Record Nr. UNINA9910143296503321 Emulsifiers in food technology [[electronic resource] /] / edited by **Titolo** Robert J. Whitehurst Pubbl/distr/stampa Ames, Iowa, : Blackwell Pub., 2004 **ISBN** 1-280-21303-5 9786610213030 0-470-79928-5 0-470-99574-2 1-4051-4799-7 Descrizione fisica 1 online resource (266 p.) Altri autori (Persone) WhitehurstRobert J 664.06 Disciplina 664/.06 Soggetti Food additives **Emulsions** Dispersing agents Electronic books. Lingua di pubblicazione Inglese **Formato** Materiale a stampa Livello bibliografico Monografia Note generali Description based upon print version of record. Includes bibliographical references and index. Nota di bibliografia Emulsifiers in Food Technology; Contents; Contributors; Preface; 1 Nota di contenuto Lecithins; 1.1 Introduction to lecithins and phospholipids; 1.1.1 Some history; 1.1.2 Phospholipids; 1.1.3 Occurrence of phospholipids; 1.2 Production of lecithins; 1.2.1 Vegetable lecithins; 1.2.2 Animal lecithins; 1.3 Further processing of lecithins; 1.3.1 Standardisation; 1.3.2 Modifications of lecithins; 1.3.2.1 Enzymatic modification; 1.3.2.2 Chemical modifications; 1.3.3 Solvent extraction; 1.3.3.1 De-oiling with acetone; 1.3.3.2 Fractionation with alcohol; 1.3.4 Compounding; 1.3.4.1 Fluid compounds 1.3.4.2 Integrated powder compounds 1.4 Quality aspects of lecithins; 1.4.1 Acetone insoluble matter (AI); 1.4.2 Toluene insoluble (TI); 1.4.3 Acid value (AV): 1.4.4 Peroxide value (PV): 1.4.5 Water content (H2O): 1.5 Physico-chemical aspects of lecithins; 1.5.1 Solubility in organic solvents; 1.5.2 Behaviour in water; 1.5.3 Melting points; 1.5.4 Surface activity; 1.5.5 Lecithins and the HLB system; 1.6 Applications of

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Sommario/riassunto

Emulsifiers are essential components of many industrial food recipes, whether they be added for the purpose of water/oil emulsification in its simplest form, for textural and organoleptic modification, for shelf life enhancement, or as complexing or stabilising agents for other components such as starch or protein. Each chapter in this volume considers one of the main chemical groups of food emulsifiers. Within each group the structures of the emulsifiers are considered, together with their modes of action. This is followed by a discussion of their production / extraction and phys