



IDENTIFICATION

Department	Position Title	
Health and Social Services	Facility Planner, Biomedical	
Position Number	Community	Division/Region
49-13900	Yellowknife	Infrastructure Planning / HQ

PURPOSE OF THE POSITION

The Facility Planner, Biomedical is responsible for the planning, implementation, monitoring and ongoing protection of all aspects of Biomedical Technology and infrastructure throughout the Northwest Territories (NWT) health and social services (HSS) system.

SCOPE

Located in Yellowknife, the Facility Planner, Biomedical (Planner) reports to the Manager, Health Technology Planning, and is required to research, develop and adapt Biomedical Technological policy and engineering specification with a high degree of professional engineering judgement that drives a consistent technology utilization approach that suits the constraints of delivering patient care in the unique logistical, technical, and geographic realities of the NWT.

Health technologies are essential to the delivery of safe, effective patient and client care by practitioners in the Health and Social Services (HSS) sector. They include all medical equipment and related information and communication systems required to provide HSS services and deliver patient and client care in inpatient and outpatient settings, including intensive care units, labour and delivery units, emergency departments, operating rooms and specialist procedure rooms, diagnostic imaging services, laboratory services, pharmacy services, medical device sterilization services, rehabilitation services, public health services, home care services and long term care services.

The Planner provides advice to the Department of Health and Social Services (DHSS) and three health and social service authorities (the Northwest Territories Health and Social Services Authority (NTHSSA), the Hay River Health and Social Services Authority (HRHSSA) and the Tlicho Community Services Agency (TCSA)). This position is responsible for the development and monitoring of a multimillion dollar capital and O&M budgets, the support, monitoring and



evaluation of facilities in three (3) health and social services authorities of management, and the planning and monitoring of over seventy (70) health and social services facilities in all the communities in the NWT. Specialized engineering understanding covers biomedical, electrical, civil, mechanical, information systems, and architectural fields.

This position works extensively with representatives from the Department, Boards, Communities and Private sector. The work is conducted to a large extent in a team environment, including Health and Social Services, Boards, Department of Infrastructure, and many other stakeholders, often requiring travel to regions and communities. The position does retain overall authority and responsibility for all final design and delivery decisions. The incumbent is required to monitor projects in any or all boards and communities at any one time, as well as simultaneously working on several major planning projects.

A significant challenge faced by governments is that mainstream organizations, like health and social services, cannot be separated from the legacy of colonialism and anti-Indigenous racism in Canada. In health and social services settings, present day anti-Indigenous racism or systemic racism, impacts access to services, quality of care and health outcomes for Indigenous peoples. This also results in a system that inherently privileges the ideas, needs and norms of the dominant white settler population, including the privileging of western knowledge over Indigenous approaches and ways of knowing. As such, it is critical that the Government of the Northwest Territories (GNWT), DHSS, Division and the incumbent put in all efforts to eliminate these issues and offset their consequence.

The HSS system is committed to addressing anti-Indigenous racism and promoting cultural safety and anti-racism. DHSS staff are expected to honour and promote a culturally safe and anti-racist environment at all times, and to interact with clients, families, community members, partners and colleagues in a relationship-based approach. This involves being tactful, respectful, self-aware, and humble in order to develop and maintain ongoing and trusting relationships. Facilities have long been planned without the participation of the Indigenous populations they serve. With a population of 51% Indigenous Peoples in the NWT, this includes utilization of all Health and Social Services facilities in our inventory, with a vast majority in those outside of Yellowknife.

The work of the Infrastructure Planning Division includes recognition that government facilities, such as residential schools and Indian hospitals, have caused significant trauma for Indigenous peoples. The incumbent shall have an understanding of this dark period of Canadian history, as well as the deleterious health outcomes it has caused to the Indigenous populace. The physical design of facilities can perpetuate harm as they are reminders of colonial and racist institutions for Indigenous peoples. Ensuring that facilities and the technologies used within are developed in a culturally appropriate manner and facilitates a welcoming and culturally safe environment. This builds on the evidence that the physical space can itself be medicine.



The Planner provides engineering and system level support for Medical Technology on 3100+ Health Canada classed devices and is the DHSS expert in the area of Biomedical Engineering and provides specialized and unique expert advice to the management of all Biomedical Technology. The incumbent provides direct input into capital planning for Biomedical Technology that directly affects the procurement and operational costs of health care facilities. Biomedical technology is both equipment and facility based with a high degree of program impact. Ultimately, this position is the territorial authority for the replacement and enhancement of Biomedical Technology, which has direct impact on the safety and comfort of patients.

The incumbent experiences pressing client imposed deadlines and technology failure and, as such, the consideration of the impact on the patient's well-being.

This position requires the incumbent to routinely travel (potentially 10% of the time, dependent on the business and procurement cycle) to several remote Northern Communities in small planes or vehicle and may experience extreme weather conditions.

RESPONSIBILITIES

- 1. Develop, implement, evaluate and revise an ongoing NWT health and social service system biomedical infrastructure plan in order to contribute to the Department's Capital Planning, Business Planning and Program Review processes, in order to ensure an adequate, appropriate and sustainable Biomedical infrastructure is available in the NWT for the delivery of health and social services.**
 - Develop one to three year capital plans for biomedical equipment, in conjunction with the Departmental Business Planning Process, outlining the capital requirements.
 - Develop Long Term (five and twenty year) capital plan based on identified program and technical need and available funding.
 - Prepare reports to management providing recommendation of plans and alternatives for achieving the long term "vision" for the NWT HSS infrastructure system.
 - Prepare reports analyzing the biomedical infrastructure requirements and financial impact of new and /or changing programs or legislation.
- 2. Develop and update Capital Standards and Criteria for all health and social services bio-medical equipment to ensure that there is appropriate, affordable and equitable infrastructure across the NWT health and social services system.**
 - Research and evaluate the applicability of standards from other jurisdictions and adapt accordingly.
 - Consult with user groups and program managers to determine program requirements.
 - Develop costing models to apply to and determine the appropriate and affordable capital standards.



- Interpret and apply national standards and legislation (example, *Canada Health Act*) as applicable.

3. Biomedical Technology Project Management.

- Manage Biomedical Technology projects: e.g. clinical device, new facility support and system implementation including evaluation, contract development, receipt, installation and training.
- Serve as focal point of responsibility for specialized and general areas related to the success of projects.
- Develop and maintain effective relationships with clinical and administrative customers, providing appropriate and optimal levels of customer service for safe and effective management of medical technology.
- Provide expert biomedical advice to mechanical, electrical, civil, computer and architectural projects or issues.

4. Coordinate and evaluate an inventory and technical/functional status of all health and social services biomedical equipment in the NWT HSS system to provide an information base for capital planning decision making and to anticipate future capital requirements.

5. Territorial Biomedical Program Planning

- Refine and develop new and unique system and automated tools to progressively manage Biomedical Technology assets and define replacement priority and replacement cost.
- Provide engineering advice and direction to Departmental and Authority personnel.
- Provide pro-active risk management advice
- Responsible for the DHSS system's compliance with regulatory requirements and accreditation standards.
- Responsible for DHSS policies and procedures and standards relating to the use and/or service of health technology.
- Follow health technology trends and ensure appropriate health system executive are briefed concerning significant changes. Ensure the internal departmental processes adapt to meet these health technology trends proactively.
- Represent DHSS on committees for the development or revision of National Medical Technology standards.

6. Procurement.

- Develop all specifications for the procurement of Health Canada classed medical devices.
- Develop tender and request for proposal documents through an understanding of financial administration, capital planning process, tendering, contract administration, and general Government procurement policies and directives.



- Develop and direct occupancy plans for the receipt and implementation of Medical Technology including commissioning and training.

WORKING CONDITIONS

Physical Demands

No unusual demands.

Environmental Conditions

Exposure to electrical, chemical, mechanical, thermal and biomedical hazards (on-site planning in health facilities, equipment installations, commissioning/other implementation activities).

Sensory Demands

No unusual demands.

Mental Demands

The incumbent may be required to travel approximately five days per month.

KNOWLEDGE, SKILLS AND ABILITIES

- Knowledge of principles and theories of other diverse specialty and professional engineering fields (e.g., civil engineering, mechanical engineering, electrical engineering, computer engineering).
- Project management knowledge and skills of health facility planning theories and principals.
- Knowledge in the areas of health facility functional programming, facility planning, architecture, engineering and/or design, in a health and /or social services setting.
- Knowledge of and/or the ability to acquire and apply knowledge of the people, culture, government and HSS in the NWT and its political and business environment.
- Oral and written communication skills to convey or solicit information related to projects and standards through a variety of for diverse audiences.
- Computer skills including spreadsheet, database and statistical applications.
- Ability to ensure DHSS system's compliance with regulatory requirements and accreditation standards.
- Ability to develop costing models to apply to and determine the appropriate and affordable capital standards.
- Ability to convey difficult concepts and engineering advice to a non-technical audience.
- Ability to develop tender and request for proposal documents.
- Ability to manage diverse activities that are often only broadly or generally defined.
- Ability to organize time and resources efficiently.

- Ability to acquire an understanding of health and social programs and services, including knowledge of program requirements, workflow and patterns, facility technical/design standards and prevailing trends and practices.
- Ability to prioritize actions in order to respond to numerous, diverse challenges and demands; and the ability to change approach as required to achieve intended outcomes.
- Ability to commit to actively upholding and consistently practicing personal diversity, inclusion and cultural awareness, as well as safety and sensitivity approaches in the workplace.

Typically, the above qualifications would be attained by:

A degree in Biomedical or Clinical Engineering fields and six (6) years of relevant Biomedical/health technology planning experience, including one (1) year of experience in a cold/remote location.

Equivalent combinations of education and experience will be considered.

ADDITIONAL REQUIREMENTS

The incumbent is required to have PMP certification or be able to obtain it.

Position Security

- ☒ No criminal records check required
- ☐ Position of Trust – criminal records check required
- ☐ Highly sensitive position – requires verification of identity and a criminal records check

French language (check one if applicable)

- ☐ French required (must identify required level below)
 - Level required for this Designated Position is:
 - ORAL EXPRESSION AND COMPREHENSION
 - Basic (B) ☐ Intermediate (I) ☐ Advanced (A) ☐
 - READING COMPREHENSION:
 - Basic (B) ☐ Intermediate (I) ☐ Advanced (A) ☐
 - WRITING SKILLS:
 - Basic (B) ☐ Intermediate (I) ☐ Advanced (A) ☐
- ☐ French preferred

Indigenous language: Select language

- ☐ Required
- ☐ Preferred