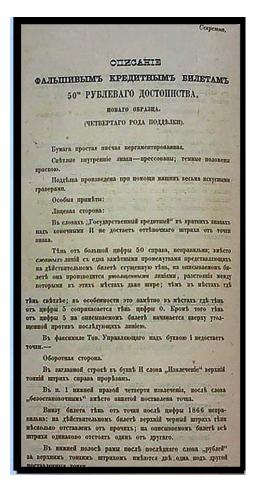


Fig.23: Courtesy of Paramonov-Kuznetzov

Top Secret

DESCRIPTION of
FORGED CREDIT NOTES
50 Rubles
NEW DESIGN
(4th Type of forgery)

#### Note to the page 32





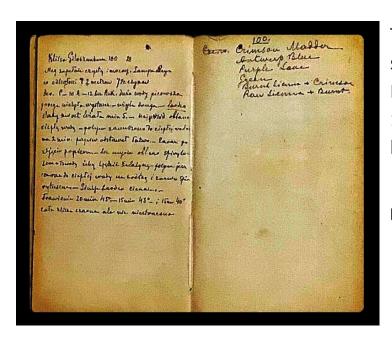
The crown of Leon Warnerke's activity, as a counterfeiter, was to be the largest denomination of Russian paper banknotes - 100 Rubles 1866.

Fig. 24: On a left – Cliché impressions on paper. Courtesy of Paramonov-Kuznetzov.

Fig. 25: On a right - Matrix for making cliché portrait and vignette with figures of denomination for 100 Rubles 1866, made of special plastic mass. Courtesy of Paramonov-Kuznetzov.

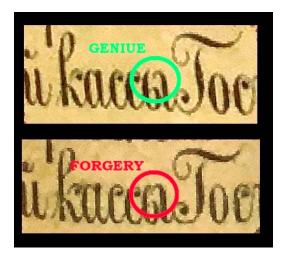
The fragments of Fig.24 and 25 are used in the design of the cover of the book.

## Notes to the page 33



The colors on the sheet illustrated bear such maker's names as J. Winston Bronze 1893, Millar Blue, and Stanbury 1893, but most of the colors are simply labelled with their names.

Fig. 26: Courtesy of Paramonov-Kuznetzov



The most noticeable among them is the uneven engraving of the right line of the letter "ы" in the word "кассы".

Fig. 27: Courtesy of Paramonov-Kuznetzov

# Note to the page 34



"Orlov print" – is a method of multi-color printing from a single cliché, invented in 1890 by Ivan Orlov.

Fig. 28: Ivan Orlov

- <sup>1</sup> *Muravyov-Vilensky, Mikhail Nikolaevich* (October 1, 1796 August 31, 1866). He became famous for the decisive suppression of the Polish uprisings in the North-Western Territory, primarily the uprising of 1863. Thanks to a number of deep and systemic transformations, he put an end to the Polish-Catholic domination in the social, socio-economic, and cultural-educational sphere over the Belarusian Orthodox peasant population of the region. Chevalier of a number of orders and the highest award of the Russian Empire the Order of St. Andrew the First-Called.
- ii In 1827 the Corps of Gendarmes was formed (since 1836, the Separate Corps), which became the executive body of the II Branch of his Highness Imperator Greatness Own Chancellery. The Corps was directly subordinate to the chief of the Third Department as chief of gendarmes. The gendarmerie conducted investigations in cases of state crimes, provided custom control at the borders, supervised the railways.
- iii Eder, J.M. 1945. History of Photography, trans. Edward Epstein. New York: Columbia University Press. 452: In 1871 a wealthy young man, with his wife and young daughter, arrived in London from Paris and settled in south-east London. Over the years he established himself as a very successful businessman and inventor dealing with the technology of photography. He won numerous prizes and awards as well as the respect of his peers. Although based for most of the latter part of his life in a large, imposing house on Champion Hill, his business and photographic interests led him to travel constantly throughout Europe.
- <sup>iv</sup> The Photographic Journal, Oct. 9, 1877, p8 #369, Truing a new Lens (Emulsion, Negative, Dallmeyer's Triplet) Leon Warnerke, p9. #414, Photo. Engraving (impression from letter-press block, produced after a steel plate engraving) Leon Warnerke, p9. #419, Collodion Emulsion for Studio Cabinet Work (Two Cabinet Negatives) Leon Warnerke, p12. #512 Scene in a Garden (Negatives Taken on Warnerke's Sensitive Negative Tissue, Dallmeyer's Triplet) Leon Warnerke; The Photographic Journal Oct. 3, 1879, p10 #383; Inhabitants of Armenia and Incidents of the War 1877-78 (Taken by Nikitin, Tiflis) Leon Warnerke p.10 #385, Scene of Armenia. Inhibited by Leon Warnerke, the Photographic Journal Oct. 4, 1884, p15 #628-629
- Valter Woodbury (1834-85) was a well-travelled and inventive man. During his younger years he lived in both Australia and Java before returning to his birthplace, England, in 1863. Between 1866 and his death 19 years later he took out over 20 patents for photomechanical printing processes and for photographic and allied apparatus. He died suddenly at Margate in 1885 from the effects of an overdose of laudanum. Examples of his work can be seen in Bower, P. 1994. Walter Woodbury and the photo-filigrane process. The Quarterly, Journal of the British Association of Paper Historians 12 (September): 10-12
- vi ЕФОД. П.1r-1919/1. The case consists of 29 sheets of handwritten text, as well as drawings and photographs relating to the period from 1895 to 1899. However, from the inventory of 1682 of the RGIA (РГИА) (where it was located from 1928 until the return to Goznak under the name "Various correspondence and acts of examination of fake credit notes of the 100-r[uble] d[enonimation] sample of 1866 of the 2nd kind of the forgery, as well as secreted of supervision of Warnerke in London") it follows that the initial volume of the case was much larger 124 l. (See: RGIA. Inventory of the fund 1682. p. 2. No 35). We do not know the whereabouts of the missing case file.
- vii Walter Dinnie(1850-1923), a famous English police officer, an employee of the CID-office (Criminal Investigation Department), who revealed a number of high-profile crimes of the time. In 1903, the New Zealand government invited him to the post of commissioner of police. Dinnie left Scotland Yard with an honorary pension. Until 1914 he served in the New Zealand Police, after which he engaged in private detective work.

100

What one man can make, another can copy; where one man can copy, another can tell a copy was made. This story is all about 35-year career of a late-nineteenth-century master forger Leon Warnerke, who may be the greatest banknote counterfeite ever.

In 1991 an extraordinary collection, consisting of banknotes, printing trial, watermarks, papermaking moulds, letters, receipts, a memorandum book, and ink trials, was find in London during the demolition of old house.

Our story covers the physical investigation of these subjects by Peter Bower. The interpretation of those findings and uncovering the real name of Leon Warnerke made by Paramonov-Kuznetzov, Furthermore, it include the resent developments made by A. Balachenkova who established connection between Warnerke and EZGB. As well as facts regarding Leon Warnerke biography written by photography historian Josef Maria Eder.

The fragments of Fig.6 from page 19; Fig.8 from page 23 and Fig.24 and 25 from page 46 are used in the design of the cover of the book.

Courtesy of Paramonov-Kuznetzov.