

Helping Hands Toronto - by the McMaster Dream Team

ECCE App Challenge 2018

Team Members

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Mission Statement

Life in Canada's largest city is rarely easy, with one in five Toronto residents currently living in poverty. For those struggling to make ends meet, it can be difficult to secure all necessities of western life such as sufficient nutrition, educational resources, and shelter on a daily basis. Currently, many government and private services exist in Toronto that aim to assist low-income residents in one or more areas. The issue is that all too often those in need do not realize these services exist, let alone where to access them until their situation becomes dire.

The goal of **Helping Hands Toronto** is to create an easy-to-use tool that consolidates community resources for at-risk or lower-income families in Toronto, based on open geospatial data hosted by the city. These resources include public libraries, licensed child-care services, youth services, supportive housing locations, and more (for a full list, see **Data Sources**). This app is a convenient interface for displaying the various available services and their locations, identifying and filtering amenities within a given radius of a user-defined location as well as provide directions from a location to a desired facility. Users may also locate services via a search function according to a number of attributes including name, street address, and service type.

App Characteristics

Helping Hands Toronto aims to assist at-risk individuals through providing an easy way to explore the locations and details for many of Toronto's social services and displaying them in a single, easy to use app.

The web app includes a *Near Me* function that allows users to pin their location on the map and display all service facilities within a search radius of their choosing. From there, users can filter through support types based on their needs and read specific facility information by clicking the map icons. Users can also acquire walking or driving directions from their location to a selected service center or specified locations through their name, address, or other characteristics using the *Query* widget.

Though any of these specific locations could be found using a Google search, this app lets you explore any of the 9 different resource types, and displays important information that may otherwise be difficult to locate elsewhere.

Data Sources

This app was designed using the Developer Edition of the ArcGIS Web App Builder. All data used was obtained from the [City of Toronto's open data portal](#). Feature layers were either downloaded directly as point shapefiles, or converted to points from CSV files using their listed latitude and longitude coordinates. The different feature layers representing community resources used in the app are:

- Public libraries
- Long-term care facilities
- Rent banks
- Licensed child-care services
- Air-conditioned public places
- Homeless shelters
- Youth services centres
- Drop-in locations
- Supportive housing locations

For some point layers, key attribute information such as names, email addresses, websites, etc. were either unavailable or formatted incorrectly. This issue was corrected using Arcade expressions with conditional logic.

Disclaimer: *Helping Hands Toronto* is not affiliated with any of the City of Toronto organisations or social programs referenced within the app. This application was created strictly for educational purposes in conjunction with the 2018 ECCE App Challenge.

Widgets Used

The web app interface uses the following widgets:

- **Splash screen:** to introduce the user to the app
- **Share:** gives a shareable link to the web app on ArcGIS Online
- **Layer List:** to let the user control which layers are displayed
- **Legend:** to show the user which icons represent what
- **Query:** to search for specific resources
- **Nearby:** to find resources within a specific distance of and obtain information and driving directions
- **Directions:** to get walking directions for a specific resource