

# **Comparison of the Periodization Methodologies of the Korean Bronze Age and the Japanese Yayoi Period**

**Yi Kisung**

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In this article, I will examine the research history of subdivision/periodization of Korea's Bronze Age and Japan's Yayoi period and compare the methodologies of the two countries. The subdivisions of the Korean Bronze Age and the Japanese Yayoi period are similar in that they set changes in pottery as the basis, but show clear differences in their contents. The subdivision of the Korean Bronze Age set at first the changes in metalware and later the changes in pottery as the standard. However, after the concept of "types" was introduced, cultural epochs became the standard. Of course, periodization is initially done using material culture including pottery, followed by cultural interpretations of other archaeological aspects. However, it can be seen as a methodological limitation. The subdivision of the Japanese Yayoi period, however, used changes in pottery as the standard since the formation of Japanese archaeology. Whether good or bad, it is said to be the most important characteristic of Japanese archaeology. Of course, the idea is that classification is not simply based on changes in pottery form but includes changes in pottery types under the concept of "model," but is limited in its actual application.

Keywords: Bronze Age, Yayoi period, periodization, type, pottery

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## **1. Introduction**

Periodization and subdivision of such periods are the most basic tasks of archaeology. The most well-known archaeological periodization scheme is Christian Jürgensen Thomsen's three-age system, which divides human prehistory

into Stone Age, Bronze Age, and Iron Age according to their respective predominant tool-making materials. As a general rule, however, different regions use their own period names for the three-age system. In Korea, for example, its prehistoric age is periodized into the Paleolithic Age, Neolithic Age, and Bronze Age. In Japan, it is divided into the Paleolithic Age, Jomon period, and Yayoi period. Although significant differences exist between the period's cultural contents and the definitions of such contents, the two regions are identical in the sense that they use the changes in economic occupations as critical factors in periodization.

However, the two regions differ in their methods of subdivision. The most generally accepted method of subdivision is to divide a period into early, middle, and later eras (Hamada 1922). Therefore, the periodization method that sets its standard as an epoch that is not specific to a certain civilization is generally accepted as the appropriate method. However, in actual archaeological research, it is not always the case that such a standard is used. Not only is it true that archaeological artifacts discovered during excavations do not always reflect the social changes of the period, but there is even a discrepancy between the points in which artifacts reflect changes in society to the actual point in which the changes occur. Therefore, it is generally the case that periodization is mostly decided by excavated artifacts—pottery in most cases. The Bronze Age of Korea and the Yayoi period of Japan are identical in the sense that both are divided into four stages, including a beginning period, early period, middle period, and later period. However, the two sides differ greatly in their methods of periodization and the contents of the epochs. This difference should not be perceived in terms of the methodological superiority of one over the other, but as a difference between Korean archaeology and Japanese archaeology.

In an earlier article, I examined the methodological differences between Korea and Japan in interpreting the transitional period between the Neolithic Age and the Bronze Age (Yi 2006). In this article, as an extension to the aforementioned research, I will aim to examine the difference in methodology between Korean and Japanese archaeologies by focusing on periodization. By comparing methodological differences between Korean and Japanese archaeologies, this article aims to arrive at a more effective methodology to interpret the past. I will focus on the Korean Bronze Age and the Japanese Yayoi period, and I will only treat relative periodization and not absolute periodization. First, let us briefly go over the relevant terminology and the history of periodization research, followed by a reorganization and comparison of Korean and Japanese methodologies.

## 2. Periodization

### (1) Bronze Age

Research on Korea's prehistoric age was first attempted by Japanese scholars during the Japanese colonization of Korea. However, since it was impossible to distinguish between Jeulmun pottery culture of the Neolithic period and the Mumun pottery culture of the Mumun pottery period at the time, the two were lumped together in what was called the prehistoric period. The two periods started to be classified separately when Huzita Ryosaku took the prehistoric age of the Korean Peninsula and divided it into the Stone Age (present-day New Stone Age) and the Chalcolithic Age (present-day Bronze Age and Early Iron Age) (Huzita 1942). This division between Stone Age and Chalcolithic Age was unquestioningly accepted up until the 1960s, and the differences between Jeulmun pottery and Mumun pottery were perceived as tribal differences (Lee 1992).

The discovery of a sequential relationship between Jeulmun pottery and Mumun pottery and the discussion over the existence of the Bronze Age began in North Korea during the 1950s. By distinguishing between primitive artifacts and ancient artifacts from the excavation research in Jitab-li, it was concluded that the chrysalis-patterned pottery found in zone two of the Jitab-li excavation, unlike the artifacts from the Gungsan excavation, had asbestos mixed in the clay. They are similar to the Bronze Age artifacts found on the shores of Lake Baikal in Siberia, a fact which can be attributed to the influence of metal culture (Do and Hwang 1957:24). Do Yuho asserts that the stone daggers and flint arrowheads excavated along with the square shaped earthenware attest to the influence of metal culture. Seeing these artifacts as being identical to those found from stone covered tombs and dolmens, the square shaped pottery culture layer can be said to have been left behind by inhabitants of the Megalithic Age, specifically from the early metal culture (Do and Hwang 1957:12). Therefore, up until that time, it was only talked about that the appearance of square shaped pottery culture was influenced by metal culture. However, during the following year, 1958, dolmens and other Megalithic culture became accepted as being Bronze Age artifacts, which naturally made the square shaped pottery found in the dolmens part of the Bronze Age, and ultimately led to the square shaped pottery being recorded as Bronze Age artifacts (Lim 1992). Later, after the official excavation report of the Jitab-li artifacts was published, the Neolithic Age and the Bronze Age started to be discussed separately (Gogohak ·

Minsokhak yeonguso 1961). And with the increase in excavation after the 1960s, the cultural characteristics of the Neolithic Age and the Bronze Age became clearer. Meanwhile, the first time in which the Bronze Age was discussed in South Korea was in 1964 by Kim Wonryong, though he could not have been certain about there being a pure Bronze Age at the time he was introducing the newly discovered materials from North Korea (Kim 1964). Later, when the lute-shaped bronze swords were excavated in both North and South Korea, the Bronze Age came to be recognized as an independent period in South Korea as well.

Earlier research on Korean Bronze Age culture mainly focused on the origins of Bronze Age culture and the systematic periodization of the most typical artifacts of the age, including lute-shaped bronze daggers, thin bronze daggers, and Mumun pottery. It was during the 1970s, with the excavation of artifacts from Heunam-li and Songguk-li, when active research into the cultural characteristics of the Bronze Age was attempted.

## (2) Yayoi Period

The Yayoi period of Japan started to be recognized as an independent period in prehistoric Japan decades after the discovery of Yayoi pottery. In the history of Yayoi period research, the earlier half is considered to have been filled with continuous efforts to distinguish between early Jyomon pottery and later Hajiki (Kobayasi 1971). In 1884, pottery completely different from the then known Jyomon pottery was discovered in a shell mound in the Bunkyo district of Tokyo. Even though published in the academic world five years later (Tsuboi 1889), they were reported to have been Stone Age artifacts just like the Jyomon pottery that was discovered during that time. The term “Yayoi pottery” actually started to appear seven years later, which is twelve years after it was first discovered (Maida 1896). However, it was not until the beginning of the twentieth century, when Yayoi pottery along with other stoneware was discovered in Nagoya, which led to the general acceptance in the academic world that Yayoi pottery belongs to the Bronze Age and that Yayoi cultural characteristics were revealed (Izumi 1991). In the continuous excavation research that followed, besides the discovery of Yayoi pottery alongside stoneware, there were instances where Yayoi pottery was found with metalware, which laid the foundation for the position that Yayoi pottery belongs to the pottery of the Chalcolithic Age. The Yayoi pottery alongside the stoneware and metalware found in northern Kyushu can all be but from the same period, and the

new perspective draws from the interpretation that the Yayoi period was a transitional period between the prehistoric Jyomon period and the Gobun period of early history (Nakayama 1917). Later, after Hamada Kousaku applied European archaeological methodology upon returning to Japan after studying in Europe, it was proven through layered excavation in various regions that the Jyomon period and the Yayoi period have a definite chronological relationship (Morioka 1989). However, the Yayoi cultural characteristic that had rice farming agriculture as the basis in which to use metalware only came to be discussed in detail from the 1950s, after the research of scholars such as Naraken, Karako, Sizuokaken, and Toro (Izumi 1991).

### 3. Subdivision

#### (1) Korean Bronze Age

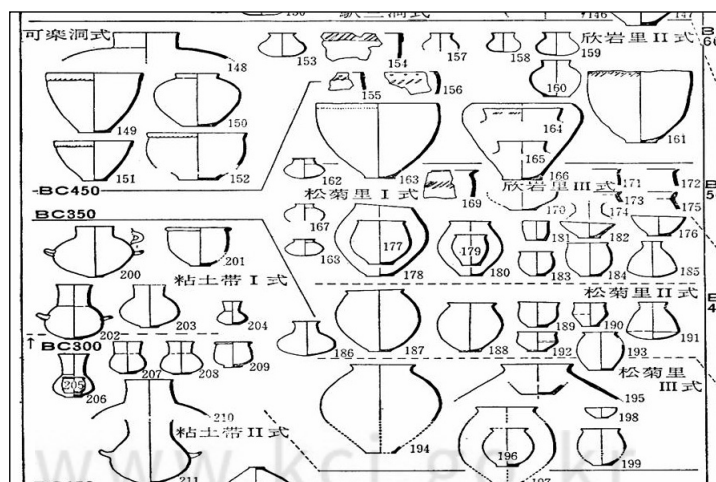
It is true that different opinions exist concerning the subdivision of the Bronze Age. Similar to the case of Japan, the most common methodology divides the period into four: beginning, early, middle, and later periods. However, it is true that even the most common method is a matter of consistent debate. In this section, I will go over the history of research on the subdivision of the Bronze Age, choose the classification categories for the beginning, early, middle and later periods, and examine their contents.

The very first subdivision of the Bronze Age was done with bronze artifacts. This is precisely the reason that the discovery of the lute-shaped bronze dagger is classified as the earlier period and the thin bronze dagger as the later period (Kim 1973).<sup>1</sup> Also, various subdivision methods use bronzeware as the standard up until the 1970s and various opinions are proposed to divide the period into three or four.<sup>2</sup> The abovementioned views all have in common that they focus on

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1. Kim Wonryong (1986) later revises his opinion and classifies the era when the lute-shaped bronze daggers are excavated as the Early Iron Age.
  2. Yun Mbyeong (1972), using bronze artifacts as the standard, divided the Bronze Age into Bronze I, Bronze II, and Bronze III eras. Kim Jeonghak (1972), for example, divided based on the cultural stages into the early, middle, and later periods. Jeon Yeongrae (1977) divided the Bronze Age into four eras: bronze introduction and usage of stone swords era (I), beginning of bronze culture in the Daedong River basin area (II), production stage of Bronze culture in southern Korea (III), and Han era cultural diffusion era and mixed usage of steel era (IV).

the entire Korean Peninsula and that they all choose the appearance of bronze artifacts as the standard for setting the starting point of the Bronze Age. Later on, however, there is an attempt to use Mumun pottery, which is completely different from Jeulmun pottery, as the standard for setting the starting point of the Bronze Age, while using only southern Korea as the target region instead of the whole peninsula. In particular, much of the successful excavation was concentrated in the Mumun pottery of the Han River basin. As the first such attempt, Lim Byeongtae divided Mumun pottery into early and later periods. He assigned Garak-dong style and Yeoksam-dong style potteries, which are representative of the thick-textured pottery that is similar to the top-shaped pottery of the northwestern regions that was baked at around 500 degrees and contained sand grains mixed into the clay, to the earlier period. Then he assigned the pottery that was baked at a higher temperature than the typical thick-textured Mumun pottery, has either a gray or a black shade to the clay, contributes to the sense of stability, and uses relatively refined clay to the later period. He used the blackness as the standard for subdivision (Lim 1969). Lee Baekgyu classified the Han River basin Mumun pottery into the earlier half and the later half. He argued that the northeastern and northwestern Mumun pottery cultures spread separately to the south, leading to the usage of Mumun pottery under the influence from both of these regions—again setting the period that shows the Han River basin's regionally unique characteristics after the fusion of the Mumun cultures of the two northern regions as the earlier half. On the other

**Picture 1** Middle period diagram based on Songguk-li type pottery (Huziguchi 1986:151)



hand, the period when pottery such as pottery with clay strips and black burnished pottery started to be widely produced and the number and types of stoneware started to decrease drastically due to the wide usage of bronzeware such as the thin bronze dagger, was categorized as the later half (Lee 1974). It can be seen that whether the standard was pottery or bronzeware, this was the common method for determining the earlier and the later halves of the Bronze Age until the 1970s. Later on, using Mumun pottery becomes the standard method for the subdivision, and the early and later periods become subdivided even further.

Instituting the Bronze Age's middle period started with the excavation of the Songguk-li artifacts. Although the survey of the Songguk-li artifacts established the Songguk-li style pottery, it was only seen as a mere pottery form (Kim 1986:80). The establishment of the Songguk-li pottery as a signature relic of the middle period was done by a Japanese researcher (Huziguchi 1986) (Picture 1). Understanding that the Songguk-li pottery made an appearance as a later stage pottery with an outcurved rim of Heunam-li style pottery and seeing the characteristic outcurved rim pottery as the epoch of the middle period was the first attempt to establish a middle period of the Bronze Age.

After the Songguk-li pottery was established as belonging to the middle period, the clay strip pottery was naturally recognized as belonging to the later period of the Bronze Age. Later, with the rapid increase in excavation results, an attempt was made to subdivide the Mumun pottery culture into six cultures: Garak-dong, Yeoksam-dong, Heunam-li, Songguk-li, Suseok-li-Yeonamli, and Gungok-li-Neukdo, according to their shapes (Lee 1988). Lee Cheonggyu classified the formative period of the Yeoksam-dong and Garak-dong types as the initial period; the formation of the Heunam-li and Songguk-li types as the early period; the spread of Yeoksam-dong, Heunam-li, and Songguk-li types as the middle period; the formation and proliferation of Suseok-li and Yeonam-san types as the later period; and the spread of Gungok-li and Neukdo types as the final period. Comparing each stage to the Bronze Age, the beginning stage corresponds with the period before the influx of lute-shaped bronze daggers, the early stage with the early stage of lute-shaped bronze dagger usage, the middle stage with the later stage of lute-shaped bronze dagger, the later stage with the thin bronze dagger usage, and the final period with the influx of ironware culture.

Although there are still arguments over the "Bronze Age" and "Mumun Pottery period" as period designations, it marks the beginning of the primary

standard in periodization methodology in which South Korea is the region of focus and the changes in pottery are the standard artifact. Later on, with the common method of subdivision, Yeoksam-dong, Garak-dong, and Heunam-li types were understood to belong in the early period, the Songguk-li type to the middle period, and the clay strip pottery culture to the later period. However, there are still lingering disputes over the subdivision of the periods.

A representative case is the contention that Songguk-li culture belongs to the later period instead of the middle period, and this view is held by Lee Hongjong (1996). Lee Hongjong thought that, even though establishing a middle period was meaningful in the chronology of pottery, it was difficult to see it as a period marked by epochal change in its social organization. He thereby divided the Bronze Age into an earlier period and a later period, marking the epoch as the point where a new social system began to emerge around rice agriculture. Using the pottery as the standard, the earlier period was seen as a mixture between the northwestern Garak-dong style pottery and the northeastern hole-patterned pottery and it did not show any signs of cultural exchange with the outside through collisions or indications of reforms. This period was marked only by internal changes and development. The later period shows that, under the influence of the newly arrived and rapidly spreading Songguk-li pottery in the central region, the pottery of the earlier period changed in appearance and showed signs of regional characteristics. Also, an important characteristic of this period is the influx of outside pottery, which has not been seen in the earlier period. The clay strip pottery is an important example, and the appearance of the Jongdo-style pottery marks the ending point of the later period (Lee 1996:200). With these points, it can be seen how the Songguk-li pottery and the clay strip pottery, which were previously seen as belonging to the middle and later periods, came to be seen as belonging solely to the later period. More recently, however, a perspective that classifies the clay strip pottery (which will be further discussed below) as belonging to the Early Iron Age, in concordance with a view that only considers the Songguk-li type stage as the later period, has become the prevailing understanding. In addition, there are insistences that view the clay strip pottery culture as a part of the Early Iron Age instead of the later Bronze Age (Kim 1986), the Heunam-li type as a part of the middle period, and the Songguk-li type as a part of the later period (Jeong 1999).

If the previous dispute over the subdivision of the Bronze Age was over the issue of setting the epochal point, the matter of dispute during the 2000s has been on assigning a stage for pottery with a clay rim, which started to be



reported on by researchers. Pottery with a clay rim was found in the Hwangseok-li excavation during the 1970s and really started to be discussed after numerous artifacts were found in the Misari and Namgang excavations in the 1990s. Seeing the pottery with a clay rim group as the first Mumun pottery culture to move southward with agriculture, and after setting the pottery with a clay rim stage as an early period of the Mumun pottery era (An 2000), there are disputes over its origins (Kim 2004; Cheon 2005). However, since it is impossible to establish the chronological order of the pottery, though it belongs to the early stages of Mumun pottery like the Yeoksam-dong style and Garak-dong style potteries, the assigning of pottery with a clay rim to the early period seems to be generally accepted in the academic world despite certain voices of dissent (Kim 2008:107).

Also, related to the assigning of the Songguk-li type to the middle period, the assigning of other regions where Songguk-li types were not found to the middle period also began in the 2000s (Yi 2008c). With an increase in excavation in various regions, the Songguk-li type, which was previously seen as the model for the middle period of South Korea's Mumun pottery period, ultimately started to be seen as not being the best model in the South Korean region as a whole. Such perceptions led to assigning regions that have not yielded Songguk-li types to the middle period (Kim 2005; Bae 2005).

Therefore, the subdivision of Korea's Bronze Age has undergone much debate, but is basically seen as having a signature relic according to the period: The initial period has pottery with a clay rim; the early period has Yeoksam-dong, Garak-dong, and Heunam-li potteries; the middle period has Songguk-li pottery; and the later period has clay strip pottery.

## (2) Japanese Yayoi Period

The Yayoi period is generally subdivided into three periods: early, middle, and later. Limited to the case of northern Kyushu, however, a beginning period is also accepted (Yi 2008b). I will examine the various changes that the Yayoi period's subdivision underwent.

Research of the Yayoi period during the early days focused on the question of whether it was possible to categorize the Yayoi period as independent from other periods. After it was proven by Hamada Kousaku that the period following the Jyomon period was the Yayoi period through his layered excavation, the periodization of the Yayoi period started with the chronology of Yayoi pottery.

Thus, in order to examine the research history of periodization, it is first necessary to examine the research history of pottery chronology.

The analysis and chronology research of Yayoi pottery started in the 1920s. Based on its pattern, the pottery was divided into four groups: Jomon, Kusigakimon, hakememon, and mumon. Researchers also attempted to find the chronological relationship between the groups (Yawata 1928; Kobayasi 1971). Later, Morimoto Rokuji and Kobayashi Yukio were at the center of the periodization of Yayoi pottery. Morimoto subdivided Yayoi pottery from northern Kyushu into three types (Ongagawa, Sugu, and Togo), and ordered them into early, middle, and later periods. He also made the claim that other regions could also be divided into these three periods (Morimoto 1935). Morimoto's position that the Yayoi period should be subdivided into three periods provides an important premise in later research. However, Morimoto's approach is problematic in that it cannot be proven through layered relationships. Later, in 1937, excavations at the Karako site in Naraken began. The excavation survey done at the Karako site was carried out on an unprecedented massive scale, and large numbers of earthenware and woodenware buried together in numerous ditches were found (Kobayasi 1943). As a result of the excavation survey at this site, Kobayashi Yukio divided Yayoi pottery into five models (Picture 2), and such subdivisions even now serve as the basic frame in Yayoi pottery chronology.

In his report, Kobayashi Yukio compared the composites of various pottery found in the water holes, and divided them into five models that were divided broadly into three districts, and Kobayashi made the interpretation that each period shows the early, middle, and later periods of the Yayoi period.

Even though a sixth model was later added that corresponds to the transitional period to the Gobun period, the subdivision of Japan's Yayoi period generally follows the five-models classification, and the early period corresponds to the first model, the middle period to the second, third, and fourth models, and the later period to the fifth model.

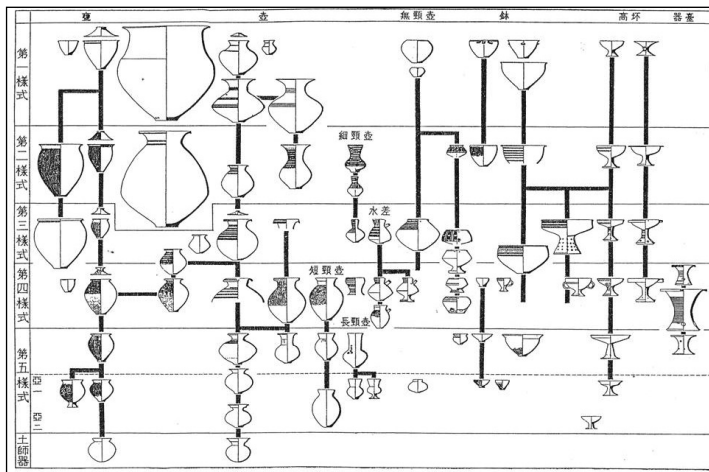
Of course, the above subdivision is not completely free from criticism. Sugihara Sousuke criticized the fact that there has been no added or revised data, and offered a more subdivided and revised model (Sugihara 1960). The Kinai first model is divided into Karako and Uriwari types, the second model is subdivided into Kuwazu 1 and 2 types, Kobayashi Yukio's third and fourth models are combined to make the Sinzawa type, and the fifth model is termed the Hozumi type. However, the important point is that even though the

subdivisions are identical in determining the early and middle periods, after the Sinzawa type, what comes after Kobayashi's third model is established as the later period. However, while Kobayashi's scheme received continuous support from the field, Sugihara's subdivision scheme did not get much recognition even after another revision.

In addition, unlike the pottery chronology that focuses on shape and pattern, Sahara Makoto started to classify pottery based on the production and engraving techniques. In other words, Sahara distinguished between the use of Kusigakimon, caused by the use of the turntable, and the increase in the mumon pottery due to the disuse of the turntable (Sahara 1959). Such periodization based on production techniques is succeeded by Tsude Hiroshi (1974). Tsude recognized that, for the fifth model of the later era, the shaping methods included Tadaki and a divide pottery making technique. He subdivided the fifth model and took the Syonai type, which was previously thought to be Gobun period pottery, and established it as the sixth model.

The generally recognized details of each model are as follows (Huzita and Matsumoto 1989).<sup>3</sup> Pottery, vases, jars, pots, and urns form the basis of the first

**Picture 2** Changes in Yayoi pottery over time (Kobayashi 1943:66)



3. Although it is generally accepted in the western Japan region to divide the Yayoi period into five or six models, there are regional differences in content. Here, I want to use the Yamato region (current Nara basin region), which is widely recognized as the standard for Yayoi pottery chronology, as the standard in my explanation.

model, and it is in the first stage that Yayoi pottery appears. Pottery with engravings done through heragaki is the dominant form. The pottery has many sand grains mixed into the clay, and some Jyomon potteries are included in the early stages of this period.

The second model is a stage represented by Kusigakimon, distinguished by the different engraving patterns compared to the Heragaki engravings representative of the first model. This difference is also recognized as the dividing point between the early and middle periods. The early Yayoi period is when the Ongagawa type became widespread, following the spread of northern Kyushu's Ongagawa-type pottery and rice agriculture to the east. Afterwards, with the development of Heragaki engraving, Tazyouheikommon becomes popular and leads to the appearance of Kusigakimon. Besides the change in the engraving pattern, vessel shapes are also diversified, including vases with a broad mouth, vases with a narrow neck, vases with no neck, jars, pots, urns, as well as pots and jars making up a larger portion. Similar to the first model, many sand grains are included in the clay.

The third model is characterized by a rapid differentiation of each vessel type. Regarding the pattern, the straight-line pattern of Jeulmyo forms the core and the patterns that are formed with Hzyoumon or Renzyoumon become popular, and Ousenmon makes its appearance in the later half of the third model. In contrast to the first and second models, there are more vessels with thinner vessel walls, and the clay is mixed with fine sand grains. The appearance of Ousenmon marks the dividing line between the earlier and later halves.

The fourth model forms the last stage of the middle Yayoi period. The jeulmyo pattern, popular during the third model, declines and Ousenmon that first appeared during the later half of the third model becomes prevalent. Mumun pottery, which does not have pattern engravings, is established as the standard for the fourth model. So the third model is characterized by the prevalence of Jeulmyomun, and the fourth model is characterized by Ousenmon. However, recent excavation results show that Jeulmyomun and Ousenmon were often buried together, making the distinction between the third and fourth models unclear. The appearance of new vessel types such as pitchers and vessel platforms are also an important difference.

The fifth model is the last stage of the Yayoi period, and unlike the third and fourth models, it has been thought to have been a Mumun pottery age with no engraving patterns. It has miniaturization and patternlessness as its characteristics, and concerning the production method, has the disappearance of

the turntable as the standard. As was examined above, the periodization of Yayoi period pottery has set the evolution of pottery engraving pattern as the primary standard, and has other accompanying differences in the production of pottery as the secondary standard. The division of the Yayoi period into early, middle, and later periods also basically corresponds to the subdivision standard of the first to fifth models. Later, concerning the subdivision of the three periods, changes in sociocultural aspects are applied somewhat. A typical example is viewing the sudden decline in stoneware as a characteristic of the later period. Using such a change in the sociocultural aspect as the standard for periodization, the question of how to assign each model to a period shows some differences depending on the region. For example, the Kinki region of Japan, which has Osaka and Nara at its center, sets the first model as the early period, the second to fourth models as the middle period, and the fifth model as the later period. However, in the northern Kyushu regions, the first model is seen as the early period, the second and third models as the middle, and the fourth and fifth models as the later period.

If so, how is subdivision done with culture as the focus instead of pottery? The distinction between the beginning, early, middle, and later periods of the Yayoi period does not clearly show what social changes are significant to each period (Sahara 1975). Now I will examine the changes outside pottery that are generally talked about with each period of the Yayoi period.

**Beginning period:** The pottery of the Jyomon period continues to be used but the occupational economy manages rice agriculture, which is the typical characteristic of the Yayoi period. It is considered to be the transitional period between the Jyomon and Yayoi periods and marks the period when rice agriculture along with other continental cultural aspects starts to be received in Japan.

**Early period:** It is the period that shows the appearance of complete Yayoi pottery. Although it shows certain chronological differences depending on the region, it is the period that rice farming is really brought in and started.

**Middle period:** This period marks the increase of community artifacts on a large scale, and it is characterized by the typical Yayoi cultural image, large-scale settlements and rice agriculture, and the use of metalware.

**Later period:** It is characterized by the rapid decline of stoneware.

As can be seen, the cultural aspects of each period are about the changes in the condition of various archaeological data. This point is also a prevalent characteristic of Korean archaeology, which received much influence from Japanese archaeology over the years.

Generally speaking, archaeology in Korea and Japan are identical in that period subdivisions are done using pottery as the standard. However, in the case of Korea, certain pottery are assigned the term “signature type,” which can be used to include the stoneware, settlement area, and other material culture as a whole. Japan, on the other hand, differs greatly in that the subdivision of the Yayoi period has pottery as the absolute standard. Then, where does the difference in subdivision between Korea and Japan originate from?

#### **4. Significance of the Epochs—Archaeological Times and Periodization**

##### **(1) Significance of Subdivision**

In archaeology, temporal classification can usually be divided between classification of an age and classification of a period. Age classification is classifying the flow of a continuously developing civilization. Thomsen’s three-age system is the most well-known method, with prehistoric age as a common classification. Depending on the materials used, it can be divided into the Stone Age, Bronze Age, and the Iron Age. These periodizations, according to the region, can have region-specific characteristics applied to them. Periodization does not aim to take the continuous flow of civilization and understand its severed pieces, but is a classification that attempts to show a certain culture’s characteristics more effectively and uses an important historical epoch as the standard (Park 2008:111).

In the case of Korea, archaeological periodization distinguishes between the Paleolithic Age, Neolithic Age, Bronze Age, Early Iron Age, Proto-Three Kingdoms Period, and Three Kingdoms Period. The Paleolithic Age and Neolithic Age establish the appearance of earthenware and the use of ground stoneware as their most important characteristics, and the epoch between the Neolithic Age and Bronze Age is established to the appearance of crescent-shaped stone daggers and the start of rice agriculture. The Early Iron Age’s epoch marks the advent of the thin bronze dagger and the use of metalware as its standard. Of course, it is a well-known fact that there have been various disputes over even simple methods of periodization. Here, we should focus on the various names of each of the ages. Each age is usually named after the material used to make the tools that are normally used. Also, when calling the Neolithic

Age the combtooth-pattern pottery age and the Bronze Age the Mumun pottery age, these are cases where the names of the most representative material culture, pottery, are used to name the period.

In Japan, periodization distinctions are made between the Pre-Earthenware Period (Paleolithic Age), Jyomon Period, Yayoi Period, and Gobun Period. The epoch between the pre-earthenware period and Jyomon period sees the advent of earthenware as the biggest criterion. Between the Jyomon and Yayoi periods, it is seen that the change from a hunting and gathering economic structure to a producing economy is the biggest epoch. For the Gobun period, the archaeological material data that best shows the social structure of that time is that it was possible for an individual to amass enough power to construct a large burial mound (*gobun*) for a certain individual. The archaeological material that shows these social aspects the most clearly is *gobun*, thereby leading to the name of the period as the Gobun period. The point to keep in mind here is that the Jyomon and Yayoi periods both take their names from the pottery of the period, reflecting the position that pottery occupies in the history of Japanese archaeological research. Periodization, however, shows a different aspect. Periodization can be seen as a classification within a specific period in a specific region. Basic periodization divides a period into three subperiods, consisting of the early, middle, and later periods. This signifies the three stages of birth-peak-demise of a particular culture (Hamada 1992), and of course this classification can be applied to various regions and cultures. In Korea, the Bronze Age can be divided into earlier and later periods and Japan's Jyomon period chooses a six-period classification that goes through the opening-beginning-early-middle-later-ending periods. However, the important problem is that regardless of what meaning the periodization has, a cultural epoch, an epoch that at least carries enough weight to qualify for periodization, cannot simply set the transition of a certain artifact as the basis. If so, are archaeologists in Korea and Japan carrying out periodization according to cultural epochs?

## (2) Periodization as Cultural Epochs

Both Korean and Japanese archaeologists share that they use changes in pottery as the standard for periodization/subdivision. Using earthenware as the basis has to do with the fact that earthenware, unlike stoneware and metalware, has a great chance of metamorphosis and can reflect changes throughout time in greater detail, leading to the recognition that it is most suitable as a chronological unit.

So, it is earthenware that shows chronological changes in culture in the most detailed way, setting as the premise the point that an epoch in the evolution of pottery can also be seen as a social epoch. For example, in Korea, the boundary between the earlier period and later period is seen to be marked by the appearance of outcurved rim pottery, while in Japan, the change in pattern from chinsenmon to kusigakimon is seen as the difference between the earlier and middle periods.

In actual periodization, however, Korea and Japan show many differences. Conclusively, Korea also uses change in pottery as one standard, but has continuously attempted to use changes to different material cultures for periodization using the same concept that is used for pottery periodization. In contrast, Japan has only used changes in pottery as the basis for periodization. This is perhaps the biggest difference between the periodization of the two regions.

In the case of Korea, after using the lute-shaped bronze dagger and thin bronze dagger of the earlier era as the criterion for classifying between the early and later periods, in the case that uses the pottery of the region limited to South Korea as the standard for periodization, though the pottery includes signature relics as well as Garak-dong pottery, Yeaoksam-dong pottery and other forms of pottery, in actuality they include all aspects of material culture. Especially after the 1990s, when the concept of “types” became popularized, periodization concerned itself not only with the changes in pottery, but saw all changes in material culture such as the production of stoneware, the type of dwellings and their scale as the basis for periodization, which led to the discussion of the different social aspects of each period.

The most representative is changes between the early period and middle period and the setting of the initial period. As was previously explained, the establishment of the middle period was started with the views of Huziguchi. At the time, in the periodization of pottery, the appearance of the new characteristic called an outcurved rim provided the foundation for the establishment of the middle period. He divided the Songuk-li pottery into three types and talked about the appearance of grooved adze and carbonize rise as characteristics of Songguk-li pottery, but concerning the establishment of the middle period, he only follows the short-term changes to the pottery as the basis (Huziguchi 1986). At first, the establishment of the middle period was simply based on the changes in the forms of pottery, but later when artifact excavation increased, the Songguk-li type cultural characteristics became better understood (Ha 1989:44). The Songguk-li type comes to be recognized as the typical model for the middle



period of South Korea's Bronze Age. Concerning material culture, the Songguk-li type settlement, jar with an outcurved rim, grooved adze, and triangular stone knives are recognized as characteristics of the period. Later, the archaeological aspects of the Songguk-li type artifacts show that the establishment of paddy field rice farming, the appearance of large-scale settlements, and changes in the social infrastructure are cited as the differences between the early and middle periods. Especially in the regions that do not have confirmed Songguk-li type artifacts such as the northern Gyeonggi, Yeongseo and Ulsan regions, the main standard for the establishment of the middle period is the material culture that reflects one of the biggest changes of the middle period, the aspect of changes in the family structure. The regional types are established based on the characteristic forms of material culture, and the changes in form and scale of settlements, the appearance of new vessel types, and the prominence of specific forms of pottery are talked about as being the markers of the middle period (Yi 2008c).

The conditions for the initial period that began to be discussed after the 2000s are identical. The initial period has pottery with a clay rim as the signature relic. However, besides simply the appearance of pottery, the changes in artifacts and relics mark the transitional period (An 2000; Cheon 2005). Even though cultural aspects of the Neolithic Age are confirmed by the pottery and pottery production, the stages that contain artifacts such as the crescent-shaped stone dagger, which provides evidence of rice farming, are set as the initial period, while setting the period that marks the complete disappearance of Neolithic cultural aspects and the appearance of Bronze Age cultural aspects is the early period of the Bronze Age. This shows that, in the first step of periodization, the rise and fall of other cultural aspects besides pottery are considered, which is a big difference compared with the previous periodization of the middle period. However, using the same reasoning, there is criticism that the period of the pottery with a clay rim cannot be established as an independent period using archaeological evidence (Kim 2008).

As examined above, the subdivision of the Bronze Age appears to have the intention of periodizing according to cultural epochs. However, periodization according to cultural epochs has only occurred in relatively recent research. Before that, the epoch was decided by changes in material culture, including pottery, accompanied by an appropriate cultural interpretation.

Japan's case is completely different from that of Korea. In the periodization of Japan's Yayoi period, changes in pottery are still seen as the most important

**Picture 3** The Japanese Kinki Region Yayoi Pottery Model Chronology Table  
(Terasawa 1989:327)

既応の編年		河 内	大 和	紀 伊	丹後・丹波
第一様式	(古)	I — 1	I — 1	( I — 1 )	
		I — 2			
	(中)	I — 3	I — 2	I — 2	I
	(新)	I — 4		I — 3	
第二様式		II — 1	II — 1	II — 1	
		II — 2	II — 2	II — 1	II
		II — 3	II — 3	II — 2	
第三様式	(古)	III — 1	III — 1	III — 1	III — 1
		III — 2	III — 2		
	(新)	IV — 1	III — 3	III — 2	III — 2
		IV — 2	III — 4	III — 3	
第四様式		IV — 3		IV — 1	IV (古)
		IV — 4	IV	IV — 2	IV (新)
第五様式		V — 0	V — 1		
		V — 1	V — 2	V — 1	V — 1
	第五様式	V — 2	VI — 1	V — 2	V — 2
		V — 3	VI — 2	V — 3	V — 3
	重式	VI — 1		V — 4	
		VI — 2	VI — 3	V — 5	
		庄内 0	VI — 4		
布留式以前		(庄内1〜3式)	(庄内式)	V — 6	V — 4

standard, rather than cultural epochs. Picture 3 shows the parallel chronology of pottery of the Kinki area, which is known as the center of Yayoi culture.

As can be seen in the picture, the model classification in each region shows a different aspect. The Kawachi and Yamato regions especially show differences in form compared to the previous model; the Kawachi region’s samples of Ousenmon, characteristic of the later half of the third model, were incorporated into the fourth model. Also, in the Yamato region, the chinsenmon that was previously seen as the first model was set to the beginning of the second model. Since the periodization of Japan’s Yayoi period depends on the classification of models as the basis, the classification of the early and middle periods of the Kawachi and Yamato regions each have a different standard. Since the periodization is done according to the changes in pottery, periodization can change according to where one marks the epoch in terms of pottery change, and other archaeological data besides pottery are not considered at all.

The adoption of metalware, which can be seen as the biggest epoch of the Yayoi period, is revised to the end of the early period, while the appearance of a settlement with a moat on a large scale in the Kinki region is set to the middle of the middle period. Also, the extinction of the Jyomon cultural characteristics in

the Kinki region is talked about as belonging to the end of the early period. These aspects which can be talked about in terms of clearly being sociocultural epochs all show chronological differences when compared with the pottery epochs. Of course, it cannot be said that social changes are always reflected in the archaeological material, and it cannot be said that changes in the cultural aspects occurred all at the same time. For example, the point when Japan accepts paddy field rice farming, the point when the structure of settlements changes, the point when the pottery changes, and the point when stoneware changes cannot all be the same. Although it cannot be determined if a certain cultural aspect changes after, during, or before a social change, what is clear is that all material and cultural aspects cannot all change simultaneously. Keeping this in mind, however, one can still point out that the standard for periodization in Japanese archaeology is still largely based on changes in the pottery. Of course, the establishment of the initial period shows a different aspect. With the establishment of the initial period, the problem was suggested when it was brought up that the new excavation results and the previous pottery based periodization contradicted each other (Sahara 1975). From the late 1970s into the early 1980s, paddy fields were found in the Itazuke and Nabatake sites, which raised the question of whether to classify them as the Jyomon or Yayoi period. Since the pottery found was pottery with a clay rim of the later period of the end of the Jyomon period, as a solution to such problems, the initial period of the Yayoi was established. So the period that completely possesses Yayoi cultural aspects is the early Yayoi period, and the period that has aspects of both Jyomon and Yayoi culture is set as the initial Yayoi period. Calling it the initial Yayoi period means that even though the continental cultural aspects such as paddy field rice farming, crescent stone dagger, and continental polished stone tools were spread to northern Kyushu regions and carefully accepted, the pottery was of the traditional Jyomon style pottery with a clay rim period (Yi 2008a). So in the case of the initial Yayoi period, its establishment can be seen as a case where the problems of using preexisting pottery for periodization was brought up, leading to the usage of settled agriculture that is characteristic of the Yayoi period as the basis for periodization. However, with the exception of such special cases, Japanese archaeology has excessively depended on pottery for periodization. I wish to find the cause of this from the intellectual current of Japanese archaeology.

Hamada Kousaku, upon returning from his studies in Europe, wrote Japan's first introductory archaeology book, *Tsuroon Koukogaku* (Hamada 1922), which

introduced the methodology of European archaeology and explained the archaeological research method in the following way.

Collecting of Materials>Ordering of Materials>Check for Forgery and Alteration>Assigning of Grade for Artifact>Necessity of Systematic Compilation

Let's turn our attention to the last stage of "compilation." Hamada Kousaku, emphasizing the importance of compilation in the organization of archaeological data (Hamada 1922:140), himself compiled *Yayoisikidokikeisikibunruiseizuroku* (1919). This type of compilation work on Yayoi pottery would later be an important part in the development of Yayoi period research. After the compilation of books like *Yayoisikidokizusyu* (Morimoto 1933) and *Yayoisikidoki syusei zuroku* (Kobayasi and Morimoto 1939), Yayoi period research starts to have the framework in which chronology is done according to pottery classifications. It should be noted that, instead of stoneware and metalware, pottery was the target for artifact compilation. Excavations at the time were mostly done by layers and not by individual artifacts, meaning that artifacts that could not be classified chronologically according to the layer and could only be chronicled by its form, making it natural for using pottery, which can easily be changed over time, for periodization instead of using stoneware that has limited usage and retains the same shape over an extended period of time.

But, it cannot be said that periodization relied only on the changes in form of the individual pottery. Subdivisions of the Jyomon period only rely on changes in pottery form, but the periodization of the Yayoi period includes the concept of "model."

The concept of model (*yousiki*) as used here is a native Japanese concept, not a concept that came from western archaeology. Kobayashi Yukio explained this concept as, "If A, which has the form of a bottle, and B, which has the shape of jar, exist during the same period, then they are included in the X model" (Kobayasi 1959). Therefore, the concept of model is above shape or form, with the basis on uniformity. This uniformity can be classified between uniformity of production and uniformity in usage (Kosugi 1995). The uniformity in production means that pottery produced at a certain time by a certain group leaves traces of an identical production technique in its engravings and composition. The uniformity in usage refers to the development of the pottery that was produced by a certain group at a certain time. This means that with

model, the characteristic is that it is not the changes of an individual piece of pottery, but the development of pottery that serves as the basis.

Then it is necessary to examine the changes in pottery development. In Japanese archaeology, the first category in classification is form. This is often called the vessel type and includes classifications such as pot, vase, jar, and urn. This type of form classification depends primarily on the usage of the vessel. For example, the pot is used to boil food, vase for storage, and urn is used for storing food. Each form is decided by its usage. Certain vessel types were created over an extended period of time by the demands of the society, and exist commonly and regardless of the period or the region—whether its the Jyomon or Yayoi period (Kobayasi 1989). So the division of vessel types is a sort of classification tool, and the various vessel types of a society reflect the lifestyle of the society. Thus, any change in the vessel type indicates a change in lifestyle. For example, the appearance of a vase during the Yayoi period which did not exist during the Jyomon period shows how there was a necessity for long-term rice storage after the transition from a hunting and gathering society to a rice farming society. Therefore, they imported the vase from Korea for storage and added it to the various vessel types. The vessel holder that makes its first appearance during the fourth model is the same. Vessel holders are not actual vessels used to hold things but are made for ritual purposes, which reflect the new farming rituals that were created.

Although such a periodization scheme is based on pottery, the fact that the vessel types, not changes in forms of the individual vessels, serve as the basis reveals its premise that social changes bring about changes in pottery. However, it is clear that this method has limitations in application. Model classifications based on patterns of pottery instead of types of pottery are generally more common. As was discussed above, the epoch marked between the early and middle periods is the pattern change from the chinsenmon to kusigakimon, and it is recognizable that the usage of the turntable accounts as a major epoch.

But concerning the induction of metalware, which holds more social significance, it is unclear what changes were made to the production of pottery and what changes were made to the pottery types as a result of the induction of metalware. Also, the changes between the middle and later periods include the disappearance of Yoseonmun, which was made using the turntable, an increase in Mumun pottery, and the miniaturization of pottery as some of the most important features. The rapid decline of stoneware is seen as being culturally significant but the relationship between the two is also unclear.

A contradiction can be pointed out that although actual pottery classification and the theoretical method of model periodization are in conflict, it is still used as the standard periodization method.

As was examined above, although it appears at first glance that Korea's Bronze Age and Japan's Yayoi period both use the changes in pottery as the standards of periodization, there are clear differences in the contents of periodization. The subdivision of Korea's Bronze Age relied first on the changes in metalware and later the changes in pottery. After the concept of "types" was introduced, however, cultural epochs were used as the standard. Of course, periodization was initially done using material culture including pottery and cultural interpretations of other archaeological aspects that came later—which is probably the natural sequence for such a methodology. But the periodization of Japan's Yayoi period used the changes in pottery as the standard, and this was the trend since the formation of Japanese archaeology. Whether good or bad, it can be said to be the strongest characteristic of Japanese archaeology. Of course, the idea is that classification is not simply based on changes in pottery form but includes changes in pottery types under the concept of model, but it is nevertheless limited in its application.

When comparing the subdivision methods of the two regions, the Korean Bronze Age subdivision might be considered more effective as it considers all material cultures. But Japanese archaeology's method of periodization that examines pottery types with the basis on model is significant as well. The so-called "Kisuyukougiron" (Suzuki 2008), which looks to changes in vessel types as epochs, is an important methodology in archaeology and is compatible with the pottery-centered characteristic of Japanese archaeology.

## 5. Conclusion

Thus far, research history of periodization/subdivision methodology of the Korean Bronze Age and Japanese Yayoi period was examined. In the case of Korea's Bronze Age, there is a strong tendency in research to cite cultural epochs as the standard, which came after the introduction of the concept of "types" that include all material culture. On the other hand, Japanese archaeology, since its formative stage, has focused on pottery, especially the vessel types of the Yayoi period using the concept of "model" as the standard. Although such a tendency appears to be based on the understanding that changes

in a model reflect social changes, it has its limitations.

This article was not written to discuss the advantages and disadvantages of Korean and Japanese archaeological methodologies. The two regions' methodological differences can be noted in the flow of research history. A comparison is merely an attempt to extract a more effective methodology. For example, the changes in vessel types that are discussed in Japan's Yayoi period subdivision are rarely discussed in the pottery research of Korea's Bronze Age, and this point should be noted in the future.

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**Yi Kisung** currently works as a special researcher at the Hanshin University Museum. He received his Ph.D. in archaeology from Ritsumeikan University, and his primary research interest is the comparative study of the cultures of the Japanese Yayoi period and the Korean Bronze Age.