METROPOLITAN MEDICAL CENTER DEPARTMENT OF ONCOLOGY

DISCHARGE SUMMARY

PATIENT: Thomas Gregory (ID: SYN199) MRN: 5872136 DOB: 03/16/1952 ADMIT DATE: 04/04/2025 DISCHARGE DATE: 04/14/2025 ATTENDING: Dr. Robert Walsh CONSULTANTS: Dr. Aaron Chen (Neurology), Dr. Maria Gonzalez (Radiation Oncology)

PRIMARY DIAGNOSIS: Status epilepticus secondary to new brain metastases in patient with NSCLC progressing on lorlatinib (third-line therapy)

ONCOLOGIC HISTORY: 73-year-old male with metastatic non-small cell lung cancer diagnosed in January 2021. Initial presentation included headache and visual disturbances, with imaging revealing a right lower lobe primary lung mass, bilateral adrenal metastases, and multiple brain metastases. Biopsy confirmed NSCLC, adenocarcinoma, with no actionable driver mutations but high PD-L1 expression (TPS 80%).

Treatment history includes:

1. First-line: Pembrolizumab monotherapy (02/2021-12/2022)
    - Initial partial response followed by progression after 22 months
    - Completed WBRT at diagnosis with good intracranial control
2. Second-line: Docetaxel + ramucirumab (01/2023-08/2023)
    - Progressive disease after 5 cycles
3. Third-line: Lorlatinib (09/2023-present)
    - Initiated due to CNS progression, off-label use
    - Initial stabilization followed by current progression

HOSPITAL COURSE: Patient was admitted after experiencing three generalized tonic-clonic seizures at home, progressing to status epilepticus in the emergency department requiring intubation for airway protection and IV midazolam for seizure control. Head CT and subsequent MRI revealed multiple new brain metastases with significant vasogenic edema. EEG demonstrated diffuse slowing but no ongoing seizure activity after 24 hours.

Patient was extubated on hospital day 2 with no recurrent seizures. Dexamethasone was initiated for cerebral edema with rapid neurological improvement. Levetiracetam was initiated for seizure prophylaxis with therapeutic levels achieved. Repeat MRI on hospital day 5 showed mild improvement in vasogenic edema.

Oncology evaluation determined disease progression on current therapy. CT chest/abdomen/pelvis demonstrated progression of primary lung lesion and new liver metastases. Given progression on three prior lines of therapy, options for subsequent treatment are limited. Multidisciplinary tumor board recommended stereotactic radiosurgery (SRS) to the largest symptomatic brain lesions followed by consideration for clinical trial or single-agent chemotherapy.

Patient underwent SRS to four target brain lesions during this hospitalization. Neurology followed throughout admission with serial examinations showing gradual improvement in mental status and no recurrent seizures. By discharge, patient was at neurological baseline with ECOG PS 2.

PROCEDURES:

1. Stereotactic radiosurgery to four brain metastases (04/12/2025)
    - Right parietal (2.3 cm): 18 Gy single fraction
    - Left frontal (1.8 cm): 20 Gy single fraction
    - Right temporal (1.5 cm): 20 Gy single fraction
    - Left occipital (1.2 cm): 20 Gy single fraction

IMAGING:

1. MRI Brain with and without contrast (04/04/2025):
    - Multiple new enhancing parenchymal lesions (>10) with largest in right parietal lobe (2.3 cm)
    - Extensive vasogenic edema surrounding largest lesions
    - No leptomeningeal enhancement
2. CT Chest/Abdomen/Pelvis with contrast (04/06/2025):
    - RLL primary tumor increased from 3.6 cm to 4.5 cm
    - Progressive bilateral adrenal metastases
    - New liver metastases in segments IV and VII (1.2 cm and 0.8 cm)
    - Stable mediastinal lymphadenopathy

LABORATORY DATA:

- CBC: WBC 7.6, Hgb 11.8, Plt 215
- CMP: Normal renal and hepatic function
- Therapeutic levetiracetam level: 22 μg/mL (10-40 μg/mL)
- LDH: 325 U/L (elevated)

DISCHARGE MEDICATIONS:

1. Levetiracetam 1000 mg PO BID
2. Dexamethasone 4 mg PO BID with taper plan
3. Pantoprazole 40 mg PO daily
4. Discontinue lorlatinib

FOLLOW-UP PLAN:

1. Neurology follow-up in 1 week
2. Oncology follow-up in 2 weeks to discuss fourth-line options:
    - Clinical trial NCT03874819 (novel HDAC inhibitor)
    - Gemcitabine monotherapy
    - Vinorelbine monotherapy
    - Best supportive care
3. MRI brain in 4 weeks to assess radiation response
4. Seizure precautions and education provided to patient and family

CONDITION AT DISCHARGE: Patient is neurologically stable with no seizure activity since admission. Alert and oriented to person, place, and time. Motor strength 5/5 throughout. ECOG performance status 2. Ambulating with walker.

PROGNOSIS: Guarded, given progression after three lines of therapy and development of multiple new brain metastases. Expected survival of 3-6 months based on disease burden and limited remaining treatment options. Goals of care discussion initiated during hospitalization with plan to continue at follow-up visit.

Robert Walsh, MD Department of Medical Oncology Date: 04/14/2025