

Forging Japanese Swords

Japanese swords, or *nihontō*, are curved, single-edged blades known for their exceptionally strong steel and complex grain and temper patterns. Their making was designated an Important Intangible Cultural Heritage in 1955.

Japanese swords are distinguished by the way they are forged and tempered. The raw material is a low-impurity iron sand that is mixed with charcoal, smelted, and forge-welded into a type of steel called *tamagahane*. *Tamagahane* blocks are repeatedly folded and hammered out to remove impurities and evenly distribute the carbon, resulting in high-quality, multilayered steel. A clay mixture is applied everywhere but the cutting edge before the blade is heated and quenched, which gives it a completely unique temper pattern. Finally, the blade is polished and the smith's signature inscribed on the tang (the part of the blade that fits inside the hilt).

Although earlier swords exist, the origin of true *nihontō* is the emergence of long, curved blades called *tachi* during the Heian period (794–1185). *Tachi* were supplanted by a slightly shorter style called *katana* as the dominant form in the fifteenth and sixteenth centuries. However, the term *nihontō* covers a wide variety of both short and long blades that emerged at different times in response to the needs and styles of the era.

During the seventeenth to nineteenth centuries, the Maeda lords of Kaga domain (now Ishikawa and Toyama Prefectures) attracted many skilled swordsmiths, as well as artisans who crafted sword components, like scabbards and hand guards. Under the Maedas' patronage, they were able to pursue and refine their crafts, supplying elite members of the warrior class with finely wrought swords and ornate fittings.