عنوان مقاله:

The Relationship Between Breast Cancer and VDR Gene Polymorphisms

محل انتشار:

فصلنامه سرطان پستان, دوره 5, شماره 1 (سال: 1397)

تعداد صفحات اصل مقاله: 6

نویسندگان:

Hengameh Mozaffarizadeh - *Department of Genetics, Isfahan University of Medical Sciences, Isfahan, Iran*

Mohammadreza Hakimian - *Cancer Prevention Research Center, Isfahan University of Medical Sciences, Isfahan, Iran*

Mansoor Salehi - *Department of Genetics, Isfahan University of Medical Sciences, Isfahan, Iran*

Elham Moazam - *Cancer Prevention Research Center, Isfahan University of Medical Sciences, Isfahan, Iran*

Mohaddeseh Behjat - *Rajaie Cardiovascular Medical and Research Center, Iran University of Medical Sciences, Tehran, Iran*

Mahtab Keshvari - *Isfahan Research Institute, Isfahan University of Medical Sciences, Isfahan, Iran*

خلاصه مقاله:

Background: Vitamin D serves several cancer protective roles within thehuman body.Vitamin D functions through binding with the VDR encoded by VDRgene. It has been demonstrated that polymorphism in VDR gene would influenceexpression and/or function of the VDR protein. The researchers found that themost important VDR gene polymorphisms that are associated with tumorigenesisinclude Fok۱ (rs۲۲۲۸۵۷۰), Bsm۱ (rs۱۵۴۴۴۱۰), Taq۱ (rs۷۷۱۲۳۶), and Apa۱(rs۷۹۷۵۲۳۲) .The purpose of this study was to assess the association between Fok۱,Bsm۱, and Taq۱ polymorphisms and breast cancer development. Methods: In this study, ۵۰ patients suffering from breast cancer with less than ۶months after the diagnosis of breast cancer and ۵۰ healthy control individuals wereincluded. Restriction fragment length polymorphism PCR (RFLP-PCR) was usedto determine the genotype of polymorphisms. Results: Statistical results showed that among the studied polymorphisms, Ttgenotypes of Taq۱ polymorphism have correlations with breast cancerdevelopment (P< ۰.۰۰۱, OR= ۵.۵۱, ۰.۹۵ CI= ۲.۳۰-۱۳.۲۱). Conclusion: The results of the present clearly demonstrated that there is arelationship between Taq۱ polymorphism in VDR gene and development of breastcancer.

کلمات کلیدی:

Breast cancer, VDR gene, polymorphism