

## Glioblastomas extension on DTI: prospective and comparative study versus metastases and healthy subjects

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### Rationale

Occult tumor cell invasion along white matter fibers is inapparent in conventional MRI. We aimed to precise glioblastomas extension on Diffusion Tensor Imaging (DTI) through a prospective and comparative study.

### Patients, material and methods

Glioblastomas (n=15), metastases (n=9) and healthy controls (n=15) were included. DTI parameters were analyzed, particularly in the normal appearing white matter (NAWM) beyond peritumoral area.

### Results

Specific DTI abnormalities were found in glioblastomas such as hyperanisotropia and morphological modifications in the NAWM.

**Keywords:** Glioblastoma, MRI mapping, Metastasis behavior, DTI