E221 Effects of wastewater on biosynthesis of phospholipid and fatty acids composition of *Chlorella ellipsoidea*

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The growth, biosynthesis of phospholipid and their fatty acid composition of *Chlorella ellipsoidea* during the culture in wastewater polluted the heavy metals were analyzed to compare with the control. The quantity of heavy metals in cells significantly increased according to the duration of culture, whereas it was decreased to a minimum 25.4% in a wastewater. Compared to the control, growth, contents of total lipid, fatty acid methyl esters in cells cultured in wastewater were decreased predominantly and also phospholipid synthesis was inhibited in wastewater to compare with the control. The composition of fatty acids in phosphatidylcholine(PC) and phosphatidylethanolamine(PE) were utilized together both in the control and in the wastewater the saturated fatty acid(behenic acid,38.32%) and unsaturated fatty acid(palmitoleic acid,16.27%) to midphase of the culture. Otherwise, at the latephase of culture PE was saturated fatty acid(behenic acid, palmitic acid,63.82%) to formation the phospholipid, and PC was utilized the saturated fatty acid(behenic acid,40.02%) and the unsaturated fatty acid(palmitoleic acid,15.77%).

E222 A Epidemological Study of Virulence Factors Produced by *S.aureus* Strains Isolated from Foodstuffs Specimen in Korea. -On the Coagulase of the Isolates-

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142 *Staphyloccous aureus* were isolated from 760 foodstuffs current in the period 1997-1998,were achived for their epidemological study. 6 coagulase types were identified by coagulase confirmative test against 48 *S.aureus* isolated from the various foodstuffs. The remaining 94 strains were not confirmated into the 8 known types of coagulases. As showed the result,it was found that all the isolates could be classified into the coagulase types Ⅱ,Ⅲ,Ⅴ,Ⅵ,Ⅶ and Ⅷ. Namely,48 strains(33.8%) out of 142 isolates were classified into 7 strains(15%) as type Ⅱ,2 strains(4%) as type Ⅲ,3 strains (6%) as type Ⅵ, 3 strains(6%)as type Ⅷ, 25 strains(52%) as type Ⅶ,respectively. Therefore, it was found that type Ⅶ among the coagulase types of the *S.aureus* isolated from foodstuffs korea were occupied a good many.