## **Pharmacology Department**

The department staff at that time was Professor Sobue, Assistant Iga, Research Assistant Hashimoto, Yamanaka, Maeda, and staff Yoshii, Urata, Igasaki, and Maeda.

The situation at the time of the bombing

Professor Sobue was exposed to the bombing in the laboratory. He was taken to the hospital corridor, then moved to Professor Sano's house on the 11th and received further treatment, but died about 1:00 p.m. on the 16th. Other department staff were also exposed to the atomic bomb in the department building and died.

Biography of late Professor Kanbun Sobue

Junior Fifth Rank, M.D., Ph.D., professor of pharmacology

24 December	1895	Born in Tokyo
March	1926	Graduated from Tokyo Imperial University School of Medicine
April	1922	Appointed Assistant at Tokyo Imperial University, specializing in
		internal medicine
July	1925	Appointed Assistant at the same university, specializing in
		pharmacology
April	1945	Appointed professor at Nagasaki Medical College
9 August	1945	Exposed to the atomic bomb on campus and died in the line of duty
		on the 16th.

## Main research topics

Research to clarify roles of quinine and its derivative involving proliferative activity of transplantable cancer with rats

## Official position and name of the deceased

Official position Name
Professor Kanbun Sobue
Assistant Yukitomo Iga
Chemistry research assistant Yoneko Hashimoto
Chemistry research assistant Fujiko Yamanaka

Chemistry research assistant Maeda (first name unknown)

Staff Shoko Urata
Staff Asataro Yoshii
Staff Masako Maeda

Memories

Tatsuko Sobue

My husband left Tokyo for Nagasaki on 3 May 1945. He was born in Tokyo and had never left the city, so he must have been very worried to leave his family behind, especially when the city was under air-raids as Japan's defeat was near at the time. After it was confirmed that he was going to Nagasaki, we thought about moving together as a family, but as we did not have a house in Nagasaki and for the air-defense reasons in Tokyo, the community group did not allow us to easily leave our house empty. My husband said that he would later ask one of his former students in Isahaya about a house. Nonetheless, Nagasaki was still quiet compared to Tokyo, and I heard that people laughed at my husband's protective hood and gaiters, which he wore on his commute to his department. After he returned once in mid-June and stayed for a week, the situation in Nagasaki gradually became serious, and as air-raid shelters were dug, my husband wrote to us, "It seems like I had come all the way to Nagasaki just to supervise the digging." The corridors and the other parts were demolished and disconnected to prevent the College buildings from further damage once another disaster occurred.

In July, I was told that my husband would be back in Tokyo on the 18th, but his schedule gradually changed, and he was finally confirmed that he would teach during the summer holiday and leave Nagasaki on 8 August. He had earlier decided that he would return one month from the day he left Tokyo. Back then, it took ten to fifteen days even for express mail, so when we heard the change of schedule often, I was afraid that even if I sent him a letter, it would arrive after his departure, so I refrained from replying to him. My husband was always the one to send letters to us as his only consolation was communication with us, but there were times when I did not send anything, and I regret that to this day.

Since it was decided that he would leave Nagasaki on 8 August, we were just waiting for the day, when a new type of bomb was dropped on Hiroshima, followed by Nagasaki but the newspapers reported only about Hiroshima and not a word about Nagasaki, so while we were concerned, we gradually came to understand that my husband, who had left Nagasaki, must have been helping victims of the bombing in Hiroshima on his way as a medical doctor. In the midst of the worry, we tried to find peace of mind. However, one day, a friend of my son visited us from far away bringing a newspaper reporting about the Nagasaki bombing in detail. We were surprised by a picture of Nagasaki, which became a scorched land, but not knowing the

name of the area in Nagasaki or places where major buildings were, we did not know whether my husband had also become a victim or whether the College had been damaged. I visited Dr. Ryutaro Azuma, professor of pharmacology at Tokyo University, who lived nearby, and asked about many things. Days passed while worrying, when around 25 August, a research manuscript in my husband's handwriting arrived from Nagasaki postmarked on 16 August with our address written by him as well, so all our long distress was gone at once. The postmark was the day after the end of the war. As both the envelope and paper inside were in my husband's handwriting, it seemed certain that he was alive. Since then, the family became completely cheerful, so that even when a telegram informing "Father passed away. The details will be in the following letter" arrived on 2 September, I jumped and ran to our entrance expecting some kind of good news. Upon receiving the telegram, we were instantly thrown into despair. An hour or two later, my husband returned home with a piece of bone in a flower base carried by Dr. Sano. The professor sent the telegram ten days ago, but it took ten days to arrive. It was then that I heard from Dr. Sano the story about how my husband met the disaster in Nagasaki, leading to his death.

President Tsuno'o traveled through Hiroshima on the way back from Tokyo and witnessed the devastation caused by a new type of bomb, so on 8 August, he summoned everyone and told them to be extra vigilant, but on the following day, the same type of bomb was dropped in Nagasaki.

My husband was supposed to leave Nagasaki in the afternoon of the 8th, but when he went to the station, he was told that there was a derailment of a freight car in Kokura and it would take time to recover, so he postponed his departure to the next day. At 11:00 a.m. on the 9th, after the air-raid alarm was lifted, the bomb was dropped, and Nagasaki turned into a city of death instantly. Students attending the lectures became skeletons in the same sitting position as before; some of the teachers who had gone out due to some business were still missing. My husband was lying on a couch in his laboratory as he was waiting for the time to return to Tokyo, and he struggled through beams that fell on top of him but went outside, then spent two nights in a back mountain. Dr. Sano, who had a visitor from the countryside, luckily took a leave on that day and stayed at his house, and escaped the disaster. When he went to rescue doctors, he was informed that Sobue was in the mountain behind, so he went to search for him and eventually found my husband lying on a straw mat in the corridor of the concrete ward (assuming Obstetrics and Gynecology Department, which was saved from the fire). He immediately carried my husband to his home on a stretcher.

The stretcher was prepared for the President, but his condition was already so bad that there was a high risk of moving him to his home, so they continued treating him in a tunnel shelter. On the other hand, my husband was given very good care at Dr. Sano's house and became much better by the third day. His wounds were not too serious. There were bigger wounds on his forehead and on his wrist, which were about 2 cm, but others were small cuts, and I remember hearing that they

were all over his body.

It was not season, so he was only wearing a shirt and trousers. So when he slept outside for two nights, someone gave him a "haori (short coat for kimono)." There was no food, but he could drink water, and he suffered from severe diarrhea.

When he got better on the third day, he sent a letter to us in Tokyo. Of course, this letter was delivered much later than his bones were returned, but the contents showed that he had never dreamt of his death and wanted to return to Tokyo as soon as possible, that he was grateful for the care provided by the family of Dr. Sano, and that the new bomb was very powerful so we should be careful and evacuate to an air-raid shelter under any circumstances.

The next day, on the 14th, when Dr. Sano returned home, his wife came running out saying, "Hurry up," because my husband was having trouble breathing and giving the doctor's wife a hard time asking her to lend a knife so that he could operate on himself. I forgot to mention that a little while ago, his lips became dry, and inside of his mouth was swollen, which were the common symptoms of everyone at that time. Dr. Sano immediately went to my husband, and told him that he needed to disinfect anyway if the incision was to be made, and gave him some kind of injection, so the lonely sick man's mood was calmed with the doctor beside him, and the incision was forgotten. However, my husband's condition gradually deteriorated, and he passed away around 1:00 p.m. on the 16th. At that time, Dr. Sano was taking care of yet another professor whose symptoms were almost the same as my husband's, and he passed away around the same time.

I have forgotten his name, but he had a house and family in Nagasaki, and he died at his home.

Both this doctor and my husband were cremated by Dr. Sano in a vacant field next to the College, and as there was not even an urn, the doctor stored the bones in a flower base and carried them to us.

Thus, on 2 September 1945, we lost all hope for my husband's return, but what we did not understand was his manuscript postmarked on the 16th, which had temporarily brought us great relief. As we could not get the answer, I finally shared the story with the post office, requested an investigation later, and received a reply shortly afterwards. According to the reply, there was a young woman working in the laboratory for my husband, and she lived in a boarding house at that time. On the morning of the 9th, her parents asked her to take a day off since they thought that the risk was high on that day, but she told them that she had to go as it was the day of the professor's departure to Tokyo. She asked her parents to post a package with the manuscript inside as she left for College, so her parents posted it on the 16th. Unfortunately, that young lady also became a victim.

(Resident of 1289, 2-chrome Shimoshakujii, Nerima-ku, Tokyo)

Yoshito Kobayashi

He joined the Internal Medicine Department led by Professor Inada after graduating from Tokyo University School of Medicine in 1926, and then the Pharmacology Department in 1926. I joined the Pharmacology Department in October in the same year, so it was almost as if we started studying pharmacology at the same time. Later, he had to suspend his research temporarily. I do not know the circumstances at that time, but I have heard that there was an economic reason. Once the doctor opened his practice in Asakusa, his outstanding reputation as a field medical practitioner was confirmed by the fact that there were always crowds of patients in front of his clinic and that he did not have enough time for house calls, even if he drove around in his car. It was also said that he was one of the most successful practitioners in Tokyo in terms of income.

It was 1934 when he reappeared in the Pharmacology Department. He wanted to resume research in his spare time. He chose "Chemotherapy of malignant tumors" as his research topic. One might think that it would be challenging to tackle this huge research topic when your body and mind were exhausted from treating patients, but the doctor was vigorous with joy as his longheld hope came true. Since then, a luxury car has been parked at the entrance of the Pharmacology Department all day long. The number of days the car was parked gradually increased. As the number of days the doctor left his practice to others increased, the number of days he came to the department increased. His research gradually progressed, and his presentations stood out at the Pharmacological Society Conference.

As he gradually moved from a treatment room to the laboratory, there was a discussion about a successor to Nagasaki Medical College's professor of pharmacology. Dr. Sobue was a primary candidate. This recruitment must have been a big deal for the doctor. It was at this point that the doctor made the decision to give up all his work as a medical practitioner and concentrate his life on research. In 1945, when air-raid attacks were intense in Tokyo, the President of Nagasaki Medical College, Dr. Susumu Tsuno'o, visited me and I asked about Dr. Sobue's intent. As a result, in the spring of the same year, he was appointed to Nagasaki. From around May, the doctor went to Nagasaki and started to organize the laboratory. Back then, travelling from Tokyo to Nagasaki was not easy. We were exposed to a constant risk of air-raids. One can guess the doctor's determination.

On 9 August, when the atomic bomb was dropped in Nagasaki, I heard that the doctor was in his laboratory in the College. I also heard that he was not seriously injured at that time. He passed away on 16 August from subacute atomic bomb symptoms. I was later told that he had a ticket to Tokyo departing on 8 August, but it appeared that he had to postpone the departure by a day for

some reason. It was a truly unfortunate day for him.

Unfortunately, the doctor's life work on chemotherapy of malignant tumors was terminated, but there are 19 research papers in a foreign language and in Japanese, including a recently published posthumous article. 19 papers reported by him brilliantly pointed out that the issues were steadily making progress toward a solution.

His appointment to Nagasaki was a step toward the completion of his research, and an extraordinary achievement was expected in the future. Today, after ten years, I feel deeply emotional recalling those days.

(Pharmacology Department, Tokyo University School of Medicine)

Achievements and memories of the late Professor Kanbun Sobue

Yoshiro Nakazawa

Professor Sobue's first paper was on a process of bilirubin reaction, which was published in 1928, but his research presented at the Japanese Pharmacology Society for several years was research to clarify the roles of quinine and its derivatives involving proliferative activity of transplantable cancer in rats, and was probably continued after he was appointed to Nagasaki Medical College.

Professor Sobue devised a new method to measure tumor growth rates and discovered that quinine is one of the elements that suppresses the growth. If this research had been completed, a new field in tumor therapy would have developed, so his untimely death was a truly regrettable loss for academia.

I happened to be Professor Sobue's successor, but I only met him once a year at the Pharmacology Society conference and did not know him personally. So I am not the right person to write Professor Sobue's memoir. Nonetheless, I have decided to write because he left me with a strong impression which are seared into my memory in our short encounter at the Society conferences. Sobue-san was a princely looking young man with fair skin and a beautiful beard, and his casual wear with a hunting cap stood out in conferences. He impressed the audience by explaining with great clarity using his Leica projector and color slide films, which were rare back then. This was probably the impression everyone had, including not only me but all the participants at that time.

The first time I spoke with him was when I was waiting for a train on the underground platform after the Pharmacology Society conference in Tokyo in the autumn of 1943. I asked him for the directions to my destination, and we exchanged two or three words, but his calm manner of speaking with a quiet voice was quite different from high pitched and slightly

intimidating manner he had at the podium. I was surprised, but at the same time, I felt as if I saw the warm side of him. Moreover, this was the last talk with Sobue-san.

In 1950, after the war, Professor Emeritus Haruo Hayashi traveled all the way from Tokyo to participate in the Pharmacology Society Southwest District meeting held at Nagasaki University. Suddenly, the professor requested a visit to pay respect at the grave of the victims of the atomic bombing, and as we did not have much time before the next appointment, I hurriedly led him to Gubiroga Hill. The elderly Dr. Hayashi walked with a long stride on an uncleaned path with rubble to the top of the hill all at once. He was so energetic that Professor Kumagaya of Tokyo University, who accompanied him, and I were both out of breath and barely managed to follow him. Dr. Hayashi offered a long, silent prayer in front of the cenotaph. I also bowed and thought about Professor Sobue. At that moment, I realized that the reason why the doctor carried his old body to Nagasaki despite various post-war inconveniences was to pray for the repose of the soul of his beloved disciple, Dr. Kanbun Sobue, who lay in the ground of Urakami. I thought about how much Dr. Hayashi had expected Sobue-san's distinguishing brightness and saw a beautiful love of a master towards his student. That energetic Dr. Haruo Hayashi also passed away last year. I can not help imagining that he is talking about Nagasaki with Sobue-san in heaven.

(Written on 8 August 1955, Pharmacology Department)

Yukitomo

Hisako Iga

Oh, 9 August, the anniversary of the atomic bombing, the day I try to forget but can not, is again approaching.

As this year marks the 10th anniversary, my memories are especially emotional. Ten years ago on that day, I was far away in Matsuyama, Shikoku, unable to focus on any work due to the daily air-raids and thinking only about escaping. We sent our old mother away to the countryside for evacuation, and as my husband also stayed out of the city most of the time, as he was sick, I was the only one who stayed to look after our house. So I thought I could be killed any day, but I never dreamt that my son would die. I heard about the news that a new type of bomb was dropped in Nagasaki without any serious damage due to cloudy weather, but I had more concerns for myself, so I did not have time to worry about my son. Soon, the war ended on the 15th, and suddenly I started to be anxious, so I did my best asking for information. At first, I had no information, but then I heard that Nagasaki Medical College had been totally destroyed, so I made a painstaking effort to get a train ticket and left on the morning of 21 August. I arrived in Nagasaki on the following day and saw brutal devastation beyond imagination. Yukitomo's death was confirmed,

and I received his remains. I was taken by such a surprise at first that I could not shed a drop of tear, but after receiving the bones and a short rest, I regained my composure and began to cry. Then, holding the bones in the heat, I went to the city office and police to complete the necessary procedures and immediately jumped on a train back home, as I did not want to stay in such an unpleasant place even for an hour. Suffering and sorrow during the coming and going back on the train can not be described by someone like me. When I returned home and held the funeral, my husband became bedridden out of despair and passed away in the spring of 1946, followed by our old mother's death in 1947, and now I am all alone. Because of the misfortunes followed by another, I was emotionally confused, and I did not know what was happening, but today, I regained peace and am looking forward to visiting Nagasaki for the memorial day as if I had seen the deceased when he was alive. I will visit again in the future, as it is a consolation in my old age.

(Resident of Minami Tachibana-cho, Matsuyama city)