

Title (en)  
ENGINEERED CEMENTITIOUS CONTAMINANT BARRIERS AND THEIR METHODS OF MANUFACTURE.

Title (de)  
VORBEARBEITETE ZEMENTVERUNREINIGUNGSSPERREN UND VERFAHREN ZU IHRER HERSTELLUNG.

Title (fr)  
BARRIERES CIMENTAIRES PERFECTIONNEES ISOLANT DES SUBSTANCES CONTAMINANTES ET LEURS PROCEDES DE FABRICATION.

Publication  
**EP 0555238 A4 19930519 (EN)**

Application  
**EP 91917485 A 19910719**

Priority

- US 55608690 A 19900720
- US 61931790 A 19901128
- US 9105100 W 19910719

Abstract (en)  
[origin: WO9202024A1] Novel engineered cementitious contaminant barriers and containers for storage of hazardous waste are formed by positioning a hydraulic cement composition into a predetermined configuration and then hydrating the cement composition. One or more liquid, ion, or gas getters capable of binding with or absorbing liquids, ions, or gases which may penetrate the barrier may be positioned into the configuration before hydrating. The contaminant barriers of the present invention may be engineered to include mixtures of different getters, single and multiple layers of different getters, multiple layers of cement and getters, and a host of different getter, cement, mixture, and layer combinations. Novel waste containers are also advantageously prepared utilizing contaminant barriers within the scope of the present invention. The waste containers may be prepared by surrounding waste material with at least one getter and with a powdered hydraulic cement composition and then compressing the cement and getter around the waste material. Preformed waste containers may also be prepared within the scope of the present invention. Use of reinforcing fibers and aggregates to improve the mechanical properties of the hazardous waste container is disclosed.

IPC 1-7  
**G21F 9/16; G21F 9/34; H01L 23/48; H01L 23/535; H01L 29/04**

IPC 8 full level  
**G21F 9/30** (2006.01); **G21F 9/34** (2006.01)

CPC (source: EP)  
**G21F 9/304** (2013.01); **G21F 9/34** (2013.01)

Cited by  
CN107500589A; GB2624847A

Designated contracting state (EPC)  
AT BE CH DE DK ES FR GB GR IT LI LU NL SE

DOCDB simple family (publication)  
**WO 9202024 A1 19920206**; AT E151192 T1 19970415; AU 8631191 A 19920218; DE 69125500 D1 19970507; EP 0555238 A1 19930818; EP 0555238 A4 19930519; EP 0555238 B1 19970402

DOCDB simple family (application)  
**US 9105100 W 19910719**; AT 91917485 T 19910719; AU 8631191 A 19910719; DE 69125500 T 19910719; EP 91917485 A 19910719