Factors associated with quality of life among adult patients with Type 2 Diabetes Mellitus

ABSTRACT

The prevalence of Type 2 Diabetes Mellitus (T2DM) in Malaysia is increasing. It is essential to assess the quality of life (QoL) of T2DM to measure the outcome of T2DM for better care and control of the disease. This study aimed to determine the factors associated with QoL among adult patients with T2DM. A cross-sectional study was conducted among patients attending diabetic clinic in Seremban 2 Health Clinic. Patients were selected using systematic random sampling method and data collection gathered by self-administered questionnaire. SF-36 was used for assessing the QoL which has 8 health domains and 2 component summaries that incorporated both physical and mental component. The response rate was 89%. QoL were found significantly associated with socio-demographic factors such as age (PF: \( p=0.043 \)), gender (PF: \( p<0.001 \), BP: \( p=0.013 \) & PCS: \( p=0.007 \)), ethnicity (BP: \( p=0.03 \)), education level (RP: \( p=0.006 \), GH: \( p=0.038 \), VT: \( p=0.009 \), RE: \( p=0.012 \), MH: \( p=0.001 \), PCS: \( p=0.037 \), & MCS: \( p<0.001 \)), marital status (VT: \( p=0.027 \)), and employment status (PF: \( p<0.001 \), RP: \( p<0.001 \), GH: \( p<0.001 \) & VT: \( p=0.041 \)). Lower QoL scores were observed in older age group, females gender, lower education, divorced/widowed and unemployed. Clinical profiles such as diabetic duration (PF: \( p=0.005 \), RP: \( p=0.033 \), GH: \( p=0.004 \), RE: \( p=0.044 \) and PCS (\( p=0.003 \)), and presence of co-morbidity (PF: \( p=0.012 \)) were also significantly associated with QoL in various SF-36 domains. Type of treatment was significantly associated with QoL in all domains (\( p<0.05 \)) except in BP. Glycemic control significantly associated with QoL in RP (\( p=0.008 \)), BP (\( p=0.002 \)), GH (\( p=0.003 \)), RE (\( p=0.009 \)), PCS (\( p=0.001 \), and MCS (\( p=0.017 \)). Diabetic complication was significantly associated with all the 8 health domains and 2 component summaries (\( p<0.01 \)). In conclusion, socio-demographic, diabetic complication, co-morbidity, duration, treatment types and glycemic control were found to be associated with QoL among T2DM patients.

Keyword: Quality of life; Type 2 Diabetes Mellitus; SF-36; Seremban