

The Collection and Image Database of Japanese Old Photographs in Bakumatsu-Meiji Period of Nagasaki University Library

by

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Nagasaki University Library began collecting old Japanese photographs, digitizing the images, and entering them into an on-line public database early on. Today, visitors from all over the world can access this site. The collection currently boasts 7,100 photos, making it one of the largest in Japan. This report intends to illustrate how Nagasaki University developed the database and how it is being used.

Key words: *Japanese Old Photographs, Database, Bakumatsu, Meiji, Nagasaki University Library*

1. Introduction

The photo collection of the Nagasaki University Library ‘Japanese Old Photographs in Bakumatsu-Meiji Period’ is one of the largest in Japan. These photographs not only depict what Japan was like in those days, but at the same time are valuable source materials for research on old photographic techniques and the photographers from the dawn of Japanese photography.

Nagasaki University Library started collecting old photographs in 1988 and quickly began digitizing these images for database input. In 1998, the database went on-line for public access in English as well as Japanese.

In 2003, 501 of the old photos were viewable in high definition, meaning that the images could be enlarged to up to 10 times their original size. The database has been accessed continuously within Japan as well as internationally for such varied purposes as research, education, publication, broadcasting, and other websites.

This report will discuss the contents of the collection, how the image data base came about, and how it is being used.

2. Nagasaki University Library - Japanese Old Photographs in Bakumatsu-Meiji Period

2.1 Details of the Acquisition of the Collection

The bulk of the old photographs collection was obtained methodically with funds designated by the Ministry of Education, Culture, Sports, Science, and Technology for such purposes. Between 1988 and 2003, photographs by Kinbei KUSAKABE, Felice BEATO, Hikoma UENO, and others were purchased on five separate occasions. Since most of these had been taken abroad as souvenirs by foreigners who had visited Japan, they had to be purchased abroad.

After 1988-2003, Nagasaki University Library has continued to acquire old photos and currently owns roughly 7,100 old photos, including donated ones.

In 2007, 528 photographs of the Bauduin Collection were added, and the collection was designated as the national registered, tangible, cultural property for the first time among printed photographs in Japan²⁾.

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2.2 The Old Photographs

(1) Time Period

The old photographs were mainly produced between 1858 and 1897, i.e., following the opening of the country to foreign trade in the Bakumatsu period through the middle of the Meiji period during the modernization of Japan.

In addition to the fact that these photos represent vivid images of Japan those days, they provide us with valuable research sources on old photographic techniques and the photographers from the dawn of Japanese photography. Except for a few that were taken in China and Canada, most of the photographs were taken in Japan¹⁾.

(2) Subjects

The old photographs fall into two subject categories: 1) 'Views' (landscapes) and 2) 'Manners and Costumes' (people and their customs and habits).

1) 'Views' photos include cityscapes, touristic spots, and nature. Views, streets, and buildings in the cityscape photos were mainly taken in major Japanese cities like

Tokyo, Osaka, Kyoto as well as Nagasaki, Kobe, Yokohama, and Hakodate, where there were foreign settlements.

As for touristic locations, photos taken in Nikko, Hakone outnumber the others, but some famous sites of the Kiso Highway and hot springs across the nation are also included. Scenic shots of Mt. Fuji, taken from all directions, are especially outstanding.

Photos documenting the Nobi Earthquake and photos of the damage caused by typhoons are valuable historic records.

2) Among 'Manners and Costumes' photos are portraits of people of all ages: children and the elderly, men and women, photos of clothing and tattoos, some cultural photos such as household chores, baby minding, tea ceremony, flower arrangements, and the brothels and pleasure quarters unique to Japan. These Bakumatsu to mid-Meiji Period photos capture Japanese nature and cities as well as the people's manners and customs from a cultural anthropological point of view, as Japan was becoming a modern nation¹⁾.



Photo. 1 The valuable material cabinet in the Nagasaki University Library



Photo. 3 Inside of an album 1 (hand-tinted)



Photo. 2 Album cover



Photo. 4 Inside of an album 2 (hand-tinted)



Photo. 5 Single photo (hand-tinted)



Photo. 7 Stereo photo



Photo. 6 Photo from "The Far East"



Photo. 8 Slide photo

2.3 Categorization of the old photographs

The Nagasaki University Library Old Photograph Collection is classified into six categories: 1)photo albums, 2)single photos, 3)photos from the English newspaper "The Far East", 4)stereo photos, 5)slides, and 6)photographic equipment. These materials are preserved in the valuable material cabinet in the Nagasaki University Library shown in Photo. 1.

1) The photo albums contain many photographs. Album covers made between the late 1880s and the beginning of the 1900s have mother-of-pearl inlay and are gold-lacquered. These albums were called "The Yokohama Photos" and taken to Europe or the United States as souvenirs. (Shown in Photo. 2, Photo. 3 and Photo. 4)

2) Single photos are those that have been removed from their albums and exist as single pieces (shown in Photo. 5). There is no way of knowing how they fit into the original albums.

3) The English newspaper "The Far East" was published between 1870 and 1875 in Yokohama and

photographs were glued directly to the newspaper (shown in Photo. 6). Since these photographs first appeared in newspapers, we can accurately discern the dates they were taken.

4) A 3D image can be seen when looking at two stereographs with a two-lensed viewer such as a pair of binoculars (shown in Photo. 7). Nagasaki University Library owns about 200 stereo photos.

5) Slides are the photos for the slides which were directly hand-tinted onto glass plates (shown in Photo. 8). Some photos were made for the so-called magic lanterns in which clear images were projected onto a wall by passing light from a lantern through a translucent photographic glass plate. There are 130 slides.

2.4 Characteristics of the old photographs

The defining characteristics of the photographs of the Bakumatsu-Meiji period are 1)historical relevance, 2)beautiful colors, and 3)the high quality of the images.

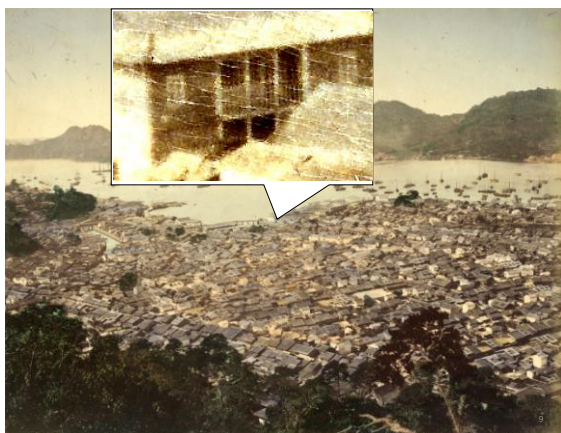


Photo. 9 Bird's-eye view photo and its enlargement (part) 1

(1) Historical Relevance

As mentioned above, the subjects of the old photographs are 'Views' (landscapes) and 'Manners and Costumes' (people's manners and customs) during the Bakumatsu-Meiji period. Among the 'Views' photos, we can appreciate the cities across Japan, the famous sights, and the beautiful natural sites. Among the photos of 'Manners and Costumes', we get a glimpse into the lives of the Japanese through portraits of its people, and photos of work scenes, commercial activities, and farming.

These photos trace the nation's rapid transition from its period of early modernization to modern time and contain vast amounts of information regarding the cities and daily lives of those days. In order to utilize the historical value of the photographs in its possession, Nagasaki University created the 'Image Database of the Old Photograph Collection in Bakumatsu-Meiji Period,' and made it available online.

(2) The Beauty of the Colors

Many photos in the albums of the time were hand-tinted. These beautifully and intricately colored photos have artistic merit different from color prints. They were very popular among foreigners visiting Japan.

(3) The Quality of the Image Information

One of the photo's defining features of which people are rarely aware is the high quality of the images. Bird's-eye view photographs of cities in particular, illustrate this feature. When we enlarge some photos, we can see not only the details of the streets and buildings, but also the clothing and facial expressions of the people.

In Photo. 9 and Photo. 10, each individual roof tile can be discerned, and the people standing on the small bridge



Photo. 10 Bird's-eye view photo and its enlargement (part) 2

can easily be identified. Possible reasons for this are that the photo plates used were much larger than present day film. Others have also suggested that the image clarity was due to the much cleaner and clearer air of the time.

In order to provide detailed information on the old photos, Nagasaki University created the 'High-definition Image Database of Old Photographs of Japan during the Bakumatsu-Meiji Period' subsequent to the creation of the 'Image Database of the Old Photograph Collection in Bakumatsu-Meiji Period' and made it available online.

3. Building and Opening to the Public of the Image Database

3.1 Database of "the Old Photograph Collection in the Bakumatsu-Meiji Period"

Nagasaki University Library began digitizing the photographs into a database early on for the purpose of publicizing the old photographs online to the world. We first made the database of "the Old Photograph Collection in Bakumatsu-Meiji Period" available online in 1988. The original database consisted of about 2,500 photographs.

We carefully designed a site that would be easily accessible to anyone by using maps and keywords. 1) All photos descriptions--available in both Japanese and English--were limited to 100 to 150 words per photo. 2) We organized the search keys so that people could search intuitively. There are four categories to start one's search from: description of the photo, keyword, location on the map, and by the cabinet number and album name. In short, we aimed for a user-friendly web design and search

method. Because no other old Japanese photograph database existed online, and possibly owing to the site's search methods and its access to both Japanese and English speakers, our initial database attracted wide attention from both the domestic community and from the world at large.

In order to comply with the international academic information exchange, the database was upgraded to the international metadata standard in 2006 and renamed 'Metadata Database of Japanese Old Photographs in the Bakumatsu-Meiji Period.'³⁾ Since then, more images have been added to the online collection, which now consists of about 6,800 photos⁴⁾.

3.2 High-definition Image Database of Old Photographs of Japan

Since 1999, Nagasaki University had been experimenting with the high-definition image database using FlashPix and, in 2003, launched, "the High-definition Image Database of Old Photographs of Japan." 501 old photographs (201 Nagasaki photos and 300 photos from around Japan) were chosen from the collection. Taking advantage of the high quality of the images, they can be enlarged up to 10 times giving the viewer access to the photos most minute details.

Symbols and icons are used to enlarge the images so that anyone, regardless of his/her age or language, can magnify the images with simple mouse clicks. In addition, image icons and maps make it easier for those who do not speak English or Japanese to easily search for photographs.

Another noteworthy point is that the descriptions (about 400 Japanese words) of the high-definition photographs were written by experts residing in the areas where the photographs were shot, and these can be read, both, in Japanese and in English.

3.3 Transition of the Site to the Present State

Since its inception, these databases have attracted a number of visitors from across the world and has been used for research, education, publication, broadcasting, other websites, etc. Also as the number of the old photos has increased, the database has been in a continuous state of upgrading. In 2007, 528 old photographs from albums collected by the Dutch Bauduin Brothers, who were closely affiliated with our university, were added to the collection. This led to the launch of 'the Bauduin Collection' in 2009.

In 2011, the super high-definition image database was upgraded for increased efficiency⁵⁾.

4. How to use the Old Photo Database

4.1 The Old Photograph Collection in Bakumatsu-Meiji Period

The top page of the old photo site is shown in Fig. 1⁴⁾. The official name of the site is "The Nagasaki University Library Collection of Japanese Old Photographs in Bakumatsu-Meiji Period," but on the database it is exhibited as "Metadata Database of Japanese Old Photographs in Bakumatsu-Meiji Period."

The current database contains four ways to search: photographers, category or keyword, locations, and advanced search. (Shown in Fig.2 through Fig.5.) Fig. 6 shows the actual page after the search is complete. On the page, the information is displayed as metadata along with a description of the photo: the photo ID number, photographer, the name of the album, place, date, color, size, cabinet, and keyword.

4.2 High-definition Image Database of Old Photographs of Japan

501 of the 6,800 photos can be viewed in high-definition and are directly linked to the images in the metadata (as in Fig. 7). By clicking the high definition icon adjacent to each image, the viewer can examine an enlarged version of the photo (as shown in Fig. 8). Fig. 9 exhibits the largest image possible. One can zoom in and out using the +/- scale bar at the bottom.

4.3 Access from Nagasaki University Library Homepage

Nagasaki University Digital Collection⁷⁾ was added to the Nagasaki University Library homepage⁶⁾ in 2009, becoming another valuable asset to the university. The icon for this site appears at the top right of the library homepage as shown in Fig. 10. The first, second, and third links from the top of the list in Fig. 11 are 'Japanese Old Photographs in Bakumatsu-Meiji Period⁴⁾,' 'High-definition Image Database of Old Photographs of Japan⁵⁾,' and 'the Bauduin Collection⁸⁾,' respectively, and the sites of which can be accessed from there. Table.1 shows the timetable of our past work.

Japanese Old Photographs, Database, Bakumatsu, Meiji, Nagasaki University Library



Fig. 1 The top page of the old photo site

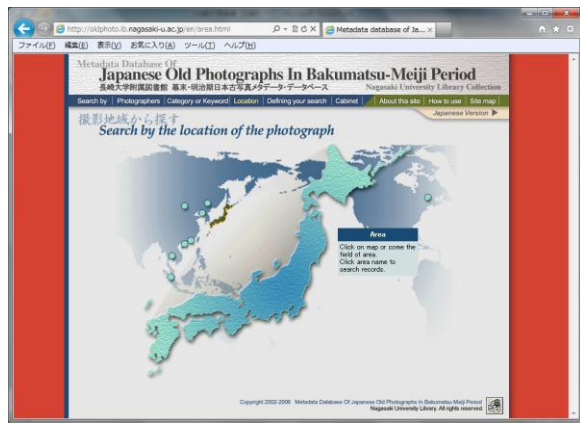


Fig. 4 Search by location



Fig. 2 Search by photographers

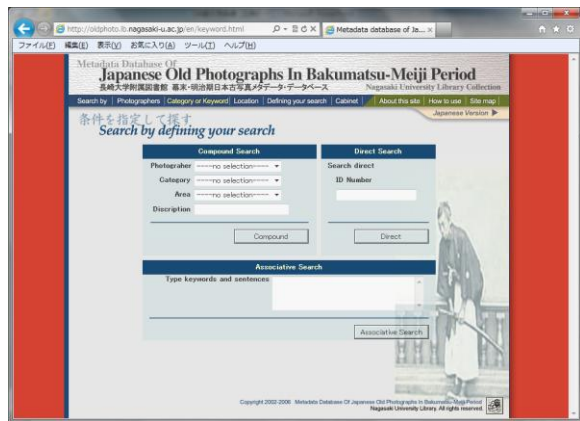


Fig. 5 Advanced search



Fig. 3 Search by category or keyword



Fig. 6 Actual page after the search is completed

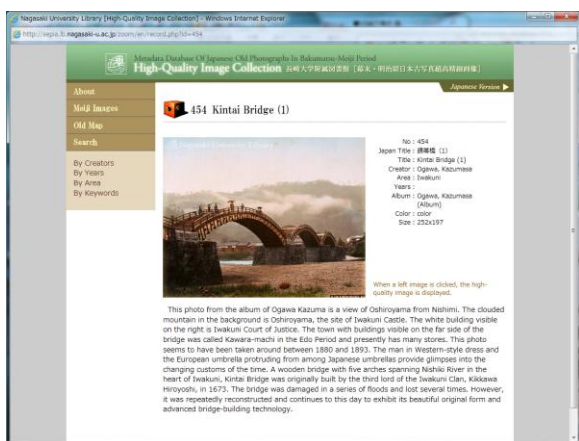


Fig. 7 Record of high-definition image



Fig. 10 Nagasaki University Library homepage

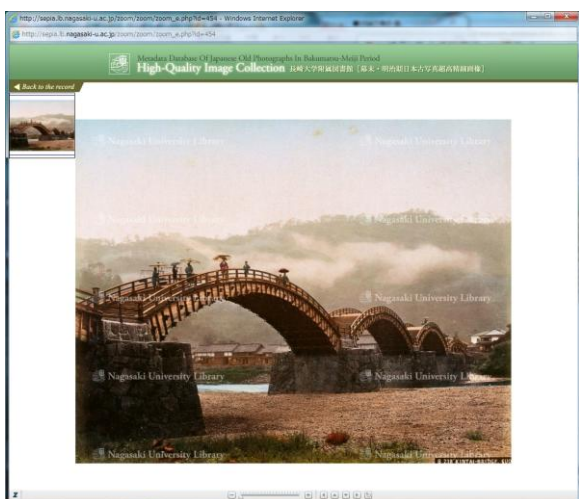


Fig. 8 Enlarged version of the photo



Fig. 11 Nagasaki University Digital Collection

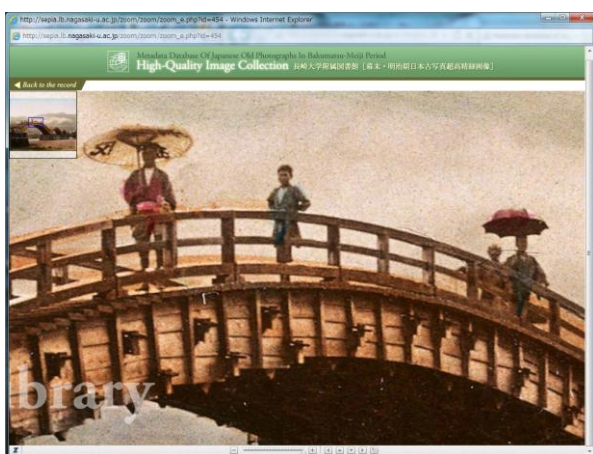


Fig. 9 The largest image possible

Table. 1 History of the development of Nagasaki University Old Photograph Database

1988	The multi-stage plan regarding the acquisition of the old photographs (~2002)
1998	The launch of the “Japanese Old Photographs in Bakumatsu-Meiji Period” [Database(A)]
2003	“High-Definition Image Database of Old Photographs of Japan” was put online [Database(B)]: 501 photos from Database(A) can be enlarged.
2006	Metadata Database came online [Database(C)]: replaced (A)
2009	“The Bauduin Collection” was put online [Database (D)]
2011	Updated the high-definition image database(B)

5. Conclusion

As mentioned above, Nagasaki University began collecting old photographs, design the database, and introduce these data online early on. It has been nearly 14 years since we launched our first online database. Meanwhile, the research on both the old photographs and the database has advanced; therefore, some upgrading of our database has been necessary. We are constantly refining the descriptions of the photos and improving the search operations.

Nonetheless, we consider the task of formatting this massive volume of old photographs, its descriptions, and the metadata into a single database so early in the history of the web to be a great accomplishment. As we continue improving this pioneer database of old photography, we do so with the ambition of making it more educational, accessible, and enjoyable to its visitors.

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