Cardiac Care During COVID19

Case:

 42 yo male, married with 3 children, works as IT specialist

- Past Medical History: diabetes (diet controlled), +ve Family Hx CAD, non smoker
- HPI: 1 week prior to admission: patient working from home, developed chest pain while walking up stairs in house, lasted 20 minutes and spontaneously resolved

Case:

- 4 days: prior to admission: onset of 5/10 chest pain with nausea and diaphoresis, intermittent but mostly continuous with occasional resolution
- <u>Day of admission</u>: pain increased to 10/10 in severity with severe shortness of breath, patient finally agreed to go to Markham-Stouffville ER due to severity of pain
- **ER**: seen in triage, ECG demonstrated Anterior STEMI (5 mm ST-elevation in V2-V6), Code-STEMI activated and patient sent directly to cath lab at Southlake

Case:

• Cath Lab:

- 100% LAD occlusion, 90% distal RCA (1 drug-eluting stent to LAD, second to RCA)
- Patient was in severe congestive heart failure

• **CCU**:

- LV function assessment Severe LV dysfunction,
 Ejection Fraction ~20%,
- ☐ HR (sinus tachycardia, 120 BPM suggestive of significant hemodynamic compromise)
- Patient now requiring significant heart failure therapy, may require ICD for primary prevention for ventricular arrhythmias, will likely need advanced heart failure therapies

ISSUES:

- 1. Fear of COVID19 directly responsible for delayed presentation with now severe, long lasting consequences (significant CHF)
- 2. Will have prolonged CCU stay and overall hospital LOS which could further impact bed shortages.
- 3. Will have worse outcomes now if *does* contract COVID19

COVID Fear is driving Morbidity/Mortality

- ER visits in general down 30-50%
- CP as primary CC down 60%
- Opiate overdoses up due to drug use alone/isolation
- Late presentations of other surgical conditions (perf appy, ascending cholangitis, pancreatitis, SBO)
- Late presentation of Infectious illnesses (cellulitis, abscess, c.difficile etc)
- Strokes presenting outside of window of opportunity to treat

Cardiac Care Specifically

- 40-60% reduction in admissions (globally)
- Late presentation is now the norm
- Elective procedures on hold
- Some patients have mis-information around use of ACE/ARB inhibitors and ASA and have stopped these medications
- Some patients may no longer be able to afford their medications
- Eating/exercise/stress

Primary Care to the Rescue

- We have the trust of our patients
- We have the ability to reach out to our patients
- Unlike COVID with limited treatment options there are effective life saving treatments for CAD and many of the other conditions that are in the shadow of COVID
- We are in this for the long haul so we should set up systems now in order to avoid further M+M which has played out on the global stage

Virtual Cardiac Care

- Reach out to patients (social media, mail outs, email, phone calls)
- Home telemed programs
- "Listen to your patient, he is telling you the diagnosis" -Osler
- Send people to the ER
- Send people to Cardiology
- Diagnostics through ER/Cardiology or local resources per established protocols (or make some protocols)