

The History of 'Uotsukirin' (Fish-Breeding Forest) in Japan

Hiroshi Wakana*

*Muroran Institute of Technology, Hokkaido, Japan
wakana@mmm.muroran-it.ac.jp

The oldest 'Uotsukirin' (Fish-Breeding Forest) in Japan is at Tokushima Prefecture of the 10th century in literature. 'Uotsukirin' existed in all over Japan in the 17th century.

According to the literature, 'Uotsukirin' in Japan were located in the following places (They are written with present Prefecture names).

[1] Tokushima (947-956), [2] Oita (1623), [3] Miyagi (1657), [4] Shizuoka (1713), [5] Nagasaki (1727), [6] Iwate (1736), [7] Yamaguchi (1743), [8] Yamagata (1747), [9] Niigata (1751-1772), [10] Wakayama (1753), [11] Yamaguchi (1775), [12] Tokushima (1781), [13] Shiga (1783-1787), [14] Iwate (1807), [15] Iwate (1816), [16] Oita (1837), [17] Fukuoka (1860), etc.

'Uotsukirin' spread throughout Japan after the 17th century. There were the intentions to promote of the sardine fishing in that background. Sardines were the important industry resources (foods, lamp oil and fish manure) at that time.

In 1623, the southern part of Oita Prefecture (at present), the first lord of feudal clan took out the following direction. "I had heard that sardines don't come near to coast if trees don't grow thickly in the mountain around the seashore. For the promotion of sardine fishing, I forbid firmly felling of the plant in small islands and swiddening in the mountain at the creek". He had become aware of the importance of the sardine in 1604. Huge amounts of sardines were thrown into the inland as fish manure in Japan in the 17-19th century. And so, Japanese agricultures developed.

The Japanese Government enacted the Forest Law in 1897. The protection-forest system was introduced in this Forest Law.

From view of natural science, in the 20th century, the researches of relations between the inland forests and the sea appeared. Dr.ENDO Kichisaburo (Studies on the seaweeds, professor of Sapporo Agricultural College) issued that the cause of 'Isoyake' (rocky-shore denudation) is the devastation of the watershed forests in inland (1902, 1903, etc.). Dr.INUKAI Tetsuo (Zoology, professor of Hokkaido University) issued that forests all over Japan are 'Uotsukirin' (fish-breeding forest)(1937,1951,etc.). Now, fishermen are planting trees eagerly all over country. In the 21st century, 'Uotsukirin' may get over the sea.

Keywords: 'Uotsukirin'(Fish-Breeding Forest), Material Cycle, Fish Manure, Forest Law, Protection Forest