

عنوان مقاله:

Ion channel gene expressions in infertile men: A casecontrol study

محل انتشار:

مجله طب تولید مثل ایران, دوره 15, شماره 12 (سال: 1396)

تعداد صفحات اصل مقاله: 8

نویسندگان:

serkan carkci - M.D., Department of Urology, Faculty of Medicine, Firat University, Elazig, Turkey

Ebru Onalan Etem - M.D. Department of Medical Biology, Faculty of Medicine, Firat University, Elazig, Turkey

Seda Ozaydin - M.D. Department of Medical Biology, Faculty of Medicine, Firat University, Elazig, Turkey

Ahmet Karakeci - M.D. Department of Urology, Faculty of Medicine, Firat University, Elazig, Turkey

خلاصه مقاله:

Background: Infertility is described as not receiving pregnancy despite unprotected and regular sexual intercourse in a 1 yr period. It is detected by 15% of the couples. Male and female factor in the etiology may be detected in similar rates. Objective: The present study aims to investigate ion channel gene expression in semen samples of infertile male compared with fertile men. Materials and Methods: A total of 150 men who applied to the urology clinic due to infertility were divided into five equal groups: asthenozoospermia, oligozoospermia, oligoasthenoteratozoospermia, teratozoospermia, and normozoospermia (control). All participants were evaluated with Cation Channel Spermia (CatSper) 1, 2, 3, 4, Proton Voltage Gated Ion Channel1 (Hv1), Potassium Channel Subfamily U1 (KCNU1), and transmembrane protein (TMEM16A) gene expression in semen samples. Results: CatSper1, 4, HV1, KCNU1, and TMEM16A gene expression were detected higher in the oligozoospermia group compared to the controls. CatSper1, 2, 3, 4, KCNU1, and TMEM16A gene expression in the asthenozoospermia group and CatSper1, 2, 3, 4, KCNU1, and TMEM16A gene expression in the teratozoospermia group were detected lower compared to the controls. CatSper1, 4, HV1, and TMEM16A gene expression were higher in the oligoasthenoteratozoospermia men than the controls while CatSper3 gene expression was detected as lower. Conclusion: It was detected that these ion channels have an effect on sperm progressive motility and morphology. It may be considered that mutations in these ion channels may result .in infertility

کلمات کلیدی:

Infertility, Male, Genes, Ion channels, Sperm

لینک ثابت مقاله در پایگاه سیویلیکا:

<https://civilica.com/doc/719746>



