

The Importance of Correspondence in Studying the Activities of the Nineteenth-Century Researchers Expedition of Stephen Sommier and Emile Levier to the Caucasus

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Abstract The archives of Stephen Sommier and Emile Levier, two Florentine scientists are preserved at the University of Florence Botanical Library archive fund. The archives are comprised of manuscripts and correspondence of the two scientists. Stephen Sommier and Emile Levier travelled to Georgia in 1890 to conduct anthropological researches and to collect and study rare plants. Although a number of articles and books designated for academic circles and a broad circle of readers were published in subsequent years, historians still have not studied their expedition. Correspondence of Sommier and Levier preserved at the Botanical Library has turned out to be a significant resource and example for studying the methodology the nineteenth-century scientists used for long-distance trips.

Keywords Sommier. Levier. Correspondence. Caucasus. Expedition. Botany. Anthropology. Publication. Photos. Engravings.

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Edizioni
Ca' Foscari

Eurasiatica 18

e-ISSN 2610-9433 | ISSN 2610-8879

ISBN [ebook] 978-88-6969-550-6 | ISBN [print] 978-88-6969-551-3

Peer review | Open access

Submitted 2021-03-08 | Accepted 2021-05-14 | Published 2021-12-21

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DOI 10.30687/978-88-6969-550-6/004

1 Introduction

In 1890, two Florentine botanists – Stephen Sommier and Emile Levier – travelled to the Caucasus for a botanical and anthropological expedition. They first travelled around Georgia to collect plants, before heading to the North Caucasus. This journey of the two scientists is among scientific expeditions that are currently not well known and have not been studied. The aim of the present article is to study and analyse personal correspondence of Sommier and Levier and to demonstrate the important and rich information that can be derived from personal correspondence in the course of the study of the nineteenth-century scientific expeditions.

1.1 Stephen Sommier and Emile Levier

A famous anthropologist and botanist Stephen Sommier (1848-1922) was born in Florence, in a family of French parents; he acquired Italian citizenship at the age of 21. Sommier got interested in geography and anthropology since his early years. He collected botanical specimens first in Italy, and next, in various regions of Europe and Asia. Out of Sommier's numerous scientific expeditions we would like to highlight here only his 1887 travel to the Russian Empire, when he represented the Italian Society of Anthropology and Ethnology at the exhibition in Ekaterinburg (Chiozzi 2014). This was when Sommier first came to the Caucasus and in October of the same year he collected botanical specimens in the environs of Baku and Tiflis (Sommier, Levier 1900, VI). Throughout his life, Sommier enriched herbariums of a lot of museums and scientific establishments with his collections, while after his death, in 1922, all of his collections were transferred to the Florence Botanical Museum.¹ His scientific legacy comprises up to 170 publications about botany, geography and anthropology (Biagioli 2006, 3). Sommier was one of the founders of the Italian Society of Botanists and its head for 8 years. Emile Levier (1838-1911), Florentine physician and botanist, was a member of the same Society; in addition to working relationship, he was on friendly terms with Sommier. Emile Levier was born in a Swiss city of Bern, got medical education at the Bern University, and settled in Florence from 1865, where he continued medical activities. He also worked as a physician at Bormio Sanatorium, Bagni di Bormio, in Valtellina. Levier developed interested towards botany since early childhood. After moving to Florence, he first got interested in local flora and started making collections and next, his scope of interest gradual-

¹ Global Plants. <https://plants.jstor.org/stable/10.5555/al.ap.person.bm000336276>.

ly increased to the entire Italy and later, Europe. Levier collected a herbarium comprising 47,000 varieties.² After Levier's death, Levier's spouse donated a part of this herbarium to the Florence Botanical Museum in 1912; the remaining part also found its place in the same museum in three years (Biagioli 2005, 3).

1.2 Expedition's Route

On May 28, 1890, Stephen Sommier and Emile Levier took a ship from Livorno to Batumi. They were accompanied by Tuscan farmer Constantino Vannucchi, alias Gosto, who helped the scientists with collecting and drying the plants and also served as a hunter and a cook. On June 15 they were already in Batumi.³ The expedition in the Caucasus went on until September 30. From June 15 to July 1 they visited Batumi and Adjara; on July 2 they stopped in Kutaisi; from July 2 to 14 - in Tiflis; July 14-15 - visit to Borjomi; from July 16 to 23, they were in Kutaisi and were preparing to travel to Svaneti. Over the next 1 month they visited Svaneti; On August 23 they went to Abkhazia from Svaneti and after moving down to the River Saken gorge and crossing the River Klich, on August 30, they went to the North Caucasus via the Kluchor pass. After crossing the Teberda pass on September 2, the travellers took the course towards the east and on September 10 they went to Elbrus from the north-western slope up to about 3,700-3,800 meters above the sea level. On September 16 they arrived in Batalpashinsk,⁴ and on September 18 they travelled from the Nevinomyssk railway station on a train towards Vladikavkaz. The travellers returned to Tbilisi from Vladikavkaz via Georgia's military road on September 23. On September 26 they went to Kutaisi and on September 29 they were already in Batumi, to board the ship Olga bound for Odessa. The travellers were first accompanied by four (in Svaneti), then seven (in Abkhazia and North Caucasus) local guides during the expedition, each of them leading a pack animal. The expedition started from lower Rioni and continued to the Kubani gorge, at 15, 20 or the longest - 30 kilometres stages - in a location they stopped only for a day, rarely for several days (Sommier, Levier 1900, V).

² Global Plants. <https://plants.jstor.org/stable/10.5555/al.ap.person.bm000004973>.

³ Fondi archivistici della Biblioteca di Botanica dell'Università degli Studi di Firenze (henceforth BUSF-FA). Archivio Sommier. Emile Levier's letters. 1891-08-11. Manuscript of a route written by Levier titled *Résumé statistique etc. de notre voyage au Caucase 1890*.

⁴ Now Karachay-Cherkess Republic, Russia, capital Cherkessk.



Figure 1 S. Sommier and E. Levier’s travel to the Caucasus – route from June 15 to September 30, 1890. The map is enclosed in the book E. Levier, *A travers le Caucase. Notes et impressions d’un botaniste*, Neuchâtel, 1894. The route has been highlighted in red by the author of the article for easier visual perception

1.3 The Results of the Expedition: Herbariums and Publications

The Caucasus expedition conducted by Sommier and Levier had significant results in botany: during their journey the scientists collected 1,627 plant varieties (Sommier, Levier 1900, VII). After returning to Italy, they sent the seeds from the expedition to four different botanical gardens and nurseries, for propagation, for studying all phases of the development of the plants and better describing them. Newly discovered varieties by Sommier and Levier are well known to modern botanists, while from among the ones familiar to wide public we will mention *Heracleum mantegazzianum* only, now also known as giant hogweed. Sommier and Levier saw this plant for the first time on August 26, in Abkhazia, in the River Klich gorge, at 1,700-1,800 meters above the sea level. Upon return to Florence, they sent its seeds to Henry Correvon,⁵ for reproduction. After waiting for four years, the plant attained its gargantuan dimensions and bloomed. Giant hogweed easily adapted to the European climate and this was the period from which its broad dissemination in Europe started: owing to Henry Correvon, it was first disseminated through the network of horticulturists and botanists in the Western Europe as an ornamental plant and this has later resulted in its spread in nature (Perrier 2001, 11). According to contemporary researches, such wide and uncontrolled spread of giant hogweed in Western European countries has negative impact on biodiversity and environment, as well as human health and even tourism, due to its toxicity (Heracleum 2009). It is worthy of mention that upon the entry to Europe, giant hogweed has occupied a special place in Art Nouveau. It is said that the French artist Luis Guignot (1864-1948) was gifted a small pouch filled with giant hogweed seeds at his wedding; and later, owing to the very Guignot, the shape of this flower, as a decorative element, has been established in the Art Nouveau School of Nancy (Nancy 1989, 274).

This expedition was followed by several important publications. The first one was published in the Swiss collection of literary works *Bibliothèque universelle et Revue suisse*. This was a series of Levier's letters where he described his travel to the Caucasus together with Sommier and which were published in this magazine during 1890-94. Georgian publishing house was instantaneously interested in these letters by Levier: Georgian translation was published in several issues (Emil 1894) of the Tiflis magazine *Moambe* throughout 1894. Although, this translation was published in an abridged version; only the letters that described the travel to Georgia were translated. Georgian translation was performed by two translators and on-

⁵ Henry Correvon (1854-1939) - a Swiss botanist, owner of an alpine botanical garden in Chêne-Bourg, near Geneva.

ly their initials were included: *N.J.* and *K.B-dze*. It is known that *N.J.* was the pseudonym (Jordania 1920, 1) of Noe Jordania (1868-1953), Chairman of the Government of the Democratic Republic of Georgia. Unfortunately, little is known about Konstantine Bakradze (Kartuli 1965, 580), the other translator, except that he was a member of the Society for the Spreading of Literacy among Georgians.

In 1894, Swiss publishing house Attinger Frères published a book authored again by Levier - *A travers le Caucase*; the book is based on the letters published earlier, although the style of narration is changed. The book contains photo illustrations by Stephan Sommier, Dimitri Ermakov (1846-1916), a famous Russian photographer working in Tiflis, and Vittorio Sella (1859-1953), famous Italian photographer; as well as engraving made from these photos.

It took 10 years to fully publish the results of the botanical researches and this work, *Enumeratio plantarum anno 1890 in Caucaso lectarum*, under joint authorship of both scientists, was published in 1900. It represents a comprehensive description of the plants collected and studied by the scientists during their travel to Georgia. In addition to the publications listed here, the authors also published numerous articles about the results of botanical and anthropological studies conducted in the Caucasus. Despite a sizeable number of publications, historians still have not studied this expedition of Sommier and Levier.

2 Studying the Correspondence

The present research is based on the unpublished archives of Stephan Sommier and Emile Levier preserved at the University of Florence Botanical Library Archive Fund.⁶ Archivist Beatrice Biagioli conducted the inventory of these archives in 2005 and 2006. Stephan Sommier's archive is comprised of two parts: correspondence and manuscripts, they contain Sommier's notes and outlines of articles. Correspondence distributed in 16 boxes is made up of over 10,000 items - letters and postcards received from over 500 individuals. Like Levier's correspondence, here, too, letters are often from widely known European botanists and naturalists. Emile Levier's archive is also made up of correspondence and manuscripts. The correspondence is distributed in 22 boxes comprised of about 3,500 items - letters and postcards from over 500 individuals. Some of the manuscripts are Levier's preparatory notes for various articles and books, as well as his work-books with the description of various plants. In the case of both archive funds, it is unclear how they

6 Fondi archivistici della Biblioteca di Botanica dell'Università degli Studi di Firenze.

were introduced in the library. Perhaps, after the death of the owners, their descendants handed these archives over to the Botanical Museum, along with the herbariums; and later, the archives were moved to the Botanical library (Biagioli 2005, 2006).

We have studied Levier's and Sommier's correspondence - several hundreds of letters and postcards written in French, English, Italian, German and Russian languages. This is predominantly correspondence with famous botanists, anthropologists, historians, scientists and photographers, as well as publishing houses - everything that might contain information about their travel to the Caucasus. Contrary to our great hope, we were unable to discover travel diaries in this archive.⁷ Nevertheless, correspondence has been a valuable source of information. In this archive we have also found letters Sommier and Levier wrote to each other; they offer a complete picture of Sommier and Levier's cooperation and friendship. Moreover, along with the correspondence from Sommier to Levier, in the same box we found letters and postcards sent by Sommier from the Caucasus to his sister. These items have revealed further details about the expedition to the Caucasus. It is unclear why these letters are preserved in Levier's archive and how they got there. We can only presume that Levier borrowed these letters from Sommier in the process of writing a book, to be able to specify various information.

As a result of the study of correspondence preserved at the Botanical Library we have discovered significant material that has enabled us to reconstruct a full picture of the expedition in the Caucasus and numerous related details that were absent from the publications of these two authors. These matters were: preparation of the expedition prior to starting the travel, difficulties related to the travel in the destination area, working on herbariums after return to Italy and cooperation with botanical gardens, exchange of the specimens of plants with colleagues, publishing works about the expedition, cooperation with publishing houses, etc. Overall, this is the richest archive material complete publication of which is beyond the format of the present article, hence, we have decided to limit ourselves with the matters presented below.

⁷ We have also attempted to find Emile Levier's descendants, hoping to find diaries from the travel to the Caucasus in the family archive; yet, this search has proven to be futile. Unfortunately, Levier's house in Florence in which he lived and where he died, and which was located at 16 via Jacopo da Diacceto no longer exists; there is a hotel building at 14 and 16 via Jacopo da Diacceto.

3 Preparation of the Expedition Based on the Correspondence

Scientists always prepared respectively prior to starting a long-distance expedition – they read relevant scientific literature about the selected geographical destination, planned the route, made arrangements for travel related financial matters and official documents. Although, we are often unaware of such information about planning expeditions, since they were not reflected in official reports and publications. Hence, for the study of this matter, the study of correspondence of Sommier and Levier preserved at the Botanical Library is especially important.

3.1 Eugène Autran's Letters

Since first publications after the travel to the Caucasus were authored by Levier, originally we presumed that this scientific expedition was conducted at Levier's initiative, although correspondence preserved in Florence has revealed an entirely different picture. It can be ascertained based on the study of the letters preserved in this archive fund that Sommier was preparing for the expedition in the Caucasus back in 1889. In this respect, the letters from Eugène Autran (1855-1912), Swiss botanist, to Sommier are especially important. It can be seen in these letters that Sommier had approached Autran for his assistance in locating relevant scientific literature about the Caucasus and designing a route for the journey. It is not surprising that Sommier approaches Eugène Autran for advice. Autran was then working at Herbarium Boissier – a veritable private botanical conservatory. This was near Geneva, a well-known herbarium *Flora Orientalis* in Chambésy that was developed by a famed Swiss botanist, Edmond Boissier (1810-1885); this herbarium included Caucasian flora, along with that of other countries. From the scientific library, Autran especially recommended⁸ two books to Sommier: *Souvenirs et correspondance du prince Émile de Sayn-Wittgenstein-Berlebourg* and Edmond Boissier and Friedrich Alexander Buhse's work *Aufzählung der auf einer Reise durch Transkaukasien und Persien gesammelten Pflanzen*. As for the travel to the Caucasus, Autran advises two routes. Firstly, he suggests to study the areas located from Poti to Kerch strait, i.e., eastern coast of the Black Sea. In Autran's view, studying the region that has not been studied from botanical perspective is a pressing cause, before Germans and Austrians do it and he suggests to prepare better and postpone the expedition for the following year, i.e., for 1890. For better preparation, he recommends to

⁸ BUSF-FA. Archivio Sommier. Eugène Autran's letters. 1889-02-27. 1889-03-27. 1889-05-13.

first contact Gustav Radde, who would help Sommier to obtain in advance all necessary permissions from the Caucasus governor. The second region, which, in Autran's view, would also be interesting to study, is *Arménie turque*; though, in his view, travel to that region during that period was regarded extremely dangerous. If the expedition ended successfully, Autran promised Sommier that he would help with the identification of the plants collected in the Caucasus and brought to Europe.

3.2 Gustav Radde's Recommendations

Gustav Radde (1831-1903), originally from Germany, in the service of the Russian Empire, was a well-known naturalist, geographer and traveller. Radde had lived in Tiflis since 1863 and was a director of the Caucasus Museum and Tiflis Public Library. He had toured and researched the Caucasus, had developed a sizeable zoological, botanical and ethnographic collection and penned numerous scientific papers. Hence, naturally, every foreign researcher consulted with him as part of their expeditions. That is why Eugène Autran suggests Sommier to contact Radde.

As can be seen from the correspondence, at this time Sommier already knew Gustav Radde – the first letter sent by Radde to Sommier is dated January 2/14, 1888. They possibly met during Sommier's 1887 travel to the Caucasus. At the time of receiving Autran's letter, where the author advises Sommier to contact Radde, Sommier had already received an answer from Radde, where he shares his recommendations with Sommier. In this respect, Radde's letters to Sommier sent during 1889 are particularly interesting. These three letters contain numerous practical details and necessary recommendations – Radde gets into details around all those issues that might be significant for the travel to the Caucasus for a botanist. Thus, it unfolds an interesting and a fairly complete picture about the way the scientists were preparing for the expedition.

Regarding the selection of the date, Radde writes that it is inconvenient to make an expedition in the Caucasus mountains before mid-July, and perhaps, this is the reason why he advises Sommier to postpone the expedition until 1890.⁹ Radde himself was planning to travel to Karabakh in Spring, 1890 and invites Sommier to his expedition.¹⁰ Although, in the next letter,¹¹ he recommends another route as well: arrival to Novorossiysk, hiring horses and a guide there, next, going to Abkhazia and visiting Sokhumi coast, lowland and ad-

⁹ BUSF-FA. Archivio Sommier. Gustav Radde's letters. 1889-05-03/15.

¹⁰ BUSF-FA. Archivio Sommier. Gustav Radde's letters. 1889-06-18.

¹¹ BUSF-FA. Archivio Sommier. Gustav Radde's letters. 1889-12-22/1890-01-03.

jaçant mountains. In Radde's view, it would be particularly interesting to also visit the Kodori gorge, since no one had collected plants in this alpine zone before. Next, Sommier would be able to take a ship to Batumi from Sokhumi, and study the flora of Batumi and nearby areas during 14 days.

Radde's letter contains numerous details: he warns Sommier about local weather, indicating that during the season there are frequent rains and advises him to take a tent. As for Radde himself, he never carried a tent with him during expeditions, he mainly slept in open air or near villages, within a short distance from settlements, he found shelter in small mills located on small tributaries. A dry overnight shelter during rain can also be organized under big trees - writes Radde to Sommier, and advises - to keep a felt coat and a saddle and a pillow that costs 10-12 Rubles in Tiflis and if necessary, it can be used as a regular pillow at night. He also advises Sommier to hire a local guide by all means; otherwise, foreigners would not be able to hike the glaciers alone. Radde recommends to consider 10 Rubles a day for expenses, from where 1 Ruble would be estimated for hiring a horse. It was particularly important for botanists to take relevant paper for drying and packaging plants collected during the expedition - such paper, according to Radde, could be bought for 4-6 Rubles in Tiflis. One could also buy boxes for packaging, felt coats, saddles and also get necessary letters of recommendation in Tiflis. Since it was effectively impossible to organize these matters in Sokhumi, in this same letter Radde revises the suggested route and advises Sommier to start travel from Batumi and to go to Tiflis next, to take care of the remaining organizational matters. He also advises Sommier to have a letter from the Foreign Ministry of Italy. In response to Sommier's question about having a gun during the expedition, Radde answers that he rarely carried along a gun and had never had to use it to defend himself. Radde recommends that if European travellers were to travel with a gun, a special permission from the Government received based on the sealed certificate issued by the Consular Office would be required; which would provide the justification for carrying a gun during travel. This letter of Radde is significant especially since Sommier and Levier considered all his recommendations. They planned the route as Radde had advised; and, during their stay in Batumi, too, according to Radde's advice, they stayed at Hôtel de France.

3.3 Sommier and Levier's Correspondence

From the perspective of the preparation of the expedition, correspondence between Sommier and Levier is especially interesting. These letters reveal an emotional context prior to the travel, which cannot be seen in any other letter or publication; they also unveil

business details on which these two researchers had agreed in advance. Before arranging for all necessary details for the travel and determining a specific route, Sommier decided to offer companionship to Levier:

Mon cher Emile, Verba volant - scripta manent. [...] je viens te faire une proposition formelle. Si tu acceptes, je renonce définitivement au Caucase pour cet été, et je remets la chose au printemps prochain. Je propose donc : que tu viennes avec moi à l'époque indiquée par Radde, et que tu restes avec moi jusqu'à entière exécution du programme - c'est-à-dire jusqu'en automne. Je me charge de tous les frais depuis le jour de départ jusqu'au jour du retour, bien que des frais de préparatifs généraux. Les collections botaniques seront propriété commune, c'est-à-dire que nous les diviserons en 2 - les unicas restant à moi. Toutefois tu ne disposerais pas de ta moitié pour la vente; et avant d'en disposer pour échanges il faudrait que je donne mon consentement. La bearbeitung des collections botaniques se fera en commun, ou d'un commun accord sera en partie confiée à des gens de bonne volonté ! C'est moi qui déciderais le mode de publication. Tu mettrais tes yeux à ma disposition pour quelques demi-heures de lecture les soirées loisir - si tant est que nous ayons jamais des loisirs ! Pondères, réfléchis, muris, et réponds moi. Avec toi cela serait une partie de plaisir - seul cela serait une corvée pour moi ! D'ici au printemps prochain nous aurions tant le temps de nous préparer, de manière à faire la chose le mieux possible.¹²

My dear Emile, Verba volant - scripta manent. [...] I have a formal offer for you. If you accept it, I will definitely give up my travel to the Caucasus this summer, and I will put it off until next spring. So I propose that you come with me at the time indicated by Radde, and that you stay with me until the expedition is over - that is, until the autumn. I will take care of all costs from the day of departure until the day of return, as well as general preparation costs. The botanical collections will be co-ownership, that is, we will divide them into two parts - whatever is a single specimen, will remain with me. However, you will not be entitled to sell your part, as for the right to exchange, it should be subject to my consent. Botanical collections will be published jointly, or publishing will be partly entrusted to people of goodwill based on mutual agreement. I would decide how to publish it. You would put your eyes at my disposal for a few half hours of reading on leisure evenings - if we ever have leisure! Weigh, reflect, decide, and answer me. This

¹² BUSF-FA. Archivio Levier. Stephen Sommier's letters. 1889-05-18.

travel will be a pleasing one with you, and a burden without you. We have plenty of time to prepare by next spring.¹³

As can be seen in this letter, Sommier has already decided everything and has even designed the conditions of cooperation. He always admired Levier's diligence and serious approach to business (Sommier 1912), hence, such details provided in the letter are not surprising. Unfortunately, it is unclear where and how did Sommier obtain funding for this expedition. Perhaps he funded it completely, perhaps it was funded by some scientific establishment. Preparing an expedition with own expenses was an accepted practice in the nineteenth-century scientific world. Oftentimes, scientists offered collections brought as a result of such expeditions, herbariums or archaeological and ethnographic collections, to other scientists, scientific laboratories or museums for a certain fee and thus recovered funds spent for organizing an expedition. Delighted Levier answers the very next day:

Mon cher Stéphen, Je croyais, avant Boissier, qu'il n'y avait pas de châteaux en Espagne qui se réalisaient. Il paraît qu'il y a aussi des châteaux en Circassie qui se réalisent. Je suis extrêmement touché de ton offre généreuse, et je suis aussi ravi qu'il y a 11 ans, quand j'eus l'invitation d'E. Boissier. C'est assez te dire qu'en mon fort intérieur j'ai déjà accepté. Reste à pondérer et à mûrir le détail. De ceci, nous en causerons de vive voix. [...] Je viendrai aujourd'hui même te remercier encore en personne.¹⁴

My dear Stéphen, I believed, before Boissier's offer, that it was impossible to build castles in Spain.¹⁵ And now I can see that they can even be built in Circassia.¹⁶ I am extremely touched by your generous offer, and I am as thrilled as I was 11 years ago, when I got the invitation from E. Boissier. It is enough to tell you that deep down I have already accepted. It remains to weigh and specify the details. We will talk about this in person. [...] I will come today to thank you in person.

¹³ Unless otherwise specified, the translations are from the Author.

¹⁴ BUSF-FA. Archivio Sommier. Emile Levier's letters. 1889-05-19.

¹⁵ Building a castle in Spain – a French idiomatic expression for an unrealistic dream.

¹⁶ Here, with the play of words, Levier wants to convey that he is as happy with the offer to travel to the Caucasus as in case of a scientific expedition with Boissier.

4 Publishing Activities

Another significant issue that is vivid from the mentioned correspondence is the difficulties that emerged in the course of the publication of travel and scientific literature. Letters received from publishing houses, as well as correspondence between Levier and Sommier, shows content related and technical problems that might be associated with the process of working on a book at the end of the nineteenth century.

4.1 Publication of Photos and Prints

In 1892 Levier received an offer from the publishing house Attinger Frères about publishing a book.¹⁷ Unlike the letters published in the Swiss collection of literary works earlier, the book was to include numerous illustrations. A decision was made to publish photos taken by Sommier during the travel in the Caucasus; as well as to add several photos by Vittorio Sella and Dimitry Ermakov. In those times, it was quite expensive to publish books with photo illustrations; hence, publishing houses often used engravings from photos, instead of photos, to minimize costs. In this case, too, in addition to photo types, engravings were included in the book. Letters sent by the publishing house to Levier offer numerous interesting details about technical difficulties involved in the publishing of such illustrated book in the nineteenth century. Mainly portraits and ethnographic scenes were selected for engravings. Attinger, owner of the publishing house, considered it unadvisable to use the photos with only scenery for engravings: it was hard to make various intertwined plants. For making engravings from photos, painting was to be made using black ink first, and engraving would be produced using a zincography technique. Not all artists were capable of making such paintings, this technique had its special and strict rules and it required relevant knowledge and experience. After selecting several candidates and rejecting paintings, the publishing house suggested to Levier the candidature of a Swiss artist, Fritz Edouard Huguenin-Lassauguette (1842-1926). Levier was amazed by graphical paintings by this artist and wrote to Sommier that he loved the paintings of both sceneries and portraits.¹⁸

As for Sommier's photo collection, it could not be found in the Botanical library archive fund; Photos taken by Sommier in 1890 during his travel in the Caucasus are preserved at the Florence University

¹⁷ BUSF-FA. Archivio Levier. Attinger Frères's letters. 1892-07-24. BUSF-FA. Archivio Sommier. Emile Levier's letters. 1892-08-02.

¹⁸ BUSF-FA. Archivio Sommier. Emile Levier's letters. 1894-08-01.

Museum of Anthropology and Ethnography.¹⁹ Unfortunately, it is unclear how this collection was introduced in this museum. There are a total of 78 photos in this photo collection, of these, only 1 shot is repeated twice. These are panoramas pictured during travel, portraits and group photos, that are printed on Albumen print, also called albumen silver print, and is affixed to cardboard. 34 photos are taken in Georgia, remaining ones – in the North Caucasus. In some cases, photos have captions inscribed with a pencil on the reverse side. These could be the captions made in the nineteenth century. Almost all photos are numbered on the reverse side although the numbering is mixed and ultimately the numbering is considerably higher than the number of photos. This allows us to presume that Sommier had taken much more photos during this expedition and the items preserved in the museum represent only one part of the entire collection. In the book published by Levier in 1894, 47 photos are included from the mentioned photo collection: of these, 39 are in the form of engravings, and 8 as phototypes. Out of the engravings entered in the book only a relevant photo (*Boys from Alpana*) is not preserved in the museum.

We have no information about a photo camera Sommier used. Levier writes that during travel Sommier used a glass plate negative photo camera (Levier 1894, 73). Letters sent by Attinger to Levier suggest that Sommier was using a photo camera with a film.²⁰ Unfortunately, currently we do not have more information about this topic. Possibly, Sommier used two photo cameras, one with glass plate negative and another one – with a film; we have similar examples during the travel of such famous French photographers in Georgia as Hugues Krafft (Cheishvili 2017) and Paul Nadar (Bernard, Malécot 2007).

4.2 The Difficulties with Transliteration

When working on Caucasian toponyms, it is necessary to underscore the difficulty related to their transliteration. For European authors it was hard to transfer those letters to the Latin alphabet that are only specific to Georgian language. It is vivid in the correspondence between Levier and Sommier how Levier tries to compare the spelling in the works of earlier scientists (Viktor Ferdinand Brotherus, Edmond Boissier) to find the best solution:

Pour l'orthographe : Achalzich, Abkasia, etc. je me suis réglé d'après la Bryologica Caucasica de Brotherus, qui donne la plupart

¹⁹ Museo di Storia Naturale, Antropologia e Etnologia dell'Università degli Studi di Firenze. Inventory nos.: N 35822-99.

²⁰ BUSF-FA. Archivio Levier. Attinger Frères's letters. 1893-02-03. 1894-01-17.

de ces noms écrits ainsi. C'est un écrit académique ; donc il a dû adopter l'orthographe usitée en Russie, et qu'on nous corrigerait probablement, si nous la changions.

Danais Par-aul ! Tu as parfaitement raison, cela vient d'aoul, donc, un seul mot. En latin, il n'y a pas de danger qu'on prononce parôl, comme en français par ex. Ainsi, mettons : Danais Paraul.

Adjaria, adopté : Brotherus écrit aussi ainsi. Abolissons cet affreuse Adscharia, que j'ai, je crois, prise dans Boissier.

Borschom. Brotherus écrit avec sch. Ce n'est pas conséquent, mais il écrit également Radscha. Si nous mettions Borshom ? Alors il faudrait Adsharia ! Au diable ces sacrés consonnes que les Latins ne connaissaient pas et qu'il faut écrire en Latin. Le plus simple, après tout, c'est de suivre l'orthographe de Brotherus, qui, au fond, n'est pas du tout latine pour Adjaria. A Rome, on aurait prononcé cela Adiaria, comme jacet. Ciceron, à coup sûr, n'a pas dû dire giacet, mais ïacet. Cela me ferait presque revenir à l'orthographe de Adscharia, pour ne pas tomber dans les inconséquences. Décide-toi ! Au fond, cela n'est pas capital.²¹

For spelling: Achalzich, Abkasia, etc. I settled on Brotherus' Bryologica Caucasica, which offers such spelling for most of the names. It is an academic writing; hence, the author has used the spelling established in Russia, and that we would probably be corrected, had we changed it.

Danais Par-aul!²² You are absolutely right, it comes from aoul,²³ so just one word. In Latin, there is no danger of pronouncing parôl, as in French for example. So let's say: Danais Paraul.

Adjaria, comment accepted. Brotherus also writes thus. Let us get rid of this dreadful Adscharia, which I believe I got from Boissier. Borschom. Brotherus writes with sch. It's not consistent, but he also writes Radscha. What if we use Borshom? Then we would have to write Adsharia! To hell with those consonants that they do not have in Latin and that must be written in Latin. The easiest, after all, is to follow the spelling of Brotherus, which, after all, is not at all Latin for Adjaria. In Rome, one would have pronounced that Adiaria, like jacet. Cicero, of course, must not have said giacet, but ïacet. It would almost make me go back to the spelling of Adscharia, so as not to fall into inconsistencies. Make a decision! Basically, this is not essential.

Due to such difficulties, Sommier and Levier developed transliteration themselves, although they did not reject accepted transliteration

²¹ BUSF-FA. Archivio Sommier. Emile Levier's letters. 1892-08-09.

²² Danisparauli - village in Georgia.

²³ Aul - a type of fortified village.

either. Thus, in a book *Enumeratio plantarum anno 1890 in Caucaso lectarum* published in 1900, they decided to bring two different versions of the spelling of toponyms: the first one was already accepted spelling in various languages, while the other one – maximally approximated with the French phonetics.

This may sound unbelievable now, yet, in 1894, the process of printing of a book published by Attinger Frères was delayed due to Georgian toponyms: it was discovered that Levier often used letters î and û, hence, the Publishing House had to additionally order these letters in Paris, resulting in the delay with the performance of planned work by 2-3 weeks.²⁴

4.3 How to Attract Readers

The correspondence also allows us to see the methods publishers used for attracting readers. In the introduction to the very first letter of Levier printed in the collection of literary works *Bibliothèque universelle et Revue Suisse*, editor said that Levier was sending these letters, in which he described his own impressions and adventure, to his family from the Caucasus; and that the family had sent the letters to the collection of literary works and that the management thought it interesting to publish them (Levier 1890, 105-6). Despite the above-mentioned information from the editor, correspondence between Sommier and Levier shows that actually this was not the case; this was more a marketing vehicle used by the publisher rather than the truth. The first couple of letters were indeed written during travel, yet, majority of the letters were written after the return of Sommier and Levier to Italy. Levier wrote text, although Sommier was also actively involved in designing this text and including his opinion and comments; i.e., as envisaged under the above-mentioned original agreement, all publications were prepared with the engagement and cooperation of both botanists. Levier, who was in the Caucasus, was unable to see and enter corrections prior to printing the text published in October-November, 1890 issue; this explains numerous errors in the text. Disappointed Levier suggests Sommier²⁵ to express his opinion about reading the first published part and if he would be willing, they may not continue and stop publication at this part. Fortunately, they continued and the author offered to French-speaking readers multitude of interesting stories from the life of Georgia and the Caucasus.

Bibliothèque universelle's editor's text is not the only marketing vehicle observed in relation to Levier's work. In a letter to Levier sent in

²⁴ BUSF-FA. Archivio Levier. Attinger Frères's letters. 1894-08-02.

²⁵ BUSF-FA. Archivio Sommier. Emile Levier's letters. 1890-10-18.

September 1895²⁶ Attinger writes that the number of the sold copies of the book is low and he is asking Levier who was good at painting to make colour illustration for a special new year dust cover. In Attinger's view, simple and live illustration with a blue sky, white summits, green spruce trees and red houses would attract more buyers:

Nous dirions presque que plus ce serait banal mieux cela irait. A tort ou à raison nous supposons que le mot de Caucase doit éveiller dans l'esprit de chacun des idées de hautes cimes blanches et de verdure : il faudrait exaspérer cette idée par une illustration simple et vive, dont suivant le cas on pourrait même faire une petite affiche, et qui nous rendrait probablement plus de service pour la vente future que les plus beaux articles du monde.

We would almost say that the more commonplace [the painting] the better. Rightly or wrongly we suppose that the word Caucasus must awaken in the mind of everyone ideas of high white peaks and greenery: this idea would have to be reinforced by a simple and lively illustration, of which, depending on the case, we could even make a small poster. This would probably do us more of a service for future sales than the best papers in the world.

In 1905, against the backdrop of political processes and the revolution in the Russian Empire, Attinger contacted Levier again and although the copies of the books were not fully sold yet, he offered to the author to print run of the book.²⁷ Though, in order to make the book more relevant, Attinger wanted to append a brief social-political overview of the developments in the Caucasus during that period. This would be another way to attract readers. Ultimately, as can be seen from the correspondence, the publishing house rejected this undertaking.²⁸

5 Conclusion

The study of the correspondence preserved at the University of Florence Botanical Library enables us to state with confidence that it is a significant source not only for the research of Sommier and Levier's expedition, but also for the study of the methodology that was used by the nineteenth-century researchers for organizing expeditions in the Caucasus. The study of this archive reveals that researchers

²⁶ BUSF-FA. Archivio Levier. Attinger Frères's letters. 1895-09-19.

²⁷ BUSF-FA. Archivio Levier. Attinger Frères's letters. 1905-07-14.

²⁸ BUSF-FA. Archivio Levier. Attinger Frères's letters. 1905-11-01.

sought scientific and practical guidance from competent scientists prior to launching expeditions: Sommier and Levier fully rely on Gustave Radde's personal experience and advice and design the route based on Radde's advice. This serves as a clear indication of the importance of international cooperation in the course of preparation of distant expeditions. Furthermore, the correspondence shows that Sommier and Levier's roles in the expedition, which, despite their close friendship, had been distributed from the very beginning and the terms of cooperation have been agreed upon; The initial publications were authored by Levier; still, Sommier, as an initiator and organizer of the expedition, is involved in all stages of the publication as per prior agreement and Levier shares full information with him. Thus, these personal letters shed light on all the stages of preparation of the expedition that cannot usually be found in official reports or in publications. This correspondence also shows the emotion, anxiety of a researcher, driven by the possibility of a journey to a region that has not been studied yet. Furthermore, all the information about the publications found in the letters is also interesting. They resonate with modern times: e.g., difficulties related to transliteration are still relevant during the spelling of Georgian toponyms. This is evidenced by the fact that just recently the State Language Department of Georgia has updated the rules of transliteration. It is also interesting to see how the editors try to attract readers' attention. Even now, interest towards old publications increases on the Book Market during every new political tension or conflict in the Caucasus. Furthermore, this correspondence vividly shows the great interest triggered by Levier's book *A travers le Caucase*: multiple letters of gratitude from interested European scientists, researchers and travellers is a testimony that this book became a type of mandatory reading prior to traveling to the Caucasus. Perhaps, it is because this work by Levier contained equally interesting information for scientists as well as for wide circle of readers.

List of Abbreviations

BUSF-FA = Fondi archivistici della Biblioteca di Botanica dell'Università degli Studi di Firenze.

Bibliography

Primary sources

- Fondi archivistici della Biblioteca di Botanica dell'Università degli Studi di Firenze. Archivio Emile Levier.
- Fondi archivistici della Biblioteca di Botanica dell'Università degli Studi di Firenze. Archivio Stephen Sommier.
- Museo di Storia Naturale, Antropologia e Etnologia dell'Università degli Studi di Firenze. Archivi fotografici. Stephen Sommier's collection.
- Emil levies mogzauroba kavkasiaში ემილ ლევიეს მოგზაურობა კავკასიაში (Emile Levier's travel to Caucasus) (1894). *Moambe*, vol. 3, 86-101; vol. 7, 12-44; vol. 9, 79-94; vol. 12, 95-124.
- Levier, E. (1890). "De Livourne à Batoum. Notes et impressions d'un botaniste". *Bibliothèque Universelle et Revue Suisse*, 48, 105-36, 315-58.
- Levier, E. (1894). *A travers le Caucase. Notes et impressions d'un botaniste*. Neuchâtel: Attinger.
- Sommier, S.; Levier, E. (1900). *Enumeratio plantarum anno 1890 in Caucaso lectarum. Additis nonnullis speciebus a claris viris H. Lojka, G. Radde, N. Seidlitz et frat. Brotherus in eadem ditone lectis*. Petropoli: Typ. Imp. akademii nauk. Acta horti Petropolitani 16. <https://doi.org/10.5962/bhl.ti-tl.e.9925>.

Secondary sources

- Bernard, A.-M.; Malécot, C. (2007). *L'odyssée de Paul Nadar au Turkestan, 1890. Photographies de Paul Nadar*. Paris: Monum, éd. du patrimoine.
- Biagioli, B. (2005). *Archivio Emile Levier*. Biblioteca del Dipartimento di Biologia Vegetale Università degli Studi di Firenze. https://www.sba.unifi.it/upload/scienze/inventaripdf/Archivio_Levier.pdf.
- Biagioli, B. (2006). *Archivio Sommier - Corrispondenza*. Biblioteca del Dipartimento di Biologia Vegetale Università degli Studi di Firenze. https://www.sba.unifi.it/upload/scienze/inventaripdf/Corrispondenza_Sommier.pdf.
- Cheishvili, A. (2017). *A la découverte de Bakou. Voyages de Hugues Krafft dans le Caucase/Discovering Baku. Hughues Krafft's journeys to the Caucasus = Exhibition Catalogue* (Reims, 25 November 2017-4 February 2018). Baku: TEAS Press.
- Chiozzi, P. (2014). "L'etnografia fotografica di Stephen Sommier". *Il Museo di Storia Naturale dell'Università degli Studi di Firenze: Le collezioni antropologiche ed etnologiche*, 5, 222-3.
- Heracleum mantegazzianum, Heracleum sosnowskyi and Heracleum persicum* (2009). Bulletin OEPP/EPPO Bulletin 39, 489-99.
- Jordania, N. ჟორდანიანი ნოე (1920). *Tsxulebani თხზულებანი* (Essays), vol. 2. T'pilis: gamotsema kartuli bečdviti amkhanagobisa.
- Kartuligazetebis analit'ikuri bibliografi* ქართული გაზეთების ანალიტიკური ბიბლიოგრაფია. (1965). Vol. 4. Tbilisi: Sabčota sakartvelo.
- Nancy 1900. Rayonnement de l'Art Nouveau* (1989). Thionville: G. Klopp.
- Perrier, C. (2001). "Une belle Caucasienne aux ambitions démesurées. La Berce du Caucase (*Heracleum mantegazzianum* Sommier et Levier, *Apiaceae*)". *GENTIANA*, 10, 11-14.
- Sommier, S. (1912). "Emilio Levier". *Nuovo Giornale Botanico Italiano*, 19(1), 5-12.

