REPORT FOR THE 2005 AUTOSUTURE TRAVELLING FELLOWSHIP FOR PRIVATE OR HOSPITAL BASED COMMUNITY PRACTICE

Center Visited : University of Southern California Upper Gastrointestinal Surgery
Preceptors : Tom R. DeMeester, M.D.
The Jeffrey P. Smith Professor, General & Thoracic Surgery
Chairman, Department of Surgery
Cedric G. Bremner, M.D.
Professor and Director of Clinical Research, Department of Surgery
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University of Southern California is a center of excellence in upper gastrointestinal surgery, especially in esophageal surgery. Dr DeMeester who is the chief of General and Thoracic Surgery is a master surgeon of the field. His vast amount of researches improved understanding esophageal physiology and esophageal surgery. His contributions were well appreciated by surgeons interested in upper gastrointestinal surgery. Members of his team; Dr Cedric Bremner, Dr. Steve DeMeester, Dr. Jeffrey Hagen, Dr. John Lipham, and Dr. Peter Crookes are also pioneers in esophageal surgery. Those were the reasons why I selected this institution for this Fellowship program.

First day and first operation proved how much I was right. It was vagal and left gastric artery sparing esophagectomy with vein stripper and gastric pull-up. And my visit started yielding from that very moment.

I was introduced to the fellows who were attributed by Dr. DeMeester as engine that keeps him academic. All indulged in interesting researches along with breath taking pace of clinical works. To give some example to their researches during my visit;

- -Development of pharyngeal pH probe (RES-TEC) for the diagnosis of extraesophageal reflux problems (e.g. reflux induced aspiration).
- -Reasons of diffent behaviour pattern in short and long segment Barrett esophagus.

I was impatient to see their esophageal physiology lab in which Dr. DeMeester developed 24-hour esophageal acid monitoring technic and score (DeMeester's Score). It was really smaller than I expected, but unbelievable researches had been done there.

Wednesday morning 7 am is the time for Swallowing Conference where papers to be published reviewed and interesting cases discussed. After this session Dr. DeMeester accepts outpatient visits. Accompanying Dr. DeMeester during those visits were very informative in terms of patient handling and systematic approach to the patient's problems. His patience to understand their main complaints, his way of explaining surgical procedures to be performed will influence the way of approach to my patients for sure.

Antireflux procedures, most of the time laparoscopic Nissen fundoplication were probably one of the most frequently performed (1 to 3 cases daily) operations in this institution. Their failure rate is around 6 % in approximately 650 cases. This is the lowest rate as far as I know. When they looked at the reasons for these failures they found in 85% failure could be predicted preoperatively: These patients tended to have long or irreducible hiatal hernia or normal preoperative pH testing or had no adequate response to proton pomp inhibitors. They do endoscopy, barium swallow video , esophageal manometry preoperatively to scrutinize real patients benefiting from anti-reflux operation to decrease their failure rate further.

Esophagectomy was second most frequent operation and performed for benign (persisting strictures, end stage achalasia etc.) or malignant diseases. Between 1-3 esophagectomies are performed daily. En bloc esophagectomy with gastric pull up preferred in esophageal adenocarcinoma. Lymph nodes cleared in two fields (thorax and celiac). In some cases esophageal dissection performed by thoracoscopy. In benign cases vagal sparing esophagectomy with vein stripper and colon interposition is preferred.

Another highlight of my visit to the USC was attending to Dr. Mark B. Orringer's conference on transhiatal esophagectomy. As everyone interested in esophageal surgery would know Dr. Orringer developed trans-hiatal esophagectomy (Orringer's operation). He is the head of Thoracic Surgery in University of Michigan Medical Center. He was visiting professor to USC and it was the second time I was attending his conference on same topic, first was about 3 years ago in Johns Hopkins.

The important moment was discussion between DeMeester's team and Dr. Orringer. He was not on the side of extensive esophageal resection due to its high complication rates while USC team recommended that at least 40 lymph nodes should be harvested in order to prevent recurrence and sustain longer survival.

During my visit I had opportunity to observe laparoscopic esophageal myotomy with Dor or Toupe fundoplications, laparoscopic gastric by-pass surgery and laparoscopic gastric adjustable banding.

I had also attended weekly Morbidity and Mortality Conference and weekly Grand Rounds and daily motility procedures conducted in the Swallowing Clinic.

Without doubt my experience in USC will further my career in upper gastrointestinal surgery.

I am grateful to SSAT for providing me this opportunity.

I am also grateful to Dr. DeMeester, Dr. Bremner and their team for their hospitality and helpful approach enabling me observe their busy clinical activities.

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