Cambodian Weaving

The Cambodian shaft frame loom (kei thbanh) is used to weave the style of resist-dyed (hol) textiles unique to Cambodia. The ground weave is woven in an uneven twill, 2/1, meaning the weft thread is passed over 2 threads and under 1, creating a distinct difference in the color shading from the face of the fabric in comparison to the back. The use of 3 shafts on these looms is quite unusual, and the reason for this remains a mystery. Generally speaking, weaving techniques are designed to ease the process, and oftentimes used to increase speed. One can speculate that by raising only every third thread, there would be less friction in separating the fine warp threads, thus speeding up the process and creating less wear on the fibers. The use of 3 shafts might also regulate the 'rhythm' of lifting each shaft in a specific sequence.

The painstaking technique by which silk threads for the weft are resist-dyed prior to weaving is referred to as *hol*, although the origin of the Khmer word is surprisingly obscure. The starting point of the *hol* process requires that silk thread be wound back and forth between two rods held secure by a rectangular frame, or stands with pegs. Plant fibers were traditionally used to tie the pre-planned segments of the bundle of threads, but strips of plastic tape purchased in the markets now serve as substitutes.

The ties are applied according to a plan pre-determined in the weaver's mind's eye. She selects between two to six pairs of threads, and ties around a section of the bundle varying in length from a few millimeters to a couple of centimeters depending on how she has planned to build up the motif forms. Once dyeing is complete the bundles are hung up to dry, and the second set of ties is applied for the second color, and so on. Generally six colors are may be used: red, maroon, indigo, purple, yellow, and green. Extracts of leaves, bark, seeds, fruit, rhizomes and stems yield dyes used to color silk threads. For more crimson red, the silk thread is dyed with an extract from the resinous secretion, lac, of the insect *Kerria lacca*.

The success of achieving a lifelike rendering of narrative, pictorial, or figurative patterns using the *hol* technique is testament to the extraordinary skill and dexterity of Cambodian weavers.