

The menopausal age and associated factors in Gorgan, Iran

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Abstract

Background: Considering the physical, emotional and psychological complications of early or delayed menopause on women's life, it is necessary to determine associated factors of menopause age. This study designed to determine menopausal age and associated factors in women of Gorgan, i.e. the capital of Golestan province in the north-east of Iran.

Methods: In this cross-sectional study, 804 menopausal women in Gorgan were selected via two-stage sampling method in 2009. The study included only women who had undergone natural menopause and had their last menstrual bleeding at least one year before. Data were gathered through structured questionnaire that included individual characteristics, socioeconomic characteristics, menstrual and fertility characteristics and climacteric complaints. Socioeconomic status was defined using principal component analysis. Data were analyzed with T-student's and ANOVA tests using SPSS version 16 (SPSS Inc, Chicago, IL, USA) for Windows.

Results: The mean menopause age was 47.6 ± 4.45 years with the median age of 48 years. The mean menopause age in women with first pregnancy before 30 years (47.58 ± 4.47 years), without pregnancy (46.26 ± 4.90 years) and without delivery (46.30 ± 4.47 years) was significantly lower than others ($p < 0.01$). The mean menopause age was lower in single women (46.6 ± 2.80 years), with low income level (47.7 ± 4.39 years) and smokers (47.6 ± 4.45 years) compared to others; but these differences were not statistically significant ($p > 0.05$). Socioeconomic status was not associated significantly with menopause age ($p > 0.05$).

Conclusion: This study illustrated that menstrual and fertility factors have influence on menopausal age while socioeconomic factors were not effective.

Keywords: Menopausal age, socioeconomic status, Menstrual factors, Fertility factors, Climacteric complains, Iran.

Introduction

Menopause is defined as discontinuation of menstruation for successive 12 months (1). Although it has constant mean and median the menopause in the recent century approves its occurrence as a phenomenon

affected by ethnic and genetic factors, and environmental factors (2-5). In some studies the role of some associated factors in defining menopausal time have been investigated in various nations which showed changes in life style and social status may

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