CPC  COOPERATIVE PATENT CLASSIFICATION

C  CHEMISTRY; METALLURGY
   (NOTES omitted)

METALLURGY

C23  COATING METALLIC MATERIAL; COATING MATERIAL WITH METALLIC MATERIAL; CHEMICAL SURFACE TREATMENT; DIFFUSION TREATMENT OF METALLIC MATERIAL; COATING BY VACUUM EVAPORATION, BY SPUTTERING, BY ION IMPLANTATION OR BY CHEMICAL VAPOUR DEPOSITION, IN GENERAL; INHIBITING CORROSION OF METALLIC MATERIAL OR INCRUSTATION IN GENERAL
   (NOTES omitted)

C23G  CLEANING OR DEGREASING OF METALLIC MATERIAL BY CHEMICAL METHODS OTHER THAN ELECTROLYSIS (polishing compositions C09G; detergents in general C11D)

WARNING
   In this subclass non-limiting references (in the sense of paragraph 39 of the Guide to the IPC) may still be displayed in the scheme.

1/00  Cleaning or pickling metallic material with solutions or molten salts (with organic solvents C23G 5/02)

   1/02   . . with acid solutions
   1/025  . . (acidic pickling pastes)
   1/04   . . using inhibitors
   1/06   . . organic inhibitors

   NOTE
   In groups C23G 1/061 - C23G 1/068 an invention is classified in the last appropriate place

   1/061  . . . [nitrogen-containing compounds]
   1/063  . . . [heterocyclic compounds]
   1/065  . . . [sulfur-containing compounds]
   1/066  . . . [phosphorus-containing compounds]
   1/068  . . . [compounds containing a C=C bond]
   1/08  . . . Iron or steel

   NOTE
   In groups C23G 1/081 - C23G 1/088 an invention is classified in the last appropriate place

   1/081  . . . [solutions containing H₂SO₄]
   1/083  . . . [solutions containing H₃PO₄]
   1/085  . . . [solutions containing HNO₃]
   1/086  . . . [solutions containing HF]
   1/088  . . . [solutions containing organic acids]
   1/10  . . . Other heavy metals
   1/103  . . . [copper or alloys of copper]
   1/106  . . . [refractory metals]
   1/12  . . . Light metals
   1/125  . . . [aluminium]
   1/14  . . with alkaline solutions

   1/16  . . . using inhibitors
   1/18  . . . Organic inhibitors
   1/19  . . . Iron or steel
   1/20  . . . Other heavy metals
   1/205  . . . [refractory metals]
   1/22  . . . Light metals
   1/24  . . . with neutral solutions
   1/26  . . . using inhibitors
   1/28  . . . with molten salts
   1/30  . . . using inhibitors
   1/32  . . . Heavy metals
   1/34  . . . Light metals
   1/36  . . . Regeneration of waste pickling liquors

3/00  Apparatus for cleaning or pickling metallic material (with organic solvents C23G 5/04 ; apparatus for continuously conveying articles into baths B65G)

   3/02  . . . for cleaning wires, strips, filaments continuously
   3/021  . . . [by dipping]
   3/022  . . . [the objects following a helicoidal path]
   3/023  . . . [by spraying]
   3/024  . . . [by a combination of dipping and spraying]
   3/025  . . . [Details of the apparatus, e.g. linings or sealing means]
   3/026  . . . [for guiding the objects]
   3/027  . . . [Associated apparatus, e.g. for pretreating or after-treating]
   3/028  . . . [for thermal or mechanical pretreatment]
   3/029  . . . [for removing the pickling fluid from the objects]
   3/04  . . . for cleaning pipes
Cleaning or de-greasing metallic material by other methods; Apparatus for cleaning or de-greasing metallic material with organic solvents

Mixtures of organic solvents are classified according to the major component.

- using organic solvents
- containing hydrocarbons
- containing halogenated hydrocarbons

- [containing fluorine]
- [containing only chlorine as halogen atom]
- [containing chlorine and fluorine]
- [Perhalogenated hydrocarbons]

- [Ethanes]
- [C₂Cl₂F₃]
- [C₂Cl₂F₂]

- [containing hydrogen]

- [Ethylenes]

- [Propanes]
- [C₃H₃ClF₄]
- [C₂H₂Cl₂F₄]

- [C₂HCl₂F₃]

- [characterised by the stabilising or corrosion inhibiting additives]

- [Hydrocarbons]

- [Oxygen-containing compounds]

- [Alcohols]

- [aliphatic]

- [aromatic]

- [Aldehydes or ketones]

- [Ethers]

- [Epoxy compounds]

- [Nitrogen-containing compounds]

- [Nitro-compounds]

- [N-heterocyclics]

- [Sulfur-containing compounds]

- [Phosphorus-containing compounds]

- containing oxygen-containing compounds

- having also nitrogen

- Apparatus

using emulsions