

Prevalence of Congenital Phenylketonuria in Neonates Born in Torbat-E- Heydarieh during 2011-2013

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Abstract

Background and aim : Phenylketonuri is one of the major causes of mental retardation in infants. Diagnosis and prompt treatment may prevent the consequences. If there is Phenylketonuria in Fetus, Abnormalities in major organs such as the central nerve system occurs. Screening Phenylketonuri infants is the program of preventive medicine.

Materials and Methods: In this descriptive analytical study, which was based on the national guidelines for screening all newborns in Torbat-E- Heydarieh for 36 months, the blood samples from the soles of the feet of 3-5 day old infants were collected on the paper filter and phenylalanines were measured by ELISA. Infants with higher levels of phenylalanine quorum call. Data were analyzed by t-test and ANOVA statistical and software SPSS 21 ($p < 0.05$).

Results: The analysis of the data showed that of 11091 infants screened ,5390 were girls and 5701 were boys.11075 infants had a normal PKU, and 13 cases had $14 < \text{PKU} < 21 \text{ mu / L}$, and 2 cases had $15 < \text{PKU} < 21 \text{ mu / L}$, and 1 case had $\text{PKU} > 22 \text{ mu / L}$. The last 3 patients were identified and were treated.

Conclusion: The incidence of 1 case per 3697 Live birth was obtained in Torbat-E-Heydarieh. According to the results, it is concluded that the number of infants with congenital Phenylketonuria in Torbat-E-Heydarieh is high.

Keywords: Prevalence, Phenylketonuria, Infants