

**Carpet loom.** The Dornan ingrain carpet weaving needle loom is arranged for 16 colored wefts, the vertical lifters being arranged in two ranks and the threads being passed through holes in them so that the thread appropriate to the pattern is lifted into the path of the carrier needle and carried into the middle of the shed where it is met by a hook which catches the weft thread and retires with it to the other selvage where it is knit in by a latch-needle.

The Jacquard mechanism determines the selection of the colored weft thread by raising the weft-lifter. The spools of yarn are placed on skewers on a frame upon the floor. A part of the pattern is given by the warps of solid color, being due to the concurrence of the same colors in the warp and weft. The warp is laid double in the shed.

A forked temple is combined with the jaw temple and a finger extending over the lay holds the several weft-threads in position. The lay operates the let-off and take-up, and the connection with the lay is controlled by a pivoted piece. The Jacquard has a counterpoise motion, having one top-board and two trap-boards. The journals are operated by hooked bars placed in and out of gear with the slides which support the trap-boards.

See, also, NEEDLE-LOOM.

The Murkland power carpet loom is also for weaving ingrain carpets and operates by Jacquard and by shuttles. It carries 20 shuttles and weaves 16 colors. The shuttles are carried in boxes on each side and the selection of color is controlled by the Jacquard, which also governs the warp so as to float the required weft colors in accordance with the pattern. The loom is perfectly automatic.