

Title (en)

Booklet printing apparatus with page flipping mechanism

Title (de)

Heftdruckvorrichtung mit Seitenumblätterungsmechanismus

Title (fr)

Appareil d'impression de brochures avec mécanisme de tournage de pages

Publication

EP 2853409 B1 20161005 (EN)

Application

EP 14179165 A 20140730

Priority

JP 2013205561 A 20130930

Abstract (en)

[origin: EP2853409A1] The present invention intends to provide a page flipping mechanism that reduces an occurrence of a flipping of multiple pages at once at the time of page flipping. The configuration includes that (a) a booklet (33) is inserted, (b) when a following page (33b) of facing pages reaches a position of a flipping roller (17), feeding is stopped, and a gripper of a feeding roller pair (28a) and (28b) opens, a movable guide (29) releases an upper restriction, a lifting member (24) lifts the following pages (33b) up to a 60% height, the flipping roller (17) rotates 260 degrees at a 40% speed while vibrating and bends the top page (33b-1) upwards, (d) the flipping roller (17) is stopped, the lifting member (24) descends, the flowing pages (33b) returns to a horizontal position, an end edge of the top page (33b-1) is pressed on the flipping roller (17), (e) the flipping roller (17) rotates 120 degrees, flips up the top page (33b-1) and stops, and the top page (33b-1) flops over the flipping roller (17), (f) the feeding roller pair (28a) and (28b) closes the gripper, all feeding roller pairs rotates in a booklet ejection direction, the top page (33b-1) is lifted by a driven roller (28b) of the feeding roller pair, is pushed down, and overlays the preceding page (33a), (g) the booklet (33) is ejected outside and each of the members return to home positions (See page FIG. 4).

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