

**Emigration of mathematicians from outside German-speaking academia  
after 1933, supported by the Society for the Protection of Science and  
Learning.**

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## **Emigration of mathematicians from outside German-speaking academia 1933-1963, supported by the Society for the Protection of Science and Learning.<sup>1</sup>**

### **Abstract**

Racial and political persecution of German-speaking scholars from 1933 onwards has already been extensively studied. The archives of the Society for the Protection of Science and Learning (SPSL), which are deposited in the Western Manuscripts Collection at the Bodleian Library in Oxford, is a rich source of information about the emigration also of those scientists who did not come from German-speaking institutions. This is an account of the support given by the SPSL to the persecuted mathematicians among them. The challenges faced by these emigrants included, in addition to anti-Semitism and xenophobia both in their countries of origin and destination, the restricted financial means of the SPSL, and the sometimes arbitrary assessment of academic merits.

### **Zusammenfassung**

Der rassistischen und politischen Verfolgung deutschsprachiger Wissenschaftler nach 1933 wurden bereits umfassende Studien gewidmet. Die Akten der Society for the Protection of Science and Learning (SPSL), die bei der Western Manuscripts Collection der Bodleian Library in Oxford deponiert sind, bieten umfangreiche Informationen zur Emigration auch derjenigen Wissenschaftler, die nicht deutschsprachig sozialisiert waren. Hier soll die Unterstützung der SPSL für verfolgte nicht-deutschsprachige Mathematiker beschrieben werden. Diesen Emigranten standen verschiedene Hindernisse entgegen; insbesondere Antisemitismus und Xenophobie in den Ursprungsländern und auch Empfangsländern, die zeitweilig problematische ökonomische Situation der SPSL, sowie einige Willkürlichkeiten in der Beurteilung akademischer Meriten.

**Keywords:** anti-Semitism, persecution, German-speaking academia, emigration, SPSL.

**Classification codes:** 01A60, 01A70, 01A99.

### **The Academic Assistance Council, later the Society for the Protection of Science and Learning, presently the Council for Assisting Refugee Academics.**

Soon after the Nazi takeover in Germany in 1933, anti-Semitic and other political purging of the civil service was enacted into law<sup>2</sup>. Thousands of academics were affected, and aid organisations were set up in many European countries as well as in the United States to assist refugee scholars. In Britain, the Academic Assistance Council (AAC) was founded in 1933 on the initiative of William Beveridge, then director of the London School of Economics. Nobel laureates Ernest Rutherford and Archibald V. Hill were appointed president and vice-

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<sup>1</sup> I am grateful to CARA, the owner of the SPSL archives, for permission to access them, and to the Bodleian Library for the opportunity to take photographs of them for use in my research.

<sup>2</sup> April 7, 1933: Gesetz zur Wiederherstellung des Berufsbeamtentums.

president, respectively. The AAC was reorganised as the Society for the Protection of Science and Learning (SPSL) in 1936, and in 1997 it was renamed the Council for Assisting Refugee Academics (CARA)<sup>3</sup>.

For general treatments of the history of the AAC and SPSL, see e.g. [Baldwin, 1989; Bentwich, 1953; Beveridge, 1959; Zimmerman, 2006]. Specialised studies focusing on the assistance of the AAC/SPSL to mathematicians in particular are few and far between: two substantial ones are [Fletcher, 1986] with an account of the assistance of the AAC to German mathematicians during the early years 1933-1936; and [Rider, 1984] which treats the emigration of mathematicians and physicists to the United States and Britain 1933-1945. Neither of these contains much information about mathematicians from outside German-speaking academia however, except for a brief outline in [Rider, 1984, 119-122].

The purpose of the AAC was twofold: to create a fund for financial support of displaced scholars; and to act as a placement service, putting academics in touch with institutions. A sizeable fund<sup>4</sup> was the result of a public appeal in the summer of 1933, enabling grants to be awarded to refugees in need. In order to connect displaced scholars with prospective employers, the AAC was in regular contact with established academics in Britain and the United States, requesting their confidential opinions about the scientific merits of each refugee. Some of these were themselves refugees from persecution, for instance Harald Bohr, Richard Courant, Jacques Hadamard and Hermann Weyl. In many cases, refugees first arriving in Britain were later re-established in the United States.

Other frequent referents for mathematics were Selig Brodetsky, Godfrey H. Hardy, John E. Littlewood, Louis J. Mordell, and John Henry C. Whitehead. Of these, Hardy in particular was explicit about the goal of strengthening British mathematics by having the scientifically strongest of the refugees absorbed into British universities. He made it clear that he meant Britain, and not the dominions of the British Empire<sup>5</sup>.

### Scope of the investigation

The category “German-Speaking Mathematician” is circumscribed by Reinhard Siegmund-Schultze in his book on the emigration of mathematicians from Nazi Germany:

“ ‘German-speaking’ as used in this book means more than just fluency in the German language. It is related to the process of socialization of the respective mathematicians. Publications in German alone are definitely not the decisive criterion for calling a mathematician ‘German-speaking’ as German was still the leading language in mathematics at that time.” [Siegmund-Schultze, 2009, 2]

Siegmund-Schultze goes on to point out thematic, political, philosophical, and cultural traits distinguishing various mathematical schools on the European continent:

<sup>3</sup> <http://www.academic-refugees.org/>

<sup>4</sup> SPSL 36, 37, 51/1-2

<sup>5</sup> SPSL 283/6 f332 8 December 1934 Hardy to AAC: “There are several men whom I should wish to recommend very strongly – for example, Heilbronn (perhaps the best of all the mathematical refugees), and Rado. But I should wish to see them here, or at Oxford, and not in Canada or Australia.” (I interpret this as a probable reaction to the Carnegie Fund policy of supporting refugees applying for posts in the dominions of the British Empire.)

*“Firstly*, there is no doubt that the systematic claim of Hilbert’s program of research in the foundations of mathematics, eventually refuted by Kurt Gödel’s first ‘incompleteness theorem’ in 1931, can only be understood against a philosophical background much more neo-Kantian (retaining certain absolutes or a priori in its epistemology) than the philosophy of the Vienna Circle.

*Secondly*, the deficiencies in Germany on several newer mathematical subdisciplines, such as topology, functional analysis, and some parts of mathematical logic, seem to have been conditioned by a certain self-sufficiency and by social hierarchies in Germany and, in particular, by a politically motivated sealing off from Polish mathematics, which was much less typical of mathematicians in Vienna.” [Siegmond-Schultze, 2009, 2-3]

Thus, in [Siegmond-Schultze, 2009] only those mathematicians are considered who were perceived, and perceived themselves, as insiders in German-speaking academia during the time leading up to their persecution.

I am taking the set difference between the mathematicians represented in the SPSL archives and those considered in [Siegmond-Schultze, 2009] as the scope of the present investigation. Of the 95 mathematicians in the SPSL files, 33 are non-German-speaking in this sense. In a few cases, there will be occasion to recall the reasons why a particular mathematician considered here was excluded from consideration in [Siegmond-Schultze, 2009].

The SPSL archive is structured into boxes, with folios numbered sequentially within each box. A single box contains material relating to at least 4 and sometimes as many as 10 different mathematicians in alphabetical order by name, the folios about each one being contiguously numbered. For example, box 278 contains folio numbers 001-450, starting with file 1, Richard Courant, folios 001-040, then file 2, Boris Davison, folios 041-127, and ending with file 8, Werner Fenchel, folios 439-450. In the text below, numbers in parentheses identify box number/ file number, and folios, e.g. (278/6 fol. 303) for box 278, file 6, folio 303. Where box and/or file numbers are clear from context, only folio numbers will be given.

### **Recurrent themes**

Before considering the archival material of each individual mathematician in more detail, let me comment on some common topics which recur frequently in many of these files:

#### ***Anti-Semitism and xenophobia***

Of the 33 refugees considered here, at least 18 were of Jewish descent<sup>6</sup>, and victims of discrimination and persecution in their countries of origin in the 1930s. Some lost their positions when their universities were closed due to nationalistic strife (notably the University of Vilnius and the Czech Universities in Prague and Brno). One was expelled from the USSR because of his British nationality.

Xenophobia was not confined to the countries of origin. One Polish refugee reported being pessimistic about finding employment in Western Europe because he had perceived a strong dislike of foreigners there, especially of East Europeans<sup>7</sup>. One was even faced with the

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<sup>6</sup> Some applicants for support from the SPSL gave no information about descent.

<sup>7</sup> Zygmund to Hardy (286 fol. 372)

skepticism of the SPSL itself on account of his Russian appearance<sup>8</sup>. Racism typical of the period was evident in the way a position at an American college established for the education of African Americans was presented to several refugee scholars, some of whom replied with finesse<sup>9</sup>.

### ***Financial problems of the AAC/SPSL***

Most of the cases considered here date from 1938 onwards, with two dating from the cold war. At the time leading up to the outbreak of the Second World War, the SPSL was financially on a firm footing, and in early 1939, the going rate for a maintenance grant from the SPSL to a single scholar placed in Britain was £182 p.a.<sup>10</sup>. However, in December 1939, the SPSL grants committee had, in spite of several successful recent fundraising events reported in [Zimmerman, 2006, 41-42],

“reluctantly come to the conclusion that all grants which are extended beyond their present date of expiry will have to be considerably reduced in the rate of payment, and that in most cases it will not be possible to continue the grant at all”<sup>11</sup>.

Several of the refugees who had come to Britain with the assistance of the SPSL were interned as enemy aliens due to government orders issued in May and June of 1940. Two of those considered here were affected: Beniamino Segre (SPSL 285/1) and Paul Weiss (SPSL 286/2). Segre held a grant from the SPSL at the time. The Society initially took the position that the payment of grants should be discontinued during internment, and that responsibility for the families of interned scholars be shifted to the authorities. In Segre’s case, the SPSL grant was restored to his family in late July, and he was released from internment in the middle of August.

### ***Support based on academic eminence***

The AAC/SPSL was never a general emergency relief organization, and always operated specifically as an academic placement service, seeking to re-establish its applicants in academic life in the UK or elsewhere. On initial contact, refugees were made to complete a questionnaire with details of their academic merits, and the SPSL had a network of correspondents from whom confidential opinions were solicited about the academic merits of the applicants. Refugee scholars with strong academic resumés stood the best chances of success with the SPSL. As was to be expected, opinions about particular refugees sometimes diverged<sup>12</sup>, complicating the task of prioritizing applicants. Personal contacts and recommendations also played a significant role, and occasionally the SPSL was invited to complement financial support already established by supporters of particular refugees<sup>13</sup>.

### **The individual files**

In the following, I give an overview of the archival material pertaining to the 33 mathematicians under consideration here, roughly grouped along national lines, alphabetically by country. Some great European twentieth century mathematicians (e.g. Jacques Hadamard, André Weil) are dealt with only in passing, since their SPSL files are lean, while the files of some less well known scientists (e.g. Henri Jordan, Paul Weiss), but also of some better

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<sup>8</sup> Davison (278 fol. 061)

<sup>9</sup> Notably Jordan (281 folios 035-036).

<sup>10</sup> Erdelyi (278 fol. 164)

<sup>11</sup> (278 fol. 171)

<sup>12</sup> E.g. Deutsch (278 fol. 269 vs fol. 277)

<sup>13</sup> E.g. Segre (285 fol. 040), Erdelyi (278 fol. 179)

known scholars (e.g. Gino Fano, Beniamino Segre) offer more material of historical interest. This imbalance is only a consequence of the contents of the archive in question, and does not imply any judgement on my part.

### **Czechoslovakia**

Soon after the Munich Accord of September 1938, Czechoslovakia's Sudetenland was annexed into Germany, and in March 1939, the entire Czech part of Czechoslovakia was invaded by Germany and annexed as the Protectorate of Bohemia and Moravia. The new authorities lost little time in starting their campaign of deportation and extermination of the Czech Jewish population. The universities in Bohemia and Moravia, notably the German and Czech 'Charles' universities in Prague and the German and Czech technical universities in Brno, were subjected to the same discriminatory policies which were already in force in Germany, and many academics were compelled to flee. All the Czech universities in the Protectorate were closed in November 1939. The collaborationist Tiso government of Slovakia, a marionette regime established alongside the neighbouring Protectorate of Bohemia and Moravia, in 1941 enacted legislation which provided the legal foundation for internment of Slovak Jews and expropriation of their assets. More than 60000 of Slovakia's 95000 Jews were deported to concentration camps in Germany and Poland [Aronson, 2004, 175-176].

### ***Arthur Erdelyi***

The analyst Arthur Erdelyi (1908-1977) (278/4) received his scientific education at the German universities in Prague and Brno, and held a position at the German Technical University in Brno until 1936. He published almost exclusively in German while residing in Czechoslovakia<sup>14</sup>.

At the time of the Munich accord, Erdelyi was still in Brno, supporting himself by giving private lessons and writing scientific articles (fol. 157). Brno is not in Sudetenland, so in December 1938 when Erdelyi completed his SPSL questionnaire (folios 156-8), he was still inside free Czechoslovakia. However, since he was of Jewish descent, his situation there must have seemed very ominous. He was compelled to leave Czechoslovakia by the end of January 1939 (fol. 157). Professor Whittaker at the University of Edinburgh found him some money, and the SPSL complemented it. Erdelyi was appointed Assistant Lecturer there in 1941, and promoted to Lecturer in 1942. He became a naturalised British citizen in February 1947, went to the USA in 1949, and returned to the University of Edinburgh in 1973. He was elected a Fellow of the Royal Society in 1975.

### ***Jaroslav Cisar***

The SPSL archives continue after the war, and we find the Czech diplomat, mathematician and astronomer Jaroslav Cisar (1894-1983) (277/10), who had been in London as a refugee 1939-1946 or 1947 (fol. 463). After the communist coup d'état in 1948 he once again came to the UK with a permission from the communist Czech authorities to do scientific work abroad. His application for a renewal was declined in 1951, and he elected to stay in the UK. The SPSL assisted him financially in a period of transition, filling in gaps between temporary positions at Manchester and St. Andrews universities. Cisar eventually got a permanent post at St. Andrews (fol. 533), and remained there until retirement.

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<sup>14</sup> Reinhard Siegmund-Schultze informs me that if these facts had been known to him, then he would have included Erdelyi among the German-speaking emigrants in [Siegmund-Schultze, 2009, Appendix 1.1].

***Emil Schoenbaum***

The statistician Emil Schoenbaum (1882-1967) (284/7) was dismissed from his position at the Czech University in Prague because of his Jewish origin at the time of the German occupation. He applied to the SPSL for support to come to Britain or America, but this came to nothing. He escaped to South America in 1939 with the assistance of ILO<sup>15</sup> official Oswald Stein, and worked as an advisor to several Latin American governments. During this time, he was appointed Chief Actuarial Advisor of the ILO, attached to its temporary headquarters in Montreal, and he also worked for the ministry of social welfare of the Czech exile government in London from August 1943 onwards, while he was still in America<sup>16</sup>. He returned to his post at the Czech University in Prague after the war.

***Stefan Schwarz***

The algebraist Stefan Schwarz (1914-1996) (284/8), also of Jewish descent, applied to the SPSL for assistance to come to Britain or the United States, but to no avail. He then fled no further than to the Comenius University in Bratislava, capital of his native Slovakia. Schwarz was able to continue teaching at the Comenius until 1944, but was then denounced and deported. He survived in concentration camps until the end of the war, returning to Bratislava where he stayed until retirement.

**France**

Although there is no SPSL file on Louis Rapkine (1904-1948), he has to be mentioned as one of the central figures in the assistance to persecuted scientists in France before, during and after the Second World War. Himself an immigrant from Russia, who studied medicine in Canada but settled in France, he founded the 'Comité français pour l'accueil et l'organisation du travail des savants étrangers' in 1936, aided the escape of some thirty French scientists to the USA in 1940, and was involved in the reorganization of French science after the war, supported financially by the Rockefeller Foundation [Karp and Karp, 1988].

***Jaques Hadamard and Szolem Mandelbrojt***

Jacques Hadamard (1865-1963) (279 fols. 250-255) acted as a referee for the SPSL on several occasions before the war, but there is no record that the Society assisted his escape to the United States in 1940. The SPSL corresponded with him again in 1943, when he was already well established in America, e.g. about the establishment of the *École Libre des Hautes Études* in New York.

Szolem Mandelbrojt (1899-1983) (282 fols. 306-309), uncle of the mathematician Benoît Mandelbrot (1924-2010), was born Polish, but he had long been a professor in France and a naturalised French citizen when he escaped to the United States in 1940. He was an analyst who had held professorships in France since 1929, at the *Université de Clermont-Ferrand*, later at the *Collège de France*. His SPSL file is meager, but it confirms that he went to the Rice Institute in Houston. He would return to his chair in Paris after the war (where he stayed until retirement).

Towards the end of the war, Hadamard and Mandelbrojt spent a year together in London (279 fol. 250, 282 fol. 306, [Maz'ja and Šapošnikova, 1998, 245ff]). They were joined by several other French scientists, and the whole mission was organized and directed by Rapkine.

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<sup>15</sup> International Labour Organization, <http://www.ilo.org>

<sup>16</sup> I am grateful to Sandrine Kott and Vladimir Rys for information about Emil Schoenbaum.

***Ervand Kogbetliantz and André Weil***

The other Frenchmen on file are Ervand Kogbetliantz (1888-1974) (281 fols. 261-262), and André Weil (1906-1998) (285 fols. 405-407). Kogbetliantz was a naturalised Frenchman, originally Armenian, who escaped from Clermont-Ferrand to the United States and spent the rest of his career there, without any record of direct assistance from the SPSL. The situation with regard to André Weil is similar. The only pieces of information about Weil on file with the SPSL are two notes to the effect that he had escaped from Strasbourg to the United States (undated), and that he was at the *École des Hautes Études* and was waiting for the travel permit to take up a call from São Paulo (9 Nov 1944).

**Italy**

The development of mathematics in Italy between the World Wars is the topic of [Guerraggio and Nastasi, 2006], and Italian anti-Semitism during Fascism is treated in [Sarfatti, 2006]. The anti-Semitic decrees of 1938 deprived Italian Jews of the right to hold positions in schools, universities and academies [Capristo, 2002, 367-369]. Eight Italian mathematicians are represented in the SPSL files, of which five were apparently never in direct contact with the Society, and their files contain very little information beyond the dates of their reinstatement in their university positions. These five are the analyst Guido Ascoli (1887-1957) (277 folios 78-79), the geometer Guido Castelnuovo (1865-1952) (277 folios 456-462), the analyst Beppo Levi (1888-1961) (281 folios 321-322), the geometer Arturo Maroni (1878-1966) (282 folios 312-313), and the applied mathematician Scipione Treves (1900-1991) (285 folios 388-389). There is more material about the remaining three, Alessandro Terracini (1889-1968) (285/5), Gino Fano (1871-1952) (278/6), and Beniamino Segre (1903-1977) (285/1):

***Alessandro Terracini***

The Turin-born and based geometer Alessandro Terracini (1889-1968) (285/5) appealed for help from the SPSL in December 1938, suggesting that more contact between British and Italian geometers would be desirable, and enclosed testimonials from Fano, Levi-Civita, and Castelnuovo. He then applied for vacant positions in Aberdeen and Durham, but did not get either post. The SPSL archives lost track of him at this point, but he is known to have emigrated to Argentina until the end of the war (fols. 386-387, see also [Santaló, 1968]).

***Gino Fano***

Also a refugee from persecution in Italy, albeit financially in less dire straits than most, was another Turin-based geometer, Gino Fano (1871-1952) (278/6). When stripped of his position, he went to Lausanne where he was to stay until the end of the war. In the SPSL questionnaire (fol.297) he listed under "Sources of income" inter alia "a good family position". His son, the physicist Ugo Fano, himself an SPSL-assisted refugee, wrote to the SPSL on his father's behalf in February 1939, proposing to channel a research grant from an anonymous benefactor in Switzerland via the SPSL to his father.

This ruse was designed to hide a Fano family fortune in Switzerland from the Italian authorities:

"He has to give to the Italian consulate an evidence regarding his possibility of support in Switzerland, without showing his real economical resources, because it is forbidden to have money abroad." (fol. 303)

The SPSL agreed, and during the next two years acted as a conduit for monthly payments to Fano from his own family funds, receiving a contribution of £10 to the SPSL general funds as



honorarium for this service. At the start, SPSL sent Fano cheques drawn on a British bank, later a Swiss bank account in the name of SPSL was set up in Lausanne expressly for this purpose.

As an almost farcical twist, the SPSL subsequently ran into trouble with the Foreign Exchange Control for violating British Defence Finance Regulations (fol. 336), and the arrangement was terminated in 1941. I have no information about whether, and if so how, Fano managed to conceal his financial assets from the Italian consulate in Lausanne for the rest of his stay in Switzerland.

Fano was reinstated (riammesso) in his position at the University of Turin on the first of January 1944, according to (278/6 fol. 364). The SPSL archives refer to “Professor Ruffini’s list” when dates are given for the reinstatement of Italian professors<sup>17</sup>. The list, drawn up in 1946, gives reinstatement dates which are for the most part in 1944, well before hostilities ended in Italy, and while the universities in northern Italy were still in Axis-controlled territory. This raises the question of how these reinstatements are to be interpreted. The following explanation seems plausible:

After the surrender of the Italian forces to the Allies in September 1943, Germany seized military control of the parts of Italy not already held by the Allies, liberated Mussolini from captivity, and put him in charge of a puppet “Italian Social Republic” in the north. Turin was liberated at the end of April 1945, for instance. The reinstatements are hence to be understood as revoking the 1938 expulsion of these professors, rather than actually re-establishing them in office.

### ***Beniamino Segre***

Beniamino Segre (1903-1977) (285/1), a distant relative of the algebraic geometer Corrado Segre (1863-1924), was Jewish and was therefore dismissed from his chair in projective and descriptive geometry (fol. 016) at the University of Bologna in December 1938. In January 1939 he appealed to the SPSL for assistance to relocate to Belgium, the United Kingdom or the United States (folios 2-4).

Within weeks, a group of British mathematicians had collected funds for an earmarked grant to be channeled through the SPSL to bring Segre and his family to Britain. The initiative was coordinated by professor J. G. Semple (1904-1985), professor of pure mathematics at King’s College London and co-founder of the London Geometry Seminar, which is still active<sup>18</sup>. He and professor W. V. D. Hodge of the University of Cambridge made the largest individual contributions to the fund, as can be seen from the list of contributors which Semple presented to D. C. Thomson of the SPSL in February of 1939 (fol. 024) (Figure 1).

During the 1930s, Hodge had extended the results of the Italian school of algebraic geometry with topological methods, so it stands to reason that Hodge would want Segre to come to

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<sup>17</sup> In all likelihood this refers to Edoardo Ruffini (1901 – 1983), professor of the History of Italian Law at the University of Perugia. He and his father, the liberal senator Francesco Ruffini, were among the very few Italian professors who refused to take the oath of fidelity to the Fascist regime in 1931, and who for this reason were dismissed. From 1945 to 1947 Ruffini served as cultural attaché with the rank of counselor at the Italian embassy in London. I am grateful to Annalisa Capristo for this information.

<sup>18</sup> <http://geometry.ma.ic.ac.uk/seminar/>

Cambridge. Segre himself had also said that "I would prefer to dwell at Cambridge" (fol. 036). He stayed three years in Cambridge, working with Hodge and J.A. Todd.

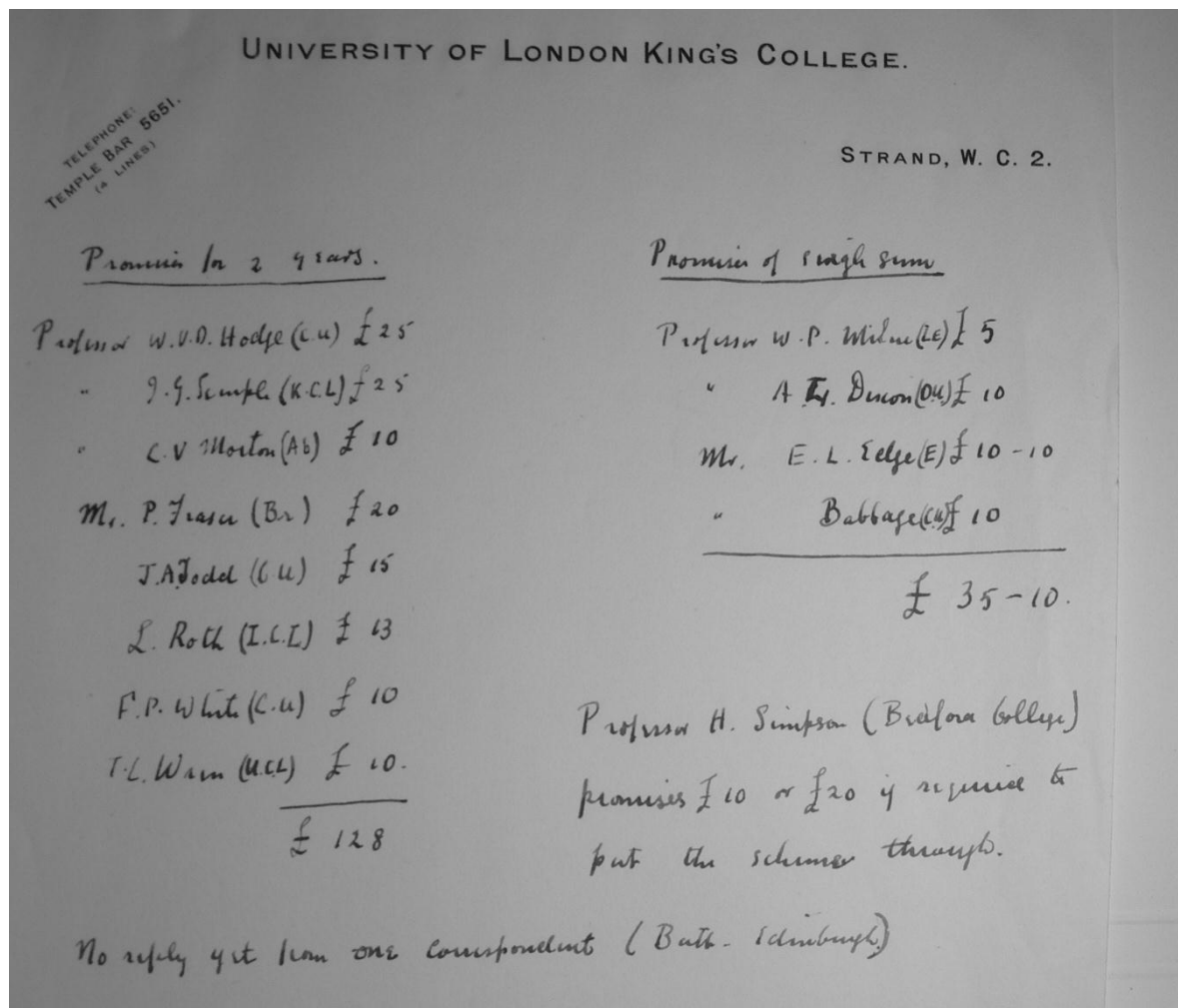


Figure 1. Pledges of contributions to the Segre fund (SPSL 285/1 fol. 024)

It seems that the initiators of the Segre fund approached the SPSL not only to ask for complementary funding from the Society. This additional funding was in fact obtained, and the Society assisted administratively by collecting the pledged amounts from the contributors and disbursing the funds in regular installments to Segre. However, an equally important motive seems to have been to get the SPSL to support Segre's application for a permit to enter and work in Britain. In this way, any eventual requirement to guarantee subsistence indefinitely for the invitee, in case he should fail to find employment, would fall on the SPSL instead of on the individual contributors to the fund. In its letter to the Immigration Officer at the Home Office, however, the SPSL is careful to point out that "Mathematical colleagues in this country have raised a fund which this Society is supplementing, to enable Professor Segre to come to this country with his family, and to continue research with Professor Semple at King's College, London." (fol. 045)

Like so many refugees to Britain, Segre was interned as an enemy alien in the summer of 1940. Churchill is quoted as having said "Collar the lot!" in response to the Italian declaration of war on June 10, 1940, setting off comprehensive internment of Italian citizens in Britain

[Gillman and Gillman, 1980]. Many had already been interned before that, however. Beniamino Segre was first taken to Bury Internment Camp near Manchester, then to Palace Internment Camp in Douglas on the Isle of Man (fols. 173, 180).

There is no information on file with the SPSL to confirm the date of Segre's internment, but it could plausibly have been as early as June 2, and was certainly before June 20 (fol. 140). The internment orders were issued in stages: On May 12, 1940, in response to the German attack on Belgium and the Netherlands, German and Austrian males between the ages of 16 and 60, who were residing in regions bordering the Channel or the North Sea, were interned. On May 16 all foreign nationals who did not have a "no security risk" clearance were interned, and on June 2, following the surrender of the French forces to Germany, most remaining foreign adult males in the Britain were interned. The latter order would have affected Segre. By comparison, Paul Weiss, see below, then still a German citizen, was interned on May 12 while on a short visit to Cambridge, reportedly "along with other aliens who were residing more permanently in Cambridge" (286/2 fol. 215, Whalley-Tooker to SPSL).

The SPSL initially took the position that grants promised to refugee scholars would be discontinued during their internment, and tried to shift responsibility for the families of interned scholars to the government (and failing that, to other relief organizations, in particular the Jewish Refugees Committee) (fol. 141). This attempt to relieve what seems by then to have been the very strained finances of the SPSL created a gap of about a month in the disbursement of the Segre fund. During Segre's internment, his family temporarily relocated to North London to stay with friends (fol. 140). Patrick du Val reported that this episode was particularly trying for Segre's family, and that Segre's youngest child died during this time [Du Val, 1979].

The SPSL was, along with the Royal Society, heavily engaged in appealing for the release of academic refugees from internment, and Segre was released as early as August 1940 (fol. 173). Many academics remained interned much longer, and some were sent to camps in Canada and Australia.

The Segre fund was to last until 1941, by which time Segre was able to support himself, first on a book contract with Clarendon Press, Oxford, and from September 1942 onwards, from a lectureship at Manchester University. At Manchester, he worked with Louis Mordell and Kurt Mahler on diophantine equations and the arithmetic of algebraic varieties [Mordell, 1943; Segré, 1943; 1944; 1945].

Segre's time in England was productive, and in 1945 he sent the SPSL a list of 17 articles published in various British and American journals, with five more in press. He also listed "In preparation: A treatise in two or three volumes on 'Geometry upon Algebraic Surfaces and Varieties' (in collaboration with J.A. Todd)", which apparently never came to fruition, but failed to mention his book 'The Non-singular Cubic Surfaces' [Segré, 1942], which he had published in 1942 with Clarendon Press (the book contract which by all accounts provided his livelihood in 1941-42). He returned to his chair in Bologna in 1946.

## **Poland**

When Poland regained independence after the First World War, it was home to a Jewish population of over 3 million. Anti-Semitic tendencies in the general population and the establishment grew stronger during the years leading up to the Second World War, especially after the death of Piłsudski (the strictness of whose regime, although it could not be described

as pro-Semitic, may have prevented the worst of the anti-Semitic excesses of earlier times from recurring) in 1935 [Marcus, 1983]. The German invasion of Poland on September 1, 1939, led to the annexation of the western provinces of Poland into Germany, and of the eastern Polish provinces into the USSR. Within months, a drastic program of annihilation, not only of Polish Jews, but also of Polish intellectuals in general, was launched in the German-controlled Polish territories. A general overview of the situation at Polish universities during the war is given in [Redzik, 2004].

The logician Alfred Tarski and the analyst Antoni Zygmund are the Poles about whom the SPSL archives are most informative.

### *Alfred Tarski*

There is no evidence of direct contact with Alfred Tarski (1901-1983) (285/4) on file with the SPSL, but J.H. Woodger<sup>19</sup> had applied for support for Tarski in 1937, explaining the latter's precarious condition in Warsaw (folios 330-1). Tarski had built a considerable reputation abroad as a mathematical logician during the early 1930s, and his SPSL file includes copies of testimonials by Paul Bernays, Abraham Fraenkel, Felix Hausdorff, C.I. Lewis and others in support of an earlier application for a Rockefeller scholarship which had brought him to Paris and Vienna in 1935 [Siegismund-Schultze, 2001, 299]. He was unable to get a professorship in his native Poland, and according to Woodger this was because of the prevalent anti-Semitism at Polish universities (fol. 330). In dealing with the appeal made by Woodger to the SPSL in 1937 on Tarski's behalf, SPSL solicited an opinion of the merits of Tarski's work from Bertrand Russell, who responded with the handwritten testimonial shown in Figure 2 (folio 333 r+v), saying:

“I have no doubt that he is the ablest man of his generation in what may be called ‘scientific philosophy’ (by which I do not mean The philosophy of science). There is one man who has perhaps a wider reputation (Carnap), but I do not consider him so original, so clear, or so well-balanced.”

Nothing came of this indirect appeal for support, however. Tarski made a narrow escape from the war; he had left for a conference in the United States in August 1939, and was still there when Poland was attacked on September 1. He remained in the United States for the rest of his career, eventually becoming a full professor at Berkeley.

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<sup>19</sup> Professor Joseph Henry Woodger (1894-1981) was a biologist and logician at the Middlesex Hospital Medical School, London. He conceived of language acquisition and other forms of learning as theory construction on an axiomatic basis. Tarski had himself studied biology before turning to logic [Feferman and Feferman, 2004, 26-27]. The two had met at the congress of Scientific Philosophy in Paris in September 1935. They became friends as well as collaborators: Tarski contributed an appendix to Woodger's book “An Axiomatic Method in Biology” [Woodger, 1937], and later Woodger translated a selection of Tarski's early papers from 1923-38 into English [Tarski, 1956].

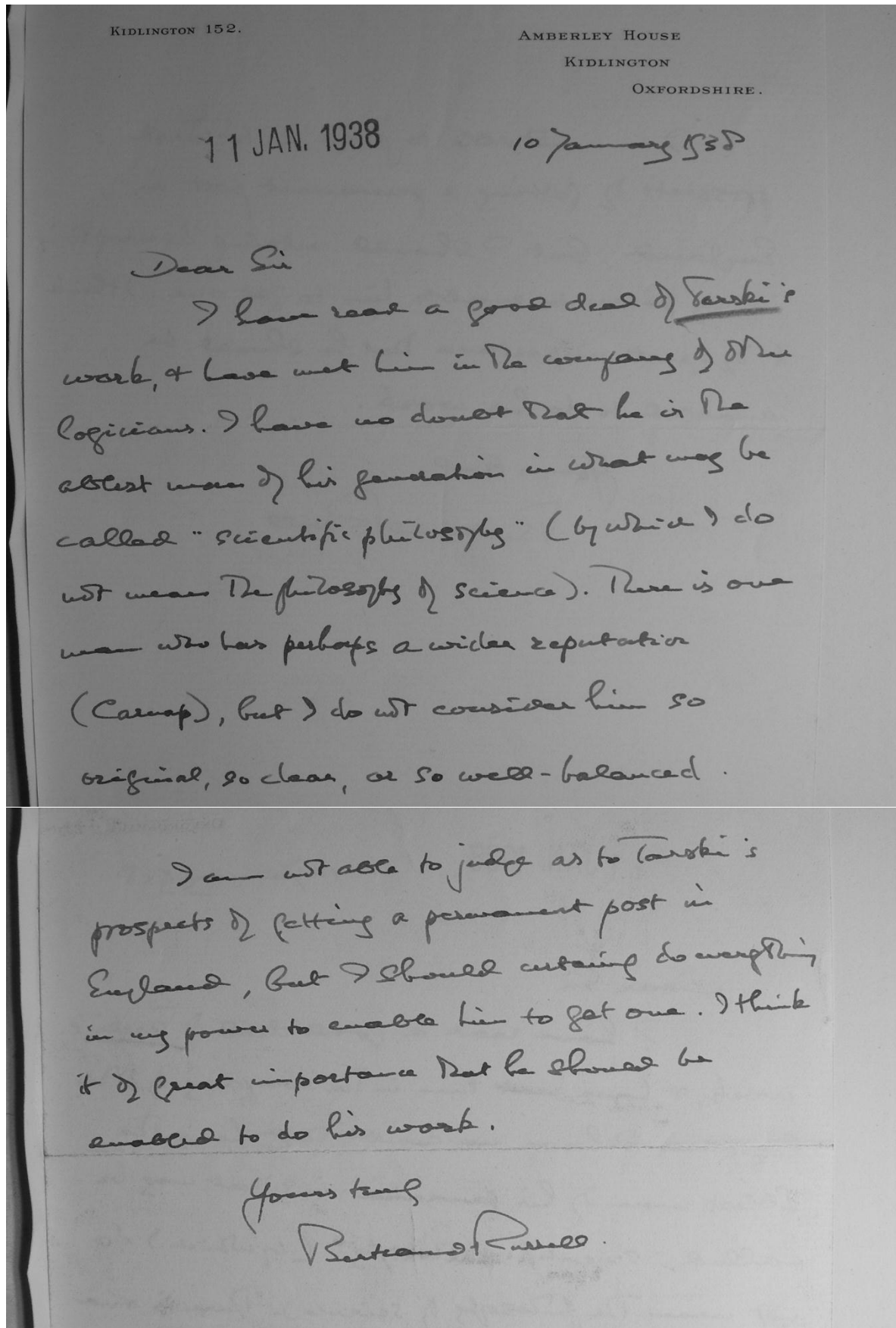


Figure 2. Bertrand Russell's testimonial about Alfred Tarski (SPSL 285/4 folio 333 r+v)

### ***Antoni Zygmund***

Antoni Zygmund (1900-1992) (286/4) contacted the SPSL after losing his position at The Polish University in Vilnius<sup>20</sup>, which was liquidated and its students and professors disbanded in December 1939. He wrote again on February 15, 1940 (286/4 fol. 381), explaining that he had an invitation to join the Massachusetts Institute of Technology (MIT), but that the relocation allowance from MIT would not cover the trip. He applied for additional support from the SPSL, which granted him an amount for the seafare and started researching ways to transfer the money to him in Vilnius.

Then, on March 5, Zygmund wrote a postcard from Gothenburg (Sweden), saying he had borrowed money for the trip from friends, and was already on his way to the USA (fol. 388).

Zygmund's originally planned itinerary, as stated on February 15, 1940 (fol. 381), was via Riga, Stockholm, and Bergen (Norway). On March 5, he said that "meanwhile various reasons compelled me to leave sooner", but he did not reveal why Gothenburg was preferred over Bergen. A plausible reason for changing one's mind about transiting through Norway at that time would be the Altmark incident on February 16, 1940, in which a British naval force attacked a German ship in Norwegian territorial waters, liberating 299 British seamen who were prisoners of war and who had been originally captured by the battleship Graf Spee in the South Atlantic. This was the first major breach of Norwegian neutrality during the war. Norway and Denmark were invaded on April 9, while Sweden managed to stay neutral throughout.

As things turned out, Zygmund never made use of the grant from the SPSL, since a Polish emigrants' organization in the United States refunded his extra expenses (fol. 391).

### ***Other Poles***

The analysts Stefan Kempisty (1892-1940) (281/3) and Jozef Marcinkiewicz (1910-1940) (282/5), both at the University of Vilnius, were deported and killed, while their colleague, analyst Juliusz Rudnicki (1881-1948) (284/4), survived in Vilnius throughout the war, working as a secondary school teacher. The topologist Kazimierz Kuratowski (1896-1980) (281/3), analyst Stefan Mazurkiewicz (1888-1945) (282/5) and topologist/analyst/set theorist/number theorist Waclaw Sierpinski (1882-1969) (285/1) all stayed in Warsaw, where a clandestine underground university was organised. In 1944, Sierpinski was incarcerated, but he survived the war. The analyst and geometer Alfred Rosenblatt (1880-1947) (283/7) of the University of Cracow had emigrated to Peru in 1936, thus escaping the ravages of the conflict. There is an SPSL file for each of these, but none of the files contain much information. Rosenblatt's file is the slimmest, holding but a single folio.

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<sup>20</sup> The university was founded in 1579, during the Polish-Lithuanian Commonwealth. When the Commonwealth was dissolved at the end of the 18th century, most of Lithuania was incorporated into the Russian empire. The University of Vilnius was shut down after an uprising in 1832 and remained closed until the end of World War I. Lithuania declared independence in 1918, and in 1919 the University of Vilnius was re-opened. During the Polish-Soviet war 1919-1921, however, the Vilnius region was captured and later annexed by Poland, and the Lithuanian authorities moved their government and the university to Kaunas. Polish-Lithuanian relations deteriorated badly, and the Polish annexation of Vilnius was never recognized by Lithuania. The University of Vilnius was operated as a Polish-language, Polish-staffed university until the region was returned to Lithuania at the (preliminary) end of hostilities in October 1939. This led to the dissolution of the Polish University of Vilnius and preparations for a Lithuanian university in its place, on the basis of the then existing one at Kaunas. Lithuania was occupied by the USSR in June 1940, and was soon after declared a Socialist Soviet Republic, which joined the USSR. Lithuania remained in the USSR until 1990, interrupted by German occupation 1941-44.

## Other countries

### *Henri Jordan*

The analyst Henri Jordan (1902 -) (281/1), a Belgian-born naturalised German who had completed a Dr.Phil.Nat. degree at the University of Frankfurt in 1928<sup>21</sup>, spent two years in Scotland on research scholarship, and then went to Rome in 1930 to work at the League of Nations (International Institute for Educational Cinematography). He was made redundant toward the end of 1933. He was then (because of his Jewish descent) without prospects of any academic post in Germany, and he turned to the SPSL for help. He came to Britain, and held temporary posts at the universities of Dublin and St. Andrews for two years before moving on to the United States in 1936. Jordan was excluded from consideration in [Siegmond-Schultze, 2009] because his redundancy in Rome was not racially or politically motivated.

Jordan's case exemplifies a particular attempt at placement in the United States which was made by the SPSL, then still called the AAC, in August 1934. At that time, the AAC was in its second year of operation, and in regular contact with its American counterpart, the Emergency Committee in Aid of Displaced German (later Foreign) Scholars (EC). Information about vacancies at American Universities was frequently forwarded by the EC to the AAC, which would circulate this information to refugee scholars on its lists. In August 1934, the AAC sent out almost identical letters to a number of displaced European mathematicians, including Jordan (fol. 034) who was then already in England:

“We have heard through a correspondent in the U.S.A. that a college in Atlanta, Georgia, is looking for a Professor of Mathematics. The Institute in question was established for the education of negroes, but our information is that there are no negro members of the faculty.

We have no further information about this possible situation, but quite clearly the college in question cannot be a first-rate American University, but we believe that those displaced scholars who manage to get to the U.S.A. within the next year, have a far better chance of establishing themselves permanently in academic work than those who remain in Europe.

We should be glad if you would let us know immediately whether you wish us to put your name forward for this position.”

Many of the recipients of the letter asked to be put forward for the position, with varying degrees of enthusiasm. One can only imagine how they, most of them victims of anti-Semitic oppression, must have cringed at the overtly racist assurance that no negro colleagues would be forthcoming. Jordan's reply includes the following remark (folios 035-036):

“Also I did not quite understand from your letter whether there are no negro students at the college, or no negro professors, or both.”

His gentle sarcasm contrasts with the more direct tone employed by Willy Feller in a letter dated 11 November 1934 from his temporary exile in Stockholm to Richard Courant, by then already in New York. Feller had lost his position at the University of Kiel in 1933, and got the

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<sup>21</sup> The year of Jordan's PhD is taken from his CV (fol. 11), and differs from the information in [Tobies, 2006].

same letter as Jordan from the AAC about the vacancy in Atlanta. He comments on the apparent racism of the AAC as follows:

“The prospects here are of course  $\varepsilon/3$ , but the Assistant Council tries to sell me off [verschachern] to a Negro college in Atlanta (Georgia) according to the maxim ‘the inferior races to the inferior races.’ ”  
[Siegmond-Schultze, 2009, 155]

The college in question may have been Morehouse College, Morris Brown College, or Spelman College<sup>22</sup>. The Historically Black Colleges<sup>23</sup> of Atlanta is the subject of a series of articles by Sisk [Sisk, 1958; 1964a; 1964b]. I have yet to discover which college was looking for a professor of mathematics in 1934. The most likely candidates are Morehouse and Spelman, both liberal arts colleges which, under pressure from their funding agencies, had entered into an affiliation arrangement with Atlanta University in 1929, and were going through a period of transition, including coordination of their library services and their study programmes.

In the end, none of the correspondents of the SPSL would be appointed to the position in Atlanta. On October 29, 1934, the AAC wrote to the applied mathematician Michael Sadowski (1902-1967)<sup>24</sup>, who had expressed an interest in the position, that “We are afraid that very probably this opening has either been filled or is no longer available” (284 fol. 271), and on January 10, 1935 to the statistician and political activist Emil Gumbel (1891-1966)<sup>25</sup>, who had also expressed interest in it, that “...we have heard nothing further of the possible openings in Atlanta [and in...]” (279 fol. 223).

Henri Jordan lectured at the University of St. Andrews in Scotland 1934-35, and moved to the United States to take up a 1 ½ year contract at Georgetown University, Washington DC, on February 1, 1936 (281/1 fol. 041).

### *Paul Weiss*

The mathematical physicist Paul Weiss (1911- 1991) (286/2) came to Britain as a research student in October 1933, getting a PhD from the University of Cambridge in 1936. His supervisor was Paul Dirac, Nobel laureate for physics in 1933, and the external examiner was Max Born, a German refugee by then settled in Edinburgh, who would later win the Nobel prize for physics in 1954. Born appealed to the SPSL on behalf of Weiss, but there is no record of any grant from the Society, nor any mediation of a job. Weiss held a temporary post as a lecturer at the University of Belfast from January to June 1939. Like many refugees, he offered to do national service when war broke out in August 1939, but he was never called up. On the contrary, while he was on a short visit to Cambridge in May 1940 he was interned along with other enemy aliens and sent to Canada. SPSL appealed for his release, see e.g. (fol. 215) with a letter of support from the senior tutor of Downing College, University of Cambridge. He was released in Canada in December 1940 and returned to England soon after. He got a temporary position at Westfield College, University of London, in February 1941, which was later made permanent. He became a British citizen in 1946. Weiss was excluded

<sup>22</sup> Clark College (so named 1940-1988, today a part of Clark Atlanta University) was in 1934 called Clark University, and it would therefore probably not have been described as a ‘college in Atlanta’ at that time.

<sup>23</sup> Cfr [Obama, 2010]

<sup>24</sup> [Siegmond-Schultze, 2009, 37-38]

<sup>25</sup> [Siegmond-Schultze, 2009, 176-180]



from consideration in [Siegmond-Schultze, 2009] because he had never held a post in German academia.

### ***Boris Davison***

The Russian-born British subject Boris Davison (1908-1961) (278/2) had submitted his PhD thesis in applied mathematics to the University of Leningrad in 1938. Before the degree was conferred, he was expelled from the USSR for being an alien citizen. He experienced not only the xenophobia of the Soviet Union, but also some reciprocal sentiments within the SPSL on his arrival in Britain, and even long after the war, his family ties to Russia were to become an issue. A handwritten SPSL archival note dated November 3, 1938 (fol. 061) contains the following judgment:

“Looks 150% Russian. English not very adequate. Looks as though he has had a breakdown.”

The SPSL made many enquiries on his behalf, but was unsuccessful in finding him a job. The main difficulty seems to have been finding an institution in Britain where Davison's research and work experience in the field of hydrology could be put to use. In a letter marked “unofficial”, W Allard of the Engineering Inspectorate, Ministry of Health, commented that (fol. 073)

“Hydrology is for the time being not well-established as an object of study in Great Britain, and much of the little work that is being done is effected by public organizations, of which the Civil Service is typical, with permanent staff of ‘general-service’ character, that is often required to perform other duties also and is recruited according to rules covering a wide range of personnel. I see little hope of an opening occurring for a specialist such as Mr. Davison in these directions, even if (as to which I am uncertain) he be eligible for admission to such bodies as the Civil Service.”

Geoffrey Taylor of the Cavendish Laboratory in Cambridge commented on Davison's competence in a handwritten note to his colleague Ralph Fowler: (folios 095-096)

”Dear Ralph, I have looked at Mr. Davison's application. His subject is rather a specialized one which is really chiefly of interest to Civil Engineers and hydraulic engineers. I did read one of his papers some years ago in the Phil Mag & I remember getting an impression that it was competent but not specially inspiring. There is no doubt that the subject of ground water flow is one the Russians are very good at. Later I have looked up Davison's 2 Phil Mag papers & have got a more favourable impression than I had before. They are really excellent pieces of work. As far as I know the subject is hardly studied here. I think that the most likely place to find people who are interested in it is in the Civil Engineering Dept of the City & Guilds College South Kensington. Perhaps Prof C M White of that College might be able to help him. Yours G.I.T.”

Towards the end of 1938, the SPSL made at least two attempts to contact Professor White as per Geoffrey Taylor's suggestion (folios 075, 118), but there is no reply on file. While there is

no record of any contact between the SPSL and Davison in 1939, 1940 or 1941, he had fended well for himself in the meantime, and in 1942 the SPSL learned that he had worked at an Air Ministry department since February 15, 1939 (fol. 125). He was later part of the British mission in Los Alamos (Manhattan project), and he worked at the Atomic Energy Research Establishment, Harwell, until moving to Canada in 1954. His Russian background continued to haunt him while at Harwell: His defence security service files were released from the MI5 to the National Archives<sup>26</sup> in 2007, and reveal a constant apprehension on the part of the British security services about the risk of having a staff member at Harwell whose parents were living in the USSR, even if no suspicious activity on his part was ever reported.

### ***Emeric Deutsch***

The Romanian applied mathematician Emeric Deutsch (b. 1929) (278/5) was registered with the SPSL in March 1964, when he had already fled communist Romania and was in Rome. SPSL was able to mediate an offer of a 1 year appointment at the University of Glasgow with prospects of a permanent post, but he chose to go to the United States instead. In 2010, the Brooklyn Polytechnic listed him as a professor of mathematics, retired but still publishing papers.

### ***Harald Bohr***

Harald Bohr (1887-1951) (277/7) was, like his brother Niels<sup>27</sup>, a frequent correspondent with the AAC/SPSL. Copenhagen became a haven for several German refugees, mathematicians as well as physicists. Most of them, including the Bohr brothers, being of Jewish descent, found a further refuge in Sweden when conditions deteriorated in Denmark. Harald Bohr's personal file contains correspondence from 1943 and 1945, concerning lists of scientists who had gone to Sweden.

### ***Borchardt and Euer***

The SPSL file of the medical doctor and surgeon Moritz Borchardt (1868-1948) (277 fol. 407) is apparently misplaced among the mathematicians, and will therefore be disregarded here. Some files are too scanty to offer much of scholarly interest, particularly the mysterious Miss Euer (278 fol. 295), whose identity eludes me<sup>28</sup>.

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<sup>26</sup> <https://www.mi5.gov.uk/output/2-march-2007-releases-atomic-scientists-p2.html>

<sup>27</sup> Niels Bohr went via Sweden and Britain to the United States in 1943 and joined the Manhattan Project at Los Alamos.

<sup>28</sup> "Miss Euer Mathematician has been placed in U.S.A. pr Dr. (?)Hiepmann(?) of American Joint Distribution 8/9/55" (278 folio 295)

### Mathematical specialties

Based on information given by the mathematicians themselves in the SPSL questionnaires, I have grouped the mathematicians into the following specialties: *foundations*, *mathematical logic*, *number theory*, *geometry*, *analysis*, *algebra*, *topology*, and *applied mathematics*. This subdivision is admittedly rather coarse. For those whose questionnaires are on file with the SPSL, the information about mathematical specialty is taken from there. Some gave more than one specialty in their questionnaires, and I have registered up to four for some mathematicians. The sample size of 33 is too small to sustain any attempt at statistical analysis, here is never the less a tabulation of mathematical specialties against places of persecution:

		Places of persecution				
		Cz	Fr	It	Pol	++
Specialties	Foundations		1		2	
	Math logic				1	
	Number theory		3		1	
	Geometry		2	3	1	1
	Analysis	1	2	3	6	4
	Algebra	1	2	1		
	Topology			1	3	
	Applied math	2	2	3	3	4

### Concluding remarks

In this presentation of previously little used archival material about the assistance given by the SPSL to refugee mathematicians from outside German-speaking academia in the period from 1933 to 1963, I have sought to illuminate the data from the files with further information about the historical context of these refugees before, during, and after the Second World War. The contents also permitted some remarks to be made about adverse conditions faced by these refugees in their countries of origin as well as destination. In a forthcoming paper, I am considering the impact of those among the refugees aided by the SPSL who were integrated into British academia, some of whom also belong to the group under consideration here. The work of the SPSL is continuing under the auspices of CARA, as academic refugees continue to need assistance, and the study of the archives of CARA remains a task for the future.

### Acknowledgements

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**Individual summaries**

Box	Folios	Name	Dates	Phd	Habil	Creed / Descent	Citiz	Expulsion	First destination	Last dest. before 1945	SPSL grant
277 / 1	078-079	Ascoli Guido	1887 - 1957				I	1938 Milan			
277 / 7	394-406	Bohr Harald	1887 - 1951	1910 Copenhagen		J	DK	1943 Copenhagen	1943 SWE	1943 SWE	
277 / 7	407	Borchardt Moritz	1868 - 1948				D		1935 ARG		
277 / 9	456-462	Castelnuovo Guido	1865 - 1952	1886 Padua		J	I	1938 Rome	1949 GB		1952-53
277 / 10	463-554	Cisar Jaroslav	1894 - 1963				CZ	1948 CZ	1938 GB	1938 GB	
278 / 2	041-127	Davison Boris	1908 - 1961			GC	GB	1938 USSR	1938 GB	1964 US	
278 / 5	250-294	Deutsch Emeric S A	1929 -				RUM	1963 Rumania	1963 I	1939 GB	1939-40
278 / 4	142-229	Erdeelyi Arthur	1908 - 1977	1938 Prague		J	NONE	1938 Brno	1939 GB		
278 / 5	285	Euer Ms	-								
278 / 6	296-365	Fano Gino	1871 - 1952	1892 Turin		J	I	1938 Turin	1938 CH	1938 CH	1939-41
279 / 5	250-255	Hadamard Jacques Salomon	1865 - 1963	1892 Paris		NONE	F	1940 Paris	1940 US	1944 GB	
281 / 1	001-044	Jordan Henri A	1902 -	1928 Frankfurt		RC	B	1933 Rome	1933 GB	1936 US	
281 / 3	252-260	Kempisty Stefan	1892 - 1940	1918 Krakow	1925 Warsaw	RC	P	1939 Vilnius			
281 / 3	261-262	Kogbetliantz Ervand George	1888 - 1974	1923 Paris		RC	F	1940 Clerm.-Ferrand	1940 US		
281 / 3	263-264	Kuratowski Kazimierz	1896 - 1960	1921 Warsaw			P				
281 / 4	321-322	Levi Beppo	1888 - 1961	1896 Turin			I	1938 Bologna	1938 ARG	1938 ARG	
282 / 3	180-198	Lukacz Eugen	1906 - 1967	1930 Vienna			J	1939 Vienna	1939 US	1939 US	
282 / 5	306-309	Mandelbrot Szolem	1899 - 1983	1923 Paris			J	1940 Paris	1940 US	1940 US	
282 / 5	310-311	Marcinkiewicz Jozef	1910 - 1940	1935 Vilnius			P				
282 / 5	312-313	Maroni Arturo	1878 - 1966	1901 Pisa			J	1938 Pavia			
282 / 5	314	Mazurkiewicz Stefan	1888 - 1945	1913 Lviv			P				
283 / 7	617	Rosenblatt Alfred	1880 - 1947	1908 Krakow			P			1936 PERU	
284 / 4	227-233	Rudnicki Julius	1881 - 1948	1916 Paris	1921 Krakow	PROT	P	1939 Vilnius			
284 / 7	327-333	Schoenbaum Emil	1882 - 1967		1919 Prague	NONE	J	1939 Prague	1939 S.A.M.	1939 S.A.M.	
284 / 8	334-353	Schwarz Stefan	1914 - 1996	1937 Prague	1946 Bratislava	J	J	1939 Prague	1939 Slovakia	1944 Conc. camps	
285 / 1	001-233	Segré Beniamino	1903 - 1977	1923 Turin			J	1938 Bologna	1939 GB	1939 GB	1939-41
285 / 1	234	Sierpinski Wacław Franciszek	1882 - 1969	1906 Krakow			P				
285 / 4	299-339	Tarski Alfred	1902 - 1983	1923 Warsaw	1925 Warsaw	RC	J	1939 Warsaw	1939 US	1939 US	
285 / 5	340-387	Terracini Alessandro	1889 - 1968	1911 Turin			J	1938 Turin	1939 ARG	1939 ARG	
285 / 5	388-389	Treves Scipione	1900 - 1991	1924 Turin	1927 Bologna		J	1938 Turin+Bologna			
285 / 6	405-407	Weill André	1906 - 1998	1928 Paris		NONE	J	1939 Strasbourg	1940 US	1945 BR	
286 / 2	181-240	Weiss Paul	1911 - 1991	1936 Cambridge		J	J		1934 GB	1934 GB	
286 / 4	364-394	Zygmund Antoni	1900 - 1992	1923 Warsaw	1926 Warsaw	RC	P	1939 Vilnius	1940 US	1940 US	1940 (not used)

Index to abbreviations used for Creed: J=Judaism, GC=Greek Catholicism, RC=Roman Catholicism, PROT=Protestantism, NONE=Atheism/agnosticism. For Descent: J=Jewish.

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