

**In memoriam: A tribute to Dr Morteza Kaveh Kachouie (1906–1987)
On the 100th anniversary of the passing of the Parliament Act
"Contagious Animal Disease Prevention and Serum Making Institute" 1924, Tehran, Iran**

**Keyvan Tadayon^{1*}, Ehsan Mostafavi², Najmeh Motamed¹, Farid Ghasemlou³, Afshin Hajizadeh¹,
Mojtaba Moharrami¹, Sina Soleimani¹, Ahmad Yousefi¹, Rainak Ghaderi¹**

1. *Agricultural Research, Education and Extension Organization (AREEO), Razi Vaccine and Serum Research Institute (RVSRI), Karaj, Iran.*

2. *Department of Epidemiology, Pasteur Institute of Iran, Tehran.*

3. *Wisdom-Traditional Medicine and Medicine of the Islamic and Iranian Civilizations Group, Academy of Medical Sciences, Tehran, Iran.*

How to cite this article: Tadayon K, Mostafavi E, Motamed N, Ghasemlou F, Hajizadeh A, Moharrami M, Soleimani S, Yousefi A, Ghaderi R. In memoriam: A tribute to Dr Morteza Kaveh Kachouie (1906–1987). *Archives of Razi Institute*. 2025;80(Special Issue):1-10. DOI: 10.32592/ARI.2025.80.Special Issue.1

ABSTRACT

This tribute, written as a brief pictorial essay, a biographical sketch, and perhaps a glimpse into his personality, is intended to stimulate an appreciation for the remarkable veterinarian Dr. Morteza Kaveh Kachouie, for the services he provided and the legacy he left for his country. Being indefatigable in his commitment to promote public health and reduce social disparities in his society, Dr. Kaveh remains among the few we know today who have made history in their contributions to the Hesarak (Karaj) people, to the veterinary field, and beyond.

1. Introduction

In today's fast-moving world, where non-stop advances in technology overwhelm all aspects of our lives, the priceless experiences of people who came before us are easily undermined or overlooked. Writing biographies, therefore, can compensate by paying respect to our luminaries and inspiring the young generations.

On January 9, 2025, under the auspices of the Ministry of Agriculture of Iran, a prestigious ceremony hosting several senior State figures including MPs, the under-secretary of State, Minister of Agriculture, Academy of Science members, university professors, veterinarian and non-veterinarian officials plus many other professionals from government and private sector, was held in Tehran to mark the 100th anniversary of the Razi Vaccine & Serum Research Institute. The event acknowledged the institute's outstanding achievements at the national and regional scale in the development of knowledge and know-how in the field of manufacturing vaccines and other biologicals with therapeutic/diagnostic application, and also the diagnosis of animal infectious diseases. In the centenary of Razi Institute's birth, it is highly appropriate to pay tribute to the institute's giants. Between 1985 and 1990, Razi witnessed demise of two of its legendary figures Dr Aziz Rafie and Dr Morteza Kaveh Kachouie, the second and the third directors of the institute succeeding the late Dr Delpy. Together, these three men led Razi for nearly half a century. Dr Kaveh, whom we know more for his public benefit activities, passed away on 10th December 1987, aged 81, in Tehran.

This article is a brief tribute to the memory of Dr. Kaveh for his lifelong commitment and dedication to making a big difference.

2. Materials and Methods

To the best of our knowledge, no individual from the first generation of the Razi staff is still alive and available to approach. The personnel file of Dr Kaveh, including as many as five old paper card folders, was obtained from the institute's personnel office. All the documents were scanned and used to prepare an electronic folder. The individual documents were scrutinized for inclusion in this paper. Other reflections for this commemorative text were extracted from several interviews with many former Razi employees. The majority of these events were conducted in the years 2023-2025 at the institute's main campus in Karaj.

Biographical background

Morteza Kaveh Kachouie was born on September 24, 1906 in Isfahan, Iran, to his father, a religious scholar, and a young housewife mother from Isfahan. Morteza's father passed away prematurely when Morteza was only 6 years old. His mother remarried soon to another Muslim clergyman called Seyyed Habibollah Ashraf-ul-Vaezin from Isfahan (Figure 1), an intellect who was noted for his open-minded ideas and his visit to BaalBak, Lebanon. Morteza spent most of his childhood and primary school years in Isfahan until his family decided to move to the capital city of Tehran. When he turned a teenager, his family took a dramatic five-day-long horse-drawn coach ride to Tehran, where they eventually settled in their own house in Shahpour Street (somewhere close to the famous Aghaa Sheikh Hadi crossing) right in the heart of the city. Encouraged by his stepfather, Morteza was enrolled at Dar-ul-Funun high school, where he learnt French under the tuition of French and Polish teachers.

Employment

His studies continued through a fresh enrolment at the newly established Agriculture High School in Karaj. On 6th February 1924, the Persian parliament passed the "Contagious Animal Disease Prevention and Serum Making Institute" Act that paved the way for the eventual establishment of Razi Institute in Hessarak, Karaj. In May 1925, Morteza graduated as the top student of his class and got a diploma in agricultural sciences (Figure 2). He was soon employed, along with a few of his classmates, as technicians by the Agriculture Office under the Ministry of Public Benefits. The same year, Iran was digesting the impacts of a new epidemic wave of bovine rinderpest that made the government hurriedly staff the newly-founded institute. Morteza and his colleagues were soon deployed in the Razi Institute, Hessarak, to commission preliminary works. In 1925 and 1926, Abdollah Hamedi and Morteza Golsorkhi were assigned as the acting head of the institute, respectively.

Between January 1926 and June 1929, the newborn center experienced a state of uncertainty raised by a lack of a clear mission and centralized management. In 1929, a second decisive Act was passed by the parliament and tasked the government to employ a French bacteriologist and veterinarian expert in the field of vaccine and serum manufacturing to direct the institute. Consequently, in March 1931, when Dr Louis Pierre Joseph Delpy arrived in Tehran and settled along with his wife on the institute



Figure 1. Left: Seyyed Habibollah Ashraf-ul-Vaaezin, Dr Kaveh's stepfather holding his half-brother Taher. **Right:** A young Dr Kaveh enjoying a horse ride outdoors, images courtesy of Fereydoun (Ferry) Kaveh.



Figure 2. A visit by high rank State officials to the Agriculture High School, circa 1924. The young Morteza Kaveh in the back row is flanked by his classmates, image courtesy of Fereydoun (Ferry) Kaveh.

campus in Hessarak, Morteza acted as a French translator and deputy to him. Over the next nineteen years, Morteza would do his best to assist Delpy in his field visits (Figure 3), laboratory activities, and supervising construction works in order to study animal infectious diseases common in Iran, manufacturing vaccines, and building up new laboratories within the institute's perimeter.

Between 1933 and 1940, like other Iranian men, Morteza was ordered every year to attend the law-forced conscription training for several weeks (Figure 3).

Under the recommendation of Delpy, in 1934, Morteza, an accomplished vaccine-producing specialist by then, was enrolled at the veterinary college of Tehran, relocated in Karaj, which brought him the Veterinary Doctorate Diploma in 1938 (Figure 4).

On 31st August 1948, Delpy wrote a rare historic recommendation letter to the Agriculture Minister of the time and urged him to grant Morteza a sabbatical leave (Fig. 5). In his reasoning, Delpy argued that as he intended to leave Iran in two years, his close assistants needed to obtain the required qualifications before taking over his position. This letter triggered a chain of correspondence within the government departments and eventually led to Morteza touring several world-class European biological institutes for a year-long visit (Figure 5).

His sabbatical plan, made by Delpy and approved by the Agriculture Ministry, included visits to Pasteur, Roussel, Alfort and Merieux institutes in France, Lausanne, Geneva and Berne's institutes in Swiss, Waldman, Lister, The Weybridge Laboratory (also known as The Addlestone Institute or The Central Veterinary Laboratory) and Wellcome Trust laboratories in the UK, Serum Staten and Foot and Mouth Disease institutes in Denmark and the Microbiology institute in Sweden (Figs 6). He was specifically tasked to get familiar with the organizational structure, methods, and techniques used in these research centers, and also bring back microbial strains, as well as laboratory manuals and scientific periodicals (Figure 6). On his return to Iran, Morteza was holding a Veterinary Doctorate Diploma from Paris University as well as a Microbiology Diploma from the Pasteur Institute, Paris.

Until the late 1940s, besides his daily work commitments at the institute, he used to teach microbiology to students at the Karaj Agriculture College (formerly known as Agriculture High School). In 1951, he

expanded his part-time teaching responsibility at the Veterinary College of Tehran University (Figure 7). Microbiology and infectious diseases of animals were the main courses he used to teach his students. This led to his official transfer to the Veterinary College of Tehran, where he worked as an associate professor. His teaching activities spanned 30 years, and his students numbered in excess of several hundred.

In 1950 and on his own will, Delpy terminated his 19-year-long employment tenure with the Iranian government and returned to France. Despite fewer years of service compared to Morteza, the Maisons-Alfort-educated veterinarian Dr Aziz Rafie, another close assist of Delpy, was appointed as his immediate succeeding director of the institute. We will probably never know if this was what Delpy might have wished.

In November 1957, Kaveh traveled to London, UK, pursuing his second sabbatical leave. A stay that lasted for nearly a year this time and privileged him to work with British pioneering scientists at the Weybridge Laboratory.

In the years of 1958 to 1960, when Iran was struck by a serious epidemic of African Horse Sickness, Kaveh, along with his colleagues, made history by their quick response in isolating the virus and developing an effective vaccine that helped to control the disease and its subsequent eradication (Figure 7).

In 1960, Kaveh was assigned as the Chief Veterinary Officer of Iran, a position he held for 4 years (Figure 8).

In 1964, Dr Rafiee, suffering from chronic heart problems, decided to leave his position in Karaj to become the principal of Tehran Veterinary College in the city where he resided. In his letter of resignation to the Agriculture Minister, Rafiee recommended that Morteza be the best available candidate to replace him. For a second time in Dr Kaveh's career path, a letter resulted in his promotion, so on 10th March 1965, he was assigned as the third general director of the institute since 1931 (Figure 8).

He remained at this position for 14 years until October 1977. In 1974, an aging Delpy, just a few days after his farewell, traveled along with his wife and his daughter to Iran, succumbed to colon cancer, and sadly passed away in France. Dr Kaveh wrote an emotional memorandum in tribute to his superior that was later published in the Archives of Razi. To the best of our knowledge, his article was the most accurate and informative ever-published

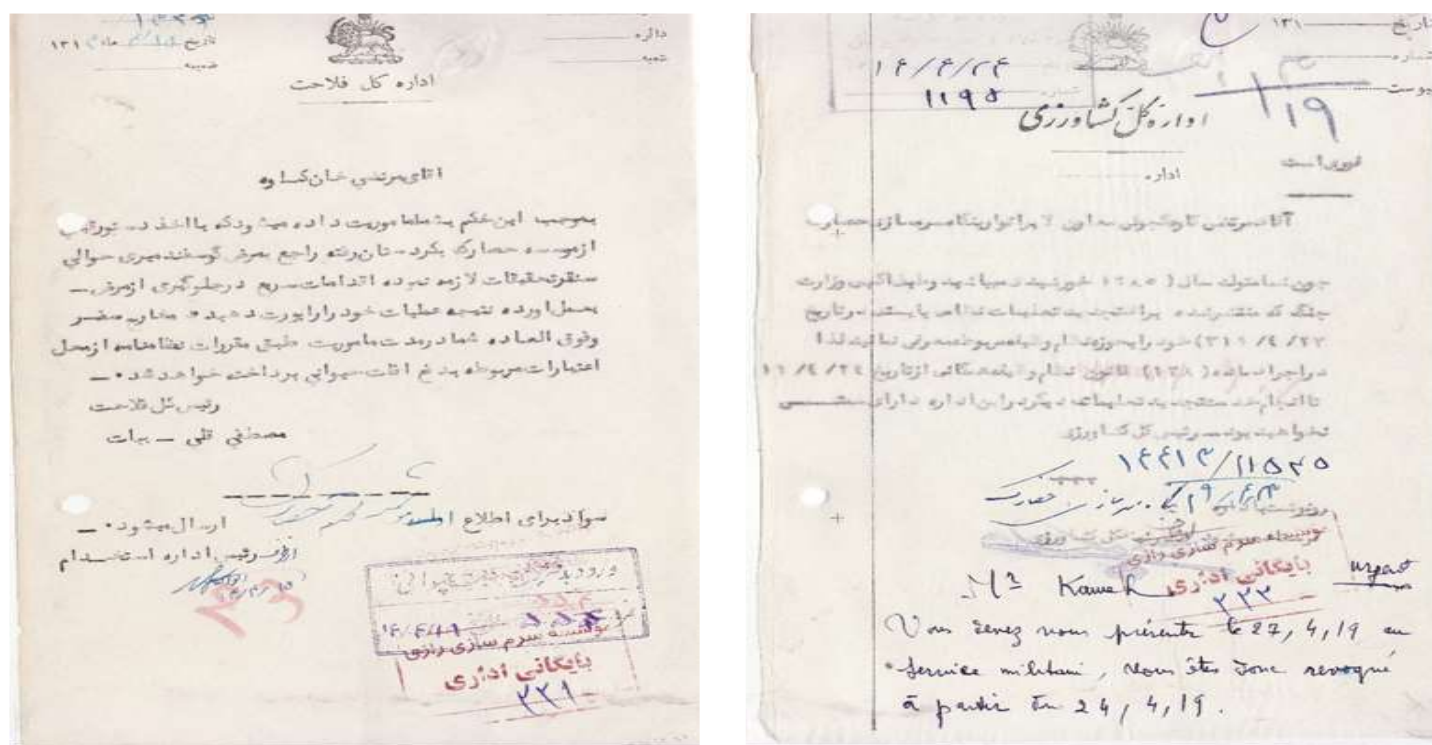


Figure 3. Left: The mission order issued by Mostafa Qolikhhan Bayat in 1935 detailing Dr Kaveh's deployment to Kordistan, Right: Dr Kaveh was called up in 1935 for the annual military training.



Figure 4. The veterinary doctorate diploma was conferred upon Dr Kaveh. He graduated from the veterinary college of Tehran university in 1938.

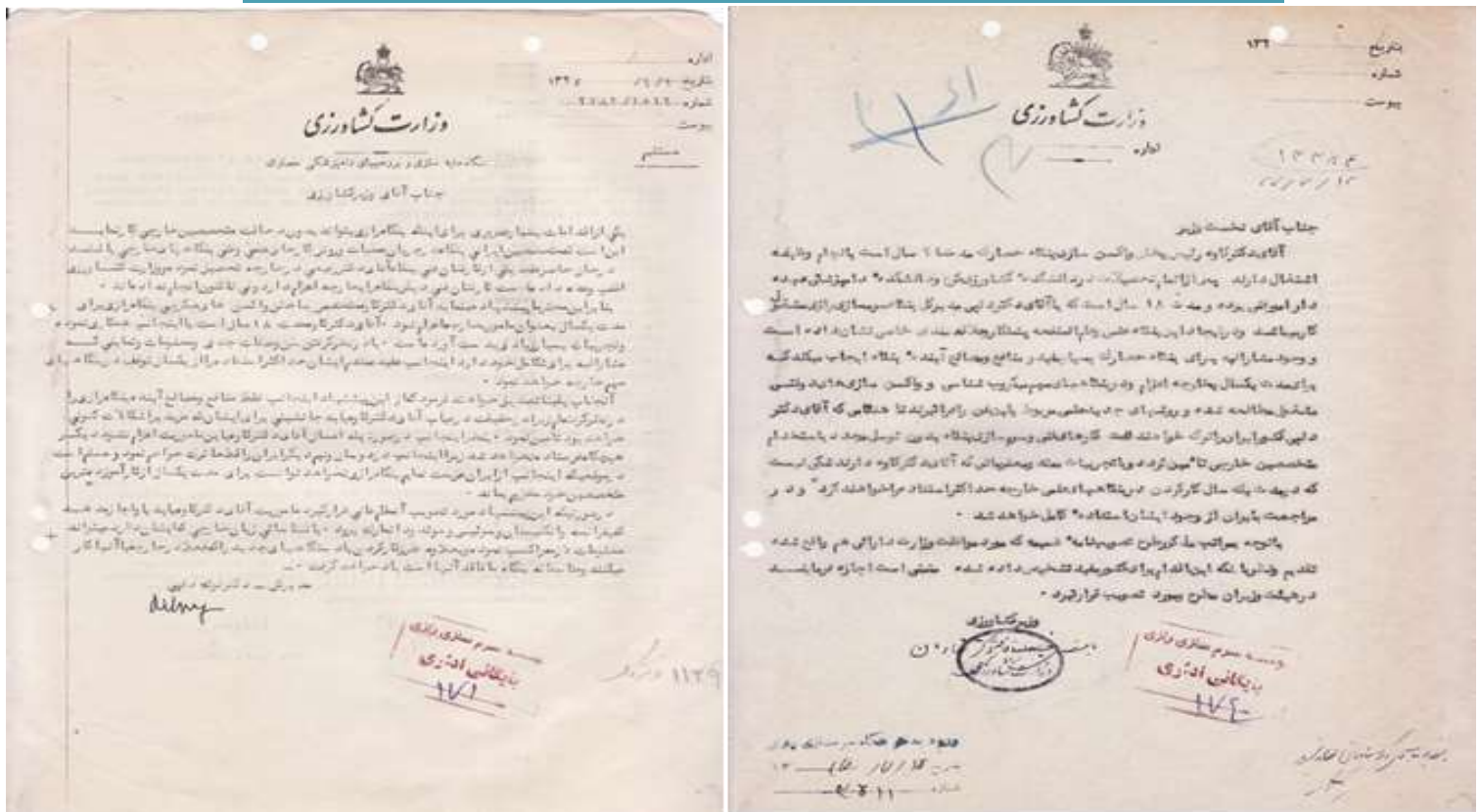


Figure 5. Left: Dr Delpy's letter to the Iranian Minister of Agriculture in 1948 in favor of Dr Kaveh, a rare letter of this type; **Right:** The Iranian Minister of Agriculture, Seyyed Fakhroddin Shademan corresponded with Premier Abdolhoseein Hazgir in 1948 about assigning Dr Kaveh to a training mission.

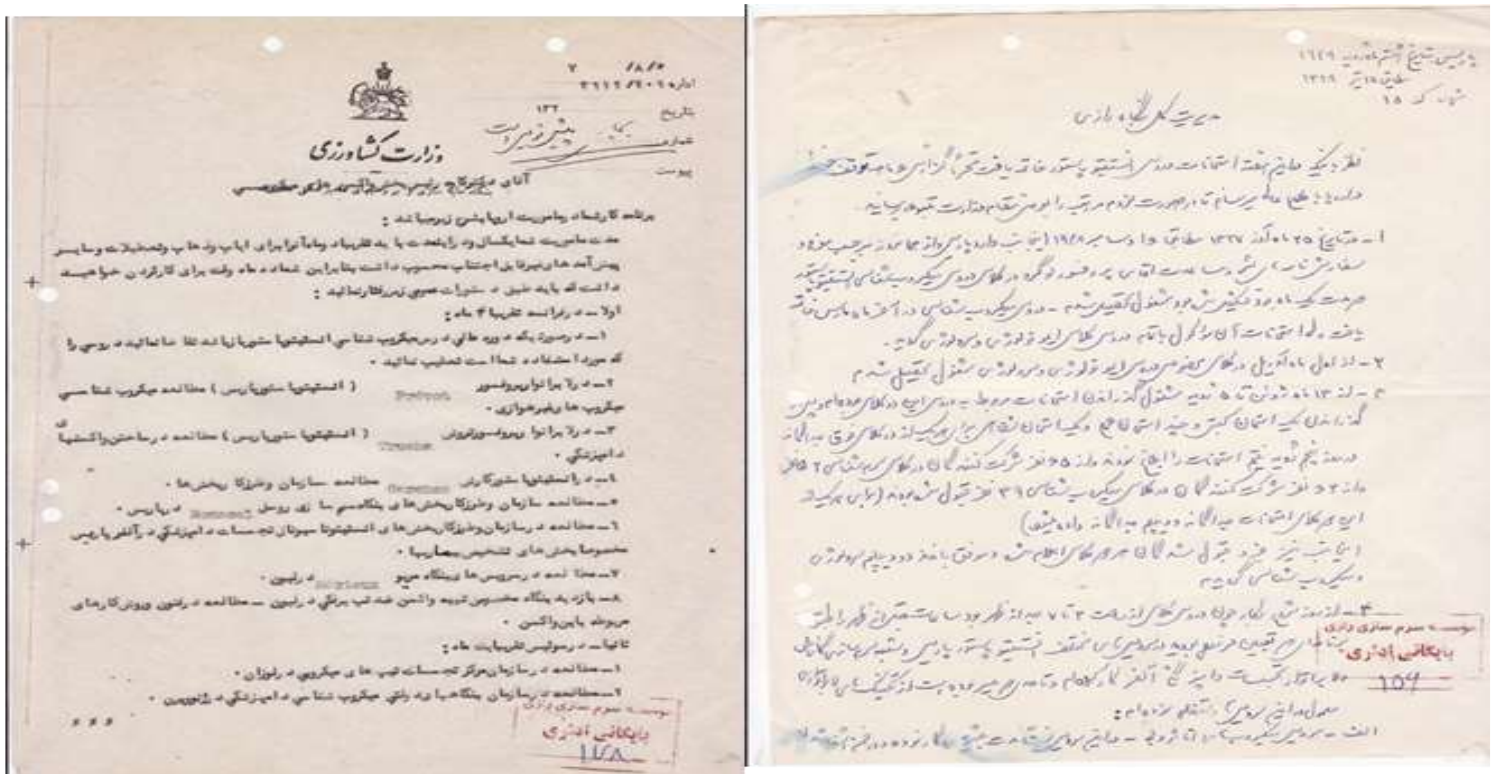


Figure 6. Left: The training plan arranged by Dr Delpy for Dr Kaveh's sabbatical leave in 1948, **Right:** A single page of Dr Kaveh's handwritten sabbatical report.

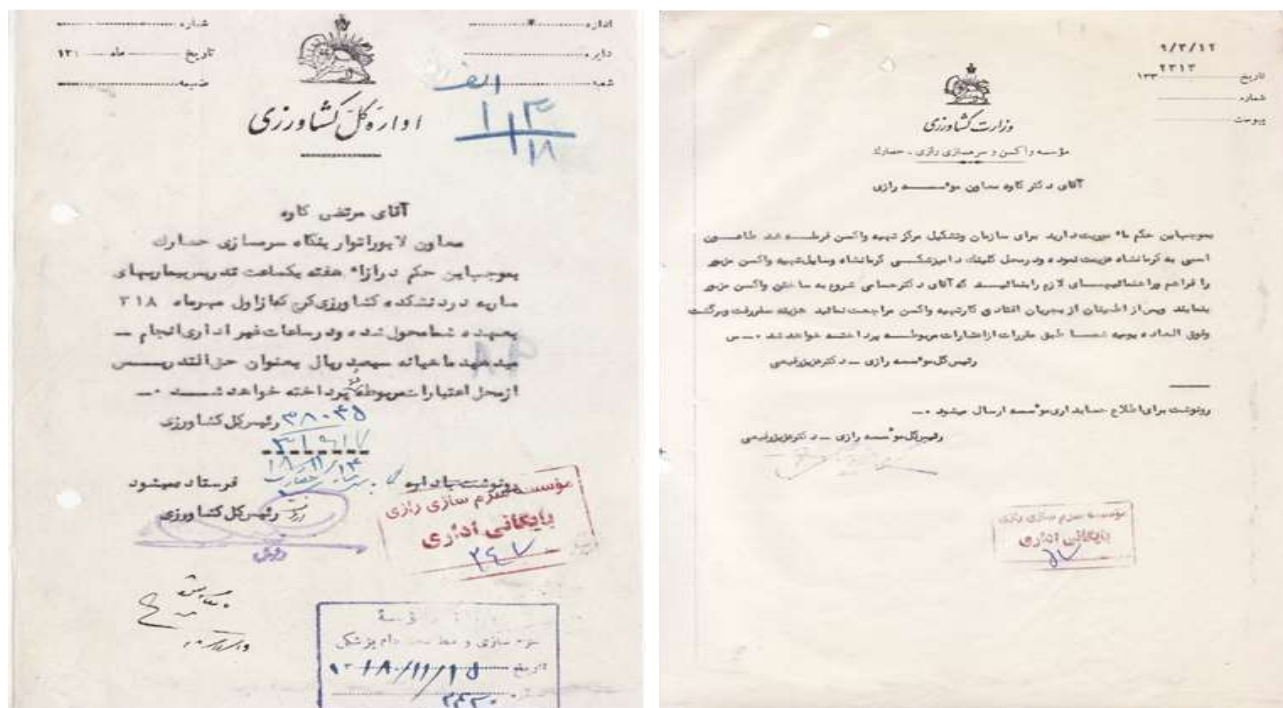


Figure 7. Left: Dr Kaveh's tuition assignment order in 1939, **Right:** The mission order issued by general director of Razi tasking Dr Kaveh to prepare vaccine against African Horse Sickness in Kermanshah, west of Iran in 1953, Down: A group photo capturing members of the Institute's High Council at the end of their meeting in 1988.

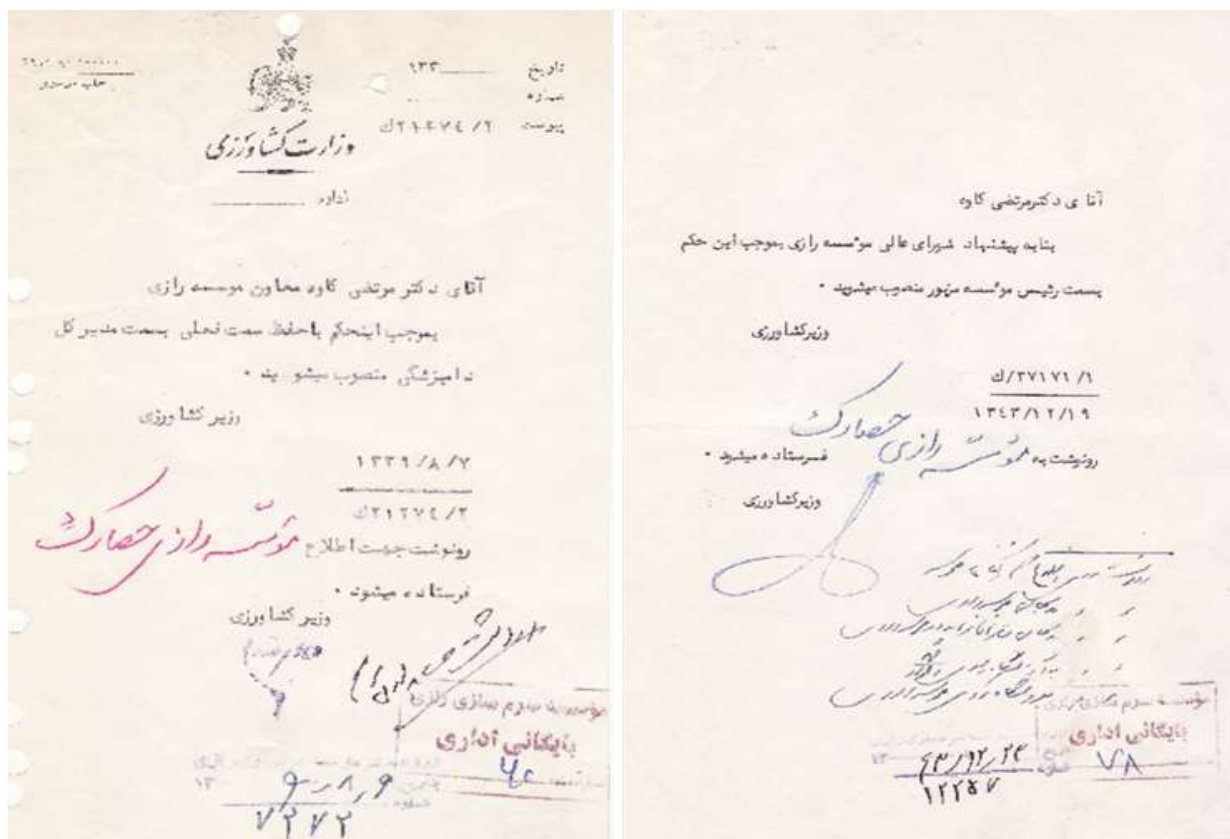


Figure 8. Official appointment of Dr Kaveh as general director of Iranian Veterinary Organization in 1960; Right: Official appointment of Dr Kaveh as general director of Razi institute in 1964.

material on the life and services of the late Dr Delpy in Iran.

In October 1977, Morteza was appointed as the deputy Minister of Agriculture. The same year, he visited Morocco to attend the Brucellosis symposium and Lyon's FMD institute in France. He remained active in the office until June 1979, when he finally opted to retire. In September 1979, he moved to Minnesota, USA, to visit his second son, Mostafa, where he settled and lived most of his retirement years. In winter 1986, on a typical freezing, icy day in Minneapolis, he walked out of his residence to drop a few letters in the postbox. As age took its toll, on his way back home, he lost his feet, fell on the ground, and broke his hip. In December 1987, he decided to visit Iran. He had a one-night stopover in London to stay at his elder son's house. He rejected Fereydoon's begging to stay longer and took the earliest available flight the next day, instead. On arrival, he was fully exhausted, and his health deteriorated. While still in Tehran, a fatal heart attack struck him two days later on 10th September 1987, which sealed his fate.

Kaveh's contributions

Dr Morteza Kaveh, was privileged to work for many years alongside his charismatic superior, Dr Delpy. Beyond his academic life and achievements, Morteza was a multi-talented man, a constructive critic, and a good friend with a very characteristic sense of humor, displaying a role model for people around him.

In spite of his many work commitments at the institute, Morteza used to devote time to a variety of public services. He bought several of the farmland plots neighboring the northern border of the institute's land from local farmers. He annexed these to the main campus and extended the institute's initial territorial boundaries to its current breadth. He played a principal role in the allocation of state funds for the construction of new laboratory buildings and public facilities at the. Under his leadership in the mid-1960s, the first deep water well, along with an elevated potable water tank, the underground water piping system, and the swimming pool of the institute were constructed and inaugurated.

Besides, Dr Kaveh truly did a lot of good to modernize the very small and underdeveloped neighboring village of

Hessarak. He leased a property on the opposite side of the institute's southern main gate and converted this place into a primary school. He also facilitated the construction work to renovate the village's first primary school that was inaugurated in 1936 (Figure 9). Dr Kaveh enrolled a large number of unemployed Hessarak villagers,

mostly illiterate, as laborers to improve the health and economy of their families in the poor neighborhood society. On many occasions, a grandfather, along with his son and his grandson, worked for the institute. Further, he was a major figure at the Karaj Agrarian Reform council, which he was a member of for many years. Dr Kaveh was a frequent lecturer at various governmental, academic, and civic institutions in Iran. Many, if not all, the Maple trees that we see today on the institute's campus were planted by his own hands. Dr Kaveh received many honors throughout his career. In 1960, while still on his sabbatical visit abroad, he received a three-month bursary granted by the British Council in Tehran to extend his research work in London.

In 1962, he became the President of the Iranian Veterinary Association. In 1968, in recognition of his exceptional life-long contributions to the establishment and progress of the country, Dr Kaveh received the National Sustainable Development medal that was awarded by the contemporary Minister of Agriculture, Dr Hassan Zahedi, on behalf of the King. In 1979, following his retirement order, Dr Ali Mohammad Izadi, the Agriculture Minister of the time, praised him for his 54 years of service to the nation. A full list of Dr Kaveh's publications is available at the bottom of this manuscript.

On his death, Dr Kaveh was survived by his three sons, Fereydoun of London, from his first marriage, UK; Mostafa and Farrokh, both from the USA; and his daughter, Fereshteh, of Germany, all from his second marriage.

In the years after his death, a number of tribute articles were written to honour Dr Kaveh's most notable contributions by Dr Kamran Afsharpad, Dr Hasan Tadjbakhsh, and Dr Hasan Maljaei.

A memorial postage stamp was issued in 2015 to commemorate Dr Kaveh's fruitful life and his valuable contribution to the vaccine industry in Iran. In January 2015, a bronze bust of him was inaugurated and erected at the entrance of the institute's directorate building. In 2017, the main conference hall of the institute was named after him. In 2025, with the consent of his elder son, Fereydoun, who was visiting the institute, a new tombstone was erected at his grave at Behesht-e-Zahra cemetery.

Concloutoin

The death of Morteza Kaveh in 1987 brought to an end an era of unprecedented fast-track development in the field of manufacturing biologicals in Iran. With him, we lost a one-of-a-kind scientist in veterinary vaccinology. Given the fact that Razi community has probably not done enough to fully recognize Kaveh's accomplishments, authors would have hoped that this paper helps to shed some light on the overlooked areas of the life and career of the late Dr Kaveh.

Farewell, Dr Kaveh.



Figure 9. Inauguration of the Hessarak village's first primary school in 1936.

Dr Kaveh's published Books

- 1) Rastgar Reza, Kaveh Morteza, Shimi Ahmad. *Infectious Diseases of Livestock*. Tehran: University of Tehran, 1961 .(in Persian)
- 2) Kaveh Morteza, Baharsfat Manouchehr, Moghadam Parvin. *The Structure of Viruses*. Karaj :(in Persian)
- 3) Rastagar Reza, Kaveh Morteza, Shimi Ahmad. *General Microbiology and Zoology*. Tehran: University of Tehran, 1958 .(in Persian)

Acknowledgment

We are thankful to Behrouz Heidarzadeh for his encouraging words and generosity in supplying material from his archive, his constructive comments, as well as factual and chronological information that was essential for the historical accuracy of this article. We wish to thank Dr Kaveh's first son, Fereydoun, also Keshani brothers, and many more Razi retired employees for sharing their old photos and lovely memories.

We are much indebted to Morteza Akbarian, Ghasem Sarpanah, Mohammad Kazemi, Mehdi Tojjari, and Mr Jamshidi for letting us have full access to the personnel file of Dr Kaveh.

The financial and logistical support to this study was provided by the Razi Vaccine & Serum Research Institute (RVSRI) under grant number 3-18-1852-026-010483.

Authors' Contribution

All authors contributed to the conceptual outline, drafts, and revisions of the article and approved it for publication.

Ethics

Not Applicable.

Conflict of Interest

The authors declare that this work was conducted in the absence of any commercial or financial relationships bearing a potential conflict of interest.

Data Availability

The data that support the findings of this study are available on request from the corresponding author.

References

1. Delpy LP, Kaveh M. Nevrauxite enzootique des jeunes Chevreux. Archives of Razi Institute 1939; 1(1): 60-66.
2. Kaveh M, Entessar F. Action de diverses preparations denommees (vitamin b1) sur les cultures de Leishmania tropica. Archives of Razi Institute 1946; 5(1): 78-79.
3. Néel R, Kaveh M, Jorgensen K, Taslimi H. Introduction a l'etude de salmonella et des salmonelloses en Iran. Archives of Razi Institute 1951; 8(1): 28-35.
4. Néel R, Le Minor L, Kaveh M. Une nouvelle espece de salmonella isolee chez un corbeau (Corvus corax): s. Hessarak. Archives of Razi Institute 1951; 8(1): 55-58.
5. Rafyi A, Kaveh M, Ramiar H. La conservation du virus de la peste bovine par lyophilisation. Archives of Razi Institute 1955; 9(1): 82-84.
6. Kaveh M, Sohrab V, Baharsefat M. Bovine Pasteurellosis in Iran. Archives of Razi Institute 1960; 12(1): 99-105.
7. Kaveh M. Participation de l'Institut Razi dans la lutte contre les nouvelles Epizooties de la Peste Equine. Archives of Razi Institute 1967; 19(1): 1-3.
8. Rafyi A, Giraud M, Kaveh M, Santucci J, Arshadi M, Amighi M, Gilbert H, Stellmann C. Etude Sérologique de souches du virus de la Fièvre Aphteuse au Moyen-Orient. Archives of Razi Institute 1969; 21(1): 39-46.
9. Kaveh M, Baharsefat M. Reducing Anthrax Infection in Man through Animal Vaccination in Iran. Archives of Razi Institute 1975; 27(1): 3-9.