

Epidemiologists leverage data to identify patterns and correlations in ER visits

ER visualisations represent a new opportunity to improve healthcare work, and patient comfort and care

Overview

Having recently implemented CHIRPP (Canadian Hospitals Injury Reporting and Prevention Program), epidemiologists at the client endeavoured to leverage the wealth of information collected to identify patterns and correlations in ER visits.

This engagement saw close collaboration between Raven Bay and health service professionals in a government health care primary acute care facilitator to develop an ER visualization proof of concept.

Industry: Healthcare
Location: Canada
Size: 27,500 m2



Company Bio

This Rural Canadian Hospital serves the community with 100 in-patient beds and 24-hour ER

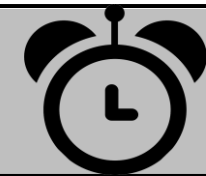
The Challenge

The CHIRPP data represented a comprehensive picture of every patient visit to an ER. With such a wealth of information, the project stakeholders at the hospital needed help quickly identifying and focusing in on the most compelling stories.

In addition to the huge range of opportunity for insight, only two weeks were available to build the proof of concept. The engagement represented a unique confluence of challenges; a huge range of information but very little time to explore and develop the stories it contained.

2 weeks

2 weeks from project kickoff to custom human body and geographic visuals



On time and on budget

20+

Over 20 patient attributes included in graphical visualisations

The Solution

With only two weeks to fully realize and visually represent insights into CHIRPP data, daily iterations were executed via workshops and demonstrations to the project's immediate stakeholders. A high level of engagement meant ideas were quickly vetted. This allowed for constantly evolving requirements and visualization design that best represented what the information available supported.

Healthcare trends carry a host of unique attributes, from injury trends to geographic factors behind ER visits. Appropriate representation of these trends required tailored visuals to tell the full story. Custom visuals were developed in Power BI to represent injury data on a human body diagram, allowing stakeholders to identify injury trends and quickly resolve the full picture. Additionally, regional data was represented across the specific regions within the Northwest Territories in a tailored map visual.

The Results

A Power BI visualization package was delivered that demonstrated key trends and facilitated powerful analysis of ER visits, including custom human body and geographic visuals.

The project culminated in a presentation to a large group of senior stakeholders at the Hospital and beyond; the insights and their method of representation in Power BI drew interest from health care stakeholders across Canada

“Today marks a milestone moment for our health and social services system, as well as for each and every person who has worked on this project over the past 4 years. This new hospital represents a new opportunity to improve the way we work, to improve the comfort and care of our patients and clients, and to advance our broader work on health system transformation as we go forward.”

-Chair of the Health and Social Services Authority Leadership Council