

Patient Name: Elizabeth Hayes (date of birth: 1967-07-05)

Patient ID: SYN096

Diagnosis: Stage IV Non-Small Cell Lung Cancer (NSCLC) with confirmed ROS1 fusion rearrangement. Date of Initial Diagnosis: July 17, 2023

Clinical Summary: Patient initially presented with persistent dry cough, fatigue, shortness of breath upon exertion, and significant unintended weight loss (~15 lbs over two months). Comprehensive diagnostic evaluation was conducted, including a chest X-ray, revealing a suspicious mass in the left upper lung field. Subsequent CT and PET scans highlighted a primary lesion measuring approximately 3.8 cm with marked SUV uptake (SUVmax 8.7), along with a 2.5 cm adrenal metastasis on the left side, also showing significant metabolic activity. Brain MRI was negative for metastatic involvement at initial diagnosis. Biopsy of adrenal lesion confirmed adenocarcinoma histology. Comprehensive genomic profiling identified ROS1 fusion rearrangement. Immunohistochemistry for PD-L1 revealed robust expression with a TPS of 80%, CPS 90, and IC 5.

Treatment Course: The patient commenced first-line therapy with Entrectinib at 600 mg daily on August 8, 2023. She tolerated therapy well, with only mild fatigue and occasional nausea, managed successfully with supportive care measures including dietary modifications and anti-emetics.

Current Status: The patient's clinical response to Entrectinib has been encouraging, with significant symptom relief and normalization of appetite and weight stabilization. Follow-up imaging at three-month intervals has demonstrated substantial reduction in tumor size, notably with a 60% decrease in adrenal lesion diameter. No new metastatic lesions identified. Routine bloodwork remains stable, with mild transient elevations in liver enzymes noted but subsequently resolved without intervention.

Follow-up Plan: Continue current Entrectinib regimen with close monitoring, including imaging studies (PET-CT and brain MRI) every three months, given the increased risk of CNS involvement associated with ROS1 fusion. Regular laboratory assessments to monitor for potential drug-induced hepatic and renal dysfunction

Alexander Hardy, New York, April 15, 2025