



## LAUNDRY DEVICES AND MACHINES

Washing clothes in a river was the norm across the world for centuries. Women carried their soiled linens and garments to a river, soaked them, and then beat the items against a rock with a stick or a stone to loosen and remove the dirt. By the Middle Ages, women employed laundry bats or “beetles” (so-called because they were used to “beat” the clothing) to pound out the dirt. Bats and beetles came in many shapes and sizes. Some were simply tree branches; others were long and round like a baseball bat. Some were flattened square boards with a handle; others looked like small, wooden spades. Regardless, the washing process remained the same. Beating wet clothing with some hard object continued to be the standard method for cleaning clothes.

Washboards evolved from washing bats and beetles. Women in northern England used washing bats with ridged surfaces. Scandinavian women used decorated, textured washing bats. In the 17<sup>th</sup> and 18<sup>th</sup> centuries women employed smooth washboards in combination with washtubs to ease the burden of stooping over or standing long hours in the river. Gradually, these traditions came together and the grooved, wooden washboard emerged. Stephen Rust patented the first metal-covered grooved washboard in 1833.

The grooved, metal-covered washboard marked a significant improvement. The washboard was small enough to fit into a wooden or metal tub, so carrying the laundry to the river became less necessary. The washboard’s grooved surface was less brutal on the fabric than river rocks had been, so clothes lasted longer. The washboard’s scored, galvanized metal overlay increased the effective surface area, so dirt was removed faster and clothes came cleaner than before. Still, washing laundry remained difficult work. Hauling and heating water and then scrubbing, rinsing and drying each piece individually by hand consumed many long hours. Many 19<sup>th</sup> century women designated one day each week as “washday” in which their labor was solely devoted to cleaning, drying and ironing their family’s clothing. This practice extended far into the 20<sup>th</sup> century and continues today in many underdeveloped countries.

Clothes washer technology developed as a way to reduce the manual labor spent on laundry, providing an open basin or sealed container with paddles or fingers to automatically agitate the clothing. The earliest machines were hand-operated and constructed from wood, while later machines made of metal permitted a fire to burn below the washtub, keeping the water warm throughout the day's washing.

By the mid-1850s, steam-driven commercial laundry machines were on sale in the US. In the United States there was more emphasis on developing machines for washing at home. The rotary washing machine was patented by Hamilton Smith in 1858.