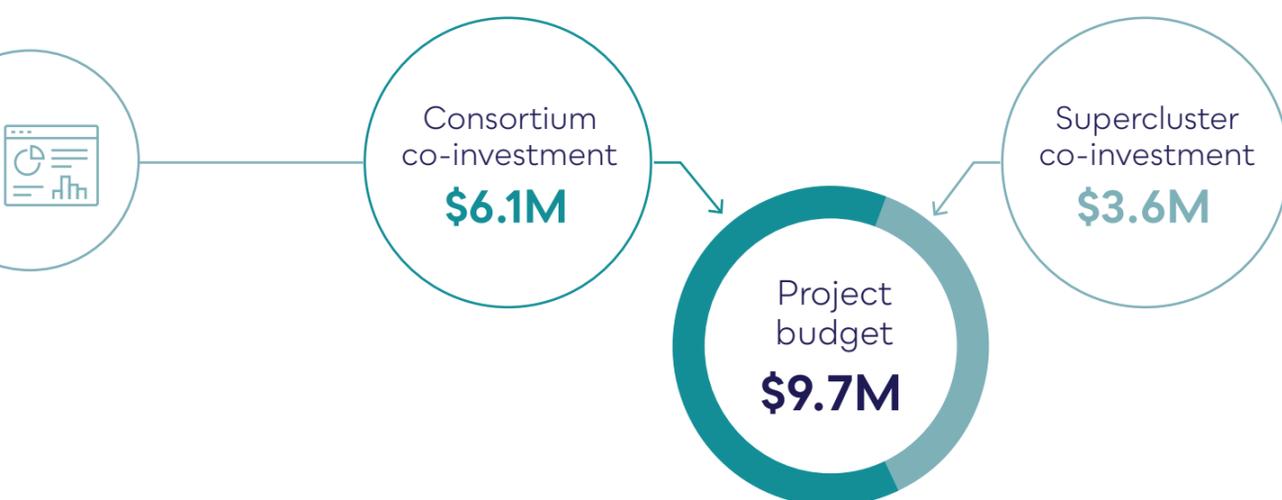




CANADA'S DIGITAL  
TECHNOLOGY  
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## Dermatology Point-of-Care Intelligent Network

AI-powered medical imaging network to connect all points of care for patients who may be dealing with skin cancer.



### Project Overview

One in six Canadians will develop some sort of skin cancer during their lifetime. Each year in Canada there are 80,000 reported cases of skin cancer (melanoma). The annual cost of skin cancer to the healthcare system is over \$500M coupled with immeasurable costs to families. Advanced cases of skin cancer can cost over \$160,000 per patient to treat, whereas a timely intervention can cost as little as \$50.



Canada is facing a severe shortage of dermatologists leading to wait times of six months or more to see one. Melanoma can rapidly progress in as little as six weeks and patient survival declines from 98% to 15% if treatment is delayed.

Change Healthcare is leading this research consortium which includes TELUS Health, MetaOptima Technology Inc., Careteam Technologies Inc., Providence Health Care and BC post-secondary research institutions to help speed diagnosis and expediate care for cancer patients.

The new cloud-based Dermatology Point-of-Care Intelligent Network will use MetaOptima's tele-dermatology and Change Healthcare's tele-pathology imaging, augmented by artificial intelligence. The project will also offer the possibility to not only expedite urgent cases faster through e-referral and e-triage but will train artificial intelligence (AI) models on real-life clinical data, to create algorithms for clinical decision support and medical education.

Change Healthcare's imaging division, with its decades of experience in radiology and cardiology imaging, will develop an enterprise-wide Intelligent Imaging Network (IIN) to manage multiple kinds of images and associated complex clinical workflows. MetaOptima will apply its revolutionary DermEngine platform to be used by medical professionals and integrated into TELUS Health electronic medical records and the patient-centered collaboration platform of Careteam Technologies. The project will apply the exceptional care backbone and integrated research expertise of Providence Health Care and the advanced research capabilities of a BC post-secondary research institution.

The project is expected to roll out in different regions of British Columbia in multiple phases in 2019 and 2020. Once proven to address the needs of British Columbians, the intent is to expand coverage of the system to other parts of Canada and the world, particularly those with increased solar exposure and higher incidences of skin cancer.

This project will also help the medical community accelerate early diagnosis of skin diseases and substantially improve skin cancer patient survivability by earlier diagnosis and intervention. Additionally, it will serve as a basis for building similar end-to-end processes in other image-intensive service lines such as Cardiology, Radiology, Pathology, Ophthalmology, etc.

