

Extraosseous accumulation of ^{99m}Tc phosphonate complexes in primary brain tumor evaluated with SPECT

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Although extraosseous accumulations of ^{99m}Tc phosphate complexes are phenomena which can often be seen, no case showing extraosseous accumulation to brain tumor on SPECT has been reported. We report here two cases of primary brain tumor showing extraosseous accumulation of ^{99m}Tc phosphate in bone SPECT. ^{201}Tl SPECT also showed increased ^{201}Tl uptake by the tumor. Comparing bone SPECT with ^{201}Tl SPECT, the regions of abnormality of both SPECTs were very similar in the case of glioblastoma, but in the case of malignant lymphoma the region showing intense uptake of ^{99m}Tc -MDP was smaller than that on ^{201}Tl SPECT. It was revealed that bone SPECT is more useful in the assessment of extraosseous accumulation to a primary brain tumor than conventional bone scintigraphy.

Key words: extraosseous accumulation, bone SPECT, primary brain tumor