

Peritoneal Super Scan on ¹⁸F - FDG PET-CT in a Patient of Burkitt's Lymphoma

Abstract

Peritoneal lymphomatosis is seen less frequently, but when seen, it is mostly associated with aggressive variants of malignancies. FDG uptake has been reported in peritoneal lymphomatosis both in DLBCL and Burkitt's lymphoma. We report a case of Burkitt's lymphoma with involvement of entire peritoneum, which looks like a "peritoneal super scan" on FDG PET-CT.

Key words: Burkitt's lymphoma, FDG PET-CT, peritoneal lymphomatosis, peritoneal super scan, super scan

A 24-year-old male presented to the Medicine Outpatient Department (OPD) with a chief complaint of progressive abdominal distention since last 2 months. It was associated with dull dragging pain and loss of appetite. With this clinical history, he underwent ultrasonography (USG) of the abdomen as initial evaluation which showed diffuse small bowel wall thickening. A further evaluation with CECT revealed irregular thickening of the peritoneum and omentum. Biopsy from the thickened omentum confirmed the diagnosis of Burkitt's lymphoma. He was then subjected to FDG PET-CT for staging. PET-CT images revealed intense FDG uptake in the entire peritoneum on the maximum intensity projection (MIP) as well as on coronal and sagittal images, with suppressed uptake of

the rest of the body including brain and kidneys [Figure 1A-Figure 1B]. Fused (PET-CT) images revealed thickening of almost entire peritoneum, omentum, and mesentery with increased FDG uptake [Figure 2A-Figure 2D] along with multiple FDG avid marrow lesions involving skull, right humerus, left scapula, multiple bilateral ribs, dorso-lumbar vertebrae [Figure 2E, Figure 2F], sacrum, left acetabulum, and bilateral femoral shaft.

Peritoneum is often involved in many malignant conditions.^[1,2] Lymphomatous involvements of peritoneum are seen less frequently; however, most of them are aggressive variants.^[1-3] FDG uptake has been reported in peritoneal lymphomatosis both in DLBCL and

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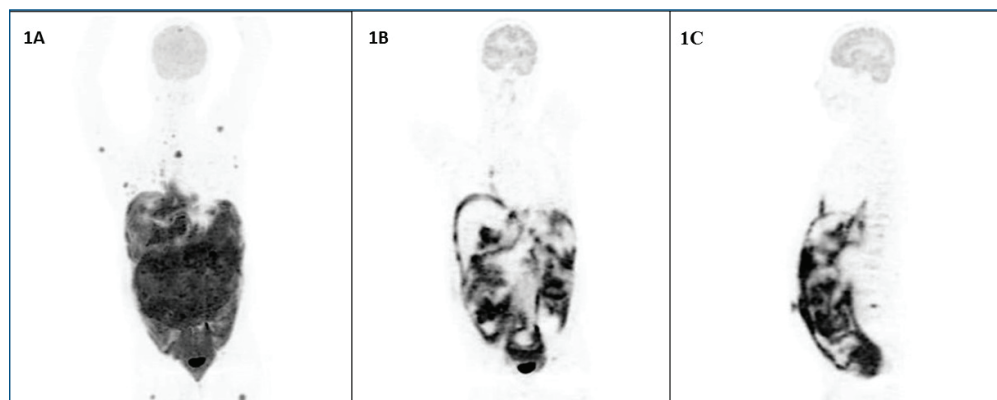


Figure 1: Intense FDG uptake seen in the entire peritoneum on the maximum intensity projection (MIP) as well as on coronal and sagittal images, with suppressed FDG uptake in the rest of the body including brain and kidneys [Figure 1a-Figure 1c], respectively)

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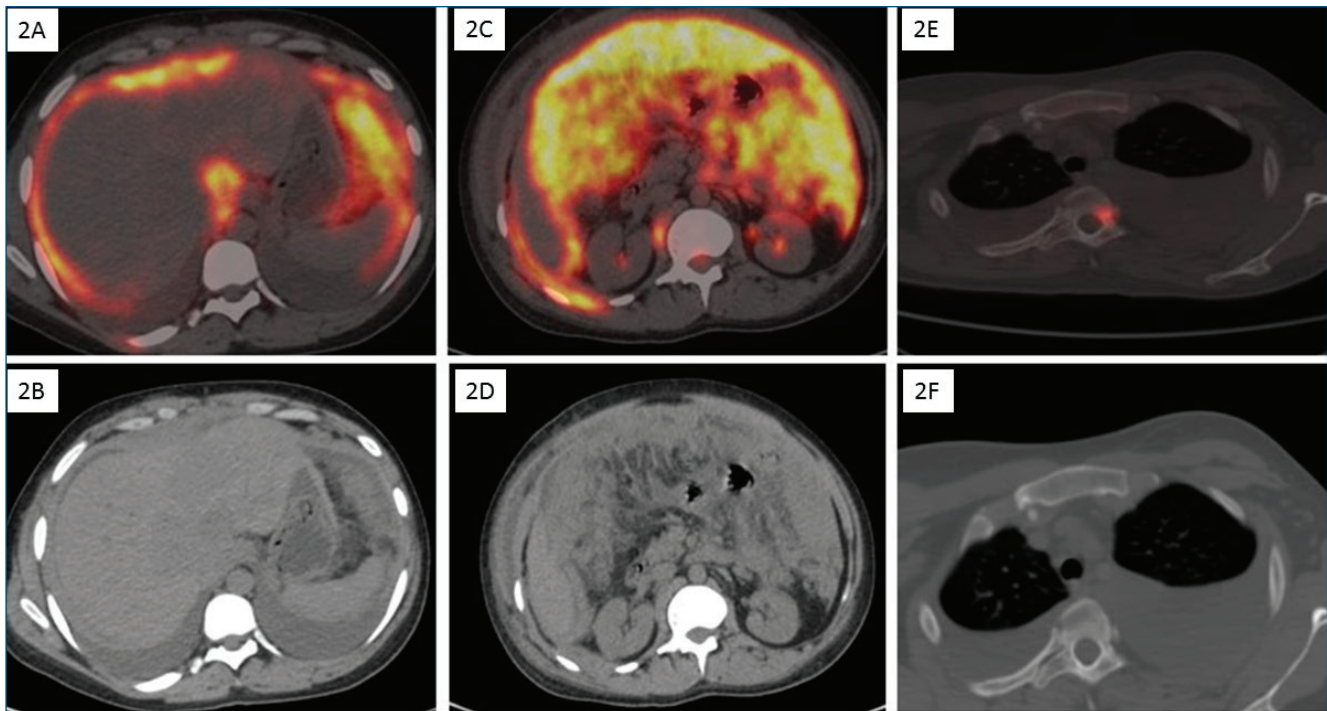


Figure 2: Fused (PET-CT) images reveal thickening of almost entire peritoneum, omentum, and mesentery with increased FDG uptake [Figure 2a-Figure 2d] along with multiple FDG avid marrow lesions involving skull, right humerus, left scapula, multiple bilateral ribs, dorso-lumbar vertebrae [Figure 2e, Figure 2f], sacrum, left acetabulum, and bilateral femoral shaft

Burkitt's lymphoma.^[4-6] Our case illustrates intense FDG uptake involving the entire peritoneum with suppressed FDG activity of the rest of the body including brain and kidneys, giving it an appearance of "super scan." Skeletal and hepatic super scans have already been mentioned in the literature in lympho-reticular malignancies.^[7-9] To our knowledge, such "peritoneal super scan" has not been reported till date.

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Conflicts of interest

There are no conflicts of interest

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