0.46- 0.79, P=0.005) and low (HR 0.67, 95% CI 0.50-0.89, P<0.001) methylation groups had better survival compared to unmethylated group. There was no evidence for interaction between MGMT methylation and completed temozolomide regimen (interaction term for low methylation P=0.097; high methylation P=0.071). This suggests no strong effect of MGMT status on survival in patients completing temozolomide regimen. In patients not completing the temozolomide regimen, higher MGMT methylation predicted better survival (interaction terms P<0.001). CON-CLUSION: Quantitative MGMT methylation may provide additional prognostic value. This is important when assessing clinical and research therapies.

## MANAGEMENT OF LOW-GRADE GLIOMAS - EXTENT OF RESECTION MATTERS BUT NOT ALL TUMOURS ARE AMENABLE TO SURGERY

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AIMS: To present and review our experience in the management of low-grade gliomas. METHOD: Retrospective case note review of all patients with WHO grade 2 glioma from 2011 to 2018 (based on WHO criteria at time of diagnosis). Data collected on demographics, presentation, location, initial management, histology, treatment, progression free (PFS) and overall survival (OS). RESULTS: 130 eligible patients. Median follow 4.6 years (up to 10.5). Median age 40 years (range: 18-83). There were 70 (53.8%) astrocytomas, 44 (33.8%) oligodenrogliomas, 16 (12.3%) oligoastrocytomas. 66%(n=86) presented with seizures, 10.7%(n=14) with sensory symptoms, 8.5%(n=11) with speech disturbance, 5.3%(n=4) with motor symptoms and 12.3%(n=16) were identified incidentally. 50.1%(n=65) were frontal, 27.7%(n=36) temporal and 9.2%(n=12) parietal. 1st line treatment was resection in 70.7%(n=92), biopsy in 23.8%(n=31) and observation in 4.6%(n=6). 15.4%(n=20) received adjuvant radiotherapy alone and 6.1%(n=8) received adjuvant radiotherapy followed by chemotherapy . At first recurrence, 31.6%(n=12) received further surgery and 95%(n=38) received radiotherapy and/or chemotherapy . Median PFS from 1st line treatment 66, 44 and 33 months for gross total resection (GRT), subtotal resection (STR), and biopsy respectively. Overall survival was 95.1%, 79.3% and 69.% for GTR, STR and biopsy respectively. CONCLUSION: Management of low-grade gliomas remains challenging. Extent of resection impacts prognosis but not all patients have gliomas amenable to surgery. The effects of chemoradiotherapy will be presented in future meetings as this is an ongoing project.

## SURVIVAL AND PROGNOSTIC FACTORS IN MELANOMA BRAIN METASTASIS (MBM) TREATED WITH STEREOTACTIC RADIOSURGERY (SRS)

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AIMS: Brain metastasis is a frequent complication in melanoma, ultimately affecting 40-60% of patients with metastatic disease1. In the era of immune checkpoint and small molecule inhibitor therapy, there is a need to identify patient, tumour and treatment characteristics which may predict an improved prognosis in patients receiving stereotactic radiosurgery (SRS) for melanoma brain metastases (MBM). METHOD: Retrospective casenote review was carried out for all patients receiving SRS, including gammaknife and cyberknife, for MBM between 2014 - 2020 at Barts Cancer Centre. Overall survival (OS) was calculated using the Kaplan-Meier method. Differences between groups were assessed using the Log-rank (Mantel-Cox) test. RESULTS: 93 patients were treated with SRS for MBM, with a median of 15 patients treated per year. The median age at treatment decision was 60 years (range 26 - 90): 59% were male; 41% female. Median number of lesions treated was 2 (range 1 - 15). Survival data was available for 74 patients: median overall survival for all patients was 9.5 months, with no significant survival difference by gender nor treatment year (pre-2017 vs. post-2017). However, treatment of 1-2 brain lesions carried a better prognosis compared to 3 or more lesions (median 12.2 vs. 5.7 months, p = 0.0292). CONCLUSION: Initial analysis reveals an improved overall survival when fewer MBM are present. Further analyses will examine the impact of the following factors on patient survival: status of extracranial metastases, symptomatic vs. asymptomatic brain metastasis, intratumoral haemorrhage, systemic therapy pre- and post-SRS, and corticosteroid use during and after SRS.

# EXPLORING THE ROLE OF SPECIALIST PHYSIOTHERAPY IN AWAKE CRANIOTOMY SURGERY FOR THE NEURO-ONCOLOGY PATIENT

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AIMS: To describe the methods used to assess and monitor motor function during awake craniotomy surgery for tumour resection. METHOD: A service review was carried out over 10 months. Patients with highly motor eloquent lesions - invasion of primary motor cortex or fronto-parietal connections involved in motor cognition - were included. Clinical notes were reviewed and summarised using descriptive analysis. Dexterity and grip strength were measured using 9-hole peg test and handheld dynameter pre/ intra and post-operatively. Patient occupation/interests were reported to guide bespoke assessments to trial intra-operatively. RESULTS: From April 2021 to January 2022, 13 patients (mean age 39.7 years, 4 female:10 male, 9 low grade:5 high grade gliomas) were included. Mean score 9-hole peg test 22.2sec pre-operatively, 30.6sec post-operatively; handheld dynameter 26.7kg pre-operatively, 18.4kg post-operatively. At discharge 5 of 7 impaired patients demonstrated motor improvement. For motor coordination, motor tasks used frequently included repetitive finger tapping, open/closed hand. Bespoke tasks included texting/writing, playing instruments, and computer games. Movement was closely monitored and verbal feedback given to the neurosurgeons throughout. With video analysis movement comparisons were made. CONCLUSION: The role of physiotherapy in awake surgery is evolving to provide movement analysis for complex motor tasks such as upper limb sequencing and dexterity. A combination of standard and bespoke assessments have been trialled and their feasibility within surgery tested. A post-operative deterioration of motor function (power and cognition) is expected after surgery for highly eloquent motor gliomas. However, intraoperative motor assessment for motor cognition allows function preservation and potentiates its recovery.

# ALLIED HEATH PROFESSIONAL SUPPORT IN ADULT NEURO-ONCOLOGY; BEFORE AND DURING COVID

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AIMS: To understand the current levels of Allied Health Professional (AHP) provision within adult neuro-oncology in the UK, gain insight into perceived gaps and any impact of the COVID-19 pandemic on this provision, from the Health Care Professional's (HCP) perspective. METHOD: In collaboration with brainstrust (a brain tumour charity) and the author, a mixedmethods, on-line survey of HCPs working within adult neuro-oncology was designed, tested and distributed to HCPs registered on the charity's HCP database. Quantitative data was analysed using simple descriptive statistics. Qualitative data was analysed using thematic analysis. RESULTS: 51 HCPs from multiple roles and teams across the UK responded. 66% (34) reported a service delivery gap, including a lack of specialist AHP support, with high geographical variability. During the COVID-19 pandemic, 60.8% (31) respondents identified a reduction in access to AHP support. 58.8% (30) respondents reported a change in appointment modality, with an increase in telephone and video appointments and a decrease in face-to-face appointments and home visits. This modality change was highlighted as a possible cause of reduced HCP awareness of symptom progression that was also reported. CONCLUSION: There is paucity of data regarding AHP provision within adult neuro-oncology and the impact of the COVID-19 pandemic on this provision. This study highlights concerns regarding overall specialist AHP support which reduced further during the COVID-19 pandemic. The impact on patients is unknown and highlights a need for further research to inform development of national guidelines for specialist AHP provision and the use of telehealth for this complex patient group.

#### CYBERKNIFE STEREOTACTIC RADIOSURGERY FOR SPINAL HAEMANGIOBLASTOMA: A SINGLE CENTRE EXPERIENCE Dr. Kieran Palmer<sup>1</sup>, Ms. Gemma Whitelaw<sup>1</sup>, Dr. Anant Krishnan<sup>1</sup>, Mr.

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AIMS: 'CyberKnife' stereotactic radiosurgery (SRS) is increasingly being used as a treatment for spinal haemangioblastoma to avoid complex surgery, especially in patients with multi-focal tumours associated with von Hippel-Lindau syndrome (VHL). Here we present the outcomes of patients treated in our centre. METHOD: Retrospective review of patients treated at St Bartholomew's Hospital, London. Assessment of radiological response was based upon RECIST criteria. The development of a symptomatic