Predictors of non-adherence to follow-up visits and deferasirox chelation therapy among Jordanian adolescents with Thalassemia major.

Al-Kloub MI, A Bed MA, Al Khawaldeh OA, Al Tawarah YM, Froelicher ES.

Abstract

Poor adherence to treatment can have negative effects on outcomes and health care cost. However, little is known about the factors that impact adherence to deferasirox chelation therapy. The aims of this study were to identify rates and predictors of non-adherence to medical regimen among thalassemia major adolescents on deferasirox oral chelation therapy by using subjective (self-reporting) and objective (serum ferritin and follow-up visits) measures. Convenient samples of 164 adolescents, aged 12-19 years were recruited from three National Thalassemia Centers in Jordan. Patients were interviewed using a four-section questionnaire and the medical records were checked. Results indicated that rate of adherence according to self-report was (73%); while to follow-up medical appointments and serum ferritin level rates was 57% and 47%, respectively. One-third of participant adolescents (n = 52) were psychologically impaired. Multivariate analysis showed that factors affecting adolescent non-adherence to deferasirox chelation therapy differ from that affecting adherence to follow-up visits. In general, adolescents more than 16 years old, presence of sibling with thalassemia, lack of parental monitoring, lower family income, decrease frequency of blood transfusion, and psychological impairment were found significant predictors of non-adherence among adolescents. Disease knowledge was not associated with adherence status of the adolescents. Clinician should be aware of high prevalence of low adherence to chelation therapy during adolescent years. Nurses need to regularly assess, monitor, and promote adherence behavior that might impact patients' outcomes.

KEYWORDS:
adherence; adolescents; deferasirox; follow-up; self-report; serum ferritin; thalassemia major

PMID:
25116329
[PubMed - indexed for MEDLINE]