

CPC COOPERATIVE PATENT CLASSIFICATION

G PHYSICS (NOTES omitted)

INSTRUMENTS

G07 CHECKING-DEVICES

G07D HANDLING OF COINS OR VALUABLE PAPERS, e.g. TESTING, SORTING BY DENOMINATIONS, COUNTING, DISPENSING, CHANGING OR DEPOSITING

NOTE

In this subclass, the following terms or expressions are used with the meaning indicated:

- "coins" also covers tokens of similar nature;
- "valuable papers" covers paper currency, banknotes, bills, cheques, vouchers, securities, bonds or similar valuable papers, irrespective of the material used for these, which represent monetary value that can be measured or verified.

- 1/00** Coin dispensers (devices delivering paper currency [G07D 11/00](#))
- 1/02 . giving change {(coin-actuated mechanisms in general [G07F](#))}
- 1/04 . . dispensing change equal to a sum deposited
- 1/06 . . dispensing the difference between a sum paid and a sum charged
- 1/08 . . hand actuated
- 3/00** Sorting a mixed bulk of coins into denominations
- 3/02 . Sorting coins by means of graded apertures
- 3/04 . . arranged on an inclined rail
- 3/06 . . arranged along a circular path
- 3/08 . . arranged on a helix
- 3/10 . . provided by sieves arranged in series
- 3/12 . Sorting coins by means of stepped deflectors
- 3/121 . . {arranged on inclined paths}
- 3/123 . . . {the coins being deflected off rails}
- 3/125 . . . {by moving deflectors}
- 3/126 . . . {the coins being diverted by ramps in channels}
- 3/128 . . {Rotary devices}
- 3/14 . Apparatus driven under control of coin-sensing elements
- 3/16 . in combination with coin-counting

- 5/00** Testing specially adapted to determine the identity or genuineness of coins, e.g. for segregating coins which are unacceptable or alien to a currency {(in combination with apparatus freed or actuated by coins or the like [G07F 3/00](#))}

NOTE

In groups [G07D 5/005](#) - [G07D 5/10](#), the last place priority rule is applied, i.e. at each hierarchical level, in the absence of an indication to the contrary, classification is made in the last appropriate place.

- 5/005 . {Testing the surface pattern, e.g. relief}
- 5/02 . Testing the dimensions, e.g. thickness, diameter; Testing the deformation
- 5/04 . Testing the weight

- 5/06 . Testing the hardness or elasticity
- 5/08 . Testing the magnetic or electric properties
- 5/10 . Testing the rim, e.g. the milling of the rim

- 7/00** Testing specially adapted to determine the identity or genuineness of valuable papers or for segregating those which are unacceptable, e.g. banknotes that are alien to a currency

NOTE

In this group, groups [G07D 7/16](#) - [G07D 7/20](#) take precedence over groups [G07D 7/02](#) - [G07D 7/14](#).

WARNING

Group [G07D 7/00](#) is impacted by reclassification into group [G07D 7/15](#).

Groups [G07D 7/00](#) and [G07D 7/15](#) should be considered in order to perform a complete search.

- 7/003 . {using security elements (using digital security elements [G07D 7/004](#))}
- 7/0032 . . {using holograms}
- 7/0034 . . {using watermarks}
- 7/004 . using digital security elements, e.g. information coded on a magnetic thread or strip

WARNING

Groups [G07D 7/004](#) – [G07D 7/0043](#) are incomplete pending reclassification of documents from group [G07D 7/20](#).

Groups [G07D 7/004](#), [G07D 7/0043](#) and [G07D 7/20](#) should be considered in order to perform a complete search.

- 7/0043 . . using barcodes
- 7/0047 . . using checkcodes, e.g. coded numbers derived from serial number and denomination

- 7/005 . Testing security markings invisible to the naked eye, e.g. verifying thickened lines or unobtrusive markings or alterations

WARNING

Groups [G07D 7/005](#) – [G07D 7/0057](#) are incomplete pending reclassification of documents from group [G07D 7/20](#).

Groups [G07D 7/005](#) – [G07D 7/0057](#) and [G07D 7/20](#) should be considered in order to perform a complete search.

- 7/0051 . . {involving markings removed from an original pattern}
- 7/0053 . . {involving markings added to a pattern, e.g. interstitial points}
- 7/0054 . . {involving markings the properties of which are altered from original properties}
- 7/0055 . . . {involving markings displaced slightly from original positions within a pattern}
- 7/0056 . . . {involving markings of altered colours}
- 7/0057 . . . {involving markings which are altered in dimension, e.g. thickened lines}

- 7/01 . Testing electronic circuits therein

WARNING

Group [G07D 7/01](#) is incomplete pending reclassification of documents from group [G07D 7/02](#) and [G07D 7/04](#).

Groups [G07D 7/01](#), [G07D 7/02](#) and [G07D 7/04](#) should be considered in order to perform a complete search.

- 7/02 . Testing electrical properties of the materials thereof ([G07D 7/01](#) takes precedence)

WARNING

Group [G07D 7/02](#) is impacted by reclassification into group [G07D 7/01](#).

Groups [G07D 7/02](#) and [G07D 7/01](#) should be considered in order to perform a complete search.

- 7/023 . . Measuring conductivity by direct contact
- 7/026 . . using capacitive sensors
- 7/04 . Testing magnetic properties of the materials thereof, e.g. by detection of magnetic imprint ([G07D 7/01](#) takes precedence)

WARNING

Group [G07D 7/04](#) is impacted by reclassification into group [G07D 7/01](#).

Groups [G07D 7/04](#) and [G07D 7/01](#) should be considered in order to perform a complete search.

- 7/06 . using wave or particle radiation
- 7/08 . . Acoustic waves
- 7/10 . . Microwaves

- 7/12 . . Visible light, infra-red or ultraviolet radiation

WARNING

Group [G07D 7/12](#) is incomplete pending reclassification of documents from group [G07D 7/121](#).

Groups [G07D 7/12](#) and [G07D 7/121](#) should be considered in order to perform a complete search.

- 7/1205 . . . Testing spectral properties
- 7/121 . . . Apparatus characterised by sensor details

WARNING

Group [G07D 7/121](#) is impacted by reclassification into group [G07D 7/12](#).

Groups [G07D 7/121](#) and [G07D 7/12](#) should be considered in order to perform a complete search.

- 7/128 . . . Viewing devices
- 7/14 . using chemical means
- 7/15 . using heating means

WARNING

Group [G07D 7/15](#) is incomplete pending reclassification of documents from group [G07D 7/00](#).

Groups [G07D 7/00](#) and [G07D 7/15](#) should be considered in order to perform a complete search.

- 7/16 . Testing the dimensions
- 7/162 . . Length or width
- 7/164 . . Thickness
- 7/17 . Apparatus characterised by positioning means or by means responsive to positioning
- 7/181 . Testing mechanical properties or condition, e.g. wear or tear ([G07D 7/16](#) takes precedence)

WARNING

Group [G07D 7/181](#) is impacted by reclassification into group [G07D 7/189](#).

Groups [G07D 7/181](#) and [G07D 7/189](#) should be considered in order to perform a complete search.

- 7/182 . . Testing stiffness
- 7/183 . . Detecting folds or doubles
- 7/185 . . Detecting holes or pores
- 7/187 . . Detecting defacement or contamination, e.g. dirt
- 7/189 . . Detecting attached objects, e.g. tapes or clips ([G07D 7/187](#) takes precedence)

WARNING

Group [G07D 7/189](#) is incomplete pending reclassification of documents from group [G07D 7/181](#).

Groups [G07D 7/181](#) and [G07D 7/189](#) should be considered in order to perform a complete search.

7/20	<ul style="list-style-type: none"> Testing patterns thereon (G07D 7/004, G07D 7/005 take precedence) <p>WARNING</p> <p>Group G07D 7/20 is impacted by reclassification into groups G07D 7/004 – G07D 7/005.</p> <p>Groups G07D 7/20 and G07D 7/004 – G07D 7/005 should be considered in order to perform a complete search.</p>	11/16	<ul style="list-style-type: none"> Handling of valuable papers (within containers G07D 11/13)
7/2008	<ul style="list-style-type: none"> {using pre-processing, e.g. de-blurring, averaging, normalisation or rotation} 	11/165	<ul style="list-style-type: none"> Picking
7/2016	<ul style="list-style-type: none"> {using feature extraction, e.g. segmentation, edge detection or Hough-transformation} 	11/17	<ul style="list-style-type: none"> Aligning
7/202	<ul style="list-style-type: none"> using pattern matching 	11/175	<ul style="list-style-type: none"> Flattening, e.g. straightening out folds
7/2033	<ul style="list-style-type: none"> Matching unique patterns, i.e. patterns that are unique to each individual paper 	11/18	<ul style="list-style-type: none"> Diverting into different paths or containers
7/2041	<ul style="list-style-type: none"> {Matching statistical distributions, e.g. of particle sizes orientations} 	11/20	<ul style="list-style-type: none"> Controlling or monitoring the operation of devices; Data handling
7/205	<ul style="list-style-type: none"> {Matching spectral properties} 	11/22	<ul style="list-style-type: none"> Means for sensing or detection
7/206	<ul style="list-style-type: none"> Matching template patterns 	11/225	<ul style="list-style-type: none"> for detecting or indicating tampering
7/207	<ul style="list-style-type: none"> Matching patterns that are created by the interaction of two or more layers, e.g. moiré patterns 	11/23	<ul style="list-style-type: none"> for sensing the quantity of valuable papers in containers
7/2075	<ul style="list-style-type: none"> {Setting acceptance levels or parameters} 	11/235	<ul style="list-style-type: none"> for monitoring or indicating operating conditions; for detecting malfunctions
7/2083	<ul style="list-style-type: none"> {Learning} 	11/237	<ul style="list-style-type: none"> for detecting transport malfunctions, e.g. jams or misfeeds
7/2091	<ul style="list-style-type: none"> {Setting a plurality of levels} 	11/24	<ul style="list-style-type: none"> Managing the stock of valuable papers
9/00	Counting coins (in combination with coin-sorting G07D 3/16); Handling of coins not provided for in the other groups of this subclass	11/245	<ul style="list-style-type: none"> Replenishment
9/002	<ul style="list-style-type: none"> {Coin holding devices} 	11/25	<ul style="list-style-type: none"> Relocation of valuable papers within devices
9/004	<ul style="list-style-type: none"> {Coin packages} 	11/26	<ul style="list-style-type: none"> Servicing, repairing or coping with irregularities, e.g. power failure or vandalism
9/006	<ul style="list-style-type: none"> {Coin wrappers} 	11/28	<ul style="list-style-type: none"> Setting of parameters; Software updates
9/008	<ul style="list-style-type: none"> {Feeding coins from bulk} 	11/30	<ul style="list-style-type: none"> Tracking or tracing valuable papers or cassettes
9/02	<ul style="list-style-type: none"> Change trays 	11/32	<ul style="list-style-type: none"> Record keeping (transaction aspects G07F 19/00)
9/04	<ul style="list-style-type: none"> Hand- or motor-driven devices for counting coins (counting mechanisms in general G06M) 	11/34	<ul style="list-style-type: none"> Monitoring the contents of devices, e.g. the number of stored valuable papers
9/06	<ul style="list-style-type: none"> Devices for stacking or otherwise arranging coins on a support, e.g. apertured plate for use in counting coins 	11/36	<ul style="list-style-type: none"> Auditing of activities
9/065	<ul style="list-style-type: none"> {Devices for wrapping coins} 	11/40	<ul style="list-style-type: none"> Device architecture, e.g. modular construction
11/00	Devices accepting coins; Devices accepting, dispensing, sorting or counting valuable papers	11/50	<ul style="list-style-type: none"> Sorting or counting valuable papers
	WARNING	11/60	<ul style="list-style-type: none"> User-interface arrangements
	Group G07D 11/00 is impacted by reclassification into group G07D 11/60 .		WARNING
	Groups G07D 11/00 and G07D 11/60 should be considered in order to perform a complete search.		Group G07D 11/60 is incomplete pending reclassification of documents from group G07D 11/00 .
11/0087	<ul style="list-style-type: none"> {Banknote changing devices} 		Groups G07D 11/00 and G07D 11/60 should be considered in order to perform a complete search.
11/009	<ul style="list-style-type: none"> {Depositing devices} 	13/00	Handling of coins or of valuable papers, characterised by a combination of mechanisms not covered by a single one of groups G07D 1/00 - G07D 11/00
11/0093	<ul style="list-style-type: none"> {Drop boxes} 	2201/00	Coin dispensers
11/0096	<ul style="list-style-type: none"> {Accepting paper currency or other valuables in containers, e.g. in code-marked envelopes} 	2205/00	Coin testing devices
11/10	<ul style="list-style-type: none"> Mechanical details 	2205/001	<ul style="list-style-type: none"> Reconfiguration of coin testing devices
11/12	<ul style="list-style-type: none"> Containers for valuable papers 	2205/0011	<ul style="list-style-type: none"> by downloading test parameters, e.g. remotely
11/125	<ul style="list-style-type: none"> Secure containers 	2205/0012	<ul style="list-style-type: none"> automatic adjustment, e.g. self-calibration
11/13	<ul style="list-style-type: none"> with internal means for handling valuable papers 	2207/00	Paper-money testing devices
11/135	<ul style="list-style-type: none"> {Remote note containers} 	2211/00	Paper-money handling devices
11/14	<ul style="list-style-type: none"> Inlet or outlet ports 		