



Figure S1: Organizational chart depicting the MOHCCN's governance structure. The Network is led by an Executive Director and governed by a Network Council – composed of leadership from member institutions, TFRI leadership, a member of the Patient Working Group, and observers from Health Canada, the Canadian Institutes of Health Research (CIHR), and the Terry Fox Foundation – that also provides strategic input. A Steering Committee, composed of consortia leads and chairpersons from the working groups, provides operational guidance. MOHCCN operations are further supported by TFRI staff centrally, as well as by full-time project managers employed through each consortium.

Table S1: MOHCCN working groups. All MOHCCN policies and guidelines can be found at www.marathonofhopecancercentres.ca/researcher-hub/policies-and-guidelines (see also Table S2 for additional links, including working group pages).

Working group	Mandate	Guidelines and policies created to date
Data Policies and Standards Committee	Provide recommendations on core aspects of data sharing, data access and use, and data privacy principles for the development of policies.	<ul style="list-style-type: none"> •Data Access and Use Policy •Data Access Committee Terms of Reference •Data Access Procedures •Data Privacy Policy •Publication Policy •Researcher Code of Conduct
Clinical Data Standards Sub-Committee	Provide recommendations on developing the MOHCCN clinical and omics data models and ontologies.	•Clinical Data Model (with accompanying guidelines, release notes, and entity relationship diagrams)
Clinical Data Model Guidelines Subgroup	To create a comprehensive data curation guideline for the MOHCCN Clinical Data Model.	
Data Sharing Subgroup	Develop and run projects to test and demonstrate data sharing in the MOHCCN. Suggest policies and guidelines on data sharing, access and use.	
Scientific Questions Working Group	Connect and represent scientific communities across the spectrum of MOHCCN. Provide overarching scientific questions and themes as a guide to MOHCCN activities. Recommend priorities for funding and future cohort selection.	
Technology Working Group	Provide recommendations to profile the genomes and discussions around how to organize, share, and advance on all fronts the most high-quality data possible in the most cost-effective way.	<ul style="list-style-type: none"> •Gold Cohort Standards Policy •Quality Control Gates Guideline •Whole-Genome and Transcriptome Sequencing Guideline
Immune Profiling Subgroup	Provide recommendations on immune profiling techniques.	
Biospecimens Working Group	Provide recommendations on the acquisition, processing, storage, derivatives, quality management, release, and data around biospecimens. Ensure a fit-for-purpose collection to meet the needs of the MOHCCN and work with the TWG to ensure alignment.	<ul style="list-style-type: none"> •FF Tissue Preparation and Nucleic Acid Isolation Guideline •FFPE Tissue Preparation and Nucleic Acid Isolation Guideline
Hematology Biospecimens Subgroup	Focusing on immediate priorities for MOHCCN Gold Cohort approvals and data preparation for submission to digital platforms, in close collaboration with	

	designated sites and MOHCCN/TFRI leadership.	
Patient Working Group	Help guide Network activities to ensure they address and respond to the needs and priorities of those with lived or living cancer experience. Develop a pan-Canadian education campaign related to precision oncology and share patient, survivor, and caregiver perspectives more widely in the research and clinical communities as well as with the broader public.	
Prospective Enrolment Working Group	Develop a protocol for a WGTA-guided prospective pan-Canadian trial. Support the trial's implementation.	
Return of Results Working Group	Provide recommendations on a structure to return cancer-related germline results (primary objective). Moving, in the future, to somatic recommendations (second objective).	<ul style="list-style-type: none"> •Patient Consent Form Template •Patient Consent Form Checklist
Canadian Spectrum Working Group	Develop inclusion strategies for under-represented populations.	<ul style="list-style-type: none"> •Underserved and Underrepresented Populations Guideline
Health Technology Assessment Working Group	Standardize HTA elements and support HTA data collection through data linkage protocols	
IP and Commercialization Working Group	Develop MOHCCN policies and frameworks related to generated intellectual property ("foreground IP"), revenue sharing, and third-party sponsored/funded research. Develop policies, operational requirements, and recommendations for agreement amendments related to commercial activities.	

FF: fresh-frozen; FFPE: formalin-fixed paraffin-embedded ; WGTA: whole-genome and transcriptome analysis; IP: intellectual property

Table S2: List of cancer types and subtypes represented within the categories shown in Figure 2.
The list is non-exhaustive and will continue to grow as data accrue.

Bladder
Urothelial carcinoma
Non-muscle invasive bladder cancer
Blood
Leukemia
Acute myeloid leukemia
Chronic lymphocytic leukemia
Lymphoma
Diffuse large B-cell lymphoma
Follicular lymphoma
Mantle cell lymphoma
Waldenström's macroglobulinemia
Multiple myeloma
Myeloproliferative neoplasm
Essential thrombocythemia
Myelofibrosis
Polycythemia Vera
Bone & soft tissues
Sarcoma
Synovial sarcoma
Brain
Glioma
Glioblastoma
Lower-grade glioma
Breast
Triple-negative breast cancer
Metaplastic breast cancer
Endocrine
Adrenal cancer
Gastrointestinal tract
Ampullary cancer
Biliary tract cancer
Cholangiocarcinoma
Gallbladder cancer
Colorectal cancer
Gastroesophageal adenocarcinoma
Upper gastrointestinal cancer
Gynecologic
Ovarian cancer

Epithelial ovarian cancer
High-grade serous ovarian cancer
Small cell carcinoma of the ovary hypercalcemic type
Undifferentiated gynecologic malignancies
Endometrial cancer
Head & neck
Head and neck squamous cell carcinoma
Oral cavity squamous cell cancer
Salivary gland cancer
Kidney
Renal cell carcinoma
Liver
Hepatocellular carcinoma
Lung
Non-small cell lung cancer
Lung adenocarcinoma
Lung squamous cell carcinoma
Multiple primary malignant tumours
Pancreas
Pancreatic ductal adenocarcinoma
Prostate
Skin
Basal cell carcinoma
Melanoma