

Cod: PO042

18F-FDG PET/CT IN FIRST DIAGNOSIS OF ENDOMETRIAL CANCER: COULD SUVMAX AND TBR, BOTH LIVER AND BLOOD-POOL, IDENTIFY PATIENTS AT HIGH RISK OF RECURRENCE?

M. Bertoli¹, F. Motta¹, D. Albano¹, A. Alkhraiheh¹, G. Bosio¹, R. Giubbini¹, F. Bertagna¹

¹*Nuclear Medicine Unit, Brescia University, Italy*

BACKGROUND-AIM

The endometrial cancer is the most common gynaecologic malignancy in the developed countries. The prognosis is usually good with an overall five years survivor rate between 80 and 90%. However in advanced and recurrent form the prognosis is poor. Identify high risk patients is critical to provide an intensive follow-up program or more aggressive clinical approach.

The aim of this study was to verify if SUVmax or TBR, both to liver and blood-pool, had any prognostic value in predicting recurrence in patients with first finding of endometrial cancer studied with FDG-PET/CT.

METHODS

We retrospectively evaluated 41 PET/CT scans, between 01/01/2006 and 31/12/2009, in patients with first diagnosis of endometrial cancer. Only 19 patients underwent further investigations. All the patients were in IIIA stage or higher. We calculated SUVmax of the primary lesion, SUV max of the liver and SUV max of blood pool in the aortic arch, for every patient. We compared the semi quantitative values in patients with a recurrence (7 patients) and in the patients with-out clinical, serological an instrumental recurrence at five years (12 patients). Mean SUV max, TBR liver and TBR blood pool values for patients with a recurrence were 17.9, 5.82 and 7.53 respectively. Mean SUV max, TBR liver and TBR blood pool values for patients without a recurrence were 16.96, 2.35 and 7.40 respectively.

RESULTS

We didn't find any statistically significant difference between patients with a recurrence and in patients without any sings of recurrence regarding SUVmax values and TBR, both liver and blood pool, values ($p>0,005$).

CONCLUSION

Our data suggest that SUVmax and TBR, both liver and blood pool, don't have any prognostic value in predicting recurrence in first diagnosis of endometrial cancer. Although the patients in our study were at high risk and advanced stage, further investigation including low risk and early stage patients could be useful.