



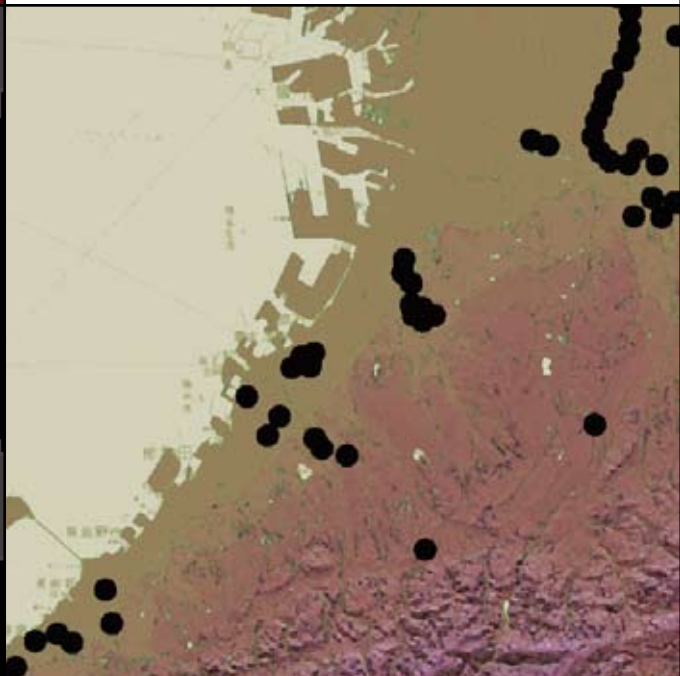
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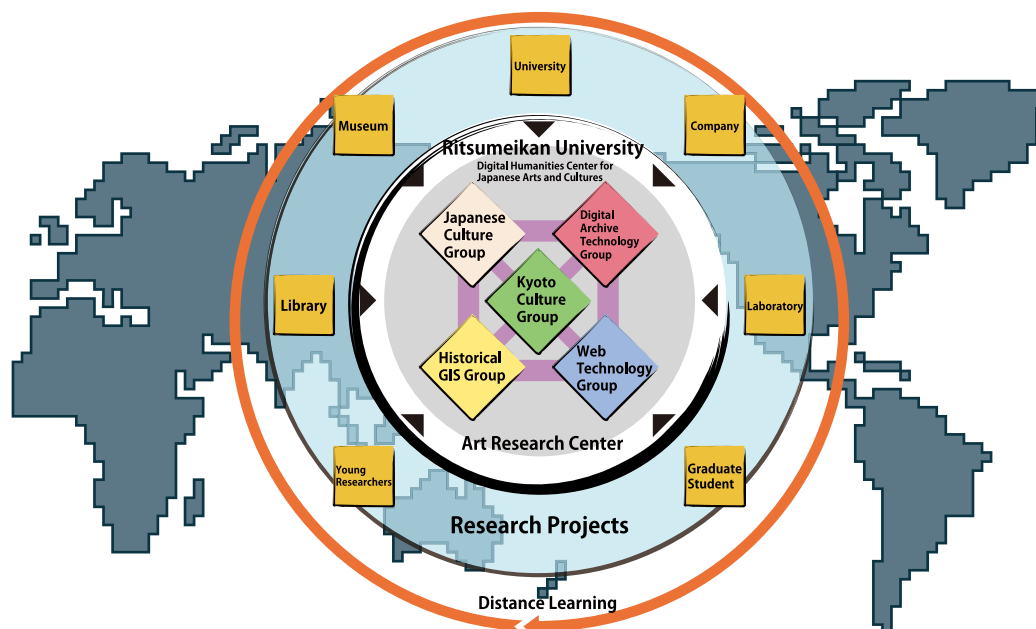
The Global COE Programme 'Digital Humanities Center for Japanese Culture' was initiated in June 2007 in continuation of the 21st Century COE program 'Kyoto Art and Entertainment Innovation Research,' accomplished during 2002-6.

The results earned from 'Kyoto Art and Entertainment Innovation Research' have shown that a multimedia based digital archive is capable of improving the environment and the methodologies in human sciences, and that such a digital archive does not only produce information but also a portal for human relations that can become a hub for overseas institutions doing research on Japan. The present center has been developed for the purpose of furthering these results.

However, the instigation to set up the present centre was not incited simply by the wish to continue our preceding programme. Presently, overseas research in Japanese culture sees a swift increase in developments based on networks, whereas Japanese researchers tend to be isolated from these networks because they are doing research on Japan within Japan itself. Accordingly, a deep chasm in research methods and purposes has opened up between Japanese and overseas researchers in Japanese culture, and we are concerned that researchers based in Japan should become a hindrance to progress in the worldwide research on Japanese culture. In other words, as researchers in Japanese culture we now find ourselves situated in a global environment even though our object of study Japan is a local entity, and we face a growing need to partake in discourses with overseas researchers in international fora. For this very reason we intend to create the necessary fora for research and education by applying 'digital humanities' as a key word.

Amidst a surging globalization we will surely find that our scholarship turns impotent if we confront the multifarious ways of human activities in the world of today by mere application of traditional methods in human sciences. Therefore, by implementing know-how from information science in our research in human sciences, and moreover to continue the discovery of its new form as 'digital humanities,' it is our objective to break with previous confinements in human sciences, and again to reorganize human sciences into sufficiently potent scholarship.

The release of this newsletter is for the benefit of informing the public of these activities. Whether we will attain our goals or not, we keenly hope that our readers will address us with constructive opinions about the progress in our pursuits.





With all of the traditional crafts that are still alive and well in Kyoto, it is often possible to carry out direct comparisons of historical texts, ethnic studies and archeological discoveries. Many would say this is an ideal research field where one may freely apply the principal historical methodology. However, with many techniques already lost in time, there are also plenty of “traditional” crafts that have been altered between modern times and today. Here, we present an experiment in ethnoarchaeology concerning a kin sumigama, the first kiln used by Ogata Shinsei (Kenzan), discovered at the archeological site of his Narutaki workshop.

## Kin Sumigama unearthed at the Kenzan Narutaki kiln site

An excavation study of Kenzan’s Narutaki workshop, located in north-west Kyoto (Narutaki Izumidani-cho, Ukyo-ku), took place over a five-year period between 2000 and 2004 by an excavation group of the kiln site at Houzouji Temple (which this department, the 21st Century COE Kyoto Art Entertainment Innovation Research, joined in April 2003). Among the multitude of unearthed relics was one particular item that stood out from the rest; a fragment of a low-temperature (Raku-ware, over-glazed) kiln introduced in the “Kyoto Ware Theory Diagram” (Kyoto Toujiki Setsuzu, 1874) as kin sumigama. This kiln was in use until the Showa period, but quickly fell into obsolescence with the proliferation of electric kilns. The kiln is constructed of two layers so that wares are packed inside the kiln, and a space between the inner and outer layers is tightly packed with high-grade charcoal and fired. The Ware Theory Diagram explains that both large and small versions are fired in four hours, which is hard to believe, but since these kilns have already gone out of style, interviews confirmed that it would be difficult to restore this technique. From the observation of excavated kiln fragments, there were a number of aspects that were hard to explain such as places that had turned white where it came into direct contact with the charcoal fire, repairs to small interior cracks with white clay although there were no signs of repair to the exterior, or the application of a glaze on the inside of the kiln’s inner layer. Given these reasons, we restored the kin sumigama using these relics and historical records as reference, and carried out a test firing.

## Restoration of the Kin Sumigama and Test Firing

Four tests were conducted, gradually altering the firing method, which resulted in cases where the temperature clearly exceeded 800 degrees in slightly over four hours. The kiln was constructed in the same method as the one excavated by winding up cords of clay, but the clay cords easily detached from the wall, and after a single firing, quite a few had detached and left cracks as a result. It was not possible to prevent these cracks or detachments because there was a large contrast in the kiln exterior temperature, but they were tied with wire and thus did not require repair. The kiln interior exhibited fewer cracks from firing when compared to the exterior, but with repeated firings, the cracks worsened and had to be repaired with clay. At first, we

assumed meticulous repair of the cracks would be necessary to prevent invasion of reduction atmosphere, but the finished pieces did not appear affected by a atmosphere reduction. Furthermore, we established that the cracks in the kiln were necessary to allow some “play” to reduce strain from expansion and contraction during the firing. Thus, by conducting these tests, we were able to find explanations to most of the questions brought about by the unearthed relics.

## Lineage of the Kin Sumigama Technique

Edo-period Kyoto pottery was developed based on Seto and Mino techniques. However, the technique used with the kin sumigama is related to that of Raku-yaki and Oshikoji, which are said to have succeeded from South China Sansai techniques which are not detected in Seto-Mino styles. Moreover, kin sumigama has been found in Jingdezhen, China, so we assume there is a relation to the colored artwork of Chinese ceramics. Also, it is not only this kiln; the techniques used in Kyoto Ware are a combination of techniques with origins both domestic and foreign. Kyoto Ware may lack technical originality, and for that reason the relationship with these places of origin is an important research task. An examination of these techniques will require a variety of methodologies with an archeological focus. Such research centered on art history and cultural history will certainly offer a new perspective on the research of Kyoto Ware.



Firing test of the restored kin sumigama.



Kiln exterior with advanced cracks.

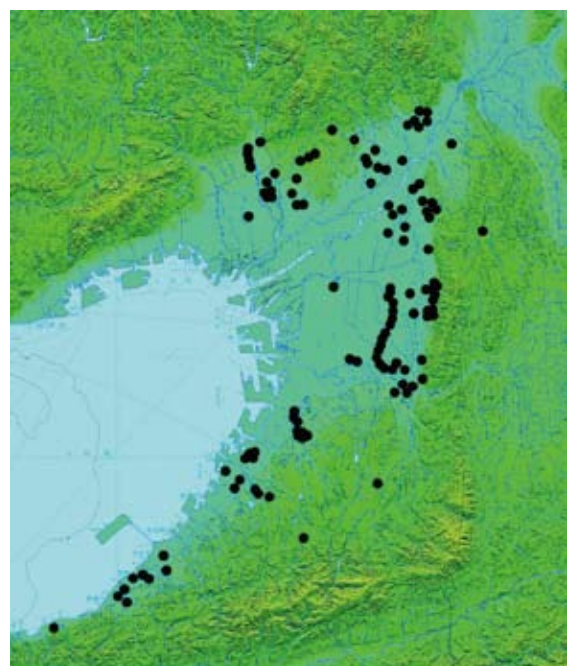


The application of Archaeology in the Humanities as an authentic scientific method of analysis began in the 1960s in the West. Process Archaeology is a trend which started in America in the 1960s that sought not to simply describe the past, but to explain it. In order to do so, a more objective scientific method was sought when interpreting material culture in Archaeology. This made use of such scientific methodology as statistics and geo-spatial analysis. Particularly, in contrast with the convention of simply showing sites on a map and using that as a method to grasp the range of distribution and culture, this method then applied the concept of geo-spatial analysis. The first result of using such spatial analysis was by Ian Hodder and Clive Orton, in their work "Spatial Analysis in Archaeology" (1976). In this book, Hodder said a new spatial analysis method was needed because, 1) existing analysis (of producing simple distribution maps) was limited due to its unclear objectives and methods, and did not support detailed analysis, 2) a danger exists for subjective conclusions concerning distribution, and 3) varying methods are needed to manage large quantities of material. Spatial analysis became a fundamental analysis method due to such needs, particularly after the 1980s when research efforts became especially active in the West along with developments in GIS and the accumulation of source material.

There are diverse fields of research that apply GIS to spatial analysis, but three are presented here: 1) Predictive Archaeological Modeling, 2) Point pattern analysis (of artifacts or sites), and 3) Settlement Archaeology. The first field looks at the attributes of a location of confirmed historic ruins, analyzes distance from rivers, direction, slope angle and such, and then predicts what kind of region will possess high probability as a historic relic location. The second field looks at a single site and derives meaning from the distribution of relics or pattern of ruins in a given

region (at random, systematically, clustered, etc). The third field is divided into three stages. The first stage is clarification of the structures within a settlement. The second stage is the relationship between the settlement and its surrounding natural environment. This stage is known as Landscape Archaeology, and furthermore includes Site Catchments Analysis. The third stage is analysis of the impact relationship between two settlements, where it is thought this impact relationship can clarify aspects of society at that time.

However, GIS application is not a solution to everything in archaeological spatial analysis. Rather, there is a side-effect; one must take care not to make methodological mistakes or abuse excessive analysis. At present, the theme of this author's research is the application of spatial analysis GIS to create a distribution pattern of Yayoi period settlements and rice paddies of the Osaka plane and a prediction of those regions. This research should make it possible to clarify one facet of Yayoi period society.



The Osaka plane excavation sites from early Yayoi period.

### Events

- Lecture: 'Communications' with the body, Contemporary Dance as Communication through the Body. Presenter: Sakamoto Kōsei. 7/7/2007 Art Research Center, Ritsumeikan University
- Lecture: A Trend in Image Culture—Another Miniscule yet Vast Image History. Presenters: Matsumoto Natsuki and Kozaki Taiji. 7/11/2007 Art Research Center, Ritsumeikan University
- Symposium: The Present State of Restoring Movies—Digital Restoration and Authenticity. 10/1/2007 Art Research Center, Ritsumeikan University
- Exhibition: Paul Binnie, Continuing the Japanese Print Tradition—Woodblock Prints from a Western Perspective. 11/5/2007-11/30/2007 Art Research Center, Ritsumeikan University
- Lecture: Paul Binnie Speaks on Continuing the Japanese Print Tradition, Demonstration: The Active Performance of Kan' eidō's Cutting and Printing. 11/10/2007 Art Research Center Ritsumeikan University
- Workshop: Third Joint Workshop on MPR (Machine Perception and Robotics) . 11/16-17/2007 Biwako and Kusatsu Campuses, Ritsumeikan University
- Symposium: The Potential of Digital Humanities—The Worlds Created by Web Communities, The Challenge of New Humanistic Scholarship. 12/18/2007 Tokyo Campus, Ritsumeikan University
- Symposium: Human Body Motion Analysis with Motion Capture. 12/21/2007 Kinugasa Campus, Ritsumeikan University
- Conference: Comprehensive Archive of Kyōto Cityscape Folding Screens and Changes in City Customs Project Conference. 12/26-27/2007 Art Research Center, Ritsumeikan University

### GCOE Seminars

- Place: [Kinugasa Campus] Art Research Center, Ritsumeikan University  
[BiwaKo Campus] Information Studies Meeting Room, College of Information Science and Engineering, Ritsumeikan University.
- Session 1: 10/2 (Tue)/2007  
Professor Kawashima Masao (Rits): Opening Words; A Full View of the Centre for Japanese Culture and Digital Humanities.  
Professor Hachimura Kōzaburō: What is Digital Humanities?  
Professor Akama Ryō: The Globalization of Research in Japanese Culture and Digital Humanities
- Session 2: 10/9 (Tue)/2007  
Dr. Chon Sonhen: The Change of settlement pattern of transition period from Neolithic to Bronze Age.  
Dr. Inoue Manabu: A Field Survey Method of Cultural Heritages Using Mobile GIS (POS System)
- Session 3: 10/16 (Tue)/2007  
Mr. Hanada Takuji: Kyoto seen from a military tie document of the Nanbokuchō Period  
Ms. Ishigami Aki: The Relationship between Shunpon by Nishizawa Ippu and Joururi-About "Kousyoku Gokuhiden."  
■ Extra Event, 1st Lunch Time Seminar  
Dr. Shioda Narushige (SUNY, Buffalo, USA): Using GIS for developing the 3D Spatial-temporal representation of urban environment
- Session 4: 10/23 (Tue)/2007  
Mr. Ueda Manabu: Appearance of motion picture theaters and transformation into modern cities  
Mr. Tsuruta Seiya: Real-Time Recognition of Body Motion for Virtual Dance Collaboration System
- Session 5: 10/30 (Tue)/2007  
Dr. Sanjay Rana (UCL, UK): Research in the Place of the London Steam Circus 200 Years Ago —Scholarly Festive Approach
- Session 6: 11/6 (Tue)/2007  
Dr. Kusui Kiyofumi: A study about Japanese novels of 1940's Korea: Especially on the analysis of the magazine "KOKUMIN BUNGAKEU"  
Dr. Lee Kisong: The Aspect of beginning of Rice agriculture in Kinki Area, Japan
- Session 7: 11/13 (Tue)/2007  
Ms. Todokoro Taiko: A Role of Traditional Local Colors of Kyo-Machiya in Urban Landscape Formation: Towards the Development of a Database for Urban Landscape in Kyoto  
Mr. Kaneko Takaaki: Digital archiving of woodblock materials -importance and problems-
- Session 8: 11/20 (Tue)/2007  
Ms. Matsuba Ryōko: The clue of the image—Ukiyo-e as records of pictorial quality on stage  
Ms. Ōya Atsuko: The environment that surrounds the Japanese films in Meiji Taishō era -Through Onoue-Matsunosuke's motion pictures and his activities-
- Session 9: 11/27 (Tue)/2007  
Professor John O' Brian (British Columbia University, Canada): The Place of Landscape in Canadian and Japanese 20th-Century Art
- Session 10: 12/4 (Tue)/2007  
Professor Nagai Kazuaki (Nara University): Wood blocks actually speak volumes; Publishing in the Edo period
- Session 11: 12/11 (Tue)/2007  
Mr. Kirimura Takashi  
Professor Hachimura Kōzaburō: Academic Societies Related to Digital Humanities
- Session 12: 12/18 (Tue)/2007  
Dr. Matsumoto Ikuyo: The problems and meanings of Japanese humane studies from over the seas

Please see the following websites for the latest information about Events and GCOE seminars:

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| Digital Humanities Center for Japanese Arts and Cultures , Ritsumeikan University | HP: <a href="http://www.ritsumeijp/humanities/index_j.html">http://www.ritsumeijp/humanities/index_j.html</a> |
| Art Research Center, Ritsumeikan University                                       | HP: <a href="http://www.arc.ritsumeijp/">http://www.arc.ritsumeijp/</a>                                       |
| GCOE seminars and information   | Blog: <a href="http://www.arc.ritsumeijp/lib/GCOE/seminar">http://www.arc.ritsumeijp/lib/GCOE/seminar</a>     |



Colophon:

Ministry of Education, Culture, Sports, Science and Technology [MEXT]  
Global COE [Center of Excellence] Program  
Digital Humanities Center for Japanese Arts and Cultures, Ritsumeikan University  
Newsletter Vol. 1  
Issued January 2008

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