

Title (en)

Multi-layered printable identity card and method for its manufacture.

Title (de)

Mehrschichtige als Druckstock verwendbare Ausweiskarte und Verfahren zu deren Herstellung.

Title (fr)

Carte d'identité imprimable à plusieurs couches et procédé pour sa réalisation.

Publication

EP 0308904 A2 19890329 (DE)

Application

EP 88115505 A 19880921

Priority

DE 3731853 A 19870922

Abstract (en)

[origin: JPH01141095A] PURPOSE: To enable writing having forgery preventing capacity by simple constitution and to enable an individual writing mode by a laser method by generating air bubbles in a plastic material used in a card by the action of laser and ensuring sufficient embossed height in order to perform the clear stamping of a character and deforming the main body of the card. CONSTITUTION: An identity card consists of an opaque core layer 22 and transparent covers 23, 24 and the core layer 22 has printing patterns 25, 26 provided on one side or both sides thereof and also has safety ensuring characteristics and plays the role for protecting a safety ensuring groove, see-through pattern type appearance and the forgery of a card structure. In the formation of this card, data is applied to the card composed of plastic by laser and an embossed character 28 is recorded within a flat high order region 21. Laser beam 29 is guided to flat high order parts 21a, 21b and recording parameters such as intensity, a scanning speed, pulse frequency or the like are properly selected and the max. air bubbles 30 are formed. This foamed region is limited to a local place and an increase in vol. of about 30% is reflected to a change of the corresponding thickness and excellent printing quality is obtained.

Abstract (de)

Eine Ausweiskarte wird mit einem als Druckstock verwendbaren Zeichensatz versehen, wobei die durch Lasereinwirkung hervorruftbare "natürliche Aufschäumbarkeit" der bei Ausweiskarten allgemein verwendeten Kunststoffmaterialien wie PVC und Polycarbonat genutzt wird, um eine für einen eindeutigen Abdruck der Schriftzeichen ausreichende Reliefhöhe zu erreichen. Die normgerechte Gesamthöhe der Prägezeichen bezogen auf die restliche Kartenoberfläche wird durch eine zusätzliche Verformung des Kartenkörpers im Prägezeichenbereich unter Ausbildung flächiger Plateaus erreicht.

IPC 1-7

B42D 15/02

IPC 8 full level

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CPC (source: EP US)

B42D 25/00 (2014.10 - EP US); **B42D 25/23** (2014.10 - US); **B42D 25/41** (2014.10 - EP US); **B42D 25/425** (2014.10 - US); **B42D 25/435** (2014.10 - US); **B41M 5/267** (2013.01 - EP US); **B42D 25/324** (2014.10 - EP US); **B42D 2033/08** (2022.01 - EP); **B42D 2035/50** (2022.01 - EP); **Y10S 283/904** (2013.01 - EP US)

Cited by

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