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(54) Title: THE ACTIVE MODULATOR OF LIPOPHILICITY IN THE FORM OF DIMETHYLSULFONE FOR USE AS A TRANSITION PROMOTER OF ACTIVE SUBSTANCES, THE COMPOSITION CONTAINING IT AND THE METHOD OF ITS PRODUCTION

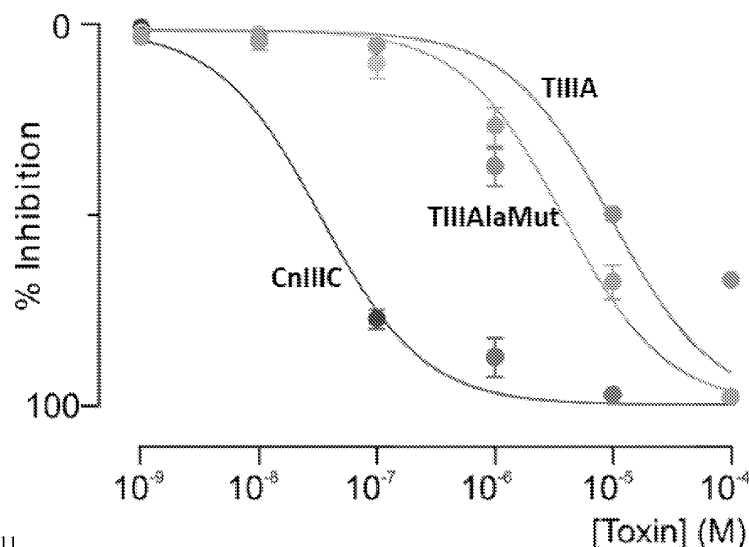


Fig. 11

(57) Abstract: An object of the invention is an active lipophilicity modulator in the form of dimethylsulfone (MSM) for use as a transition promoter for high molecular weight active substances with Mw > 500 Da. Another object of the invention is a cosmetic composition for transdermal administration comprising an active substance and a transition promoter, characterised in that the active substance is encapsulated by a transition promoter which is an active lipophilicity modulator according to claim. 1, while the active substance is a high molecular weight active substance with Mw > 500 Da. A further object of the invention is a method for producing a composition according to the invention, characterised in that it is carried out by either hot emulsification or cold emulsification, hot emulsification comprising the following steps: (a) mixing the dimethylsulfone with the diluent in a reaction vessel; (b) bringing the mixture to 70-85 °C; (c) stirring the mixture at 70-85 °C; with the onset of homogenisation depending on the phase combination steps; (d) cooling the mixture to 20-40 °C, preferably 30 °C; (e) adding a high- molecular-weight active substance with Mw > 500 Da and homogenising the mixture, preferably for 1- 3 min; while cold emulsification comprises the following steps: (a) mixing the

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dimethylsulfone with the diluent in a reaction vessel and dissolving while maintaining a temperature of 20-25 °C; (b) bringing the mixture to a temperature of 15 - 35 °C, preferably ambient or 25 °C; (c) stirring the mixture at a temperature of 15 - 80 °C, preferably 25 °C; with the onset of homogenisation depending on the phase combination steps; (d) adding a high molecular weight active substance with Mw > 500 Da and homogenising the mixture, preferably for 1-3 min.