

Title (en)
A NUCLEAR FISSION REACTOR FUEL ASSEMBLY AND SYSTEM CONFIGURED FOR CONTROLLED REMOVAL OF A VOLATILE FISSION PRODUCT AND HEAT RELEASED BY A BURN WAVE IN A TRAVELING WAVE NUCLEAR FISSION REACTOR AND METHOD FOR SAME

Title (de)
BRENNSTOFFBAUGRUPPE FÜR EINEN KERNFISSIONSREAKTOR, FÜR DIE KONTROLLIERTE ENTFERNUNG EINES FLÜCHTIGEN FISSIONSPRODUKTS UND DER DURCH EINE BRENNWELLE IN EINEM WANDERWELLEN-KERNFISSIONSREAKTOR FREIGESetzten WÄRME KONFIGURIERTES SYSTEM SOWIE VERFAHREN DAFÜR

Title (fr)
ENSEMBLE ET SYSTÈME POUR COMBUSTIBLE DE RÉACTEUR DE FISSION NUCLÉAIRE CONÇUS POUR L'ÉLIMINATION CONTRÔLÉE D'UN PRODUIT DE FISSION VOLATIL ET DE CHALEUR DÉGAGÉE PAR UNE ONDE DE COMBUSTION DANS UN RÉACTEUR DE FISSION NUCLÉAIRE À ONDE PROGRESSIVE ET PROCÉDÉ CORRESPONDANT

Publication
EP 2419904 A2 20120222 (EN)

Application
EP 10772359 A 20100416

Priority

- US 2010001127 W 20100416
- US 38652409 A 20090416
- US 45985509 A 20090707
- US 45985609 A 20090707
- US 45985709 A 20090707

Abstract (en)
[origin: WO2010129010A1] A nuclear fission reactor fuel assembly and system configured for controlled removal of a volatile fission product and heat released by a burn wave in a traveling wave nuclear fission reactor and method for same. The fuel assembly comprises an enclosure adapted to enclose a porous nuclear fuel body having the volatile fission product therein. A fluid control subassembly is coupled to the enclosure and adapted to control removal of at least a portion of the volatile fission product from the porous nuclear fuel body. In addition, the fluid control subassembly is capable of circulating a heat removal fluid through the porous nuclear fuel body in order to remove heat generated by the nuclear fuel body.

IPC 8 full level
G21C 1/02 (2006.01); **G21C 3/04** (2006.01); **G21C 3/32** (2006.01); **G21C 21/02** (2006.01); **G21C 7/00** (2006.01)

CPC (source: EP KR)
G21C 1/026 (2013.01 - EP KR); **G21C 3/041** (2013.01 - EP); **G21C 3/044** (2013.01 - EP); **G21C 3/22** (2013.01 - KR); **G21C 3/3213** (2013.01 - EP); **G21C 7/00** (2013.01 - KR); **G21C 21/02** (2013.01 - EP KR); **G21C 7/00** (2013.01 - EP); **Y02E 30/30** (2013.01 - EP KR)

Designated contracting state (EPC)
AT BE BG CH CY CZ DE DK EE ES FI FR GB GR HR HU IE IS IT LI LT LU LV MC MK MT NL NO PL PT RO SE SI SK SM TR

DOCDB simple family (publication)
WO 2010129010 A1 20101111; CN 102460589 A 20120516; CN 102460590 A 20120516; CN 102460590 B 20160113; CN 102460592 A 20120516; CN 102460592 B 20150506; CN 102460593 A 20120516; CN 102460593 B 20160824; EP 2419903 A2 20120222; EP 2419904 A2 20120222; EP 2419904 A4 20131113; EP 2419905 A1 20120222; EP 2419905 A4 20131030; EP 2419906 A2 20120222; EP 2419906 A4 20131120; JP 2012524263 A 20121011; JP 2012524264 A 20121011; JP 2012524265 A 20121011; JP 2012524266 A 20121011; KR 101700464 B1 20170126; KR 101856234 B1 20180509; KR 20110138285 A 20111226; KR 20120011044 A 20120206; KR 20120018161 A 20120229; KR 20120018768 A 20120305; RU 2011143969 A 20130527; RU 2011143970 A 20130527; RU 2011143978 A 20130527; RU 2011143979 A 20130527; RU 2530751 C2 20141010; RU 2536181 C2 20141220; RU 2537505 C2 20150110; RU 2537853 C2 20150110; WO 2010129009 A2 20101111; WO 2010129009 A3 20110127; WO 2010129012 A2 20101111; WO 2010129012 A3 20101229; WO 2010132085 A2 20101118; WO 2010132085 A3 20110224

DOCDB simple family (application)
US 2010001123 W 20100416; CN 201080027020 A 20100416; CN 201080027021 A 20100416; CN 201080027022 A 20100416; CN 201080027023 A 20100416; EP 10772356 A 20100416; EP 10772357 A 20100416; EP 10772359 A 20100416; EP 10775181 A 20100416; JP 2012505885 A 20100416; JP 2012505886 A 20100416; JP 2012505888 A 20100416; JP 2012505894 A 20100416; KR 20117027240 A 20100416; KR 20117027244 A 20100416; KR 20117027245 A 20100416; KR 20117027247 A 20100416; RU 2011143969 A 20100416; RU 2011143970 A 20100416; RU 2011143978 A 20100416; RU 2011143979 A 20100416; US 2010001122 W 20100416; US 2010001127 W 20100416; US 2010001157 W 20100416