**An Overview of Perioperative Medicine 2019: From Outpatient Preoperative Assessment to Inpatient Postoperative Care**

**WEDNESDAY, OCTOBER 23, 2019**

<table>
<thead>
<tr>
<th>Time</th>
<th>Event</th>
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<tbody>
<tr>
<td>6:00 a.m.</td>
<td>Registration and Continental Breakfast</td>
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<tr>
<td>7:30 a.m.</td>
<td><strong>Perioperative Medicine Introductory Topics</strong></td>
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<tr>
<td>7:45 a.m.</td>
<td><strong>Perspectives on the Multi-Disciplinary Approach to Perioperative Medicine</strong></td>
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<td>7:45 a.m.</td>
<td>What are the roles of the medical consultant?</td>
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<td>7:45 a.m.</td>
<td>What should a preoperative evaluation include?</td>
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<td>7:45 a.m.</td>
<td>How can a multidisciplinary approach optimize patient care?</td>
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<td>8:15 a.m.</td>
<td><strong>Anesthesia Alerts for the Non-Anesthesiologist</strong></td>
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<td>8:15 a.m.</td>
<td>What does the medical consultant need to know about paralytic agents and the physiologic effects of anesthesia?</td>
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<td>8:15 a.m.</td>
<td>What evidence is there to guide the “infield” vs “outfield” decision?</td>
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<td>8:15 a.m.</td>
<td>How do I counsel my patients about energy drinks, alcohol and nicotine the night before surgery?</td>
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<td>8:15 a.m.</td>
<td>What are the updates to the fasting guidelines?</td>
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<td>8:15 a.m.</td>
<td>How do I accurately assign an ASA score?</td>
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<td>8:45 a.m.</td>
<td><strong>Perioperative Cardiovascular Medicine Topics, Part 1</strong></td>
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<td>8:45 a.m.</td>
<td><strong>Cardiac Risk Assessment: Using Guidelines to Direct Practice</strong></td>
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<td>8:45 a.m.</td>
<td>How do I apply the current ACC/AHA guidelines to preoperative cardiac risk assessment?</td>
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<td>8:45 a.m.</td>
<td>Should I use the Gupta or the RCRI cardiac risk calculator?</td>
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<td>8:45 a.m.</td>
<td>Does it matter which stress test I order?</td>
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<td>8:45 a.m.</td>
<td>What is the significance of the METS trial?</td>
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<td>9:30 a.m.</td>
<td><strong>Cardiac Risk Reduction Strategies – Medical and Interventional</strong></td>
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<td>9:30 a.m.</td>
<td>What are the risks of general vs spinal anesthesia with respect to cardiac outcomes?</td>
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<td>9:30 a.m.</td>
<td>What is the evidence for perioperative beta-blocker, statin and alpha-2-agonist use?</td>
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<td>9:30 a.m.</td>
<td>When is cardiac revascularization indicated prior to non-cardiac surgery?</td>
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<td>9:30 a.m.</td>
<td>How long should patients wait to have surgery after MI or revascularization?</td>
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<td>10:00 a.m.</td>
<td><strong>Challenge the Experts Case #1</strong></td>
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<td>10:15 a.m.</td>
<td><strong>Question and Answer Session</strong></td>
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<td>10:30 a.m.</td>
<td><strong>Refreshment Break</strong></td>
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<td>10:45 a.m.</td>
<td><strong>Perioperative Medication and Fluid Management Topics</strong></td>
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<td>10:45 a.m.</td>
<td><strong>Understanding Perioperative Fluid Management</strong></td>
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<td>10:45 a.m.</td>
<td>What is unique about fluid management perioperatively?</td>
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<td>10:45 a.m.</td>
<td>Which is better-- liberal or restrictive fluid management?</td>
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<td>10:45 a.m.</td>
<td>What type of fluid is optimal?</td>
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| 11:15 a.m.| Perioperative Medication Management: Prescription & Non-Prescription Medication | - What issues need to be considered with perioperative medication management?  
- What are some drugs that need to be held for surgery?  
- What are the issues with some of the newer weight loss drugs?  
- What should I recommend to my patients regarding dietary supplements perioperatively? |
| 11:45 a.m.| Question and Answer Session                                                |                                                                      |
| 12:00 p.m.| Lunch on Your Own                                                          |                                                                      |
| 1:30 p.m. | Perioperative Pain Management and Substance Use Topics                    |                                                                      |
|           | Pain Management in the Perioperative Period – Insights from Anesthesia/Pain Medicine and Hospital Medicine | - What are the key issues in patients on chronic opioids preoperatively?  
- What are the commonly used opioids in the postoperative setting and what issues should I consider when prescribing these?  
- What are the common PCA doses for postoperative pain control?  
- When should I consider multi-modal analgesia to help with pain control?  
- How should patients on multiple sedating medications postoperatively be monitored? |
| 2:15 p.m. | Managing the Patient with Perioperative Substance Use Disorders           |                                                                      |
|           | How do I screen for substance use preoperatively?                         |                                                                      |
|           | What are the perioperative issues with the use of common substances such as methamphetamine, heroin, cocaine, marijuana and alcohol? |                                                                      |
|           | When should an elective surgery be postponed in a patient with substance use? |                                                                      |
|           | How do I manage patients on Suboxone and methadone perioperatively?      |                                                                      |
|           | How can I use prescription monitoring programs in the perioperative setting? |                                                                      |
| 3:00 p.m. | Challenge the Experts Case #2                                             |                                                                      |
| 3:15 p.m. | Question and Answer Session                                                |                                                                      |
| 3:30 p.m. | Refreshment Break                                                          |                                                                      |
| 3:45 p.m. | Perioperative Clinical Shorts Series 1 – Special Populations and Perioperative Scenarios |                                                                      |
|           | Preoperative Anemia and Iron Therapy                                      | - When should I consider perioperative iron therapy and how is it administered? |
|           | Non-Cardiac Device Management                                             | - How do I manage non-cardiac devices perioperatively, such as deep brain stimulators, pain pumps, acupressure devices, etc? |
|           | Hip Fractures in Complex Elderly Patients                                 | - How do I manage hip fracture patients who need urgent orthopedic surgery? |
|           | Laparoscopic Surgery and Patient Positioning – Why it Matters             | - What are the physiologic effects of laparoscopic surgery and patient positioning in the OR? |
4:45 p.m. Wine Reception and “Consult Guys” Presentation: The Myths of Perioperative Care
(CME credit will not be provided for this event)
Geno J. Merli, M.D. and Howard H. Weitz, M.D.

5:30 p.m. Adjourn

THURSDAY, OCTOBER 24, 2019

6:30 a.m. Continental Breakfast

7:00 a.m. Breakfast with the Professor Case Discussions: Informal Q & A with Wednesday’s Course Faculty

Perioperative Cardiovascular Medicine Topics, Part 2

8:00 a.m. Management of Non-CAD Heart Disease in Non-Cardiac Surgery
- How do I manage a patient with valvular heart disease perioperatively?
- How soon after valve replacement can non-cardiac surgery be performed?
- What issues need to be considered for a patient with heart failure preoperatively?
- What are the issues with preoperative hypertension?
- What are the preoperative issues for patients with chronic atrial fibrillation?
- What perioperative issues need to be considered in a patient with hypertrophic cardiomyopathy?
- What perioperative issues need to be considered in a patient with pulmonary hypertension?
- What are the indications for a temporary pacemaker in the perioperative period?
- How do I manage pacemakers and CIEDs in the perioperative period?

8:45 a.m. Perioperative Cardiology Clinical Shorts
- How might the Canadian and European guidelines impact my practice?
- When are preoperative ECGs and echocardiograms indicated?

9:15 a.m. Managing Postoperative Cardiac Complications
- Which patients should have an ECG and/or troponin surveillance for postoperative MI?
- How do I manage hyper- and hypotension postoperatively?
- What are the precipitating factors for postoperative arrhythmias and conduction disorders and how do I manage them?
- Which surgeries and patients have high risk for postoperative atrial fibrillation? Are there ways to prevent postoperative atrial fibrillation? How do I manage postoperative atrial fibrillation?
- How do I diagnose and manage postoperative myocardial ischemia and infarction?
- How important is “troponin leak” postoperatively?
- What special perioperative management is needed for patients with heart failure (systolic heart failure and heart failure with preserved ejection fraction)?

10:00 a.m. Challenge the Experts Case #3

10:15 a.m. Question and Answer Session

10:30 a.m. Refreshment Break
Perioperative Infectious Disease, Rheumatology, and Preoperative Testing

10:45 a.m. Perioperative Infectious Disease Issues
- How do I approach the postoperative fever workup?
- Which patients need antibiotic prophylaxis perioperatively and for how long?
- Do I need to order a urinalysis and culture prior to total joint surgery?
- How are patients with penicillin allergy managed in the perioperative period?
- How do I manage common postoperative infectious disease issues?
- Is there a role for the use of probiotics to prevent postoperative infections?

11:15 a.m. Perioperative Rheumatology Considerations
- How do I manage DMARDS and other rheumatologic medications?
- What are the perioperative risks associated with rheumatologic diseases?
- How do I diagnose and manage acute crystalline arthritis in the surgical patient?

11:45 a.m. Preoperative Testing Clinical short
- What are the indications for a preoperative CBC, electrolytes or creatinine?
- When should coagulation studies be obtained?
- When should liver function tests be ordered?

12:00 p.m. Question and Answer Session

12:15 p.m. Lunch on Your Own

Perioperative Pulmonary Medicine Topics

1:45 p.m. Preoperative Pulmonary Risk Stratification and Risk Reduction Strategies
- Which factors contribute to pulmonary risk in non-cardiac surgery?
- Which pulmonary risk index best predicts postoperative pulmonary complications: ARISCAT, Arozullah, Gupta or LIPPSMAck POP?
- When is pulmonary testing recommended preoperatively?
- What measures can be employed to help minimize postoperative pulmonary complications in at-risk patients?

2:15 p.m. Management of Documented or Suspected Obstructive Sleep Apnea in Patients Undergoing Non-Cardiac Surgery
- What are the consequences of OSA in the perioperative period?
- What factors increase risk of postoperative complications in patients with OSA?
- How should patients be screened for OSA?
- What are the risks of obesity hypoventilation syndrome?
- Which patients need to be tested prior to surgery to decrease the risk of potential complications?
- Which patients can be treated as “presumed” OSA and proceed with surgery with additional precautions?
- Are there guidelines available to help guide management of patients with OSA in the perioperative period?
- What postoperative monitoring is recommended for patients with suspected or confirmed OSA?
2:45 p.m. Management of Postoperative Pulmonary Complications
- What are the most common postoperative pulmonary complications?
- How do I diagnose and treat fat embolism syndrome?
- How do I minimize or treat pulmonary complications in the postoperative period?
- When should non-invasive ventilation considered?

3:15 p.m. Challenge the Experts Case #4

3:30 p.m. Question and Answer Session

3:45 p.m. Refreshment Break

Clinical Shorts Part 2 – Emerging Perioperative Practice Optimizing Opportunities

4:00 p.m. Prehabilitation
- Does exercise prehabilitation have a role in some patients prior to surgery?

The Perioperative Surgical Home
- Who are the stakeholders and what are the benefits of the surgical home model?

Myocardial Injury After Noncardiac Surgery (MINS)
- Is MINS significant and is there any evidence-based treatment?

Recognizing and Addressing Frailty
- How is the frailty index used to identify patients at risk of postoperative complications?

5:00 p.m. Adjourn

FRIDAY, OCTOBER 25, 2019

6:30 a.m. Continental Breakfast

7:00 a.m. Breakfast with the Professor Case Discussions: Informal Q & A with Thursday’s Course Faculty

Perioperative Vascular Medicine Topics

8:00 a.m. DVT/PE Prophylaxis in the Surgical Patient I:
The ACCP Guidelines and the Internist’s Perspective
- What are the patient- and surgery-related risk factors for perioperative DVT: Caprini vs ACCP risk stratification?
- What do the ACCP guidelines recommend for DVT prophylaxis in surgical patients?
- When is extended DVT prophylaxis indicated?
- How does renal function affect the management of DVT prophylaxis?
- How to prophylaxis patients with hereditary coagulation disorders or previous history of VTE not taking long term oral anticoagulants undergoing major surgery?

8:30 a.m. DVT/PE Prophylaxis in the Surgical Patient II:
The AAOS Guidelines and the Orthopedist’s Perspective
- What concerns do orthopedists have about DVT prophylaxis as recommended by the ACCP?
- What are the AAOS Guideline recommendations for DVT prophylaxis in orthopedic surgical patients?
- When is extended DVT prophylaxis indicated and which agent is best?
9:00 a.m. Perioperative Management of Direct Oral Anticoagulants
- How long should I hold dabigatran, rivaroxaban or apixaban before surgery?
- Now that some reversal agents are available, should we routinely be using these to expedite DOAC reversal preoperatively in patients who need urgent surgery?
- When should target specific oral anticoagulants be restarted postoperatively?
- Do patients on target specific oral anticoagulants need to be bridged?
- How do I manage prolonged DVT prophylaxis in patients who are also taking dabigatran, rivaroxaban, edoxaban or apixaban?
- How should we reverse these agents if major bleeding occurs?

9:30 a.m. Question and Answer Session

9:45 a.m. Refreshment Break

Perioperative Vascular Medicine and Hematology Topics

10:00 a.m. Perioperative Management of Anticoagulants (Warfarin): To Bridge or Not to Bridge
- Which patients with atrial fibrillation need bridging anticoagulation perioperatively?
- Which patients with mechanical heart valves need bridging anticoagulation perioperatively?
- Can you recommend an approach to anticoagulation dosing and the timing of bridging?
- How and when should anticoagulation be restarted after surgery?

10:30 a.m. Common Hematology Issues in the Perioperative Period
- Which transfusion strategy is best in the perioperative period—conservative or liberal?
- What should trigger transfusion in the postop period?
- When is FFP indicated preoperatively?
- What is the role of platelet transfusion in patients taking antiplatelet agents who need emergent or urgent surgery?
- How do I diagnose and treat heparin induced thrombocytopenia in the perioperative period?
- How do I manage non-HIT thrombocytopenia?
- How do I manage patients with sickle cell disease perioperatively?

11:00 a.m. Challenge the Experts Case #5

Perioperative Neurology and Geriatric Topics

11:15 a.m. Perioperative Care of the Elderly Patient
- How old is too old to consider surgery?
- What are the risk factors and preventive measures for postoperative delirium?
- What diagnostic workup is recommended for patients with suspected postoperative delirium?
- Do DNR orders need to be suspended prior to surgery and if so, when should DNR orders be reinstated postoperatively?

11:45 a.m. Managing Patients with Neurologic Disease in the Perioperative Period
- How do I manage patients with seizure disorder in the perioperative period?
- How do I manage patients with Parkinson’s disease perioperatively?
- What do I do if I find an asymptomatic carotid bruit during a preoperative evaluation?
- How do I determine appropriate timing for elective surgery after ischemic stroke?
12:30 p.m. Question and Answer Session

12:45 p.m. Adjourn

SATURDAY, OCTOBER 26, 2019

6:30 a.m. Continental Breakfast

7:00 a.m. Breakfast with the Professor Case Discussions: Informal Q & A with Friday's Course Faculty

Perioperative Endocrine and Renal Topics

8:00 a.m. Managing the Diabetic Patient in the Perioperative Period
- Should I be screening for diabetes preoperatively in patients who are at risk?
- When would I recommend postponing an elective surgical procedure because of poor diabetic control?
- How should I manage patients on insulin therapy in the perioperative period?
- How should I manage patients on oral hypoglycemics in the perioperative period?
- How should I manage patients on insulin pumps in the perioperative period?
- What is the optimal glycemic control in the postop setting?

8:30 a.m. Perioperative Management of the Patient with Kidney Disease
- What perioperative issues do I need to consider for a patient with kidney disease?
- How do I manage patients with advanced kidney disease, at risk for requiring perioperative hemodialysis?
- What are the key considerations for patients on peritoneal dialysis?
- How do I prevent acute kidney injury in the perioperative period?

9:00 a.m. Perioperative Management of Endocrine Issues: Stress Dose Steroids, Adrenal Insufficiency, Thyroid Disease
- What issues do I need to consider in patients with hypothyroidism or hyperthyroidism in the perioperative period?
- Who is at risk for adrenal insufficiency perioperatively?
- How do I determine the need for and the dose of stress dose steroids in the surgical patient?

9:30 a.m. Challenge the Experts Case #7

9:45 a.m. Question and Answer Session

10:00 a.m. Refreshment Break and Hotel Checkout

Perioperative Gastrointestinal and Nutrition Topics

10:30 a.m. Perioperative Management of the Patient with Liver Disease
- How do I approach preoperative risk assessment in a patient with liver disease?
- Which patients with liver disease may not be good candidates for elective surgery due to significant increase perioperative morbidity and mortality?
- What are the common postoperative management challenges for patients with advanced liver disease?
- What do I need to know about managing the transplant patient undergoing non-cardiac surgery?
11:00 a.m.  **Management of Postoperative Gastrointestinal Complications**
- How do I prevent and manage postoperative nausea and vomiting?
- How should I evaluate a patient with postoperative diarrhea?
- What agents are recommended to prevent stress related mucosal disease in the surgical patient?
- How do I manage postoperative constipation and postoperative ileus?

11:30 a.m.  **Perioperative Nutrition Considerations**
- What patients might benefit from a preoperative nutrition consultation?
- What preoperative testing is useful to assess nutritional status?
- Does optimizing nutrition preoperatively improve outcomes?
- When should patients receive TPN in the perioperative setting?
- What can be done postoperatively?

12:00 p.m.  **Question and Answer Session**

12:15 p.m.  Adjourn!