

Title (en)  
STAB AND BULLET PROOF PROTECTIVE CLOTHING

Title (de)  
STICH- UND KUGELSCHUTZKLEIDUNG

Title (fr)  
VETEMENT DE PROTECTION CONTRE LES BALLES ET CONTRE LES COUPS PROVOQUES PAR UN OBJET TRANCHANT OU PIQUANT

Publication  
**EP 1058808 A1 20001213 (DE)**

Application  
**EP 99902548 A 19990118**

Priority  
• DE 19802242 A 19980122  
• EP 9900258 W 19990118

Abstract (en)  
[origin: US6656570B1] Protective clothing for protection against puncture injuries is constructed from more than one layer of a fabric coated with hard solids. The hard solids are applied in accordance with abrasives technology. This protective clothing offers equally good protection against both knife- and needle-like puncture implements. For clothing intended to protect against puncture and projectile injuries, a package of 2-20 layers of a fabric coated with hard solids is combined with a package of 6-50 layers of an uncoated aramid woven fabric.

IPC 1-7  
**F41H 1/02**; **B32B 7/02**; **B32B 27/20**

IPC 8 full level  
**A41D 31/00** (2006.01); **A43B 7/32** (2006.01); **A43B 13/12** (2006.01); **A43B 17/04** (2006.01); **F41H 1/02** (2006.01); **B32B 7/02** (2006.01); **B32B 27/10** (2006.01); **B32B 27/20** (2006.01); **F41H 5/04** (2006.01)

CPC (source: EP KR US)  
**A41D 31/245** (2019.02 - EP US); **A43B 7/32** (2013.01 - EP US); **A43B 13/10** (2013.01 - EP US); **A43B 13/12** (2013.01 - EP US); **A43B 17/04** (2013.01 - EP US); **F41H 1/02** (2013.01 - KR); **F41H 5/0435** (2013.01 - EP US); **Y10S 428/911** (2013.01 - EP US); **Y10T 428/24471** (2015.01 - EP US); **Y10T 442/2615** (2015.04 - EP US); **Y10T 442/2623** (2015.04 - EP US); **Y10T 442/2861** (2015.04 - EP US); **Y10T 442/2902** (2015.04 - EP US)

Cited by  
DE102017103584A1; DE102014110791A1; DE102017103584B4; WO2021043447A1; DE202017100965U1; WO2018114069A1; DE202014103530U1; EP3458796B1

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**US 6656570 B1 20031202**; AT E229636 T1 20021215; AU 2279999 A 19990809; AU 743770 B2 20020207; BR 9907152 A 20001024; CA 2319165 A1 19990729; CA 2319165 C 20070320; CN 1093629 C 20021030; CN 1288513 A 20010321; CO 4780058 A1 19990526; CZ 20002695 A3 20010516; CZ 292963 B6 20040114; DE 19802242 A1 19990805; DE 19802242 C2 19991111; DE 59903739 D1 20030123; DK 1058808 T3 20030331; EE 04601 B1 20060215; EE 200000439 A 20010815; EP 1058808 A1 20001213; EP 1058808 B1 20021211; ES 2184409 T3 20030401; HR P20000455 A2 20010831; HR P20000455 B1 20031231; HU 227648 B1 20111028; HU P0102551 A2 20011128; HU P0102551 A3 20030128; ID 26013 A 20001116; IL 137163 A0 20010724; IL 137163 A 20030529; JP 2002501166 A 20020115; JP 4176959 B2 20081105; KR 100585033 B1 20060601; KR 20010034312 A 20010425; NO 20003697 D0 20000719; NO 20003697 L 20000920; NO 318076 B1 20050131; PL 188950 B1 20050531; PL 341858 A1 20010507; RU 2206858 C2 20030620; SK 10962000 A3 20010212; SK 284907 B6 20060202; TR 200002116 T2 20001023; WO 9937969 A1 19990729; YU 46400 A 20021018; YU 49214 B 20040903; ZA 99408 B 19990720

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**US 60082000 A 20000808**; AT 99902548 T 19990118; AU 2279999 A 19990118; BR 9907152 A 19990118; CA 2319165 A 19990118; CN 99802326 A 19990118; CO 99001974 A 19990115; CZ 20002695 A 19990118; DE 19802242 A 19980122; DE 59903739 T 19990118; DK 99902548 T 19990118; EE P200000439 A 19990118; EP 9900258 W 19990118; EP 99902548 A 19990118; ES 99902548 T 19990118; HR P20000455 A 20000706; HU P0102551 A 19990118; ID 20001403 A 19990118; IL 13716399 A 19990118; JP 2000528835 A 19990118; KR 20007008030 A 20000721; NO 20003697 A 20000719; PL 34185899 A 19990118; RU 2000122093 A 19990118; SK 10962000 A 19990118; TR 200002116 T 19990118; YU 46400 A 19990118; ZA 99408 A 19990120