



Introductory Overview of Stone Heritages in Japan

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ABSTRACT

As one contribution to 'Global Heritage Stone Resources' (GHSR), some stone heritages in Japan, which are nominated in the interim list, are briefly introduced. The geology of Japanese Islands where are the one of the most active areas in the history of the Earth, is very complicated. Therefore Japanese Islands consist of various kinds of minerals and rocks. Some of them were used to make stone implements and accessories. Japanese people also used to the best possible advantage to built tombstone, gate, pavement, and the basement and wall of the large building such as temples, shrines, castles and modern buildings.

1. Stone Heritages of Pre-historical age:

In the late Pleistocene and the early Holocene, ancient Japanese used obsidian cooled rapidly from rhyolitic magma to make small implements and accessories. For example, Shirataki, Hokkaido (north island) is the largest place producing obsidian in Japan where Paleolithic people made arrowhead, knives and so on.

Another example, Jade yielded in Itoigawa City, Japan Sea coast of central Japan, was made in the metamorphic rock about five hundred million years ago. Itoigawa area is only one place where jade is abundantly produced in Japan. Ancient people had been already collected and processed to ornaments although it is very hard and traded in wide area more than several thousand years ago.

2. Stone Heritages of Historical age:

2.1 Archaeological remains: In the Kofun (old mound) period (250 to 538 AD), stone burial chambers were used for old mounds to preserve against the putrefaction and to protect from the theft. For example, Ishibutai Kofun ("ishi" means "stone" and "butai" means "stage") in Nara old capital city, southwest Japan, is the largest known megalithic structure made of granite in Japan.

2.2 Stone walls of some typical castles

Stones used is because of not only the rich reserves of rocks but also restriction of transportation. Osaka (second biggest city) castle, are composed of Cretaceous granite exceeding over 500,000 in number and the largest block is 108 ton in weight. Stones of Hikone Castle came from Paleogene Koto Rhyolite. Edo (old Tokyo, biggest city, central Japan) castle, Imperial Palace at present, Stones are late Quaternary andesite of Hakone Volcanic Products whose quarrying places are more than 100km far from Edo. They were transported by ships and manpower on land.