Tablet weaving with jumbo yarns

Mari Kosunen, Päivi Fernström and Riikka Räisänen

University of Helsinki



Tablet weaving

Tablet weaving is a traditional craft technique, and it was widely practiced in Finland from the ancient times till the end of the 19th century to produce bands for all kind of purposes, for example framing textile's edges in the era of Iron Age and tying garments of the folk costumes. The oldest tablet woven band in Finland is from the 500 AD, found from the Huittinen excavation.

Tablet woven belts were used as waistbands for aprons and skirts, belts, head decorations, shoulder straps, sock garters, bag handles and pocket straps. In current national costumes, they are still widely used for much of the same purposes.

In this handicraft technique, bands are woven using wooden (or cardboard) tablets as tools. The warp threads pass through the holes in the corners of the tablet.

The weft is wound onto the shuttle. The band is constructed using twisted and multi-threaded warp and weft threads. Weaving tablets can have three to six corners, but usually the four-cornered one is used in Finland.



Picture 1. Tablet woven bands make by craft teacher students at University of Helsinki

(Picture: Päivi Fernström)

Picture 2. Bands from the collections of the South Karelia Museum

(Picture: Mari Kosunen)

Picture 3. Tablet weaving woman. Picture taken 1917 in Pyhäjärvi, Finland.

(Picture: Finnish Heritage Agency)





Weaving tablets

The tablets or thick jumbo yarn (Ø 12 mm or more) should be made of plywood which is 3 mm thick.

We made 21 cm x 21 cm square tablets with rounded corners (see Picture 4). Holes of diameter 14 mm were done in the corners for the yarns. Holes were numbered from one to four to make weaving easier. We cut a hole with a diameter 127 mm in the middle of the tablet to lighten its weight. Also, the middle hole gives a convenient grip when using the tablets.

For normal thin yarns, tablets can be made from cardboard.



Picture 4. Weaving tablets. (Picture: Mari Kosunen)

Instructions for tablet weaving with jumbo yarns

This instruction has been made according to the book Lautanauhat: suunnittelu ja kutominen [Tablet woven belts: design and weaving] written by the researcher Maikki Karisto (2010).

The warp can be created one thread at a time, one color at a time or directly through the entire tablet board pack.

The number of tablets depends on the pattern. The first end of the warp is attached to something sturdy, such as a door handle, and the other end is wrapped around the weaver.



Picture 5. Weaving tablets and natural dyed jumbo yarns.

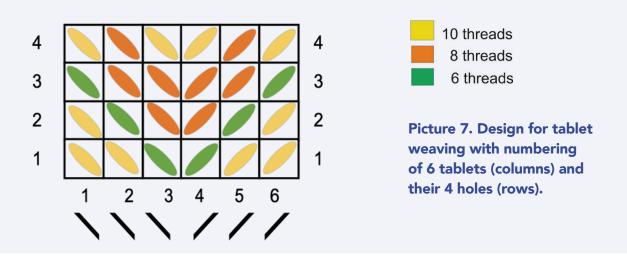
(Picture: Päivi Fernström)



Picture 6. Organizing tablets for weaving (Picture: Päivi Fernström)

Tablet weaving

- The band pattern is drawn on grid paper. The height of the design area is four lines, the number of holes in a tablet. These four horizontal rows form the basic unit of the model.
 Each row corresponds to one woven layer and the warp threads visible on the surface of the band.
- 2. Layers can be numbered on the right side of the model. Each vertical grid column corrsponds to one tablet, so the width of the design area (horizontally) is the same as the number of tablets used. The number of tablets is mostly even, but depending on the model, it can also be odd. Thus, from the figure below we can see that there are 6 tablets in use with 4 holes in each tablet.



- **3.** The tablets are numbered according to the chart in Picture 7 or only the numbers of the tablets are marked on it. One vertical grid column of the band chart corresponds to one tablet and its four corner holes, and the colorful warp threads threaded into them.
- 4. The corners of the tablets are marked with the numbers 1, 2, 3 and 4, for example, and they are marked on the left side of the chart from the bottom to the top. This is the same as the weaving direction of the band.
- 5. All the warp threads visible on the surface of the band are drawn on the grid chart with diagonal loops imitating the cord-like structure of the band. The colors of the loops correspond to the colors of the warp threads of the band. The pattern shows the colors and the number of threads creating the warp.

(The thread count of each color can be marked next to the band plan. This is useful information when estimating how much yarn is needed for the warp.) (see Picture 7)

- 6. The layout of the tablets is marked below the chart. The position of the tablet is either to the right / or to the left \ . Each tablet is in the position shown by the diagonal line when the warp threads are threaded into the holes of the tablet.
- **7.** The rotation direction of the tablets is marked with an arrow on the right side of the model. An upward arrow means forward rotation of the tablets, i.e. away from the weaver, and a downward arrow means backward rotation of the tablets, i.e. towards the weaver

Instructions for tablet weaving with jumbo yarns

- 8. The rotation direction change point can be drawn on the band model. The drawing of the model continues above the report, but after the turning point in the opposite order. The pattern is mirrored: the direction of the loops changes, and the layers now appear in the opposite order to the previous one, i.e. first the threads in hole 4, then 3, 2 and 1. This order is repeated as long as the tablets are turned backwards, i.e. towards the weaver.
- **9.** When you turn the tablet forward, the warp threads in the tablet, i.e. the loops of the drawing, are placed in the same direction as the tablet.
- **10.** When you turn the tablet backwards, the loops are placed in a different direction than the tablet.
- 11. At the point where the rotation direction of the tablets changes, longer pins are formed, i.e. longer leaps of warp threads over the weft. In this case, the warp threads can pass over several weft threads. This is clearly visible on the surface of the band. It is a characteristic feature of tablet bands, even if it sometimes looks like a mistake.
- 12. The warp threads are threaded into the tablet in the initial position in the order shown by the corner marks of the band pattern. You can find the warp thread to thread into each hole in the work instructions at the hole number. It is important that all the tablets are in the initial position when you start weaving. Then the pattern can be started from the right layer. The starting position of the tablets is: Closest to the weaver, hole 1 is at the top and from there clockwise are 2 at the top, 3 at the bottom and 4 at the bottom.



Picture 8. Tablet weaving with jumbo yarns. (Picture: Päivi Fernström)

- 13. To start the weaving, make a knot at the end of the warp bundle and mount it to a door handle or an other steady place. Make a knot to the other end of the warp bundle also and wind warp around your waist, test that you can tighten and loosen the warp by bending slightly. At the beginning of the band, two reports are woven with an extra piece of weft thread. Weaving is started by rotating the tablets forward from the initial position, i.e. 90 degrees away from the weaver. Do not squeeze the tablets together but keep them slightly apart from each other. When you turn the tablets, lean forward a little, so the warp loosens, and they turn more easily. Tighten the warp after turning by leaning back.
- **14.** Thread the weft through the formed shed. If the warp threads get stuck together, the shed can be made bigger, if necessary, by pulling the tablets forward and backward.
- **15.** Turn the tablets and thread the weft again through the shed.
- **16.** The weft should be slightly tightened after each row, but not too much so that the band does not be come too narrow. Warps should form an even surface, each yarn beside the others.
- 17. Continue weaving according to the pattern you have planned.
- **18.** Weave a few rows with a separate thread to finish, at the end of the band. Finish the actual band by threading the weft a few rows into the band, in the direction of the wefts.
- **19.** In the same way, finish the beginning of the band. After this, the start and end wefts can be unraveled. The warps can be shortened, leveled out and tied into a tassel, plaited or left as a fringe.



Picture 9. Tablet woven belts with embellishments.

(Picture: Päivi Fernström)

References

Karisto, Maikki & Pasenen Mervi. 2013. Omenaisia ja revonneniä, Suomalaisia lautanauhoja. [Applesies and Fox Noses, Finnish Tabletwoven Bands]. Helsinki: Salakirjat.

Karisto, Maikki. 2010. Lautanauhat: suunnittelu ja kutominen. [Tablet woven belts: design and weaving]. Helsinki: Tammi.

Kaukonen, Toini-Inkeri. 1965. Suomen Kansanomaiset Nauhat. [Finnish folk bands]. Helsinki: Suomalaisen Kirjallisuuden Seura.