Practical Approach to Interventional Bronchoscopy Procedural Decision Making: Scenario # 7: Endobronchial Ultrasound for right paratracheal node in a patient with COPD and cancer

Based on the information presented below, please describe your procedural decision making using The Practical Approach to Procedural Decision making. Do your best to complete each item of the Four Boxes. If the case scenario contains no information pertaining to an item, please address it as NOT AVAILABLE. Note that each case scenario may have greater emphasis on one or more items listed in the "Practical Approach".

GG is a 67 year old male with a 50 pack- year history of smoking developed cough and weight loss (15kg) for six months. His Vital signs revealed a blood pressure of 160/80mmHg, heart rate 90/min, body temperature 37.2°C and respiratory rate 18/min. The Physical examination shows prolonged expiratory breath sounds and egophony in right upper lung field. He is a retired electrician and lives with his wife. He has no advance directives. He desires all available active treatment modalities if diagnosed with cancer. Laboratory data reveal WBC 8000 (neutrophil 81%, lymphocyte 2%), Hemoglobin 13 gm/dl, Platelets 310,000/mm3. Arterial blood gas analysis showed pH 7.45, PaCO2 50 mmHg, PaO2 64 mmHg on 2L oxygen/min via nasal canula). Pulmonary function tests revealed FEV1- 1.6 L (49% predicted), DLCO- 50% predicted. A computer tomography scan of the chest showed a 3 cm right upper lobe mass and a1 cm right paratracheal lymph node that is PET negative. The CT guided transthoracic needle aspiration of the right upper lobe mass positive for non-small cell lung cancer.





After addressing items of the four boxes, please consider the following:

- ▶ Describe the 15 steps to performing EBUS-TBNA.
- ▶ Describe principles and use of endobronchial Doppler ultrasound
- ► Describe the reported relation between PET negative lymph node size and malignancy.

Initial Evaluation	Procedural Strategies
 Physical examination, complementary tests, and functional status assessment Patient's significant co-morbidities patient's support system (also includes family) Patient preferences and expectations (also includes family) 	 Indications, contraindications, and expected results Operator and team experience and expertise Risk-benefits analysis and therapeutic alternatives Respect for persons (Informed Consent)
Procedural Techniques and results	Long term Management Plan
 Anesthesia and other perioperative care Techniques and instrumentation Anatomic dangers and other risks Results and procedure-related complications 	 Outcome assessment Follow-up tests, visits, and procedures Referrals to medical, surgical, or palliative/end of life subspecialty care Quality improvement and team evaluation of clinical encounter

INITIAL EVALUATION
PROCEDURAL STRATEGIES
PROCEDURAL TECHNQUES AND RESULTS
LONG TERM MANAGEMENT PLAN