

Young patient with progressive low-grade glioma

Clinical challenges in neuro-oncology

Patient cases (Tumour board)

Friday, 18 December 2015 - 14:30-16:00

Danny TM Chan

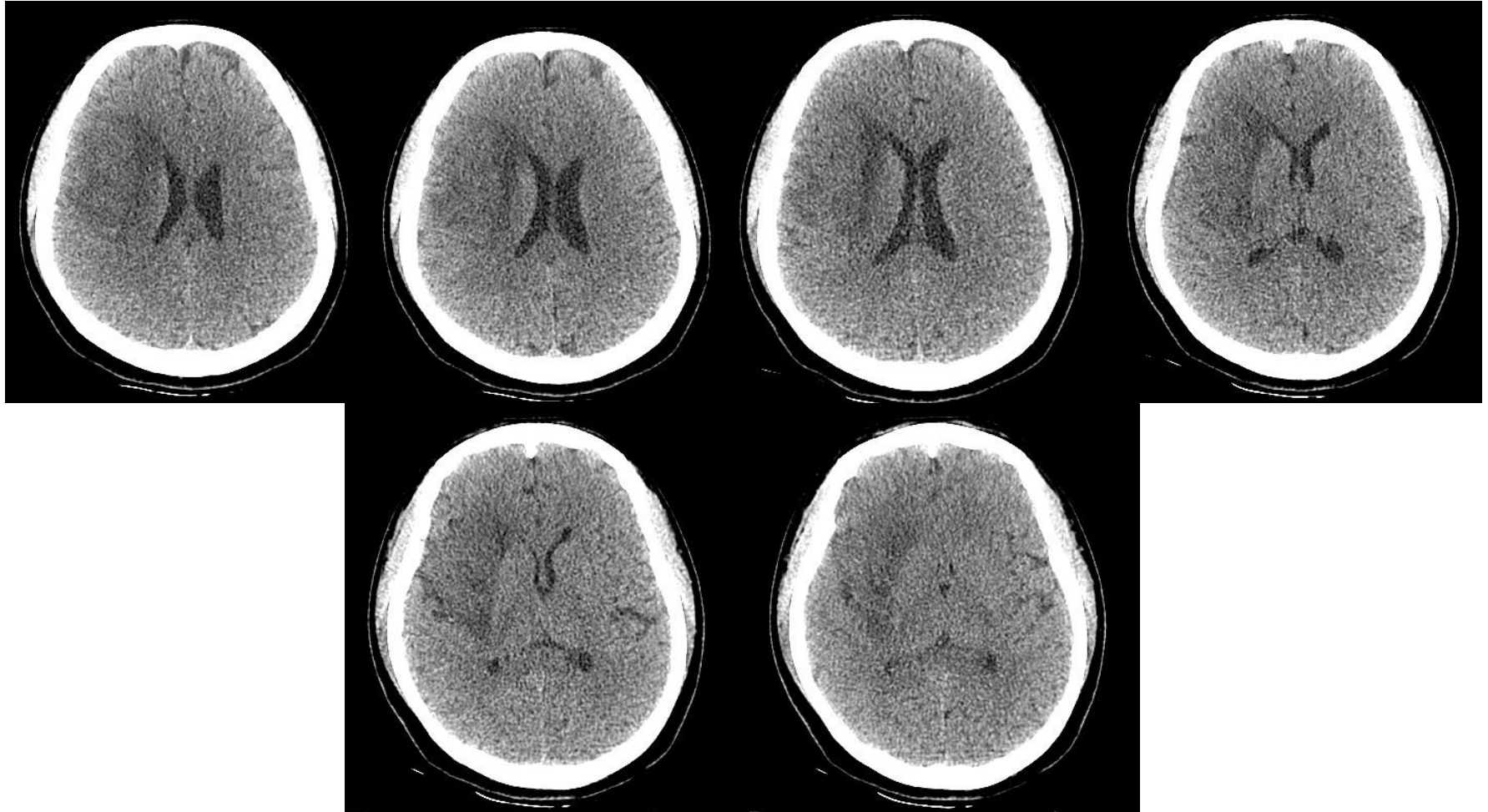
CUHK Otto Wong Brain Tumour Centre

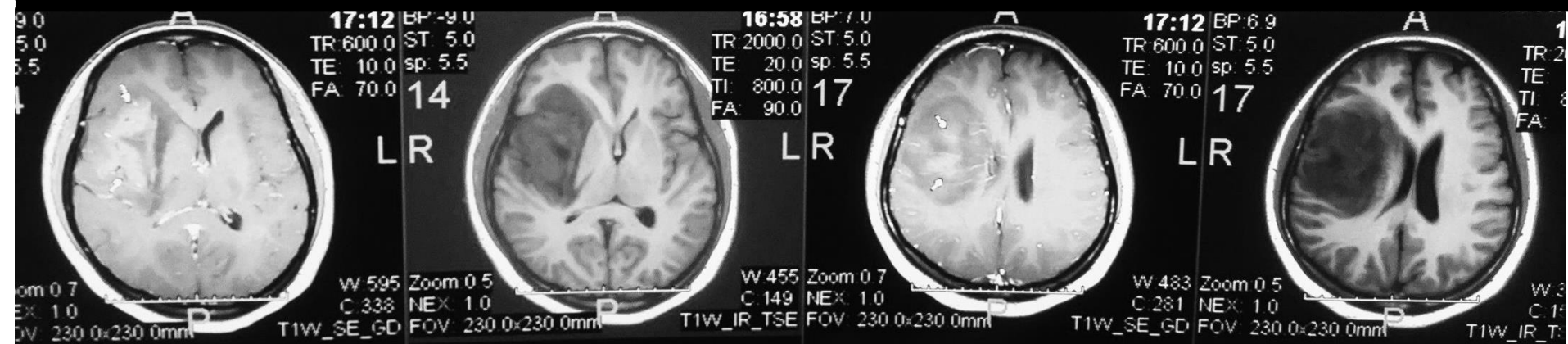
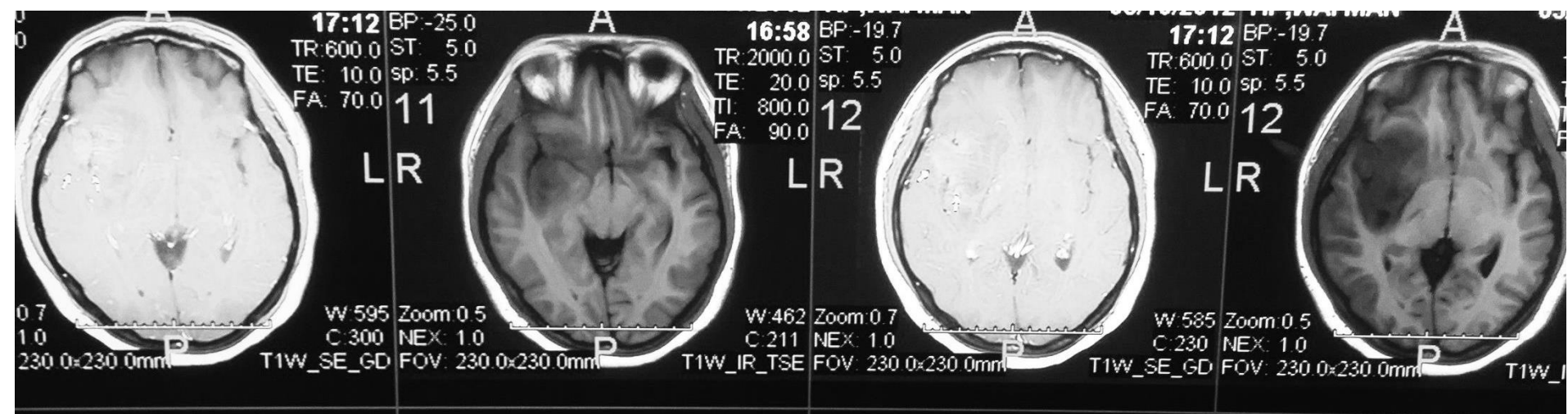
The Chinese University of Hong Kong

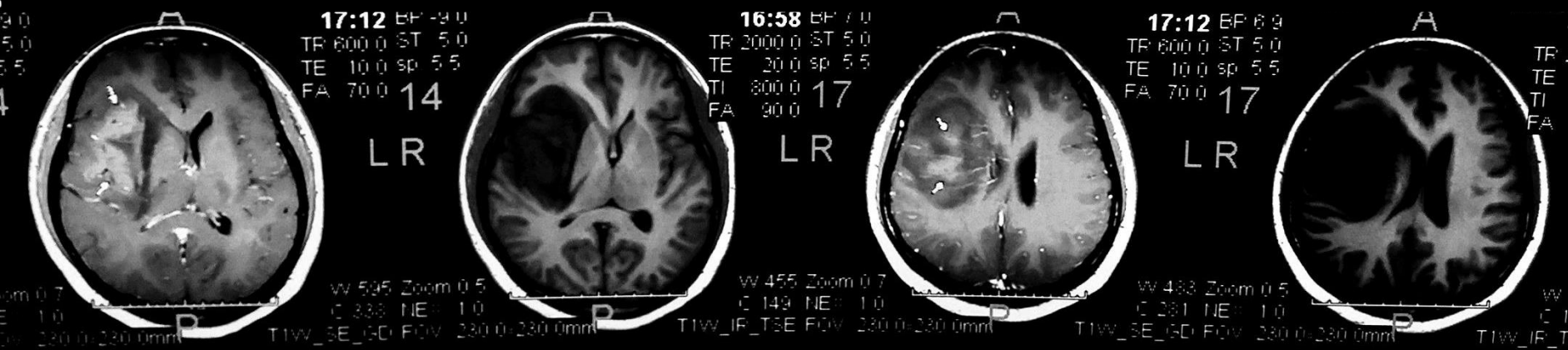
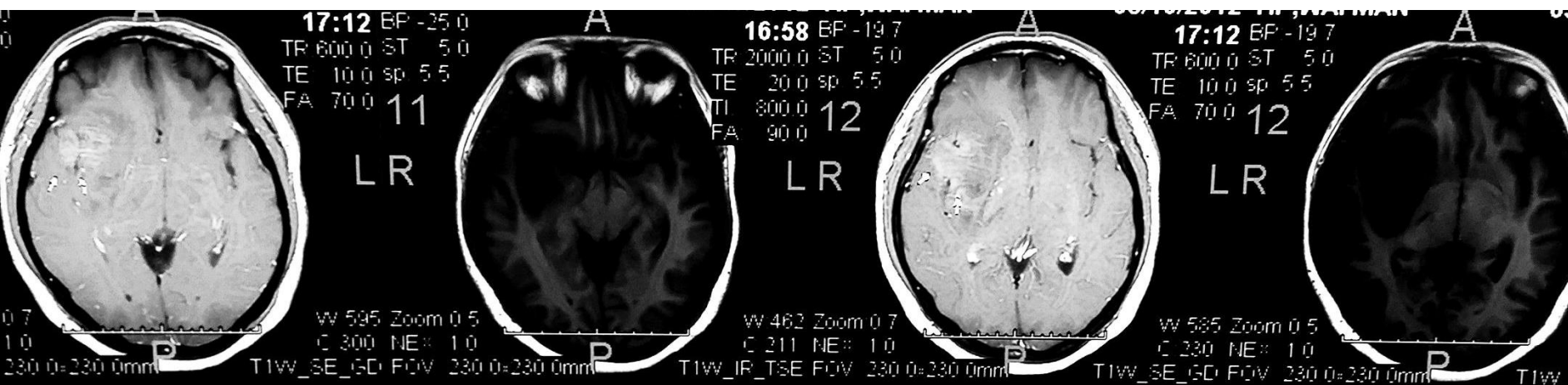
Disclosure

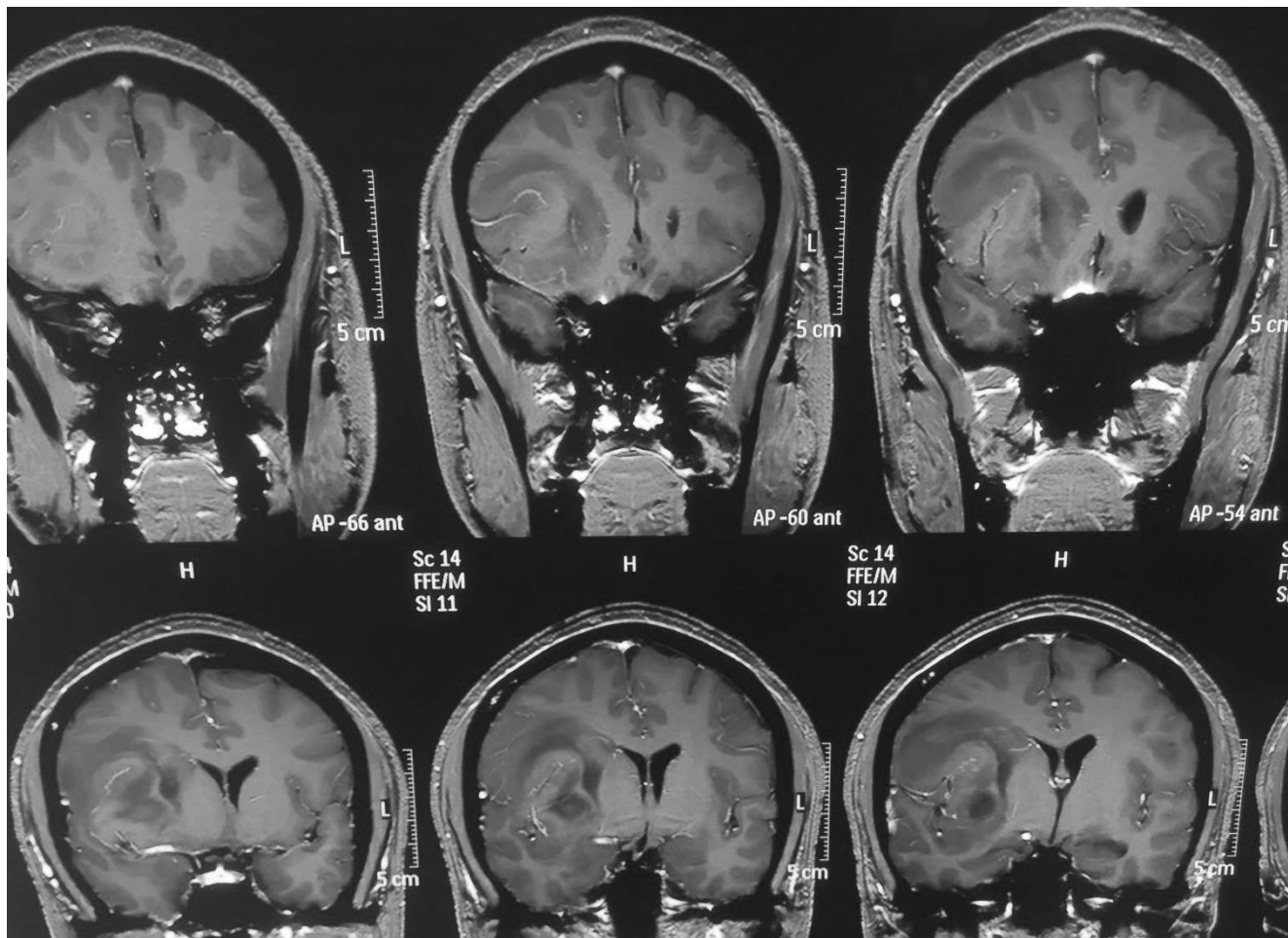
- Nil

F/35 Seizure

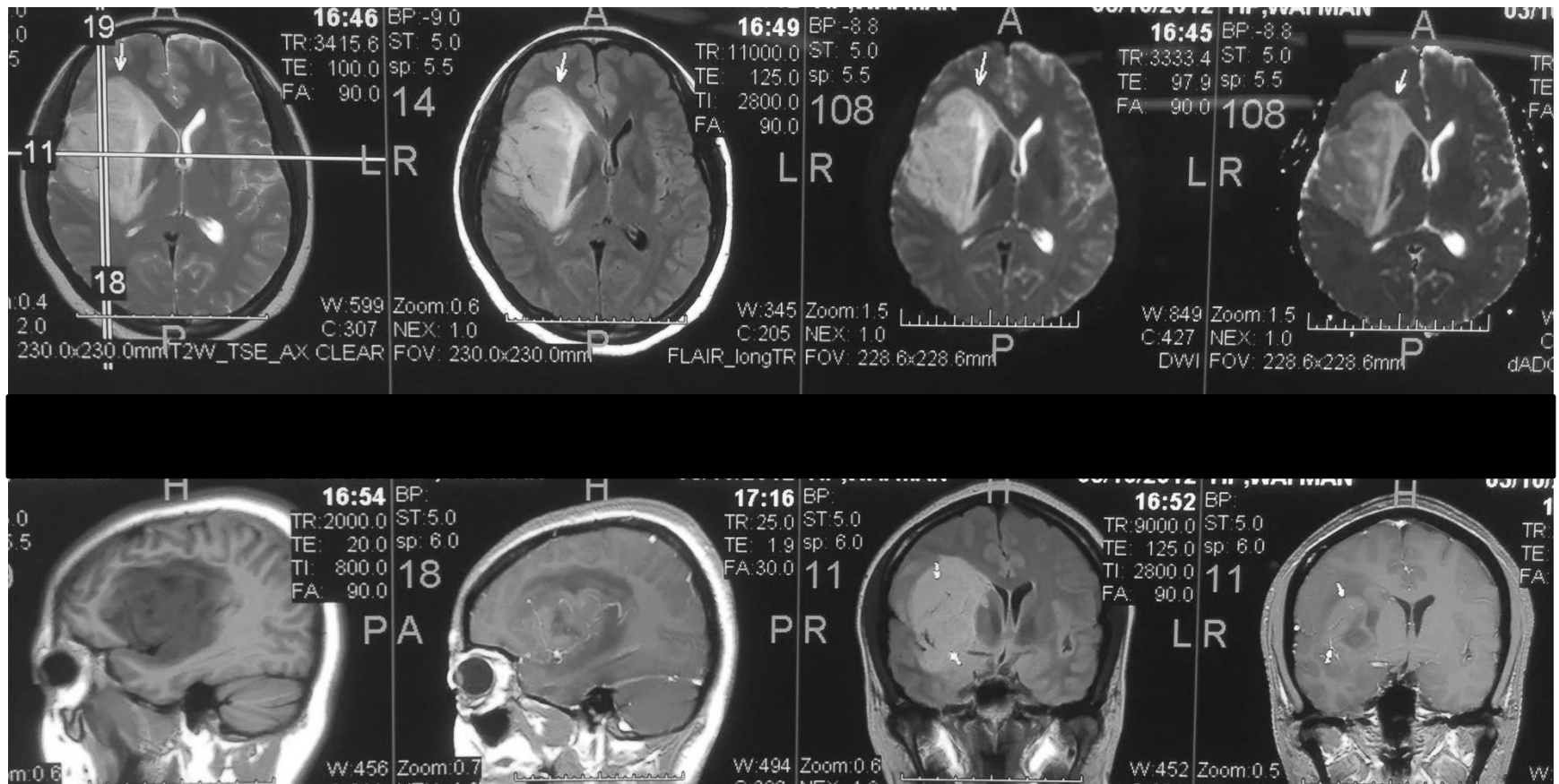




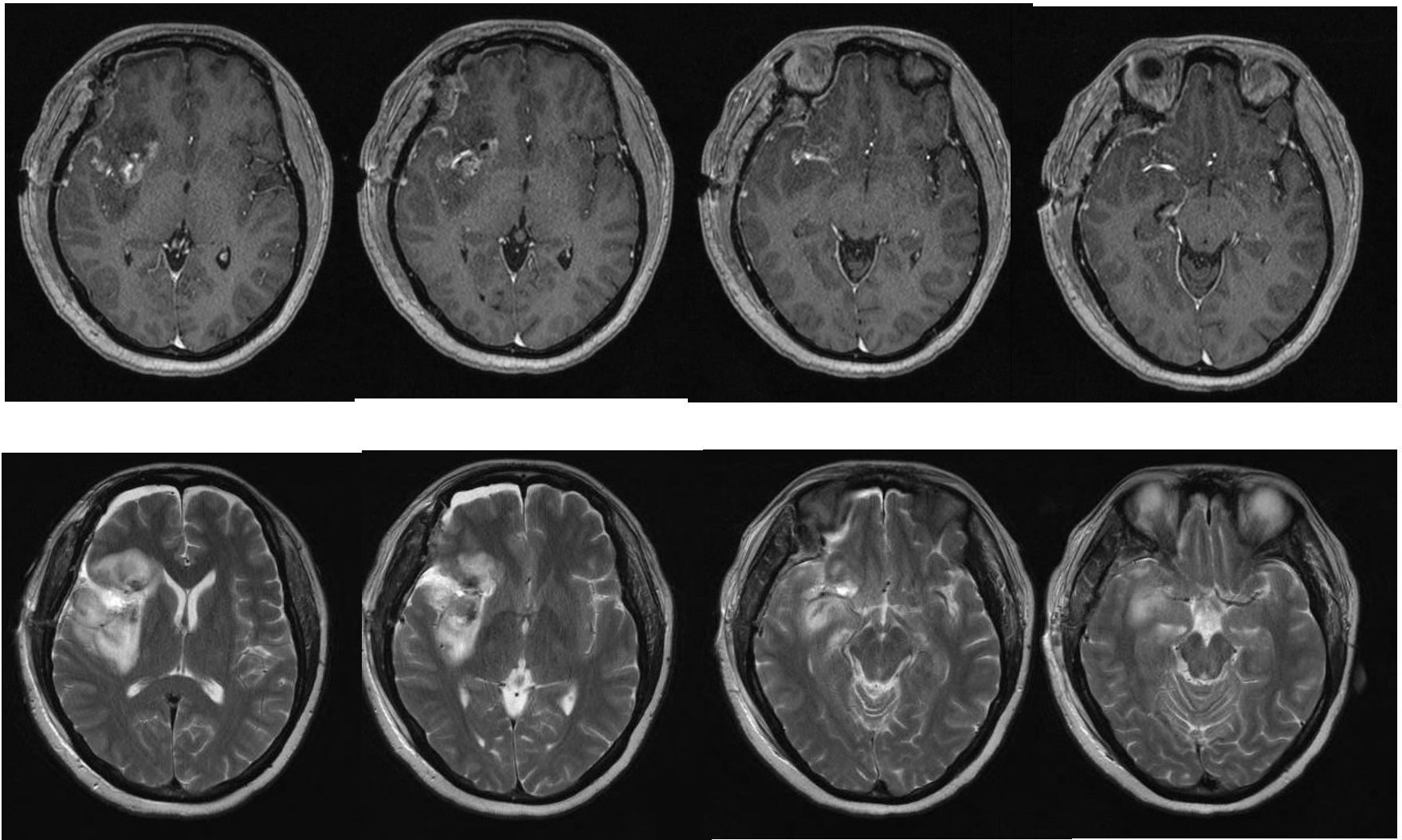




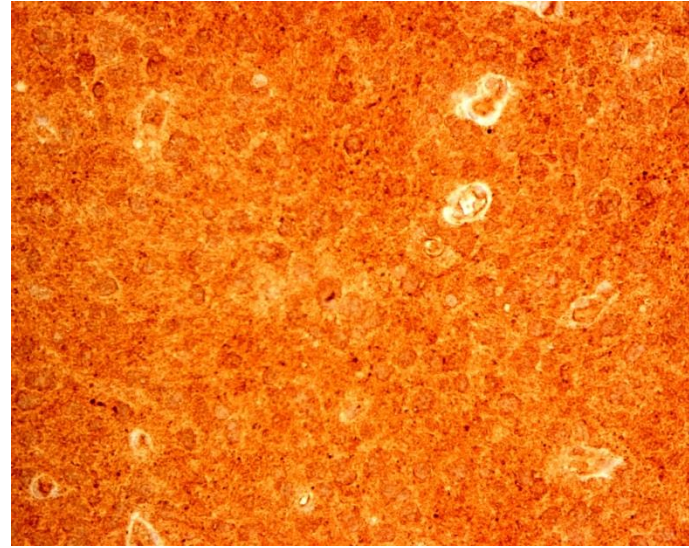
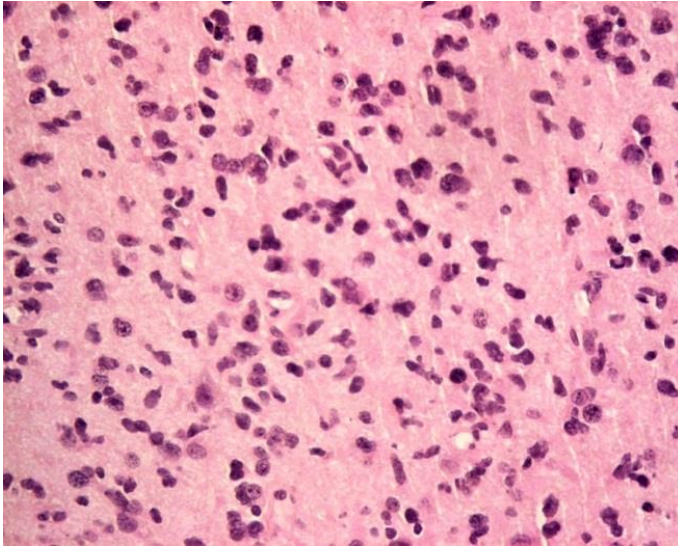
How to treat?



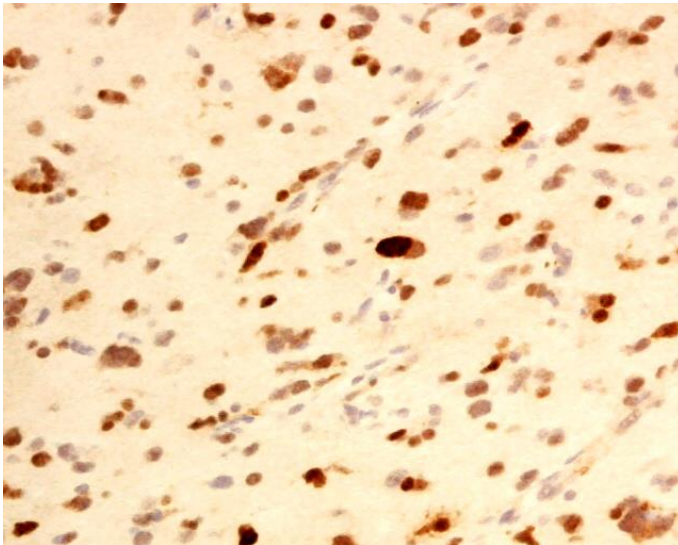
Day 1 MRI



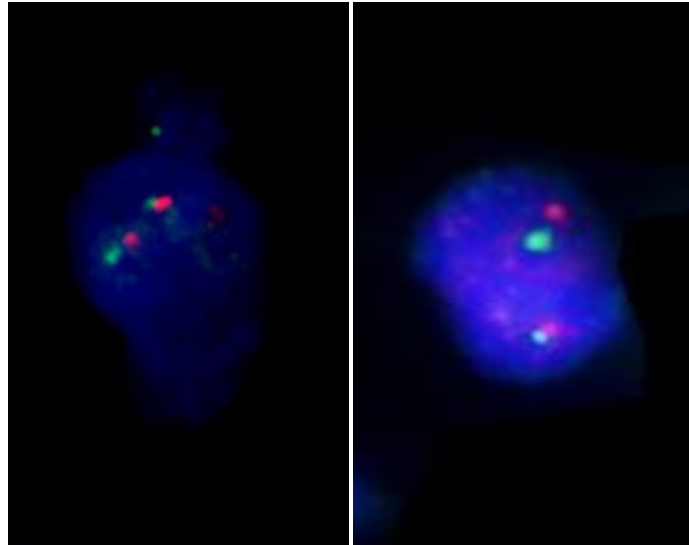
Oligoastrocytoma (Grade II)



IDH1-R132H: positive



p53: positive



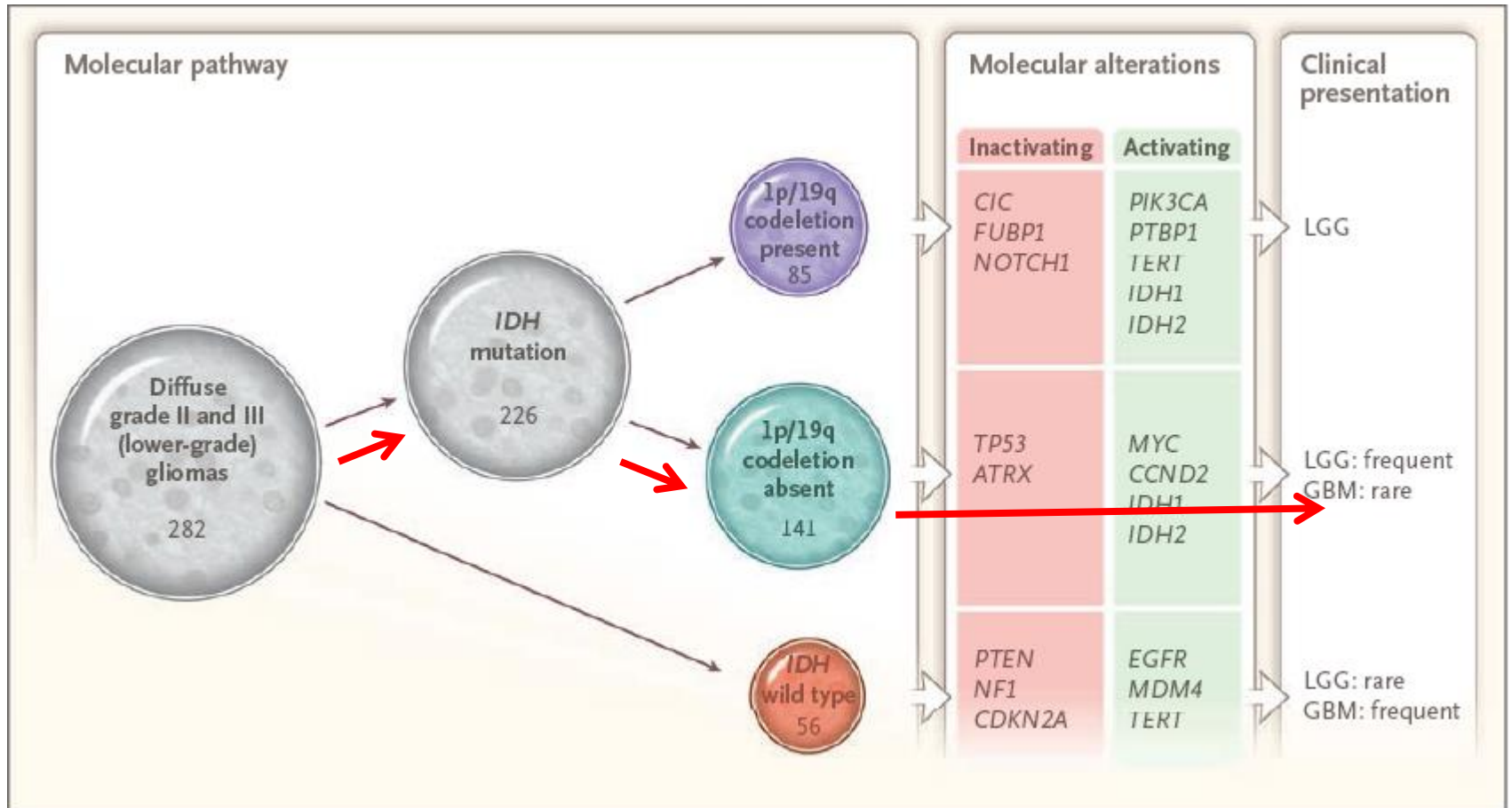
1p/19q: non-codeleted

Oligoastrocytoma (Grade II)

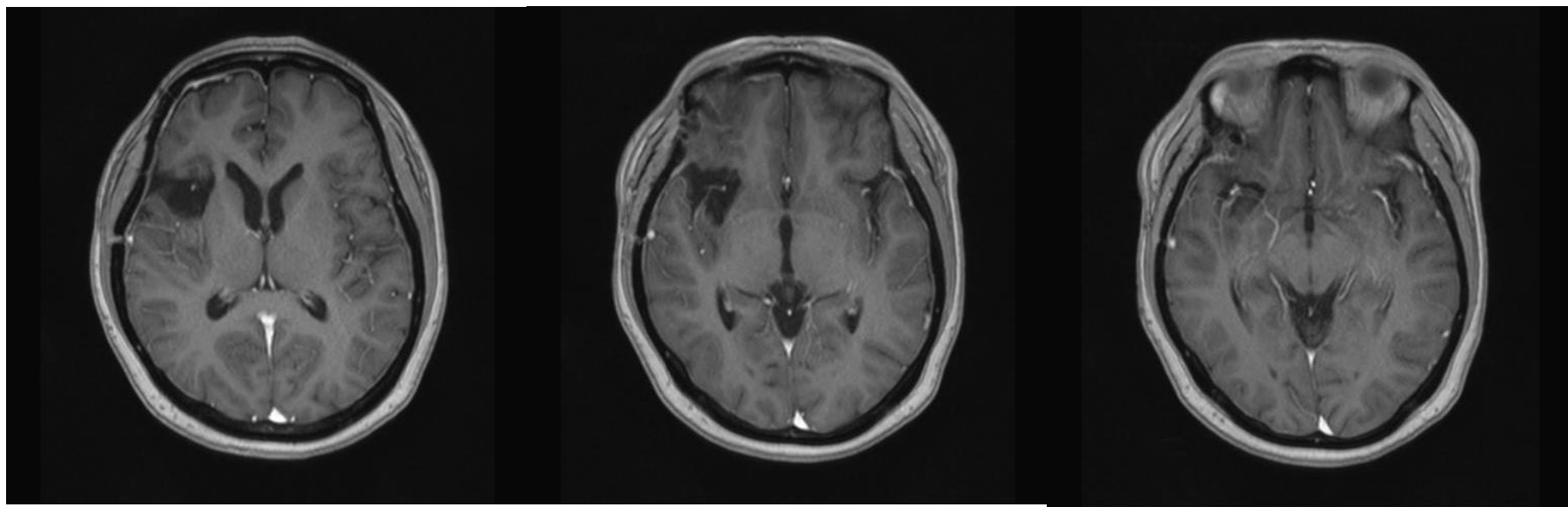
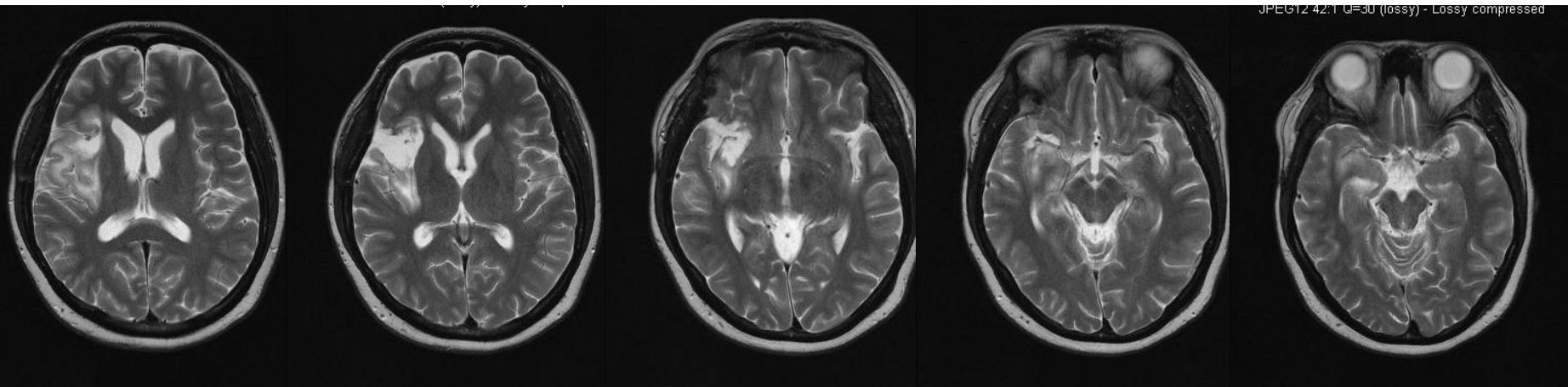
- IDH-1 mutated
 - 1p19q non-deleted
 - p53+
 - EGFR –
-
- What will you do?

Comprehensive, Integrative Genomic Analysis of Diffuse Lower-Grade Gliomas

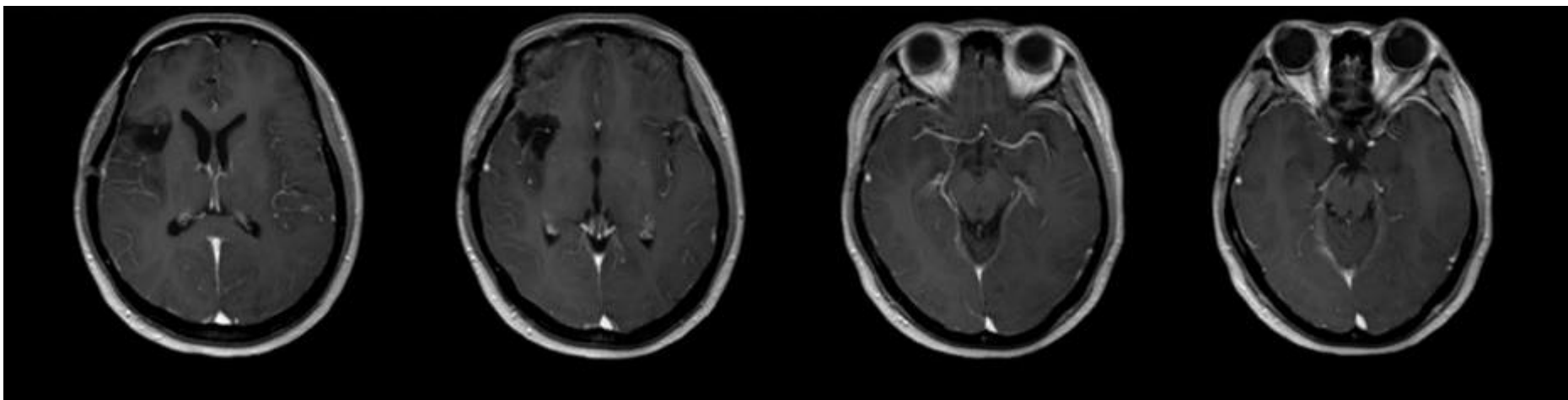
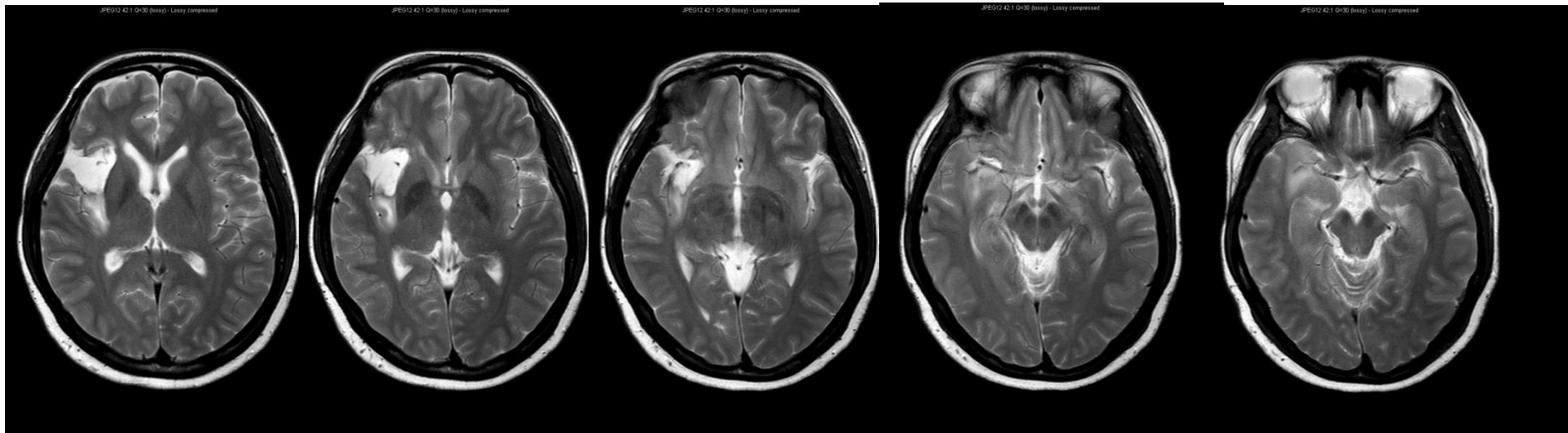
The Cancer Genome Atlas Research Network*



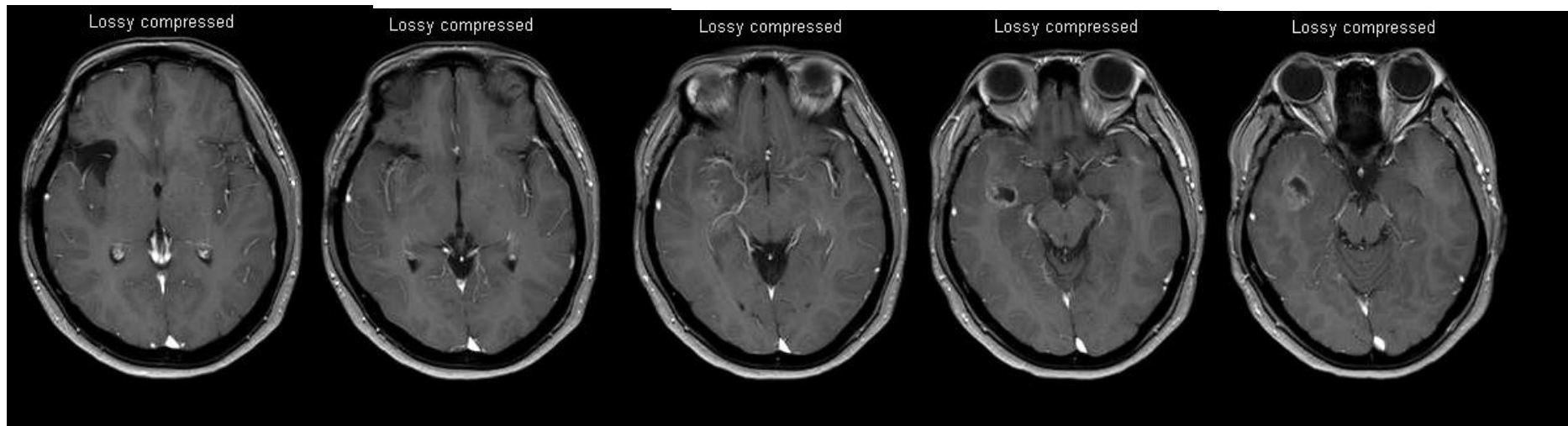
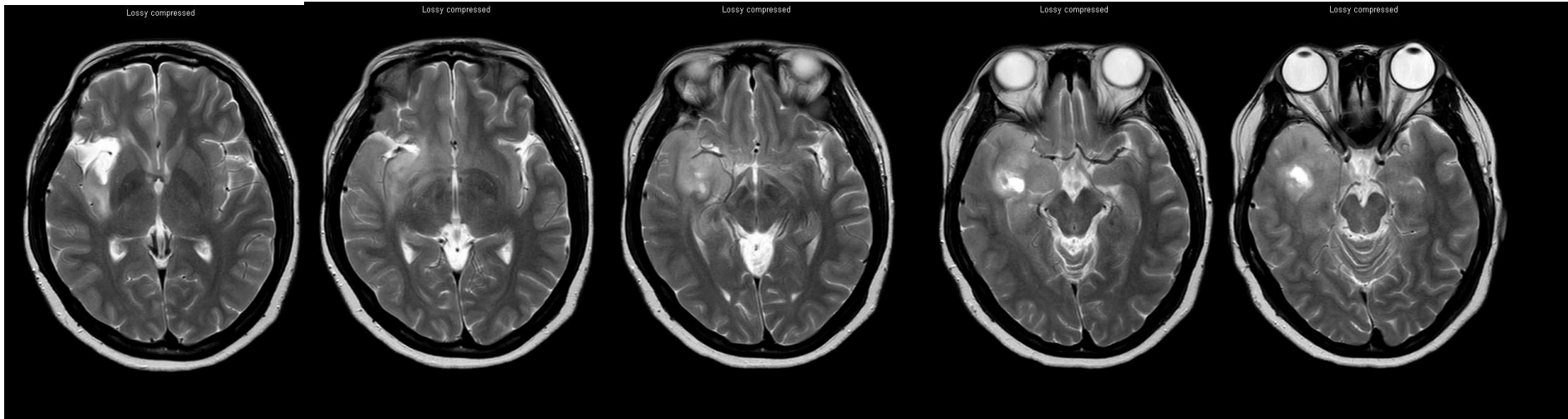
1 year post-Surgery + Radiation



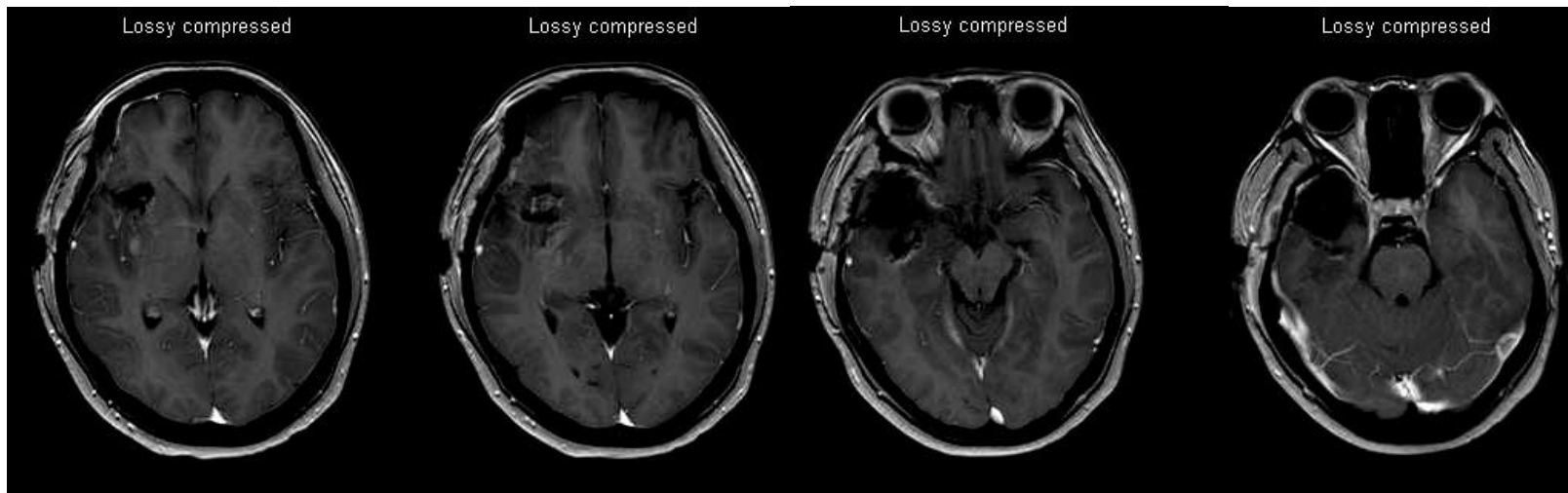
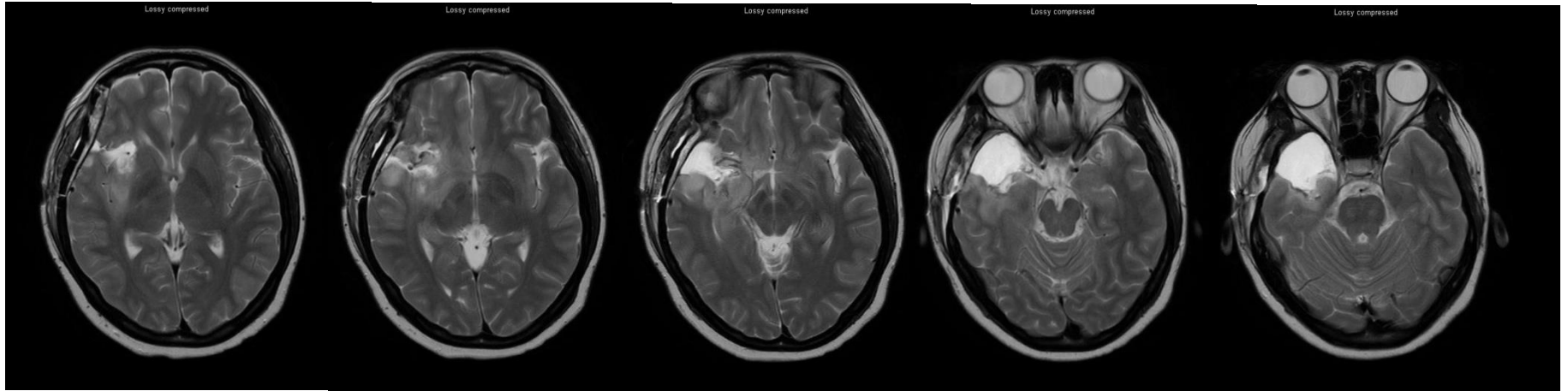
2nd year



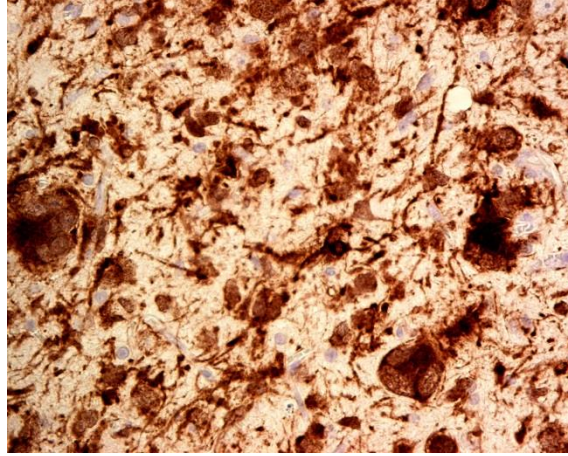
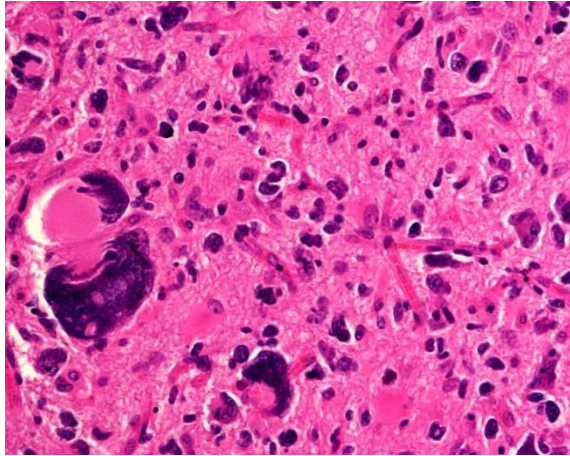
3rd year



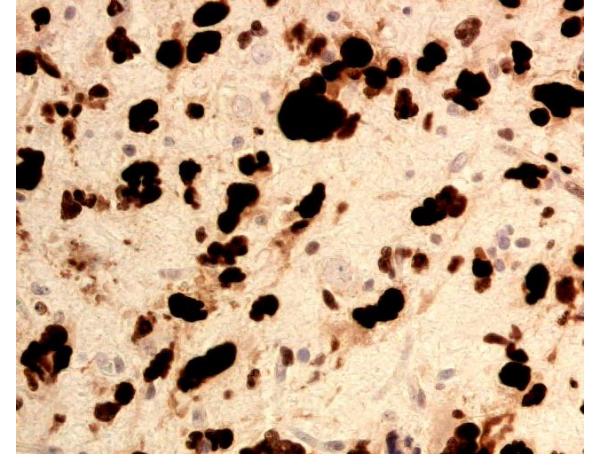
Post-Op



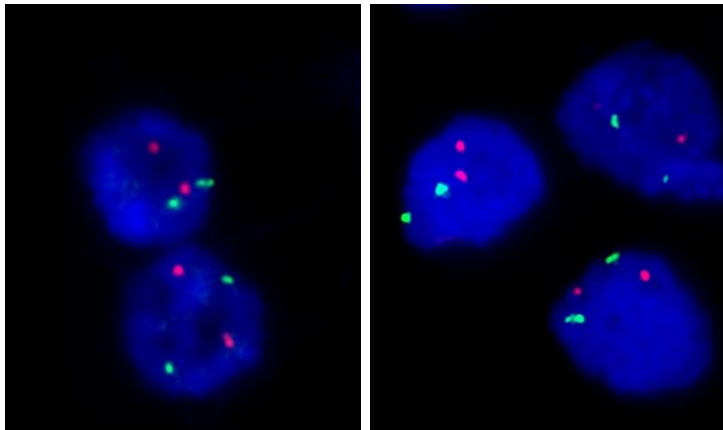
Secondary GBM



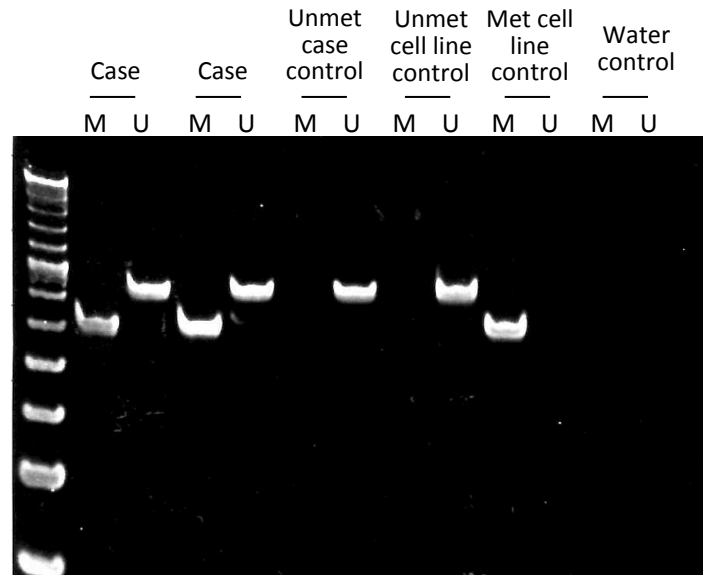
IDH1-R132H: positive



p53: positive



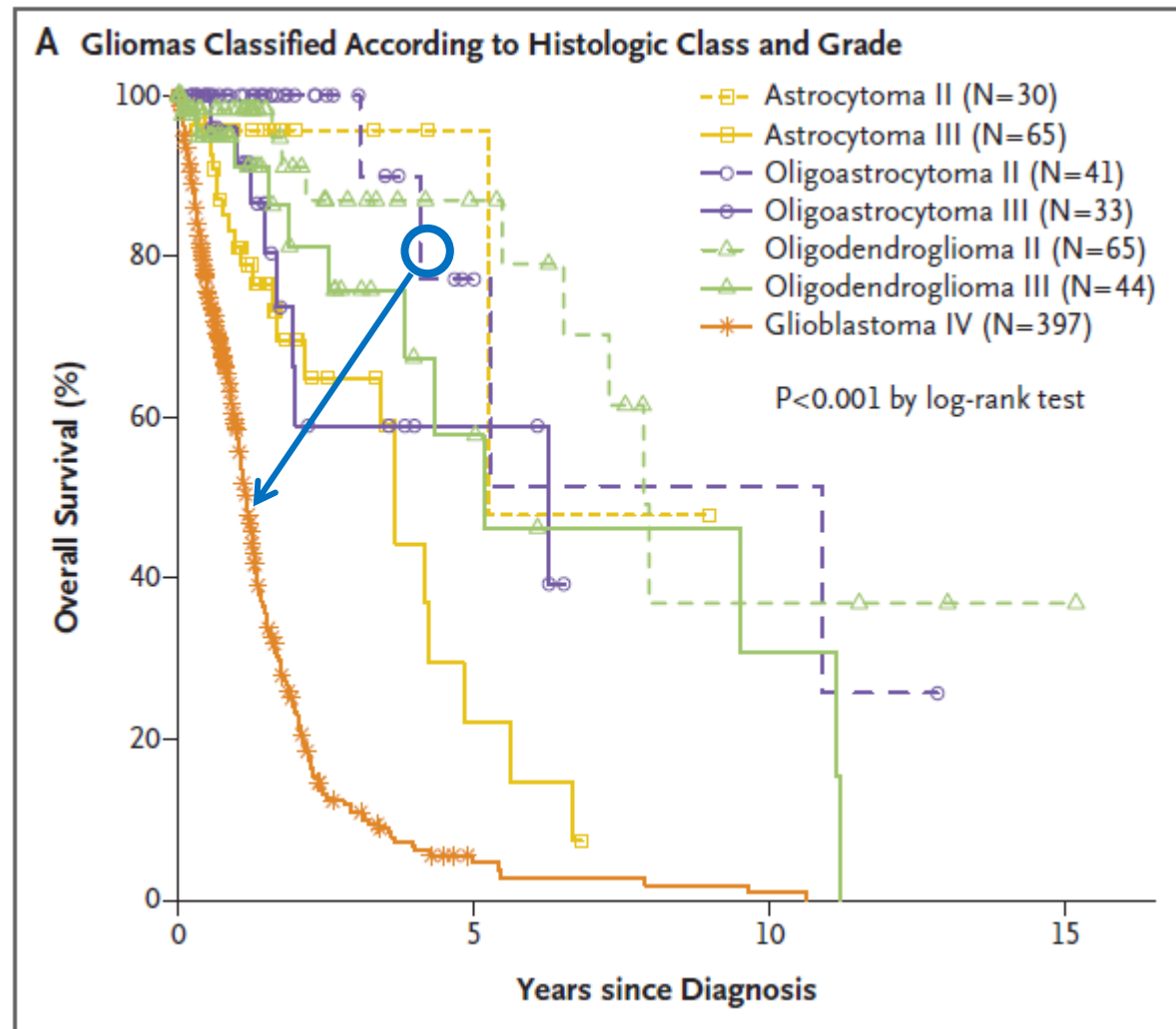
1p/19q: non-codeleted



MGMT: Methylated

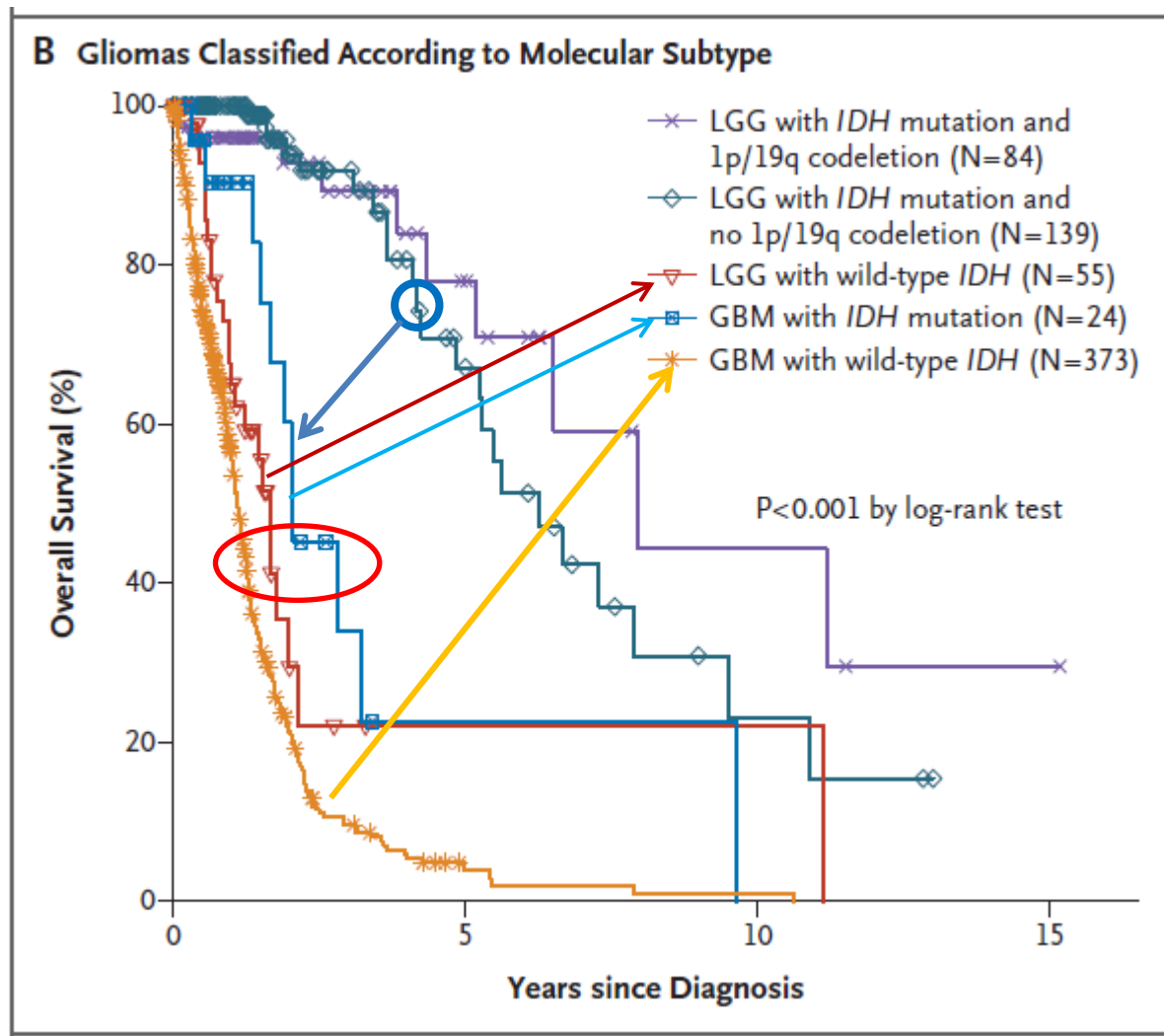
Comprehensive, Integrative Genomic Analysis of Diffuse Lower-Grade Gliomas

The Cancer Genome Atlas Research Network*



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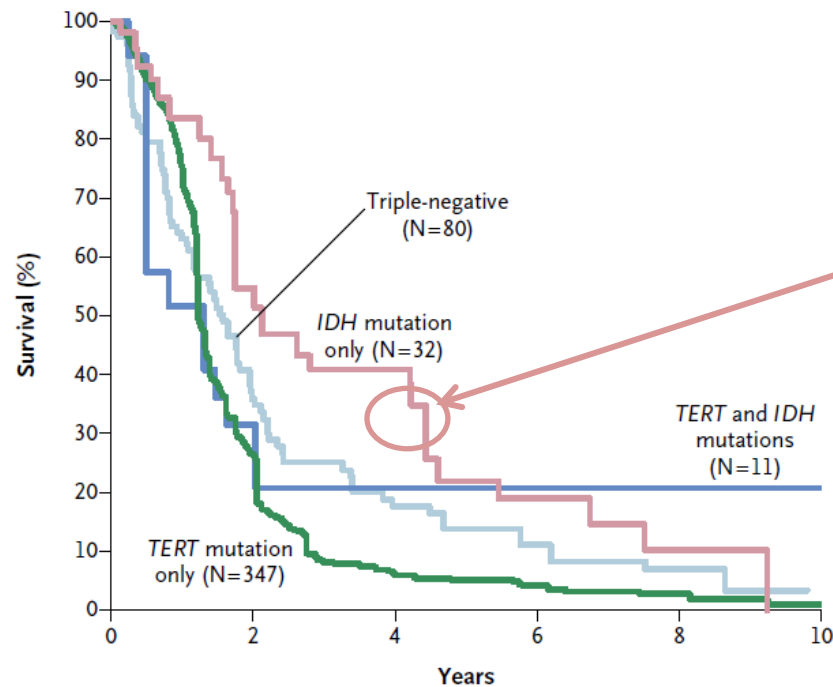
ORIGINAL ARTICLE

Glioma Groups Based on 1p/19q, IDH, and TERT Promoter Mutations in Tumors

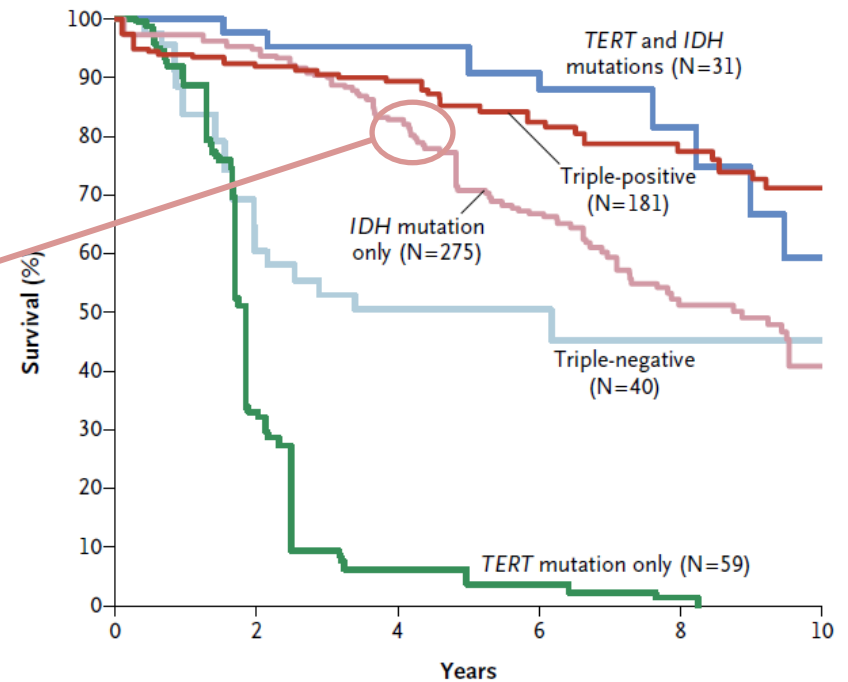
IV

II / III

B Grade IV



A Grades II and III



Summary

- Molecular classification of low grade glioma is up-coming
- Improvement in diagnostic accuracy and prognostication
- Implications in future therapeutic trials