# CHARACTERISTICS OF CULTURAL LANDSCAPE IN THE GATEWAYTOWN OF KUDOYAMA

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ABSTRACT: Managing historic environment and cultural heritage are important not only from the conservation of cultural assets and local environment but it is also necessary to consider the perspectives from the community. This paper aims to examine a case study focusing on houses and local resources in the center of Kudoyama, known as the gateway town to the World Heritage Site, Koyasan in Wakayama, Japan. Study methods used are field observations and literature reviews. From the results, characteristics of the town center of Kudoyama became clear as follows; about half of all houses have been built with single or semi-second story houses to form relatively reduced height of skylines. Thus, it creates viewpoints to surrounding mountains within the town center on undulating landform. In terms of local resources, a variety of natural and historic elements have been found to create a historic environment in town center of Kudoyama. In addition, some traditional design of houses is representing the similarities with surrounding areas of the World Heritage Sites of Yoshino and Koyasan. In future, managing cultural landscape may be necessary to balance the needs of the community and tourism.

Keywords: Historic environment, Cultural heritage, Cultural landscape, The World Heritage Site

### 1. INTRODUCTION

# 1.1 The Definitions of Cultural Landscapes

Managing historic environment and cultural landscape are important not only from the conservation of cultural assets and local environment but it is also necessary to consider the perspectives from the community. There are number of studies regarding on valuing cultural heritage and landscapes can be seen [1,2]. Melnick suggests the importance of 'viewing the landscape from a variety of perspectives' [1]. For instance, 'documented cultural imprints such as battles and literary connections' are well known by the 'outsiders', however, 'customs and experiences that may only be appreciated by the 'insiders' [3]. Therefore, meaning to the people living in the area becomes important when it comes to consider thorough comparison which may deny what has been important to those people [1]. In terms of determining priorities, 'the level of significance', whether world, national, regional, and local 'does not reflect the absolute significance of the landscape' [1]. Moreover, cultural landscapes can be described from a wider scale to clarify the characteristics from the human and other species behavior patterns and understanding of mixture of variety of 'species, places and environmental conditions' in complexity [4]. Thus, it is necessary to focus on the diversity

and identity of cultural landscapes in rapidly changing landscapes and the society to find out the importance of 'coherence between small composing elements in a broader spatial context' and to be able 'to tell the story of the place' [5]. Furthermore, it is suggested the needs of balancing between three aspects as follows; 'distinctive landform and cover, the indivisible multiplicity of functions, and the embedded fabric of stories and memories' [3]. Therefore, this study defines the meaning of cultural landscapes to be a variety of cultural landscape including value and meaning for the community in a wider scale than current situations of different levels of registrations as cultural properties for conservation.

## 1.2 The Aim of the Study and Study Methods

This paper aims to clarify characteristics of cultural landscape focusing on houses and local resources in the center of Kudoyama, known as the gateway town to Koyasan in Wakayama, Japan. It is one of the sites registered as the World Heritage Site by the UNESCO, Sacred Sites and Pilgrimage Routes in the Kii Mountain Range in 2004, and additional minor boundary modifications in 2016. The town has a World Heritage Site, Jison-in temple and Nyukanshofu shrine, along with pilgrimage routes of Choishi-michi, Fudozaka-michi, and Kuroko-michi to Koyasan, as well as a variety of

cultural landscape managed by the community. Study methods used are field observations and literature reviews regarding on cultural landscapes.

#### 1.3 The Outline of the Case Study Location

The town is located at the northeastern part of Wakayama Prefecture. The town of Kudoyama is located along The Kino river which has been a major transportation route by ship between the town of Yoshino, Nara Prefecture and the Wakayama city to carry goods. Therefore, it became a center of a transportation and commerce as a place of unloading at Funato in the town of Kudoyama to Koyasan and surrounding areas since 1601 [6-8]. The town center of Kudoyama is located at the foot of mountains to Koyasan, therefore, it became a gateway town and the pilgrimage routes has been developed (Fig.1). Choishi-michi has been completed in 1285 [9]. Kuroko-michi documented as the route has been used by one of the famous warriors, Hideyoshi Toyotomi to run down with a horse from Koyasan in 1594 [10]. It is also known to be a place lived by famous warriors of Masayuki and Nobushige Sanada.

The town center has a characteristic of traditional houses with narrow streets on undulating landforms, and an independent plateau surrounded by two rivers [11], the Nyu river down the mountains of Koya which joins the Kino river (Figs. 1-3).

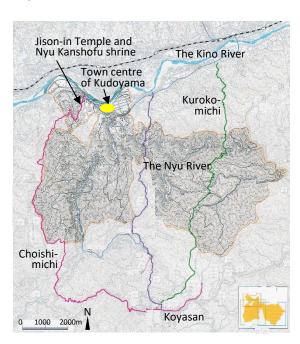


Fig. 1 A map of town of Kudoyama [6] with some amendments

# 2. CLASSIFICATIONS OF HOUSES IN THE TOWN CENTE OF KUDOYAMA

The town is located at the regions of Koya, known as the World Heritage Site, as well as sites which can be seen in the neighboring Yoshino region [13-14]. It is also surrounded by towns and villages with architectural characters at local scale, i.e., village landscapes at Koya paper making villages [15], and townhouses at cities of Hashimoto [16] and Gojo [17].



Fig.2 Undulating landforms and narrow streets



Fig.3 Traditional houses creating townscapes

#### 2.1 A Classification by Numbers of Levels

Single story houses were found at 103 with 32 percent, semi second story houses at 50 with 15 percent, and second story houses at 175 with 53 percent out of 328 houses in total (Table 1, Fig.4). To sum up single and semi second story houses comprise about half of all houses, which can be recognised to be built in traditional styles (Table 1, Fig.4). Single story houses can be found around the Sanada temple, while semi second story houses are located along the second main street near the Sanada temple. Second story houses can be found throughout the town center (Fig.4) [12].

Table 1 A Classification by Numbers of Levels [18]

Items	numbers	percentages
Single story houses	103	32%
Semi second story houses	50	15%
Second story houses	175	53%
Total	328	100%

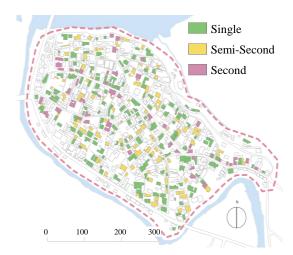


Fig.4 A map of Classification by Numbers of Levels with some amendments [18]

Table 2 A Classification by Roof Styles [18]

Items	numbers	percentages
Gable roofs	173	53%
Gambrel roofs	102	31%
Hipped roofs	35	11%
Semi-Gambrel roofs	8	2%
Flat roofs	4	1%
Thatched roofs	2	1%
Others	4	1%
Total	328	100%

#### 2.2 A Classification by Roof Styles

The results are as follows; gable roofs account for about half of all houses, at 173 with 53 percent, gambrel roofs are at 102 with 31 percent, and hipped roofs are at 35 with 11 percent (Table 2, Fig.5). Therefore, gable roofs are commonly seen, which may be one of the reasons to build houses on the limited land, an independent plateau with higher density in comparison to surrounding areas, such as neighboring district of Nyugo. Gable roofs can be

seen along the Sanada high street, and particularly concentrated around the Western area.

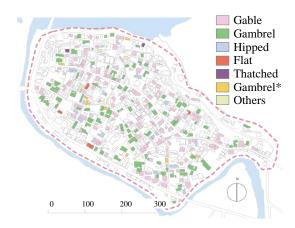


Fig.5 A map of Classification by Roof Styles with some amendments [18]
Gambrel\*: Semi-Gambrel

On the other hand, gambrel roofs are located at the Southern area, along the Sanada temple (Fig.5). Thatched roofs do exist although at a very limited numbers with two houses. It used to be thatched before, but now has been covered by the tin roofs [12]. This represents the traditional housing styles with the drawings in sites of interests of Kii area in the late Edo period [7].

# 2.3 A Classification by Ridge-end Tiles

The results are as follows; Ornamental borders are commonly seen at 190 with 65 percent, ogre shaped are seen at 63 with 21 percent, and jewel shaped are at 16 with 5 percent (Table 3, Fig.6). Some ogre shaped are designed with other tiles and plasters. Some houses are decorating ogre shaped tiles in the entrances or gardens; therefore, it is possible to imagine that is used to be placed on the roof top in the past times. Ornamental borders can be seen throughout the town center, whereas ogre shaped are seen along the Sanada street (Fig.6) [12].

Table 3 A Classification by Ridge-end Tiles [18]

Items	numbers	percentages
Ornamental borders	190	65%
Ogre shaped	63	21%
Jewel shaped	16	5%
Family crest	2	1%
Others	22	8%
Total	293	100%

Note: No ridge-end tiles at 28, and Unidentified at 17.

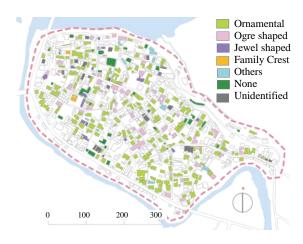


Fig.6 A map of Classification by Ridge-end Tiles with some amendments[18]

#### 2.4 Characteristics of Traditional Houses

A significant number of single-story houses are plastered on the wall. To include partial plaster, it sums up to 50 houses. Semi second story houses can be divided into higher and lower height on the second floor which reflects architecture styles of different time. On the second floor, a window style called 'Mushiko' (refer to as an insect cage) was found at 14 houses, and 13 houses are plastered into a square timber like shaped. Second story houses are relatively newly built. However, some houses are built in the traditional style, i.e., lattice, plaster, etc [12].

A building style of 'Yoshinodate' was found at four houses. The building style can be seen around the region of Yoshino, Nara Prefecture. It utilizes steep slopes to create basements by adjusting to landforms, therefore, a bottom of basements became limited and a foundation are created by terraced stone walls [13-14]. Thus, it may be one of the reasons to utilize undulating landforms in town center of Kudoyama.

# 2.4.1 Details of the design of houses

Traditional houses in town center of Kudoyama have details of the design, such as, lattices (Fig.7), traditionally designed windows called 'Mushiko' (Fig.8), chimneys on a roof with tiles (Fig.9), and wooden bars on the edge of the eaves. Houses with lattices were found at 35 houses. This may be due to keep privacy and surveillance from narrow streets with high density of houses in town center [12].

Traditionally designed windows were seen at 14 houses with semi-second story houses, and most of them were designed in square shapes to illustrate the characteristics of timbers. Chimneys on a roof with tiles were found at 5 houses, which can be seen in traditionally designed houses. Wooden bars on the edge of the eaves were seen at 15 houses, which

is a common design feature in towns and villages around Koyasan [12].

#### 2.5 A Classification by Uses of Houses

The most common uses of houses were residences, and merchant houses have been built along the Sanada street (Fig.10). Some of residences at present have been built with a signboard architecture, so that it is possible to imagine the houses have been used to be merchant houses in the past. In addition, some merchant houses are single story or semi-second story houses, and it have been built with a traditional design. Moreover, a few factories have been confirmed. According to the interviews to the residents, a saw-



Fig.7 A lattice under the eaves



Fig.8 A traditionally designed window



Fig.9 A chimney on a roof with tiles

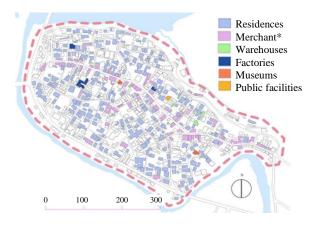


Fig.10 A map of Classification by Uses of houses with some amendments[18]

Merchant\*: Merchant houses

tooth roof textile factory used to produce cotton fabrics and had been sold at the Sanada street in the past. From the above, these houses and buildings remaining at present can be said to be the important which represents the history and people's life of the town center [12].

# 3. LOCAL RESOURCES IN THE TOWN CENTRE OF KUDOYAMA

In this section, it aims to clarify the characteristics of local resources from a classification and a distribution in town center of Kudoyama. Local resources also reflect natural and historic environments of the area, and it may be necessary to examine the management and conservation as well as houses and buildings [19]. Miyayama and Kamihogi introduces the concept of local resources represented by 'natural elements' to inherit the local history and culture, i.e., landforms, rivers, and streets; and 'historic elements' of monuments and sights of interests, as well as the wider understandings of landscapes and spaces [20]. Therefore, this study aims to clarify natural elements and historic elements.

### 3.1 Characteristics of Local Resources

From the results, a variety of local resources have been become clear and managed by people in the area. In terms of classification, natural elements were found at 224, and historic elements were at 7. Natural elements can be divided into leveling at 115, pine trees at 94, and wells at 15. Historic elements were found with shrines for residences at 4 and monuments at 3 (Tables 4-5) [19].

Levelling is largely formed with stone walls particularly along the Kino river and the Nyu river to represent characteristics of undulating landforms. Stone walls which includes chlorite schist, a locally produced stone, account for about half of levelling

with a count of 62 (Figs.11-12). Pine trees can be Table 4 A Classification of Natural Elements [19]

Items	numbers	percentages
Levelling	115	51%
Pine trees	94	42%
Wells	15	7%
Total	224	100%

Table 5 A Classification of Historic Elements [19]

Items	numbers	percentages
Shrines for residences	4	57%
Monuments	3	43%
Total	7	100%



Fig.11 Stone walls forming townscapes

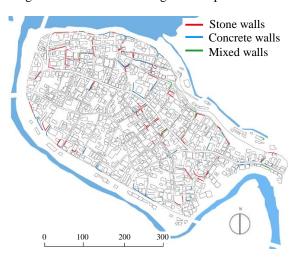


Fig.12 A map of Levelling with some amendments [21]

found in the gardens or entrances of houses (Fig.13). There are a variety of sizes of pine trees from potted plants to large trees. Several trees planted nearby, and large trees are becoming as landmarks to create characteristics of historic environment and townscapes (Fig.14) [19].

From the above, a variety of local resources can be

seen in town center of Kudoyama which is managed regularly by people in the area.

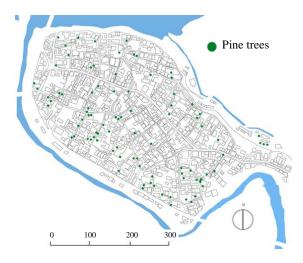


Fig.13 A map of Pine Trees with some amendments [21]



Fig.14 Pine trees creating townscapes

#### 4. CONCLUSIONS

From the results, characteristics of the town center of Kudoyama became clear as follows; about half of all houses have been built with single or semi-second story houses to form relatively reduced height of skylines. Thus, it creates viewpoints to surrounding mountains within the town center on undulating landform. In terms of local resources, a variety of natural and historic elements have been found to create historic environments in town center of Kudoyama. In addition, some traditional design of houses is representing the similarities with surrounding areas of the World Heritage Sites of Yoshino and Koyasan. In future, managing cultural landscape may be necessary to balance the needs of the community and tourism.

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