

Fig.3

The fabrics made in this way must be comparatively heavy. Fine fabrics can be and are woven in Rep, but this requires extremely fine warp, and very heavy setts. For instance a beautiful silk Rep can be woven with No.100 silk (45,000 yds/lb) but it would have to be set at not less than 180 ends per inch. This certainly could not be done on 2 or even 4 frames. Therefore we shall limit our discussion to standard yarns.

Two-Block Patterns.

Strangely enough when we go from a uniform fabric to one with a simple pattern, we do not need to increase the number of frames. Two-block patterns can be still woven on two harness-frames. What distinguishes the two blocks is not the threading but the order in which the colours come. Let us go back to fig.1. If we want to change the colour of the fabric, we do not need to change either the threading or the treadling. We simply change the colours of the warp ends. In other words in fig.2 we would have the same threading: 1,2,3,4, but one block would have the colours: oxox, when the other: xoxo.

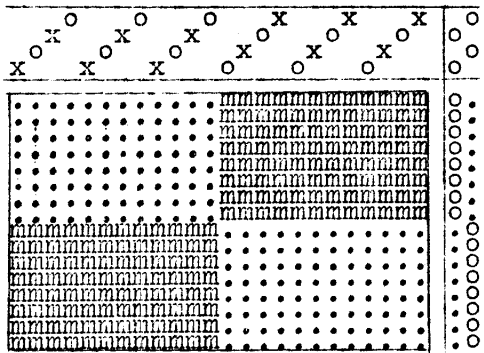


Fig.4

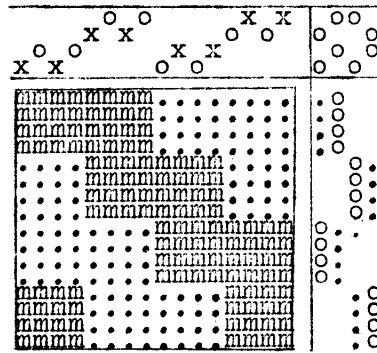


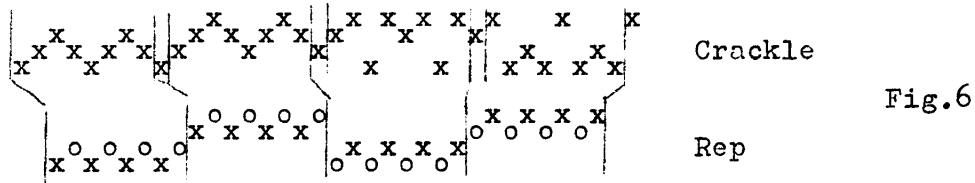
Fig.5

If we use both orders of colours in the same draft then we shall have two colours on the same side of the fabric side by side. When we want to reverse the colours during weaving i.e. have black where we had white before, and white where we had black, all we have to do is to use heavy weft instead of the fine one, and the fine weft instead of the heavy one. Fig.4 shows the complete draft. The usual draw-down is replaced here by an approximate picture of the fabric.

Any draft for a two-block pattern, such as traditional drafts for Summer-&-Winter can be easily transcribed for Rep Weave. Whenever the original draft calls for one block of S+W, we use the first block of Rep (white, black, white, black), and instead of the second block of S+W - the opposite order of colours: black, white, black, white. When all other conditions are the same, the pattern

in Rep will be smaller because of the closer sett of warp.

We can have also 4 blocks of pattern in about the same way as in Crackle weave, i.e. that the blocks will overlap. But here we need all 4 frames (fig.5) not for convenience's sake as before, but because the draft requires both: colour combinations and blocks in threading. The first block is threaded on frames 1 and 2 (reading from the left) with order of colours: black - white. The second - on frames 3 and 4 with the same order. The third - on frames 1 and 2 with reversed order, and the fourth - on 3 and 4 also with reversed order. Any traditional crackle draft can be transcribed into 4-block Rep. We simply replace each unit of crackle by one unit of Rep, as in fig.6.



We can also have a single block on a plain background, as in fig.7. But this requires a special threading with only two blocks of pattern threaded on 4 frames.

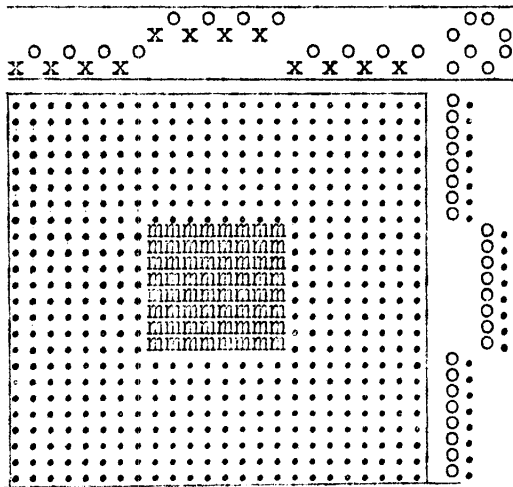


Fig.7

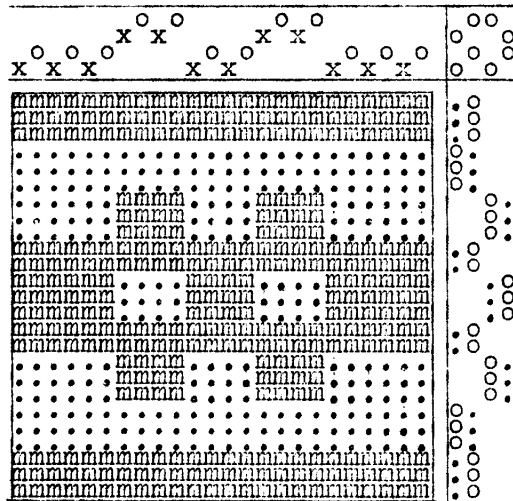


Fig.8

The same kind of threading with the same tie-up will give us also: both blocks together, no blocks, the first block alone, and the second block alone (fig.8).

Here we are not bound any longer by the necessity of weaving either one block or the other as in fig.4, or by the overlapping of blocks as in fig.5. Therefore this particular way of drafting the Rep Weave is the best for modern patterns, when drafts in fig.4 and 5 are more suitable for traditional weaving.

In fig.9 on the following page we give a few suggestions as to the patterns which can be woven with two-blocks-on-four-frames arrangement. Above each threading pattern we have a profile which can be easily developed into a threading draft.

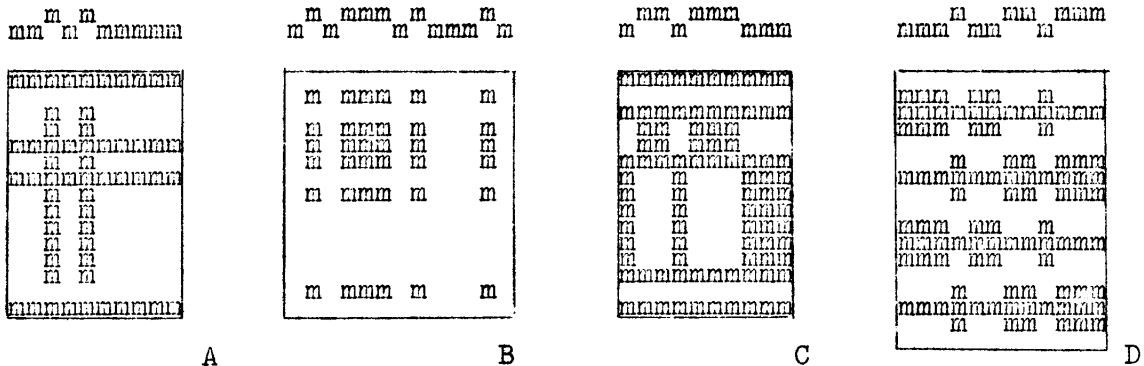


Fig.9

Finally there is another way of threading which will give us still more possibilities, but with one reservation: the weft will go not over one and under one warp end, but (at least part way) over two and under two. This means that either the weft will not be completely covered by warp, or that the sett of warp must be still closer than for ordinary Rep Weave, with four warp ends sleyed through the same dent of the reed. It means also that we shall have three different areas of colour in the woven piece. For instance in case of white and black in the warp we shall have: 1-st mostly black, 2-nd mostly white, and 3-rd half and half white and black or gray. Fig.10 shows how this happens.

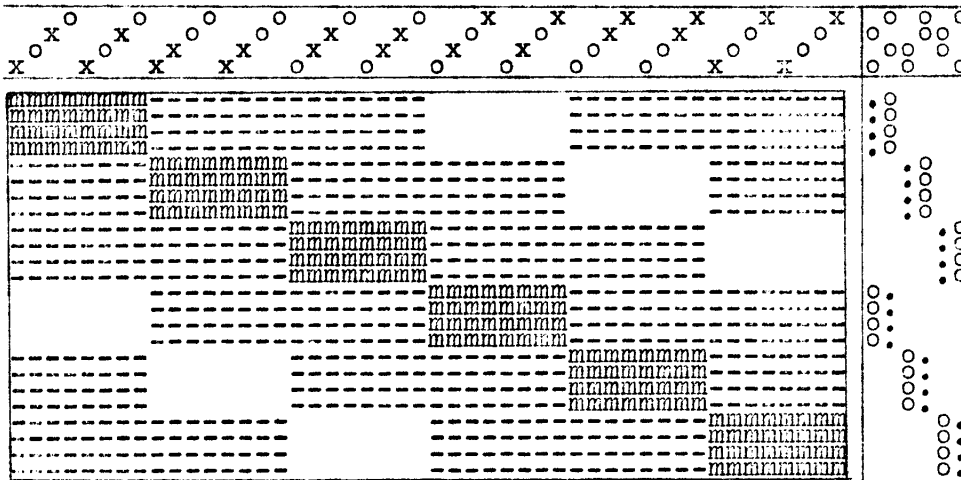


Fig.10

We have here 6 blocks of pattern, which is rather unusual with 4 frames. Two third of the fabric is gray; one sixth - black, and one sixth - white.

The six black and six white blocks make the designing anything but easy. When we follow a pattern in black blocks, then the white ones appear in most unexpected places, therefore we must take both into account. We consider this to be a rather special topic, and we shall not pursue it unless requested to do so by the readers.
