Dinamika ekspresi Cullin 1 dalam Plasenta Preeklampsia dan hubungannya dengan waktu terminasi kehamilan = Dynamic of Cullin 1 expression in preeclamptic placenta and its association with pregnancy termination time.

Makbruri, author

Abstrak

ABSTRAK
Preeklampsia merupakan sindrom sistemik yang terjadi pada 3-5 % kehamilan wanita yang disebabkan oleh gangguan faktor migrasi dan faktor seluler yang berdampak pada gangguan diferensiasi dan invasi trofoblas yang penting dalam proses perkembangan plasenta dan mempertahankan kehamilan. Protein Cullin-1 merupakan salah satu kandidat protein yang berperan dalam proses mempertahankan kehamilan, perkembangan dan invasi trofoblas di dalam plasenta. Hingga saaat ini belum ada penelitian yang menghubungkan ekspresi Cullin-1 pada pasien preeklampsia dengan waktu terminasi kehamilan. Oleh karena itu pada penelitian ini dilakukan analisis ekspresi Cullin-1 pasien preeklampsia dan hubungannya dengan waktu terminasi kehamilan. Sampel plasenta diambil dari pasien preeklampsia yang terdiri dari tiga kelompok usia kehamilan, kemudian dilakukan perwarnaan imunohistokimia untuk dilihat dinamika ekspresi dan distribusi Cullin-1 pada berbagai kelompok usia kehamilan dan hubungannya dengan waktu terminasi kehamilan. Cullin-1 terekspresi pada sinsitiotrofoblas dan sitotrofoblas. Kadar Cullin-1 terendah didapatkan pada kelompok usia kehamilan very preterm, dan paling tinggi didapatkan di kelompok usia kehamilan moderate preterm. Terdapat perbedaan bermakna antara ekspresi optical density (OD) Cullin-1 dengan waktu terminasi kehamilan, dan terdapat perbedaan bermakna (OD) Cullin-1 pasien preeklampsia usia kehamilan very preterm dengan usia kehamilan moderate preterm. Disimpulkan bahwa Cullin-1 terekspresi pada sinsitiotrofoblas dan sitotrofoblas dan berhubungan dengan waktu terminasi kehamilan.
<hr>
<i>ABSTRACT
Preeclampsia is a systemic syndrome that occurs in 3-5% of female pregnancies caused by disorders of migration factors and cellular factors that have an impact on the disruption of trophoblast differentiation and invasion that is important in the process of developing the placenta and maintaining pregnancy. Protein Cullin-1 is one candidate protein that plays a role in the process of maintaining pregnancy, development and trophoblast invasion in the placenta. Until now there have been no studies linking the expression of Cullin-1 in preeclamptic patients with the timing of pregnancy termination. Therefore in this study an analysis of Cullin-1 expression in preeclamptic patients and their relationship to the timing of pregnancy termination was carried out. Placental samples were taken from preeclampsia patients consisting of three gestational age groups, then immunohistochemical staining was performed to see the dynamics of expression and distribution in each age group of pregnancy and to find out their relationship with the timing of pregnancy termination. Cullin-1 was expressed in syncytiotrophoblasts and cytotrophoblasts. The lowest Cullin-1 level was obtained in the very preterm age group, and the highest was found in the moderate preterm gestational

age group. There was a significant difference between Cullin-1 optical density (OD) expression and termination time of pregnancy, and there was a significant difference (OD) in Cullin-1 preeclamptic patients with very preterm gestational age with moderate preterm gestational age. It was concluded that Cullin-1 was expressed both in syncytiotrophoblasts and cytotrophoblasts and was associated with the timing of pregnancy termination.