The Preservation of Railway Heritage in Japan: An Outline History and General View

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Introduction

The first railway museum in Japan was opened in 1921, but the first museum for preservation of steam locomotives in working order was opened in 1972, as the Umekoji Steam Locomotive Museum. Although the last steam trains on Japanese National Railways (JNR) ceased commercial operations in 1975, regular steam operations restarted in the following year on Oigawa Railway, a private rural railway in Shizuoka Prefecture. The revival of steam locomotive means a creation of new tourism resources, as well as preservation of railway heritage in regional societies. From these early beginnings the number of preserved railways operating steam locomotives and other old rolling stock has increased throughout Japan. This article describes the general history of preserved railways in Japan with some specific examples.

Prewar Railway Museums

The first railway in Japan, owned and operated by the Japanese government, was opened between Shimbashi in Tokyo and Yokohama in 1872 with the technical leadership of British engineers. Most of the materials for railway construction and rolling stock were imported from Britain, but American and German manufacturers soon became suppliers to Japanese railways. Private railways extended their main-line network from 1883 but most were nationalized in 1906–07.

In 1911, a railway museum project was started and began preserving railway heritage, such as locomotive No. 1, a 2-4-0 tank engine built by Vulcan Foundry in 1871; *Benkei*, a 2-6-0 lightweight tender engine built by H. K. Porter in 1880 belonging to the first group of locomotives in Hokkaido; *Zenko*, a 0-6-0 saddle tank engine built by Manning Wardle in 1880 for construction



Yoshitsune belonged to the first group locomotives built by H. K. Porter in 1880 for the Hokkaido Coalmine and Railway. Restored in 1952 and still in working order, it is preserved at the Modern Transportation Museum in Osaka, and is occasionally dispatched to exhibitions or festivals. (1990) (Author)

works of Nippon Railway—the first private railway; and two early Imperial carriages. The railway museum was provisionally opened in 1921 at Tokyo Station, but found its final location in 1936 at Mansebashi Station, the former temporary terminus of the Chuo Line. (The station was later abandoned in 1943.) This was the sole museum related to railway history in prewar days, and it was reorganized as the Transport Museum after WWII.

Preservation of Steam Locos in 1950s and 1960s

From the latter half of the 1950s, Japan experienced high economic growth and the demand for railway traffic increased. Although manufacturing of steam locomotives for JNR ended in 1949, the number of steam operating kilometers continued to increase until 1956. However electrification and conversion to diesel started in 1950s, so the main motive power changed gradually from steam locos to electric and diesel multiple units (EMUs and DMUs). In 1951, Professor Eiichi Shimazaki of Hokkaido University published *Hokkaido no kikansha ni tsuite* (About locomotives

in Hokkaido) I, II and III on locomotives working in Hokkaido's coalmines, and described two valuable heritage locomotives working in a rolling stock builder's works in Osaka and Muroran steelworks in Hokkaido. They were Yoshitsune and Shizuka 2-6-0 tender engines built by H. K. Porter in 1880 and 1882, respectively, and named after a Japanese medieval hero and heroine; Benkei, another 2-6-0 of the same class was preserved in prewar at the Transport Museum. These articles triggered restoration of the two locomotives by JNR in 1952 to commemorate the 80th anniversary of Japanese railways. Yoshitsune was restored to working order and was preserved at Takatori Works in Kobe; *Shizuka* was located at the Naebo Works in Hokkaido.

The 1962 opening of Ome Railway Park in the western suburbs of Tokyo was another step symbolizing progress in preserving railway heritage. Eight steam locomotives and two deluxe carriages, representing the development of Japanese motive power and passenger service were assembled in the park, which was the first open-air railway museum in Japan. However, none of the eight locomotives were in working order.

Two other important railway museums were also opened in 1962: the Otaru Transportation Museum in Hokkaido and the Modern Transportation Museum in Osaka. *Shizuka* was moved from Naebo Works to the former museum in 1962 and *Yoshitsune* was moved from Takatori Works to the latter museum in 1962.

Start of Working Order Preservation

The Meijimura Museum in the northern suburbs of Nagoya opened in 1965 was originally established to preserve architectural heritage, but two classic streetcars were preserved in 1967 to transport visitors around the large openair museum. They were two-axle wooden small electric trams belonging to Kyoto Municipal Transportation Bureau with an open motorman's seat and clerestory roof that had been retired from service in 1961. This was the first permanent museum for preservation of railway heritage in working order. The museum also preserved two Imperial carriages built in 1902 and 1910 as well as a steam railcar, but none are in working order. Another important heritage item in this museum is a Britishbuilt truss bridge (1875), originally used across the Tama River between Tokyo and Yokohama and on which a Brooks (1897) 4-4-2 tank engine is stationed.

The 1972 opening of the Umekoji Steam



A two-axle electric tram in Meijimura Museum, purchased from Kyoto Municipal Transport Bureau in 1967 and restored for operation inside the open-air museum. This tram is believed to have been built at the turn of the century. (1997) (Author)

Locomotive Museum to commemorate the 100th anniversary of Japanese railways was a great step in preserving railway heritage in working order. The museum was a former 1914 engine shed near Kyoto Station with a roundhouse and a turntable. Eighteen steam locomotives representing the standard JNR types were selected from all across Japan; 14 were repaired and kept in working order but this was later cut to six in working order. Some locomotives were operated inside the museum each day and others were occasionally dispatched to haul special tourist trains. In 1974, the Meijimura Museum started regular steam operations on a 743-m track using two locomotives and three small wooden carriages. The locos consisted of a Sharp Stewart 2-4-0 tank engine (1874) and a Baldwin 0-6-0 tank engine (1912). The former was the oldest locomotive in working order in Japan and worked the Kobe-Osaka-Kyoto section of the early government railways.

Withdrawal of Regular Steam Operations

JNR announced its long-term plan to withdraw steam locomotives from regular

operations in 1959. By March 1961, JNR had electrified 2699 km of lines (13.2% of total of 20,482 km) and was operating 3974 steam locomotives, compared to 794 electric locomotives and 245 diesel locomotives. Electrification of main lines progressed rapidly during the 1960s and 1970s, reaching 4228 km (20.4%) in 1965, 6021 km (28.8%) in 1970, and 7628 km (35.9%) in 1975. Operations by EMUs and DMUs expanded across Japan and the last JNR steam passenger train ran on the Muroran Line in Hokkaido on 14 December 1975. The last steam freight train ran on 27 January 1976 and the last steam shunting ended in March of the same year.

A few private lines to coalmines in Hokkaido continued steam operations beyond 1970. Oyubari Line of Mitsubishi Coalmine closed in 1975, and the Yubari Railway—a subsidiary of Hokkaido Coalmine and Navigation—stopped steam operations in March 1976.

Oigawa Railway Pioneering Preserved Steam Railways

The Oigawa Railway is a 65-km local private railway in Shizuoka Prefecture running along the valley of the Oi River



Yamaguchi tourist steam train about to depart from Ogori Station. The Class C57 Pacific (4-6-2) tender loco was built in 1937 as the standard model for passenger trains on main lines. It is dispatched from the Umekoji Steam Locomotive Museum. (1999) (Author)

Maruseppu Forest Railway, a 1.8-km, 2'6" gauge line, was restored in a recreation area in Hokkaido in 1979. The locomotive is a small 0-6-0 tank engine built by Amemiya Works in 1928. (1999) (Author)

between Ikawa and Kanaya, where it connects with the Tokaido main line. It was opened during 1927-31 to transport materials for building hydropower stations and to transport lumber from the upper reaches of the river. The line between Kanaya and Senyu was electrified in 1949 and the steam locomotives were sold. From the late 1960s, traffic on the Oigawa Railway declined as a result of motorization and during 1970-75, the railway operated steam holiday trains along a siding in Senzu Station using some small locomotives. In 1976, steam operations began between Kanaya and Senzu (39.5 km) under the strong leadership of Akira Shirai (Director of Train Operations and later Vice President), who intended to create both a new tourism resource and a means of preserving railway heritage. A Class C11 (2-6-4 standard tank engine for short-distance trains, built in 1932-46) and a group of passenger carriages built during the 1930s and 1940s were purchased from JNR for the holiday train, which ran every Sunday and holiday except during winter. The steam operations attracted many tourists to the Oi River valley, which has some very scenic spots and hot spring resorts.

The Oigawa Railway continued to develop steam operations by purchasing more locomotives and passenger carriages. In 2001, the company had five steam locomotives and 15 carriages in working order and ran regular steam trains every day including winter. Some deluxe express EMUs used in metropolitan areas have also been purchased for regular services.

Japan National Trust and Trust Train

Information on preserved railways in Europe and the USA appeared in some railway magazines in Japan from the late 1960s. The first attempt to promote funds for preserving railway heritage in Japan was made by the Rasuchijin Railway Institute, which purchased a Japanesebuilt (1930) 2' gauge 0-4-0 light locomotive in 1973 from Keelung Coalmine in Taiwan. The Institute later purchased more locomotives, carriages and wagons. This was followed by the Akamon Narrow Gauge Railway Preservation Society whose members consisted of graduates of the Tokyo University Railway Research Club. They purchased a locomotive shed and a diesel railcar belonging to the abandoned Ogoya Railway (2' 6" gauge) in Ishikawa Prefecture in 1977. Both the Institute and Society continue to maintain and operate their rolling stock.

Larger-scale railway heritage preservation was started by the Japan National Trust, which was established in 1968. This non-profit organization has contributed to purchasing and maintaining some pieces of cultural heritage. In the 1980s, the Trust decided to purchase a Class C12 2-6-2 tank engine, one of JNR's standard locomotives for short-distance trains (built between 1932 and 1947) and three passenger carriages built in 1951 and 1955. Donations from Trust members and sponsors finally enabled purchase of these rolling stock and they were entrusted to Oigawa Railway in 1987. The train is called the 'Trust Train' and operates every Saturday in the summer. Volunteer Trust members maintain and repair the rolling stock under the guidance of Oigawa Railway engineers.

Growth of Preserved Railways, Railway Museums and RPSJ

In 1979, JNR revived steam operations on the Yamaguchi Line between Tsuwano and Ogori where the line connects to the San'yo main line and San'yo Shinkansen, using a steam locomotive dispatched from the Umekoji Steam Locomotive Museum. Since Tsuwano is an old town with a feudal castle and many historic sights, the train drew many tourists and the first projects were soon followed by many similar schemes accompanied by return of more steam locomotives to working order in the 1990s.

Many small-scale preserved railways mainly former forestry railways—have begun operations. Large and small

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① JR Hokkaido Senmo main line (Kushiro–Shibecha) 2 JR Hokkaido Furano Line (Asahikawa-Furano) ③ JR Hokkaido Rumoi main line (Fukagawa–Mashike) ④ JR Hokkaido Hakodate main line (Otaru-Niseko) (5) JR Hokkaido Hakodate main line (Hakodate–Onuma) 6 JR East Ban'etsusai Line (Niitsu-Aizu Wakamatsu) (7) JR East Joetsu Line (Takasaki-Minakami) (8) Chichibu Railway (Kumagaya–Mitsumineguchi) (9) Moka Railway (Shimodate-Motegi) 10 Oigawa Railway (Kanaya–Senzu) ① JR West Hokuriku main line (Maibara–Kinomoto) 12 JR West Yamaguchi Line (Ogori-Tsuwano) 13 JR Kyushu Hohi main line (Kumamoto-Miyaji) A. Maruseppu Forest Railway (Maruseppu) B. Mikasa Railway Museum (Mikasa) C. Otaru Transportation Museum (Otaru) D. Imoko Steam Train (Kahoku) E. Yanagawa Kibo no Mori Park (Yanagawa) F. Greenpia Nihonmatsu (Nihonmatsu) G. Western Village (Imaichi) H. Musashino Mura (Kazo) I. Museum of industrial Technology (Miyashiro) J. Narita Dream Farm (Shimofusa) K. Tokyo Disneyland (Urayasu) L. Usui Pass Railway Monument Park (Matsuida) M. Nobeyama SL Land (Minamimaki) N. Shuzenji Niji no Sato (Shuzenji) O. Aichi Children Land (Hazu) P. Meijimura Museum (Inuyama)

- Q. Umekoji Steam Locomotive Museum (Kyoto)
- R. Yoneyama Industry (Matsuyama)

railway museums have also appeared on abandoned tracks and stations, some running small trains.

In 1990, the Railway Preservation Society of Japan (RPSJ) was formed with members from non-profit organizations, local authorities, railway companies, museums, and amusement parks. The regular meetings discuss and exchange information on maintenance of steam locomotives, financial problems, relationships with regional development, school education on industrial archaeology, etc. In the future, the RPSJ will play a greater role in the field of railway preservation as well as studies of other industrial heritage.

In 2001, the Society members included six commercial railway companies (including four JRs), five museums, three non-profit

organizations, and ten amusement parks or forest recreation areas.

Despite development of preserved railways, the Japanese public does not take much interest in industrial archaeology and heritage and its introduction to the school system is relatively low level. However, I expect to see a gradual future growth in interest. This article was first presented at the international conference 'Slow Train Coming: Heritage Railways in the 21st Century,' held in York in September 2001.

Further Reading

E. Aoki, *Jouki-kikansha no hozon: sono igi to jittai* (The Preservation of Steam Locomotives: Its Significance and Actual Circumstances), *Railway Journal*, No. 61, pp. 62–69, 1971.

S. Yamada, *Jouki-kikansha no fukkatsu* (The Revival of Steam Locomotives), *Railway Pictorial*, No. 531, pp. 10–13, 1990.

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