

Title (en)

Feed foot for sewing machine.

Title (de)

Obertransporteinrichtung an einer Nähmaschine.

Title (fr)

Pied transporteur sur machine à coudre.

Publication

EP 0046814 A1 19820310 (DE)

Application

EP 80105004 A 19800822

Priority

EP 80105004 A 19800822

Abstract (en)

[origin: ES8302138A1] A transport device for a sewing machine having a housing, a feeder foot and a fabric presser foot, a drive mechanism for driving the feeder foot and the presser foot, a transmission operatively interconnecting the presser foot and the feeder foot to the drive mechanism for alternately reciprocating the feeder foot and the presser foot relative to each other in up and down motions directed perpendicular to a stitch plate of the sewing machine, comprises linkages which cause the feeder foot and the presser foot, during their up and down motion, to move at a speed approaching zero during a touchdown phase of the motion. The transmission includes an eccentric connected to the drive mechanism which oscillates at a selected frequency. A triangular lever is connected to the feeder foot and the presser foot. A coupling member is connected to the eccentric and to the linkages with a link of the linkages pivotally mounted to the sewing machine housing and interconnecting the coupling member with the triangular lever. The transmission also includes a steering arm mechanism for providing a variable transmission ratio between the eccentric and the coupling member. A further linkage transmission connected to the drive mechanism varies the transmission ratio of the steering mechanism, the linkage transmission operating at twice the frequency of the steering mechanism.

Abstract (de)

Eine Obertransporteinrichtung an einer Nähmaschine, mit einem Vorschubfuß (7) und einem alternierend damit zusammenwirkenden Stoffdrückerfuß (10) denen durch ein mehrgliedriges Getriebe (25, 26, 28, 30, 33, 37, 38) über einen Dreieckshebel (13) senkrecht zur Stichplatte (49) der Nähmaschine gerichtete Auf- und Abwärtsbewegung erteilt werden und deren Geschwindigkeit in der Aufsetzphase der Füße gegen "Null" tendiert. Innerhalb des Getriebes (25, 26, 28, 30, 33, 37) ist zur Verbesserung der Betriebseigenschaften eine Lenkerübersetzung (28, 30) angeordnet, deren Übersetzungsverhältnis durch ein mit der doppelten Frequenz gegenüber dem Getriebe (25, 26, 28, 30, 33, 37) wirkendes Gelenkgetriebe (40, 41, 42, 45, 47; 101, 140, 141, 47) veränderbar ist.

IPC 1-7

D05B 27/06

IPC 8 full level

B65H 23/06 (2006.01); **D05B 27/04** (2006.01)

CPC (source: EP US)

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