



Mr. Brian Reardon, Chief Administrative Officer  
Central Okanagan Regional Hospital District  
1450 KLO Road  
Kelowna, BC V1W 3Z4

December 22, 2021

Dear Mr. Reardon:

**RE: CAPITAL FUNDING REQUEST FOR THE 2022/23 FISCAL YEAR**

Please find enclosed our annual funding request for Interior Health's (IH) next fiscal year for your approval. It is based on IH's capital budget, which has been approved by our Board. The budget is developed by prioritizing identified capital needs throughout our organization within the context of the Capital Investment Strategic Framework.

Additional investment in primary care remains a priority, as Urgent and Primary Care Centres and Primary Care Networks are established across our region. Energy efficiency and equipment that reduces carbon emissions will also be a focus in the upcoming years as IH supports wider government efforts to combat climate change. Patients will be better served with advanced Digital Health clinical innovations to enhance quality through risk mitigation and strengthening workflow efficiency. These technology driven solutions include Laboratory "middleware" to increase auto-verification reporting of lab tests, as well as automated dispensing cabinets for Pharmacy Services to manage medications.

The bulk of the capital budget, however, remains focused on investments that aim at maintaining services through replacement of clinical and non-clinical equipment and systems.

Please note that all capital initiatives over \$100,000 are subject to government approval.

For the 2022/23 fiscal year we are requesting funding for the following projects and equipment:

**1. Construction Projects over \$100,000**

**a. Pharmacy Upgrade at Kelowna General Hospital (KGH), Kelowna**

Essential renovations and upgrades are required for the KGH Pharmacy to bring the department in compliance with the new National Association of Pharmacy Regulatory Authorities (NAPRA) standards. Due to the urgency of this project, the engineering work began in fiscal year 2022, while the project delivery is set for completion in fiscal year 2023. The work will include upgrades to the Heating Ventilation and Air Conditioning systems and developing a hazardous drug storage room within the existing pharmacy to bring the space into compliance with NAPRA, IH Infection Control Standards, Accreditation Standards, and Workplace Health and Safety requirements.

**b. Boiler Replacement and Building Automation System Upgrade at Brookhaven Care Centre, West Kelowna**

This project entails efficiency upgrades to the boiler room which will include replacing the two existing main boilers with condensing boilers, as well as replacing building automation, and a kitchen make-up air unit. All three are approaching 30 years in service and there are limited spare parts and support, no remote access, no trending capability, and limited spare points for adding new equipment. While this project is a priority due to the age and reliability of the infrastructure, it will also produce co-benefits of carbon reduction and alignment with sustainability goals.

**c. Strathcona Heating Plant Replacement at Kelowna General Hospital, Kelowna**

This project will replace the existing steam boilers in the Strathcona building's heating plant with condensing boilers, adding heat recovery chillers thereby increasing the cooling capacity and recovering heat for use in the facility, and recovering additional heat from the existing lake water system (currently only used for building cooling). This initial phase focuses on transferring Medical Device Reprocessing and humidification steam loads to the Interior Heart and Surgical Centre steam plant, decoupling the domestic hot water from the steam load, and decommissioning/removing the first of the old steam boilers to make room for new equipment in future years. While this project is a priority due to the age and reliability of the infrastructure, it will also produce co-benefits of carbon reduction and alignment with sustainability goals.

**d. Chiller at Brookhaven Care Centre, West Kelowna**

This 1996 chiller has required significant repairs in recent years. This year it failed altogether, resulting in the need for a temporary rental unit until it is replaced. Loss of the cooling system has a negative impact on the patients, staff and temperature sensitive equipment. The scope of this project will be to replace the chiller and ancillary equipment with a higher capacity, more reliable, energy efficient system. Due to the urgency of this project IH had to proceed with procurement and construction in the current fiscal year.

**e. West Parkade Remediation at Kelowna General Hospital, Kelowna**

The KGH West Parkade is a 5-level structure completed in 2007. Some components indicate minor to moderate deterioration due to traffic, moisture, freezing and salt. Levels 4 and 5 are directly exposed to weather and require the most attention. This deterioration of the parkade is a safety issue for visitors and staff. The scope of work will address the highest priority components such as replacement of the membrane for levels 4 and 5, and remediation of central stairs issues.

**f. Downtown First Nations Health Centre – Planning, Kelowna**

This project will provide culturally integrated healthcare to serve the local indigenous community members in the Central Okanagan region, through development of a medical centre on the University of British Columbia (UBC) downtown Kelowna campus. Medical practitioners and care staff will provide assessment, treatment and support, along with traditional Elder/Healers who will share cultural knowledge and teachings, and engage people in practices, ceremonies and holistic ways of healing from trauma. Councillors and Social Navigators will be available to support individuals and families to take steps to recover from trauma and to assist them to access resources, remove barriers, complete forms and navigate systems.

Planning will explore integration of clinical, support and administrative areas in partnership with UBC on their multi-storey downtown university campus. Projection horizons and population cohorts will be reviewed during project development in consultation with the local First Nation partners.

**2. Construction Projects under \$100,000**

**a. Heat Exchanger Replacement at Brookhaven Care Centre, West Kelowna**

The heat exchanger that feeds the preheat coils in the air handling unit in this facility is over 27 years old, is in very poor condition, and has already required a patch repair. If this system fails it will result in the inability to run the supply air fan during freezing temperatures as well as potentially contaminating the boiler heating hot water loop with glycol.

**b. Autopsy Entrance Upgrade at Kelowna General Hospital, Kelowna**

The entrance door into the Dr. Walter Anderson Building autopsy suite requires widening as there is inadequate space to maneuver stretchers out of the elevator. This project will include a new door and required hardware.

### 3. **IH-Wide Digital Health (formerly IMIT)**

The ongoing advancement of the IH digital platform is a key enabler of IH's ability to support health service operations, enable key strategies, improve quality and patient safety, and incorporate innovation to improve effectiveness and efficiency. This year's Digital Health Investment Plan includes technology systems to enable primary and community care transformation, giving patients access to their information and digital appointment bookings, presenting clinicians and management with real-time actionable information, and updating infrastructure so patient, employee and financial information is protected from cyber attacks.

This project is an IH-wide initiative costing approximately \$9.5 million. The project's benefits are distributed equally across IH regions; therefore the cost allocation to each of the Regional Hospital Districts (RHD) is based upon population data using the PEOPLE 2021, BC Statistics. The Central Okanagan RHD's percentage ratio is approximately 27%. Claims on this project will be calculated using this percentage for the actual cost distribution.

### 4. **Equipment over \$100,000**

Please note that pictures shown below are for illustrative purposes only and may not depict the actual equipment to be purchased by IH, which will be established during the procurement process.

#### **a. Magnetic Resonance Imaging (MRI) Replacement and Addition for Kelowna General Hospital, Kelowna**

MRI is a safe and painless test that uses a magnetic field and radio waves to produce detailed pictures of the body's organs and structures. MRI's are used to diagnose a number of medical conditions, including abnormalities of the brain, as well as tumours, cysts and soft tissue injuries in other parts of the body. MRI scans are important diagnostic tools that do not use radiation. The scope of the project includes construction of a building expansion, installation of a new unit to replace the existing 2002 equipment and installation of an additional MRI for the site. The newly constructed space will meet the newest MRI safety requirements not available in the existing location.



#### **b. Computed Tomography (CT) Scanner for Kelowna General Hospital, Kelowna**

A CT scanner scans a patient by taking cross sectional images of the area of interest. As these images are digital, the computer can then use them to create a 3D image. This is replacing a CT scanner purchased in 2006 in the Medical Imaging Department. The renovation portion of the project includes upgrading existing space to meet current radiation safety and safe patient handling requirements. These changes are to improve ergonomics for the users and create a better patient experience. The new design will allow the technologist to utilize the latest features of a contemporary CT scanner and use it to its full potential.



#### **c. Equipment Management System for Kelowna General Hospital, Kelowna**

The equipment management systems within the five operating rooms in the Centennial Building at KGH are obsolete and require upgrading. The entire system encompasses booms, cameras, camera integration, video monitors and exam lights for each Operating Room (OR). Upgrading this equipment will help surgical staff to improve patient outcomes and increase efficiencies.



A phased approach will replace lights, light suspension, video monitors and equipment booms in all five ORs in Centennial in the first year. This phase is reflected in the current funding request. The remaining components (cameras and camera integration) will be addressed in a subsequent budget cycle.

**d. General Radiographic System for Kelowna General Hospital, Kelowna**

A Digital General Radiographic System adds high resolution digital detectors to an x-ray system which is made up of a table, overhead x-ray tube, and wall stand. The wall stand is like a vertical table that allows x-rays to be taken while the patient is in an upright position. The digital detectors are located beneath the surface of the table and/or wall stand. When the x-ray is taken, the image is immediately displayed on a computerized console for review before being sent directly to the Picture Archiving and Communication System (PACS) network. This is replacing a 2006 model in the Medical Imaging department.



**e. Laboratory Middleware for Various Sites**

Middleware is software that connects laboratory analyzers and the Laboratory Information System. This software enables communication and data management between those two complex environments. Middleware is a general term for software that "glues together" or bridges the gap between separate, complex programs or systems.

Middleware will allow IH laboratories to enhance and streamline operations. This software streamlines quality control processes that ensure the integrity of laboratory results. The middleware provides the opportunity to integrate and automate repetitive tasks. It is very customizable and adaptable, and will allow IH laboratories to easily incorporate new technology and equipment.

IH requested \$480,000 from the various RHD's in December 2018 from an original project cost of \$1.2M and your RHD contributed \$127,000 on bylaw #234 towards this project. Since the original request IH entered into a lengthy vendor selection process and now requires a budget increase of \$2.3M for the software and implementation costs across the whole of IH; the Central Okanagan RHD's portion of the increase is \$248,400. Until the actual vendor selection was completed IH was unable to budget accurately for the technical requirements of this project.

**f. Nurse Call for Three Links Manor, Kelowna**

This project is to replace the 2002 Austco Nurse Call system in this residential care facility to a Rauland Responder 5000 with integration to Vocera. The current manufacturer is located outside of Canada, and it has been difficult to obtain parts and support. This new system will align with supportive functionality that is being used in long-term care sites across IH.



**g. Medstation – Additional for Kelowna General Hospital, Kelowna**

Automated dispensing cabinets (ADC) for medications were first introduced in IH in 2006. This technology has brought improvements in patient safety and workflow that have been well supported by both nursing and pharmacy staff. This purchase of ADCs is additional to our current inventory of medstations and are replacing manual drug distribution used within a number of departments at this site.



**h. Ultrasound, Cardiac for Kelowna General Hospital, Kelowna**

These machines are used in the medical imaging department to generate images of internal soft tissue. By sending and receiving sound waves, the system can generate a quality image of internal organs, fetuses and free fluids such as internal bleeding. The cardiac ultrasound machine also generates images of the heart and major blood vessels. By sending and receiving sound waves, the system produces quality still images of the heart to examine structure and video clips that show cardiac function. This type of ultrasound study is known as echocardiography. This ultrasound machine will include Cardiac PACS functionality. This is replacing a unit purchased in 2009 in the Cardiology Department.



**i. Monitoring System, Physiological for Kelowna General Hospital, Kelowna**

Physiological monitoring systems consist of a bedside monitor connected to a central system and the patient. This system continuously monitors the patient's electrocardiogram, blood pressure, temperature, and blood oxygen levels among other vital signs. This information is also sent to a central system, which displays all of this information for each patient in real time at the nursing station. Alarms sound to alert clinicians if certain parameters fall outside of acceptable ranges, and trends are recorded to help clinicians assess a patient's progress. The new system is replacing a 2011 unit in the cardiology department.



**j. Five-Ton Truck for Regional Warehouse, Kelowna**

This five-ton truck is used for short-haul deliveries and non-perishable goods including the transfer of medical supplies from the Kelowna Regional Warehouse to other IH sites and other inter-facility supply transport. This vehicle will be replacing a 2016 unit.




**5. Equipment under \$100,000 (Global Grant)**

We are requesting global funding for equipment that costs between \$5,000 and \$100,000.

A financial summary of our funding requests is provided in Appendix 1. We would appreciate it, if you could submit the requests to your Board for consideration. Please advise us of the meeting date when they will be discussed to enable us to have IH representatives attend and to answer questions that may arise. If the requests should receive approval, please send Laura Dalton, Director, Capital Finance copies of the relevant bylaws for our records.

We thank you for your on-going support of our capital initiatives. If you require further information, or if you have any questions or concerns, please contact Dan Goughnour, Corporate Director, Business Operations or me directly.

Sincerely,



**Sylvia Weir, VP & Chief Financial Officer**  
Interior Health Authority

/at

Encl. Appendix 1 ~ Summary of Regional Health District Funding Request for 2022/23

cc: Gail Given, Chair, Central Okanagan RHD  
Lyle Smith, Director of Financial Services, Central Okanagan RHD