

Title (en)

Folding apparatus with belt speed control.

Title (de)

Falzapparat mit Bandgeschwindigkeitssteuerung.

Title (fr)

Appareil de pliage avec contrôle de vitesse de courroie.

Publication

EP 0434987 B1 19931118 (DE)

Application

EP 90122459 A 19901126

Priority

US 45358789 A 19891220

Abstract (en)

[origin: US5037365A] An improved folder includes a first series of belts which grips and moves sheet material along converging deflectors to fold the sheet material. As the space between the deflectors narrows, a second series of belts grips the sheet material and continues its movement between the deflectors. The first series of belts includes a first plurality of tapes disposed on a first side of a fold line and a second plurality of tapes disposed on a second side of the fold line. The second series of belts includes a pair of creaser belts which extend from between the tapes to an outlet portion of the folder. The speed of movement of the tapes and creaser belts is coordinated by using speed signal generators which are driven at the speed of movement of the tapes and creaser belts. A controller compares the speed signals and maintains a desired relationship between the speed of movement of the tapes and creaser belts. It is believed that the creaser belts will usually be driven at the same speed. However, the creaser belts may be driven at slightly different speeds in order to compensate for deformation imparted to the sheet material before it moved between the creaser belts.

IPC 1-7

B65H 45/22; **B65H 43/00**

IPC 8 full level

B65H 43/00 (2006.01); **B65H 45/22** (2006.01); **B65H 45/30** (2006.01)

CPC (source: EP US)

B65H 43/00 (2013.01 - EP US); **B65H 45/223** (2013.01 - EP US)

Cited by

CN112644072A; DE10060752B4; DE19831044A1; US6468195B1

Designated contracting state (EPC)

CH DE FR GB IT LI SE

DOCDB simple family (publication)

EP 0434987 A1 19910703; **EP 0434987 B1 19931118**; CA 2029011 A1 19910621; CA 2029011 C 19940920; DE 59003547 D1 19931223; JP 2549207 B2 19961030; JP H04140272 A 19920514; US 5037365 A 19910806

DOCDB simple family (application)

EP 90122459 A 19901126; CA 2029011 A 19901031; DE 59003547 T 19901126; JP 41195990 A 19901220; US 45358789 A 19891220