Background and Aims: Cell phone (CP) use has increased rapidly; specifically adolescents’ use is intensive (Söderqvist et al 2007). The question of potential risk for young age groups remains unresolved (Röösli et al 2010). This study aims to define the perceived risk for CP use and base stations and to determine the factors associated for Turkish high school students.

Methods: This cross-sectional study was conducted on December 2009-April 2010. The target population were 20,493 students, sample size was 2530 (p=50%, d=3%, design-effect=2 and 20% non-response). Stratified clustered sampling was used. Independent variables were; type of school, grade, age, gender, income, income perception, mother’s and father’s education, father’s occupation, CP utilization and ownership, the presence of base stations. Risk perception (RP) was questioned with a five-item likert scale for 25 statements. RP scores of the students were classified into 5 dimensions as base station, CP, public, individual, general.

Results: Response rate was 88.5% (51.6% female, 48.4% male). The mean scores for RP for 5 dimensions were ranged 3.16-3.96. Type of school, gender, income, father’s occupation, mother’s and father’s education, CP utilization, CP ownership was significantly associated with CP risk perception scores. Gender and presence of base stations were significantly associated with the base station RP scores. All the independent variables were significantly associated with the general RP scores except gender, income perception, CP ownership and presence of base station (p<0.05).

Conclusions: The lowest RP scores for the CP and public and highest scores for individual dimensions were found. The girls’ perception of risk was higher both for CP and base station. General RP significantly increased with increasing school grade and age. Low socioeconomic status was associated with high RP. Adolescents’ participation in risky behaviour is consistent with their RP (Gullone 2000; Cecile M et al 2007). The student knowledge should be improved about the health effects of CP use and base stations.

References: