

## **Postprocessing and Cross Validation**

### **New Imaging Tools: Cerenkov Luminescence Imaging**

#### **Cerenkov Luminescence Endoscopy: Feasibility and Challenges**

**Zeng Cheng**

Stanford, California, USA

Recently Cerenkov Luminescence Imaging (CLI) has risen as a novel, attractive molecular imaging technique. It bridges nuclear and optical imaging and has demonstrated many applications in biomedical research, thus CLI has attracted much attention in the molecular imaging community.

More interestingly, the combination of CLI with endoscopy techniques could result in Cerenkov Luminescence Endoscopy (CLE) techniques which may be very useful in clinic. In this presentation, our efforts on developing CLE systems will be introduced. We will present the feasibility of using CLE for tumor detection and surgery monitoring in small animal models. The challenges that this new imaging modality faces will be discussed as well.