

Yuton (Paper Floor mat)

Japan, c. 1900

Paper from paper mulberry (*Broussonetia papyrifera*), *kaki* or persimmon (*Diospyros*) tannin (*kakishibu*)

Purchase, 2014 (2014-50-01)

Yuton were cooling devices used in the summer months before the advent of air conditioners. Because of their high permeability, *yuton* were believed to actually lower one's body heat. Only one shop remains in Japan that makes *yuton* anymore - the scroll mounting shop, Beniya Kyodo, in Sabae City, Fukui Prefecture. *Yuton* are made only once a year between April and June. Sheets of handmade mulberry paper are coated with persimmon juice, *kakishibu*, and joined side-by-side. The sheets are combined then beaten into the layer beneath to make them adhere firmly, the secret behind the *yuton*'s overall strength. Each *yuton* has between 13 to 15 layers. After the mat is layered, it is coated twice with heated perilla (*Perilla frutescens*) oil. The underside is coated with a final application of persimmon juice. The entire mat would then be carried to the rooftop to dry, which had to be completed before the start of the rainy season. Each autumn, the *yuton* was rolled up and stored until the following summer. A *yuton*, properly cared for could last for several decades.

Duijin Zhu Gua (Breasted Bamboo Jacket)

China, 19th century

Bamboo, linen, cotton, netting, plain weave

Gift of Mrs. C.M. Cooke, 1927 (1064)

Bamboo coats and vests were conceived to protect an outer garment from body oils, and, to be worn as insulation between layers of garments. The network of bamboo created an air pocket that trapped body heat in the winter and permitted air circulation in the warmer months.

Duijin Zhu Kanjian (Breasted Bamboo Waistcoat)

China, 19th century

Bamboo, linen, cotton, netting, plain weave

Gift of Mr. Stephen McClaran, 2002 (11996.1)

Bamboo undergarments date back to the Ming dynasty (1368-1644) and were worn until the beginning of 20th century in China, particularly in Southern China. Although primarily worn by court officials of the Qing Dynasty (1644-1911) beneath elaborate silk robes and wedding costumes, these undergarments are also known to have been worn in Korea, Japan and the parts of Southeast Asia.

***Pio uki'* (Loincloth used as a Ceremonial Banner)**

Indonesia, Sulawesi, Galumpang, Sa'dan Toradja, c. 1915

Cotton, plain weave with supplementary weft, pattern weave

Gift of The Christensen Fund, 2001 (10470.1)

Among the most important artifacts of the Sa'dan Toradja are their textiles used at feasts and in mortuary rituals. Loincloths, often of great length are hung out as *tombi*, flags or banners at these events. Each end is elaborately decorated - one would have been worn in the front, the other the back. The woven panels of the *pio uki'* are typically geometric but this loincloth boasts a rare scene of village life evoking fertility and prosperity. The water buffaloes, accentuated by the contrasting color and dramatically angled heads, emphasizing their wide horn span, symbolize wealth and abundance.

From left to right

Kapa Malo (loincloth)

Hawai'i, Late 18th-early 19th century

Inner bark of *wauke* or paper mulberry (*Broussonetia*), beaten fiber, stamped design

Gift of Mrs. C. M. Cooke, 1936 (4112)

Loincloth

Vietnam, Quang Nam Province, Katu, 20th century

Cotton, beads, plain weave with supplementary warp and weft weave

Purchase, 2003 (12610.1)

Sirat sungkit (loincloth)

Indonesia, Borneo, Coastal Region, Iban, early-mid 20th century

Cotton, silk, discontinuous supplementary weft, weft wrapping, pattern weave

Gift of The Christensen Fund, 2001 (9988.1)

Ibu Komlora

Kain Cawat Tabai (ceremonial loincloth)

Indonesia, Tanimbar, Selaru Island, Werain, late 19th century

Cotton, trade cloth, shells, beads, plain weave with supplemental warp, applique

Gift of The Christensen Fund, 2001 (10560.1)

The loincloth or breechcloth is a basic form of dress of great antiquity that could be worn as an only garment, an undergarment or swimsuit. This fundamental piece of clothing is in essence a strip of fabric, barkcloth, or leather that is passed between the legs to support a man's genitals as a form of modesty and protection. Beyond function, a loincloth that is ornamented is recognized as a form of cultural identity, delineating family or clan lines of a given region. The portion that hangs in front as an apron can vary in length, regarded as a visual marker which can signify the age of the wearer or indicate one's social status,

Nagajuban (Under kimono)

Japan, Meiji Period (1868-1912)

Ramie, plain and gauze weave, *sumi* (ink) painting

Purchase, 1995 (7903.1)

Traditional Japanese garments often reflect the seasons. This under kimono is hand-painted in *sumi* ink with the design of a ghost, wistfully floating from a lantern - typical summer motifs. Japanese ghost stories feature a woman, betrayed by her lover, who returns as an angry and vengeful ghost. Why are ghost stories so popular in the summer? In Japanese Buddhism, August is the Bon season, when ancestral spirits are said to return for a brief annual visit, providing the perfect backdrop for ghost stories. When humans are frightened, the blood vessels on the surface of the skin contract, reducing the flow of blood, thus lowering the temperature of the skin. Hearing a good scary story will send a cold chill down one's spine, literally keeping one cool in the heat of summer.

Samples of *Hansan mosi* (ramie)

Korea, late 20th C.

Hansan semoshi or ramie (*Boehmeria nivea*, plain weave, dyed,
printed

Gift of the Cultural Center of Hansan City and Dr. Mini Nam, 2003
(2.1448.1 -16)

Woman's costume - *chima* (skirt), *chogori* (blouse)

Korea, early 21th century

Mosi or ramie (*Boehmeria nivea*), plain weave

Gift of Dr. Huh Dong-hwa and Dr. Park Young-sook, 2003

(12642.1ab)

Delicate, light and fine as cicada wings, *mosi*, a fine ramie is a high-quality fabric only produced in the Hansan region of the South Chungcheong Province. Weaving *mosi* is on the representative list of Intangible Cultural Heritage of Humanity as inscribed by UNESCO since 2011. The tradition has come to symbolize the perseverance of Korean women who pass on this knowledge from generation to generation. The fibers are acquired by chewing the tip of the inner bark of ramie plants into hair-thin strands. The typical nickname for ramie cloth in Korea is 'wings of a dragon fly' as a compliment to its light and almost-transparent refinement. Ramie absorbs perspiration effectively and is also quick drying. The woven cloth has a fine crisp texture and so it allows for good air ventilation making it an obvious preference for sultry summer months.

Camisa (blouse)

Philippines, Luzon, 1890

Piña, Spanish Red or Native Philippine Red pineapple (ananas comosus), plain or rengue weave, embroidery
Gift of Mrs. C. M. Cooke, 1927 (709a)

Piña is a delicate, diaphanous fabric woven from the fibers of the Red Spanish pineapple plant, and is considered the most elegant of textiles produced by hand in the Philippines. The fibers are extracted by scraping the resinous material (green portion of each leaf) using a broken porcelain shard and a coconut shell. The leaves are scraped until creamy white filaments appear. The first layer of extracted fibers, locally known as *bastos* is coarse, and the second layer, the *liniuan* fiber is fine and delicate.

After washing, fibers are sun-dried, and each filament is then skillfully hand-knotted to form a continuous length before weaving. Sometimes gauze screens or nets protected the weavers and looms from drafts that could break the fine threads, a practice that shrouded the weaving of *piña* cloth with mystery.

***Choli* (blouse) for wedding**

India, possibly Gujarat, Punjab, early 20th century

Cotton, plain weave, embroidery

Gift of Mrs. Gobindram Jhamandas Watumull, 1971 (3988.1)

A *choli* is a fitted upper garment, worn with a sari. The designs vary from region to region but are traditionally a cropped top with short sleeves. This one is tied at the neck, leaving the midriff and back exposed, a sensible style for hot and humid summer days. The red color of this wedding *choli* symbolizes happiness, prosperity, love, passion, desire, and excitement. Red also signifies flowers in bloom and sunlight that gives us life. It also represents power and energy. The embroidered pomegranates denote marital auspicious blessings of good luck, wealth and fertility.

Sari

India, Rajasthan, Bagru, first half of 20th century

Cotton, plain weave, *khari* (block printing)

Gift of Mrs. Gobindram Jhamandas Watumull, 1971 (3967.1)

Very fine, sheer fabrics have always been highly prized in India. Sanskrit poetry often describes women's bodies being revealed through the fineness of their clothes. Cotton is the most popular material for a summer sari. Breezy, lightweight and absorbent, it is perfect for hot and humid days. Cotton also takes on colors beautifully and summer cotton saris are usually patterned with bright prints of nature-inspired motifs. These saris have minimal embroidery and embellishments to reduce the weight of the garment for greater comfort.

While there is archaeological evidence that an early form of block printing on textiles existed in India in 3000 BCE, it was not until the twelfth century that the traditional art of block printing from intricately carved wooden blocks called *bunta* began to flourish. The states of Gujarat and Rajasthan are particularly renowned for manufacturing and exporting magnificent printed cotton fabrics. This example is stamped in black, typical for Bagru, a small village in the northwestern state of Rajasthan.

Costume

China, Guandong, Late Qing Dynasty (late 19th-early 20th c.)

Silk, shoulang yam (*Dioscorea cirrhosa*), mud dye, patterned gauze weave, hand stitched

Gift of Glenn Ahuna in memory of his mother, Mary Choi Lang Ahuna, 2004 (12863.1 and 12863.2)

Mud silk, also known as Canton silk or gambiered gauze is from the Guandong (Canton) province of southern China. The fabric was dyed with the juices of the shoulang yam (*Dioscorea cirrhosa*) and dried in the sun. This procedure was repeated several times before being coated with a river mud on one side. The entire cycle could take 5 days to complete, depending on the weather. The lengthy process resulted in a unique two-toned fabric, a glossy black on one side, a rust-brown on the other. The dyestuff itself is said to have medicinal value, adding to its desirability and use. The moisture permeability of the silk, combined with the leno weave, or twisted warps, created a light, crisp texture. Garments constructed of this gauze were highly favored because it did not adhere to the body and were cool and comfortable in the summer. It rustled when worn and released a slight scent and garnered the nickname “fragrant cloud gauze.”

Shifu Asetori (paper thread sweat absorber)

Japan, 1850-1860

Kozo or paper mulberry (*Broussonetia papyrifera*) handmade paper made into *shifu* (paper thread), plaited
Purchase, 2016 (TD 2016-23-01)

The inner bark of the *kozo* (paper mulberry) stalk was recognized for its long fibers, durability and overall strength. Paper made from this inner bark was cleverly sliced and spun into a continuous length to make *shifu*, a paper thread. The *asetori*, a sweat absorber was made by skillfully plaiting these threads into an open lacey vest. Samurai warriors were known to have written messages for good luck on the paper before it was made into thread, carrying these hidden auspicious messages into battle.

The *asetori* was worn as an undergarment against the body to absorb the perspiration and body oils, protecting the outer garment. The design also aided in air circulation and ventilation, making it suitable for summer months. In Japan, the tortoise was believed to live ten thousand years, so the hexagonal shell pattern was used to symbolize longevity.

Moisture management is one of the key performance criteria for the current apparel industry, regulating the comfort level of fabrics. The main action prevents perspiration from remaining next to the skin and allows the body's heat to be balanced under a wide range of environmental conditions and physical activities. In essence, it must be able to transport humidity, evaporate the humidity as quickly as possible, and keep the skin feeling dry while being soft and pleasant to the touch. These fabrics must be breathable, durable, easy to care for and lightweight.

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***Hitoe* (Woman's unlined summer kimono)**

Japan, mid-20th century

Silk, plain and figured gauze weaves, stencil printed

Purchase, 1999 (10958.1)

Because of its vigor and the unique shape of its bulb, the lily, known as *yuri* (*yu* means "one hundred" and *ri* means harmony) is regarded as an auspicious pattern, and symbolizes prayers for the prosperity of one's descendants. Beneath the bold floral design lies an intricate patterned gauze weave. Upon closer inspection, the twisted warps reveal a flowing water pattern known as *Kanze mizu* (Kanze water) because of its association with the Kanze school of Noh performers. The graceful and gentle curves ripple between medallions of crested waves, adding a cooling effect, and also provides an elegant system of ventilation.

***Hitoe* (Woman's unlined summer kimono)**

Japan, Kyoto, mid-20th century

Silk, plain and *nanakoshi-ro* (leno weave every 7 wefts), stencil printed

Purchase, 1999 (9054.1)

In the modern period, when silk fabrics became prevalent, textiles for the summer season changed from hemp to silk. From the Taisho period (1912-1926) to the first half of the Showa periods (1926-1989), *ro* silk such as *gokoshi-ro* and *nanakoshi-ro* where the warp threads are twisted every five or seven wefts gained in popularity. Unlined, light and airy summer kimonos were often decorated with motifs that reflected the season and also instilled a cooling psychological effect.

***Hitoe* (Woman's unlined summer kimono)**

Japan, mid-20th century

Silk, plain and *nanakoshi-ro* (leno weave every 7 wefts), stencil printed

Purchase, 1999 (10952.1)

The delicate, flowering *hagi* (bush clover) has been a favorite motif with Japanese poets. This flower of autumn blooms only a short time between the departing summer and the coming winter. The

branches represent feminine elegance and as it flowers in September as the summer heat lingers, it serves as a reminder of the change of seasons. The flowing water motif reflects the sense that all things are in a constant state of flux.