Introduction: Endometriosis (EDT) is a chronic inflammatory disease characterized by the presence of endometriotic tissue outside the uterine cavity. EDT can be classified into three different diseases: superficial (SPF), endometrioma (EOMA) and deep disease (DE). Immune factors evaluated in the peritoneal fluid (PF) and peripheral blood of women with EDT have shown to be altered. The immune tolerant protein HLA-G has been detected in tumors and auto-immune diseases, suggesting a possible involvement also in EDT. The aim of this study was to evaluate the soluble HLA-G (sHLA-G) levels in the blood serum and PF of women with different types and in different stages of endometriosis in comparison to women without the disease.

Patients and Methods: 123 women with endometriosis confirmed by laparoscopy and histological biopsies analysis and 69 women that underwent to laparoscopic tubal ligation (control group) had sHLA-G levels measured in serum and PF, using the ELISA technique. Results: The levels of sHLA-G (median; range U/mL) were higher in PF (27.91; 4.02 ? 254.70) than in serum (6.26; 0.0 ? 140.40) of endometriosis patients (p< 0.0001). Similar patterns were observed between PF (32.25; 3.29 ? 100.90) and serum (5.76; 0.0 ? 36.87) of controls (p< 0.0001). Considering the total number of women with EDT, the levels of sHLA-G did not statistically differ from control group, neither in serum nor in PF, even though a wider range in the endometriosis group was detected both in sera and peritoneal fluids. However, according to the stages of EDT, there were significantly higher levels of sHLA-G in serum in advanced stages (III/IV; 58.5%) compared to control group (p =0.0470). Moreover, considering the presence of different types of EDT, there were significant higher levels of sHLA-G in serum of women with both EOMA and DE (11.97; 0.0-67.66), compared to women with only DE (p= 0.0171).

Conclusions: These results showed that sHLA-G could be accumulated in the serum of women with both ovarian and deep endometriosis, especially in advanced stages of the disease.

Mots clefs : soluble HLA-G ; endometriosis

Auteurs :

Mauricio Abrao 1, Marici Rached 2, Maria Lucia Marin 3, Edmund Baracat 1, Jorge Kalil 4, Ana Claudia Carreira 5,

1. Department of Obstetrics and Gynecology, School of Medicine, University of Sao Paulo, Sao Paulo, BRAZIL
2. 1Clinical Immunology and Allergy Division, School of Medicine, University of Sao Paulo, Sao Paulo, BRAZIL
3. Histocompatibility and Cellular Immunology Laboratory, School of Medicine, University of Sao Paulo, Sao Paulo, BRAZIL
4. Institute for Investigation in Immunology, National Institute of Science and Technology, University of Sao Paulo, Sao Paulo, BRAZIL
5. University of Sao Paulo, Sao Paulo, BRAZIL

Auteurs (raw format)

Abrao Mauricio - email : maabrao@mac.com Etablissement : School of Medicine, University of Sao Paulo Service : Department of Obstetrics and Gynecology Ville : Sao Paulo Pays : BRAZIL Présentateur : Oui
Rached Marici - email : maricirached@gmail.com Etablissement : School of Medicine, University of Sao Paulo Service : 1Clinical Immunology and Allergy Division Ville : Sao Paulo Pays : BRAZIL Présentateur : Non
Marin Maria Lucia - email : malu.marin@incor.usp.br Etablissement : School of Medicine, University of Sao Paulo Service : Histocompatibility and Cellular Immunology Laboratory Ville : Sao Paulo Pays : BRAZIL Présentateur : Non
Baracat Edmund - email : secppgog@usp.br Etablissement : School of Medicine, University of Sao Paulo Service : Department of Obstetrics and Gynecology Ville : Sao Paulo Pays : BRAZIL Présentateur : Non
Kalil Jorge - email : jkalil@usp.br Etablissement : University of Sao Paulo Service : Institute for Investigation in Immunology, National Institute of Science and Technology Ville : Sao Paulo Pays : BRAZIL Présentateur : Non
Carreira Ana Claudia - email : ancoc@iq.usp.br Etablissement : University of Sao Paulo Service : Ville : Sao Paulo Pays : BRAZIL Présentateur : Non