

CPC COOPERATIVE PATENT CLASSIFICATION

B PERFORMING OPERATIONS; TRANSPORTING

(NOTES omitted)

SHAPING

B27 WORKING OR PRESERVING WOOD OR SIMILAR MATERIAL; NAILING OR STAPLING MACHINES IN GENERAL

B27K PROCESSES, APPARATUS OR SELECTION OF SUBSTANCES FOR IMPREGNATING, STAINING, DYEING, BLEACHING OF WOOD OR SIMILAR MATERIALS, OR TREATING OF WOOD OR SIMILAR MATERIALS WITH PERMEANT LIQUIDS, NOT OTHERWISE PROVIDED FOR (applying liquids or other fluent materials to surfaces in general [B05](#); coating wood or similar material [B44D](#)); CHEMICAL OR PHYSICAL TREATMENT OF CORK, CANE, REED, STRAW OR SIMILAR MATERIALS

1/00	Damping wood	3/105 {Injection apparatus}
1/02	. Apparatus	3/12	. . Impregnating by coating the surface of the wood with an impregnating paste
3/00	Impregnating wood, {e.g. impregnation pretreatment, for example puncturing; Wood impregnation aids not directly involved in the impregnation process} (dyeing, staining B27K 5/00)	3/14	. . Bandage methods
3/002	. {employing compositions comprising microorganisms}	3/15	. . Impregnating involving polymerisation {including use of polymer-containing impregnating agents (macromolecular compounds derived from lignocellulosic materials C08H ; compositions of lignin-containing materials C08L 97/02)}
3/005	. {employing compositions comprising microparticles}		
3/007	. {employing compositions comprising nanoparticles}		
3/02	. Processes; Apparatus		
3/0207	. . {Pretreatment of wood before impregnation}		
3/0214	. . . {Drying (drying in general F26B)}		
3/0221	. . . {Pore opening (B27K 3/0214 takes precedence)}		
3/0228	. . {Spraying apparatus, e.g. tunnels}		
3/0235	. . {Stationary devices on or in legs or poles}		
3/0242	. . {using melt impregnation}		
3/025	. . {Controlling the process}	3/153	. . . {Without in-situ polymerisation, condensation, or cross-linking reactions}
3/0257	. . {using rods or tablets, or ampoules, e.g. inserted in pre-drilled cavities}	3/156	. . . {Combined with grafting onto wood fibres}
3/0264	. . {using staples or nails}	3/16	. Inorganic impregnating agents
3/0271	. . {Vapour phase impregnation}	3/163	. . {Compounds of boron}
3/0278	. . {involving an additional treatment during or after impregnation}	3/166	. . {Compounds of phosphorus}
3/0285	. . . {for improving the penetration of the impregnating fluid}	3/18	. . Compounds of alkaline earth metals
3/0292	. . . {for improving fixation (B27K 3/0285 takes precedence)}	3/20	. . Compounds of alkali metals or ammonium
3/04	. . Impregnating in open tanks	3/22	. . Compounds of zinc or copper
3/06	. . Sap stream methods	3/24	. . Compounds of mercury
3/08	. . Impregnating by pressure {, e.g. vacuum impregnation}	3/26	. . Compounds of iron, aluminium, or chromium
3/083	. . . {along the fibers, i.e. longitudinal impregnation}	3/28	. . Compounds of arsenic or antimony
3/086	. . . {using supercritical or high pressure fluids}	3/30	. . Compounds of fluorine
3/10	. . . Apparatus	3/32	. . Mixtures of different inorganic impregnating agents
		3/34	. Organic impregnating agents {(polymers B27K 3/15)}
		3/343	. . {Heterocyclic compounds}

NOTES

1. When classifying in group [B27K 3/15](#), classification is additionally made in the groups of subclass [C08L](#) for defining the chemical polymeric structure
2. In groups [B27K 3/16](#) - [B27K 3/50](#), in the absence of an indication to the contrary, impregnating agents are classified in the last appropriate place

B27K

- 3/346 . . {Grafting onto wood fibres ([B27K 3/156](#) takes precedence; macromolecular compounds derived from lignocellulosic materials [C08H](#))}
- 3/36 . . Aliphatic compounds
- 3/38 . . Aromatic compounds { ([B27K 3/343](#) takes precedence)}
- 3/40 . . . halogenated
- 3/42 . . . nitrated, or nitrated and halogenated
- 3/44 . . Tar; Mineral oil
- 3/46 . . . Coal tar
- 3/48 . . . Mineral oil
- 3/50 . . Mixtures of different organic impregnating agents
- 3/52 . Impregnating agents containing mixtures of inorganic and organic compounds

5/00 **Treating of wood not provided for in groups** [B27K 1/00](#), [B27K 3/00](#)

- 5/0005 . {Cryogenic treatment}
- 5/001 . {Heating}
- 5/0015 . {by electric means}
- 5/002 . . {Electric discharges, plasma}
- 5/0025 . {by magnetic fields}
- 5/003 . {by using electromagnetic radiation or mechanical waves ([infra-red heating of wood \[B27K 5/001\]\(#\)](#))}
- 5/0035 . . {Electron beam-radiation}
- 5/004 . . {Gamma-radiation}
- 5/0045 . . {X-rays}
- 5/005 . . {Laser-light}
- 5/0055 . . {Radio-waves, e.g. microwaves}
- 5/006 . . {Vibrations}
- 5/0065 . . {Ultrasonic treatment}
- 5/007 . {using pressure ([B27K 3/08](#) takes precedence)}
- 5/0075 . . {Vacuum}
- 5/008 . . {Supercritical or high pressure fluids}
- 5/0085 . {Thermal treatments, i.e. involving chemical modification of wood at temperatures well over 100°C}
- 5/009 . . {using a well-defined temperature schedule}
- 5/0095 . {by employing wrappers}
- 5/02 . Staining or dyeing wood {([wood staining compositions \[C09D 15/00\]\(#\)](#)); Bleaching wood ([bleaching wood pulp \[D21C 9/10\]\(#\)](#))}
- 5/04 . Combined bleaching or impregnating and drying of wood
- 5/06 . Softening or hardening of wood
- 5/065 . . {Hardening}

7/00 **Chemical or physical treatment of cork** (mechanical working of cork [B27J 5/00](#))

9/00 **Chemical or physical treatment of reed, straw, or similar material** (mechanical working of cane or the like [B27J 1/00](#))

- 9/002 . {Cane, bamboo}
- 9/005 . {Reed}
- 9/007 . {Straw}

2200/00 **Wooden materials to be treated**

- 2200/10 . Articles made of particles or fibres consisting of wood or other lignocellulosic material ([wood composite materials made of particles or fibres \[B27N\]\(#\)](#))
- 2200/15 . Pretreated particles or fibres

- 2200/30 . Multilayer articles comprising wood ([multilayered products \[B32B\]\(#\)](#))

2240/00 **Purpose of the treatment**

- 2240/10 . Extraction of components naturally occurring in wood, cork, straw, cane or reed ([solvent extraction \[B01D 11/00\]\(#\)](#))
- 2240/15 . Decontamination of previously treated wood ([decontamination in general \[A62D 3/00\]\(#\)](#))
- 2240/20 . Removing fungi, molds or insects ([biocidal compositions \[A01N\]\(#\)](#); sterilization or disinfection of wood [A61L](#))
- 2240/30 . Fireproofing ([fireproofing materials in general \[C09K 21/00\]\(#\)](#))
- 2240/50 . Ageing
- 2240/60 . Improving the heat-storage capacity
- 2240/70 . Hydrophobation treatment
- 2240/90 . UV-protection