

Title (en)  
NUTRIENT RECOVERY PROCESS

Title (de)  
VERFAHREN ZUR NÄHRSTOFFGEWINNUNG

Title (fr)  
PROCÉDÉ DE RÉCUPÉRATION DE NUTRIMENTS

Publication  
**EP 2935158 A4 20170322 (EN)**

Application  
**EP 13866334 A 20131218**

Priority

- CA 2012050907 W 20121218
- US 201313832737 A 20130315
- US 201361810088 P 20130409
- CA 2013050985 W 20131218

Abstract (en)  
[origin: WO2014094162A1] An apparatus for recovering nutrients or water from digestate comprises one or more solid-liquid separation units, an ammonia stripping device, and a gas scrubbing unit. In a process, digestate is separated into a solids portion and a liquid portion. Ammonia is stripped from the liquid portion and converted into an ammonium salt solution which may be sold or used as, or blended with, a fertilizer product. Optionally, at least part of the remaining liquid portion may be concentrated to produce brine. The brine is mixed with the solids portion. The mixture may be dried and used as, or blended with, a fertilizer product. Optionally, a least part of the remaining liquid portion may be re-used as dilution water in a digester. A solids portion of the digestate, and one or both of an ammonium salt solution and a brine, may be used as fertilizer without thermal drying.

IPC 8 full level  
**C05F 7/00** (2006.01); **B01D 19/00** (2006.01); **C01C 1/02** (2006.01); **C02F 3/28** (2006.01); **C05F 3/00** (2006.01)

CPC (source: EP)  
**B01D 3/343** (2013.01); **B01D 19/0005** (2013.01); **C01C 1/14** (2013.01); **C01C 1/185** (2013.01); **C01C 1/242** (2013.01); **C01C 1/28** (2013.01); **C02F 11/04** (2013.01); **C05F 17/10** (2020.01); **C05F 17/50** (2020.01); **C02F 2209/001** (2013.01); **C02F 2209/02** (2013.01); **C02F 2209/06** (2013.01); **C02F 2209/42** (2013.01); **C02F 2303/02** (2013.01); **Y02E 50/30** (2013.01); **Y02P 20/145** (2015.11); **Y02W 10/20** (2015.05); **Y02W 30/40** (2015.05)

Citation (search report)

- [I] US 2003201225 A1 20031030 - JOSSE JUAN CARLOS [US], et al
- See references of WO 2014094162A1

Cited by  
US9796223B2

Designated contracting state (EPC)  
AL 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 RS SE SI SK SM TR

DOCDB simple family (publication)  
**WO 2014094162 A1 20140626**; EP 2935158 A1 20151028; EP 2935158 A4 20170322

DOCDB simple family (application)  
**CA 2013050985 W 20131218**; EP 13866334 A 20131218