An Evaluation of Preoperative Neoadjuvant Therapy by PET for Musculoskeletal Tumors

Hideo Shiraishi, Tamotsu Toba, Jun Nishida and Tadashi Shimamura

Dept. of Orthopedic Surgery, Iwate Medical University 19-1 Uchimaru, Morioka, 020-8505, Iwate, JAPAN

Abstract

In this study,we evaluated usefulness of PET for musculoskeletal tumors. We applied 7cases whom came our hospital during April,1999 to March,2003,4 cases of osteosarcoma and 3 cases of Ewing's sarcoma. We performed MRI, CT imaging and PET. PET was reported by many authors that was supported diagnosis of tumor malignancies and tumor proliferation. In our cases, showed total necrosis or partial respose by neoadjuvant therapy of the tumors, MRI imaging were similar to PET imaging. But it was so difficult for evaluating such cases. PET imaging showed like NC or PD cases suggesting good responder or non-responder.

PET imaging was so useful technique as a tumor proliferation and a tumor malignancy. In the future, PET imaging give many imformations about evaluation of proliferations and malignancies of the tumors, so easily. And I hope PET showed tumor proliferation standard index recently.