

Title (en)

ISOLATION OF PLANT OLIGOPEPTIDES AND USES THEREOF

Title (de)

ISOLIERUNG VON PFLANZENOLIGOPEPTIDEN UND VERWENDUNGEN DAVON

Title (fr)

ISOLEMENT D'OLIGOPEPTIDES VÉGÉTAUX ET LEURS UTILISATIONS

Publication

EP 3197288 A4 20180516 (EN)

Application

EP 15822094 A 20150715

Priority

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Abstract (en)

[origin: WO2016009364A1] The invention discloses a granular, free-flowing, non-dusting enriched oligopeptide isolate with a narrow, low molecular weight distribution derived from legume, seed, grain, marine and other sprouted or un-sprouted plant protein isolates and improved suitability for industrial applications and method for preparing the same. The novel oligopeptide isolate possess fluidity, dispersion, solubility, sensory properties, interaction stability and safety are consistent and well-suited for applications. The viscosity and clarity of the hydrate are well suited for applications. The product is stable, potent and easily absorbed by the body. The effective method of processing used to produce the oligopeptide isolate includes an ultra-high temperature processing treatment prior to enzymatic hydrolysis, dilution ratio and Brix parameters for hydrolysis and separation, nanofiltration and coupled fluidized bed and spray drying followed by drum drying process. The resulting plant or marine oligopeptide enriched isolate is suitable, not only for nutrient fortification of acidic media, but may be used in a wide variety of conventional applications of protein isolates, including but not limited to, fortification of acidic and non-acidic foods and beverages, emulsification of oils, as a body former in baked goods and foaming agent in products which entrap gases, pharmaceutical, preventative health, dietary supplement, pediatric nutrition, food additive, pet food, animal feed, fertilizer, antioxidant, antimicrobial, cosmetic, surfactant, adhesive and bio-fuel formulations.

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Citation (search report)

- [I] US 4443540 A 19840417 - CHERYAN MUNIR [US], et al
- [I] CN 101319245 A 20081210 - QINGDAO KENO BIO & TECH CO LTD [CN]
- [A] US 2013156887 A1 20130620 - TORP EDDY G [NO], et al
- [A] US 5691165 A 19971125 - NIELSEN PER MUNK [DK], et al
- See references of WO 2016009364A1

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