

Title (en)

METHOD FOR PRODUCING FATTY ACID METHYL ESTERS OR FATTY ACID ETHYL ESTERS

Title (de)

VERFAHREN ZUM HERSTELLEN VON FETTSÄUREMETHYLESTER BZW. FETTSÄUREETHYLESTER

Title (fr)

PROCÉDÉ DE FABRICATION D'ESTER MÉTHYLIQUE D'ACIDE GRAS OU D'ESTER ÉTHYLIQUE D'ACIDE GRAS

Publication

EP 2222828 A1 20100901 (DE)

Application

EP 08801845 A 20080905

Priority

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- DE 102007056703 A 20071124

Abstract (en)

[origin: WO2009065452A1] The invention relates to a method for producing fatty acid methyl esters (FAME) or ethyl esters (FAEE) and C₃H₅(OH)₃ from vegetable oils or animal fats in which the triglycerides contained in said oils or fats are transesterified in a base catalytic fashion with CH₃OH and/or C₂H₅OH in the mixers of a plurality of connected mixer-settler stages and the mixtures thus produced are separated in the settlers disposed downstream of the respective mixers into a fatty acid ester (FAE) and a phase containing C₃H₅(OH)₃. The phase containing FAE removed from the settler of the first mixer-settler stage is sent to the mixer of the subsequent mixer-settler stage, where aqueous acid is added thereto and said phase is washed with water in a counterflow. The water contained in the raw FAE thus obtained is removed and the prepared FAE is sent to further processing. The phase containing C₃H₅(OH)₃ obtained from the settler of the second mixer-settler stage is returned to the mixer of the first mixer-settler stage and the phase containing C₃H₅(OH)₃ removed from the settler of the first mixer-settler stage is combined with the phase containing aqueous CH₃OH and/or C₂H₅OH, C₃H₅(OH)₃ and salts obtained upon washing the FAE and the mixture is thermally separated into a phase containing CH₃OH and/or C₂H₅OH, C₃H₅(OH)₃ and an aqueous phase containing C₃H₅(OH)₃ and salts. In order to reduce the concentration of dissolved soaps in the dissolved C₃H₅(OH)₃, a soap-free C₂H₅(OH)₃ is dispersed into the FAE removed from the settler of the last mixer-settler stage and the dispersion is separated into a phase comprising raw FAE and a phase loaded with C₃H₅(OH)₃CH₃OH and/or C₂H₅OH, dissolved soaps, and catalysts.

IPC 8 full level

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Citation (search report)

See references of WO 2009065452A1

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