DIFFERENCE OF IL-23 BETWEEN PROBIOTIC FORMULA-FED AND NON PROBIOTIC FORMULA- FED HEALTHY INFANTS BORN BY CESAREAN DELIVERY

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Probiotic bacteria will improve of immune deviation in infants born by cesarean delivery. A new effector T Cell subset that produces IL-17 has been identified. IL-23 promotes the expansion of antigen primed Th17 cells. The aim of this study is to find out the difference of IL-23 in breastfed infants born by cesarean delivery given probiotic formula and non probiotic Formula. Randomized open label clinical trial was performed on 96 healthy breastfed infants, birthweight ≥ 2500 g, born by cesarean delivery in Hasan Sadikin General Hospital Bandung. Fourty eight infants were breastfed combined with probiotic formula and 48 infants as control group. Daily notes were taken on duration of breastfeeding, the amount of milk formula given and any diseases up to fourth weeks. Plasma II-23, determined by enzyme immunoassay technique at the fourth weeks of life. The duration of daily breastfeeding was not significantly different in both groups (p>0,05). None of the infants got ill during follow-up. The mean of IL-23 in group breasfeeding with probiotic formula were 1.59 (0,23) and 1.50 (0.29). It was significantly different (p<0,05). Conclusion of this study: II-23 was significantly different between infants receiving breastmilk with probiotic formula and non probiotic formula.