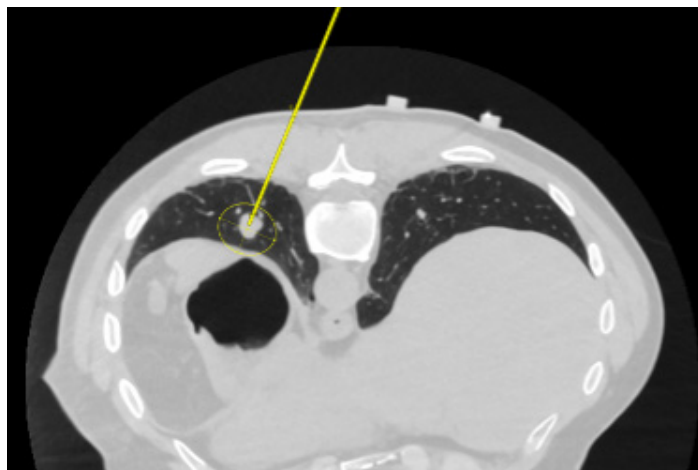


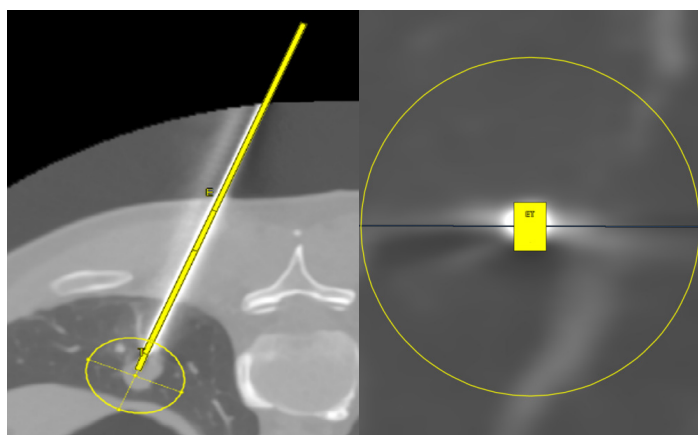


# Epione® robotic radiofrequency ablation of a lung mCRC metastasis

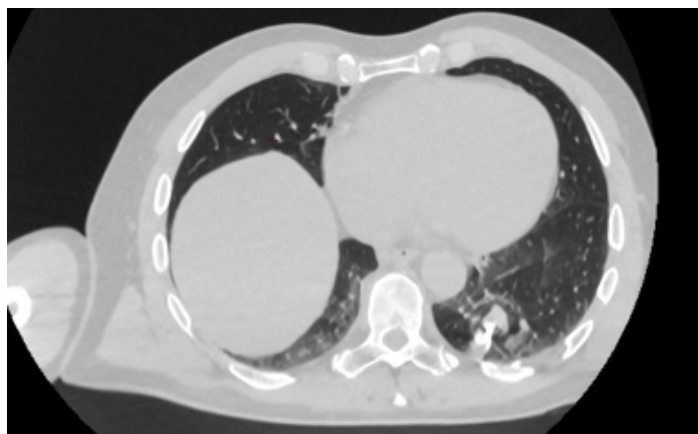
- Optimal trajectory planned
- Single needle insertion
- Needle placement right on target



Planned needle trajectory



Planned vs. actual needle placement was right on target



Post-ablation scan

**Patient:** 62 year old, Male

**Physician:** Baptiste Bonnet, Interventional Radiologist

**Institution:** Gustave Roussy

**Location:** Villejuif, France

### Tumor characteristics:

14x13x15 mm unique metastasis from colorectal cancer located in the left lung and 5 mm from the pulmonary pleurae.

### Approach:

The patient was treated in the prone position, under general anesthesia and jet-ventilation. Using the **Epione® System**, one coaxial needle was inserted in the center of the lesion to first enable biopsy then radiofrequency ablation.

## 1 Plan / Target

A single ~70mm depth trajectory was carefully planned to avoid the rib. Ablation power and time settings were simulated with **Epione® Software** to visualize adequate margins in 3D. Overall planning time was 4 minutes.

## 2 Deliver

Following accurate registration of the patient to the imaging, the **Epione® Robotic Arm** automatically aligned the needle guide to the planned trajectory and depth of insertion. The physician then inserted the coaxial needle from skin to target in one motion.

## 3 Confirm

Imaging was performed to confirm proper location of the ablation needle prior to ablation. Final needle placement was right on target. **Epione® Software** allows the physician to segment and compare the lesion and ablation zone volumes to confirm adequate margins.

### Outcomes:

Immediate post-procedure clinical success was achieved. Ablation was complete with no complications reported, especially no pneumothorax. No adverse events were observed after the procedure and after one-month control.