

## Websites

These are some websites with articles and information on ancient Chinese kilns.

Title: **Important discoveries in Jingdezhen**

URL:

<http://www.china.org.cn/english/2004/Jan/85666.htm>

*A news article on the discovery of 2 ancient kiln sites at Jingdezhen, a city with the largest imperial porcelain workshop and long history of ceramic production.*

Title: **The kiln of civilisation**

URL:

[http://www.economist.com/diversions/millennium/displayStory.cfm?Story\\_ID=347060](http://www.economist.com/diversions/millennium/displayStory.cfm?Story_ID=347060)

*The writer looks at China in the 11<sup>th</sup> century Song dynasty, and how orders from the imperial court and wealthy classes affected porcelain production in the kilns of Henan, Hebei and Jiangxi provinces.*

Title: **The letters of Père d'Entrecolles**

URL:

<http://www.ceramicstoday.com/articles/entrecolles.htm>

*These are ancient letters detailing 17<sup>th</sup> century porcelain manufacture, written by a Jesuit missionary who visited kilns in China.*

Title: **Porcelain capital to the world: Jingdezhen**

URL:

<http://www.seattleartmuseum.org/Exhibit/Archive/porcelainstories/process/process.htm>

*An article on Jingdezhen city and the porcelain its kilns produced.*

Title: **World heritage listing requested for old kilns**

URL:

<http://english.people.com.cn/200406/27/eng20040627147684.html>

*Mentions the ancient Ruyao and Junyao kiln sites.*

These websites were last accessed on June 28th, 2007.

## Reference Services

For more information or research services on the Visual Arts, you may wish to contact the National Library Board through the following channels:

### Reference Point

This is a remote enquiry service. Our librarians will search both print and electronic resources to find the information that you need.

T +65 6332 3255

F +65 6332 3248

SMS +65 9178 7792

E [ref@nlb.gov.sg](mailto:ref@nlb.gov.sg) (enquiry and appointment)

Lee Kong Chian Reference Library

National Library Board

100 Victoria Street

Singapore 188064

Compiled by Alicia Yeo

Lee Kong Chian Reference Library

[www.nlb.gov.sg](http://www.nlb.gov.sg)

Disclaimer: The contents of this document include links to other sites. As a user, you acknowledge that NLB has no control over and makes no representations of any kind, either express or implied with respect to the contents on these sites and that you waive any claim against us with respect to such sites.

The information contained in this booklet is correct as of June 2007.

All rights reserved. National Library Board 2007

National Library Board

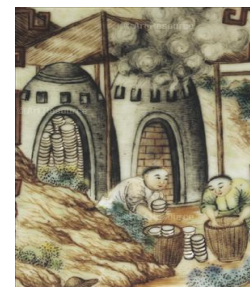
T+65 6332 3255 F +65 6332 3248

ResourceGuide

# Chinese Kilns

The key to every successful ceramic firing lies in the potter's kiln. Inside this heat source is where soft, porous clay is transformed into its hard, glassy and stone-like form. In China, ceramics have been produced as early as 5000 BC and the kilns were fuelled by wood fires. The dragon kiln (*long yao*) is but one type; others include the steam bun-shaped kiln (*man tou yao*), egg-shaped kiln (*dan xin yao*), and the earliest primitive type, the Yangshao Neolithic kiln (*heng xue yao*).

This resource guide will help you find information on the different types of Chinese kilns and Chinese ceramic production at the Lee Kong Chian Reference Library.



A Chinese *man tou yao* kiln firing, depicted on a Ming dynasty (14<sup>th</sup>-17<sup>th</sup> centuries) porcelain vase, in the Golestan Palace collection, Iran. Image available in Art Resource, Grove Art Online, via NLB's Digital Library.

 **Library**  
www.nlb.gov.sg

Knowledge • Imagination • Possibility

# Kiln Types

Here is a brief list of wood-fired kiln types used in ancient China, organized chronologically.

## (A) Neolithic Kiln (*heng xue yao*)

This ancient type from northwest China was used in 2000-4000 BC. The firebox was situated below, a small distance away from the wares.

## (B) Dragon kiln (*long yao*)

The major kiln type of south China, which is long, stretching up to 80 metres, and winds up hillsides, hence its name. It is also sometimes called long kiln (*chang yao*), centipede kiln (*wu gong yao*) and serpentine kiln (*she yao*). It can fire large quantities of wares at once.

## (C) Steam bun-shaped kiln (*man tou yao*)

The major kiln type of north China, shaped like a steamed bread bun. The temperature distribution was uneven, and capacity rather small.

## (D) Egg-shaped kiln (*dan xin yao*)

In profile, this kiln looks like an egg, and is found only in Jingdezhen city, at the later end of the Ming dynasty (14<sup>th</sup>-17<sup>th</sup> centuries). It was highly efficient as different clays and glaze types could be fired at the same time.

Here are two titles for further reading. They can be found in the Lee Kong Chian Reference Library, level 8.

### Title: **Chinese pottery and porcelain**

Author: Vainker, Shelagh

Publisher: London: British Museum Press, 2005

Call no.: RART 738.0951 VAI

*The appendices contain a good general overview about clays, glazes, kilns and firing methods used by the Chinese from prehistory to present.*

### Title: **A dictionary of Chinese ceramics**

Author: Wang Qingzheng

Publisher: Singapore: Sun Tree Publishing, 2002

Call no.: RART 738.20951 WAN

*A revised and expanded edition of a Chinese-language title, this heavy tome is handy for finding translations and meanings to keywords in Chinese ceramic technology. Contains summaries on kiln types.*

# Ceramic Production

There are several types of clay and decorative glazes used for ceramic production. The resulting look and feel is dependent on the potter's firing technique as well. Ceramics can be low-fired or high-fired, depending on kiln temperatures. In China, kilns often specialized in a style of ware, which was then named after the kiln itself.

Here are some examples of books on this subject, which can be found in the Lee Kong Chian Reference Library, levels 8 & 7.

### Title: **Ceramic masterpieces: art, structure, technology**

Author: Kingery, W.D and Vandiver, P.B.

Publisher: New York, London: Collier McMillan, 1986.

Call no.: RART 738.2 KIN

*A seminal book on ceramic science and technology, with chapters on shaping, firing, glazing and decoration.*

### Title: **The potter's dictionary of materials and techniques**

Author: Hamer, Frank

Publisher: London: A&C Black, 2003

Call no.: RART 738.103 HAM

*Reputed as the "potter's bible", this book contains an alphabetical list of terminology in the ceramics world, with concise explanations in areas such as clay and glaze minerals, forming methods and more.*

### Title: **Earth, fire and water: Chinese ceramic technology, a handbook for non-specialists**

Author: Pierson, Stacey

Publisher: London: University of London, Percival David

Foundation of Chinese Art, 1996

Call no.: RART 738.20951 PIE

*An easy-to-read guide on the chemistry behind Chinese ceramics, and their key components: clay, glaze and decorative methods.*

### Title: **Kiln sites of ancient China**

Author: Hughes-Stanton, Penelope

Publisher: London: Oriental Ceramic Society, 1981

Call no.: R 931 HUG

*This catalogue accompanies a 1973 London exhibition. It provides a good introduction to ancient Chinese kilns and the variety of wares they produced. 500 pieces from 13 provinces were shown.*

# Articles

(A) Here are some journal articles about Chinese ceramics. They were retrieved from the database **Art Full Text and Art Index Retrospective**, which offers indexes, abstracts and full text of articles from an international range of art journals.

### Title: **Consider a little more water in your fire**

Author: Woo, Marie

Source: Ceramics Technical

Issue: no. 13, 2001

*The author evaluates the use of water in Chinese kilns, for the reduction firing process.*

### Title: **Firing methods of a wood-fired Jingdezhen Qing dynasty kiln**

Author: Terpstra, Karen

Source: Ceramics Technical

Issue: no. 12, 2001

*The article takes a look at firing methods in a Yishan kiln in Jingdezhen. The author notes the division of labour among potters at this kiln.*

### Title: **Three old kilns from the Jingdezhen region**

Author: Grealy, Kevin

Source: Ceramics Technical

Issue: no. 21, 2005

*A study of the dragon kiln (long yao) and its construction, at three kiln sites in China.*

(B) For an overview and images of the different types of Chinese kilns, you may also wish to explore the database **Grove Art Online**. It contains text from the Dictionary of Art (1996, 34 vols.) and the Oxford Companion to Western Art (2001), with new and updated articles as well. The section on kilns can be found under: China> Part VII: Ceramics> 2. Materials and Techniques> (ii) Kilns.

We provide access to these Arts databases in the Digital Library ([www.nlb.gov.sg](http://www.nlb.gov.sg)). Registration is free.

