Memorandum

SUBJECT: CorHealth COVID-19 Cardiac Memo #10 – **RECOMMENDATIONS FOR AN ONTARIO APPROACH TO PRIORITIZATION OF DIAGNOSTIC CARDIAC CATHETERIZATION AND PERCUTANEOUS CORONARY INTERVENTION IN RESPONSE TO PHASES OF COVID-19**
TO: Cardiac Stakeholders
FROM: Office of the CEO, CorHealth Ontario
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DISCLAIMER: The information in this document represents general guidance based on current practice and available evidence. The document was developed by provincial clinical experts, reflecting best knowledge at the time of writing, and is subject to revision based on changing conditions and new evidence. This information is intended to be "guidance rather than directive," and is not meant to replace clinical judgment, regulatory body requirements, organizational, or hospital policies. Reference to Infection Prevention and Control (IPAC) or Personal Protective Equipment (PPE) in this document should not replace or supersede the IPAC and PPE protocols or directives in place at your hospital.

Recommendations for an Ontario Approach to Prioritization of Diagnostic Cardiac Catheterization and Percutaneous Coronary Intervention in Response to Phases of COVID-19

PREAMBLE

COVID-19 is an unprecedented crisis and poses a significant risk to the community as the landscape is rapidly evolving. The Ministry of Health requested on March 15, 2020 that all hospitals ramp down all non-essential services, elective surgeries, and other non-emergent clinical activity. In response to the anticipated demand on hospital resources, hospitals reduced outpatient surgeries and other non-emergent clinical activity. CorHealth Ontario has worked with cardiac experts and stakeholders across the province to discuss how best to preserve care capacity for those cardiac patients in greatest need, while we gradually restore health care capacity in the context of COVID-19. The following guidance and recommendations reflect advice from this engagement.

GUIDING PRINCIPLES

1. Keeping front line health care providers healthy and patients protected is vital.
2. Minimizing the impact of COVID-19 on the mortality and morbidity of patients with cardiac disease is a priority.
3. Aligning with province- and hospital-specific infection prevention and control policies and protocols is important.
4. Promoting clinical activities aimed at preserving hospital resources (i.e. health care human resources, personal protective equipment, procedure rooms, Intensive Care Units, Emergency Departments) is a priority.

CorHealth Ontario, in consultation with key stakeholders, is making recommendations for the management of patients eligible for diagnostic cardiac catheterization (cath) and percutaneous coronary intervention (PCI) for the treatment of coronary artery disease (CAD) occurring in the cardiac catheterization laboratory (CCL) during the COVID-19 pandemic. These recommendations were created with the intention to limit as much as possible unintended harm to patients who are at high risk of mortality or morbidity, if their cardiac conditions are left untreated. Patients requiring cath and PCI are at risk of mortality, morbidity and/or

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hospitalization if they contract COVID-19; as such, determination to treat these patients requires careful consideration of the risks of delayed cardiac care against the potential risk of exposure to COVID-19 in the hospital.

These recommendations were informed by the following:

- *Precautions and Procedures for Coronary and Structural Cardiac Interventions during the COVID-19 Pandemic: Guidance from the Canadian Association of Interventional Cardiology* (March 2020). *Available from:* https://www.onlinecjc.ca/action/showPdf?pii=S0828-282X%2820%2930300-7

PART 1: DECISION-MAKING TO SUPPORT CATH AND PCI

1.1 In the context of the COVID-19 pandemic, a decision on cath/PCI should be based on the patient's clinical status and risk profile, the available resources at the Cardiac Catheterization Lab (CCL) (i.e. human resources, bed availability, PPE, medication), and the risk and consequence of the patient acquiring or transmitting COVID-19 infection. These decisions can be guided by Table 1 (p.12-14) in *Precautions and Procedures for Coronary and Structural Cardiac Interventions during the COVID-19 Pandemic: Guidance from Canadian Association of Interventional Cardiology*, with consideration given to hospital- and region-specific context.
Available here: https://www.onlinecjc.ca/action/showPdf?pii=S0828-282X%2820%2930300-7

1.2 Sites should consider putting in place a process to review all referrals for diagnostic cath during this time of resource constraint and transmission risk, to ensure the referral is consistent with the decision criteria noted above. This is particularly important given the dynamic nature of the pandemic and the potential for resource availability to rapidly fluctuate.

1.3 In some situations, more intense medical therapy *may be* of benefit in relieving symptoms prior to an invasive approach and may be considered as an initial strategy, at least until the COVID-19 related constraints ease further.

1.4 The review of cath referrals should leverage the existing structure, process and expertise of the local Interdisciplinary Heart Team. It is not necessary or practical for the entire team to be involved in review of cath referrals, but a subset of members may be appropriate.

1.5 In cases where revascularization is indicated and either PCI or CABG would offer reasonably similar benefit, resource constraints in the operating room may appropriately favour a decision for PCI. These cases should continue to be reviewed by the Interdisciplinary Heart Team.

1.6 Interventional Cardiology leadership should be engaged in regular discussions with their hospital administration to understand hospital-wide resource availability, in order to inform CCL capacity decision-making.

1.7 Regular CorHealth Cardiac COVID-19 Forum meetings should be utilized by the Interventional Cardiology community to support sharing of experiences and learnings related to the COVID-19 pandemic (e.g. alternative discharge models of care).

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PART 2: WAITLIST MANAGEMENT

2.1 Hospitals should ensure there is a process in place which includes assigned accountability for the active management of the cath and PCI waitlist(s). Mechanisms should include ongoing review of patient priority, as well as the assessment of the centres' ability to provide cath and PCI services during the COVID-19 pandemic and ensure communication of this information to the referring physician(s).

2.2 To support waitlist prioritization decisions, the guidance provided in *Precautions and Procedures for Coronary and Structural Cardiac Interventions during the COVID-19 Pandemic: Guidance from Canadian Association of Interventional Cardiology,* Table 1 (p.12-14), can be leveraged.
Available here: https://www.onlinecjc.ca/action/showPdf?pii=S0828-282X%2820%2930300-7

2.3 As CCL capacity fluctuates in the context of COVID-19, patients on the wait list should be reviewed to determine if the priority (or possibly the indication) for diagnostic cath or PCI has changed. Bidirectional communication mechanisms should be in place to facilitate communication between the CCL and the referring physicians. Considerations for this review may include the following:

- Increasing symptoms may trigger higher priority
- Interim improvement in symptoms may reduce the indication for urgent cath or PCI
- More intense medical therapy *may be* of benefit in relieving symptoms prior to an invasive approach and may be considered as an initial strategy, at least until the COVID-19 related constraints ease further
- In some situations, patients with CAD and low-risk ACS during the COVID crisis who have been stable for an extended period (weeks or months) on medical therapy, may not require a cath imminently

2.4 Interventional Cardiologists should consider a consistent approach to documenting patient triage decision-making. In addition to documenting all triage decisions in a patient's medical record (i.e. the standard of care), teams may consider using additional decision documentation tools. A sample case review documentation template (created by CorHealth Ontario, and included in the Appendix), can be utilized or adapted by care providers and teams.

PART 3: OTHER CONSIDERATIONS

3.1 To minimize the exposure to COVID-19, interventional cardiologists should consider the use of virtual care tools and resources (e.g. OTN, telephone) to assess new referrals, review patients on the wait list or to conduct post procedure follow-up.

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Appendix

Sample Case Review Template:

Date:
Time:
Patient Name:
Patient Location: Acute ICU/CCU Bed Acute Ward Bed Home Other: _____
Service Required Cath PCI TAVI Mitral Clip Other Structural: _____ CABG CABG + Valve Isolated Valve:_____ Other CV Surgery_____ Other Service:_____
Case Urgency Details:
Decision ___: Rationale to proceed (comments) ___: Rationale to defer at this time (comments) <u>Case re-evaluation date/time:</u>

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