



WEATHERLOGICS TRANSPORTATION PILOT PROJECT

Why did we take on this project?

Road safety is of critical importance to all Canadians. In a large country like Canada, many of us spend countless hours on the road each year. And as a winter country, our roads often become treacherous during severe weather.

Aviva Canada launched their “Take Back our Roads” Initiative with the key objective to improve road safety in Canada. In early 2021, we developed a partnership with Aviva Canada and Highline Beta to run a pilot program to use weather data to help improve road safety in Canada. Highline Beta was a facilitator of the pilot program and provided resources, so that the pilot could go ahead in the winter of 2021-22. Our technology was trialed alongside other road safety technologies from MicroTraffic, PreAct, LifeSaver, Numina, and Autoguardian.

Who were the participants?



During our pilot project, we were excited to work with six transportation companies from across Canada. Our participants included Arnold Bros Transport Ltd, Penner International Inc, TransX, Eassons Transportation, Connors Transfer, and C.A.T.

These transportation companies used our technology in their operations to advise drivers and customers about severe weather conditions. Throughout the winter they provided data and completed user surveys.



What were our goals?

We had two simple objectives for this pilot program:

1. Test our new road weather technology in real world scenarios within the transportation industry
2. Measure how much road weather information can improve road safety and fleet performance

Road Safety Statistics

Between 1999 and 2017 there were



1.23 Million Collisions

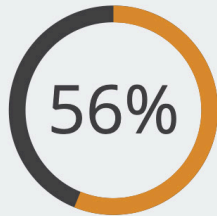


in Canada during adverse weather*

~670,000 Injuries



~8,400 Fatalities



From 2015 to 2018
of fatal crashes were on
Rural Roads

\$16,000

The average weather-related accident costs a trucking company sixteen-thousand dollars



*Rain, snow, freezing rain, ice pellets, hail, low visibility, or strong winds
Statistics from the National Collision Database (Transport Canada)

A company will experience approximately

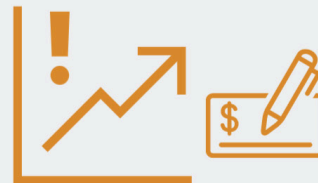


10
weather-related
accidents

per
100 trucks
on the road
each year

For an fleet with
300 trucks,
weather-related accidents
cost nearly

\$500,000
per year



EXPENSES

What new technology did we develop?

Weatherlogics developed unique road weather prediction technology that leverages artificial intelligence, advanced weather modeling, and meteorologist expertise to predict road and weather conditions across North America. The data is provided through a web-based and mobile-friendly app that can be used by transportation office staff and drivers.

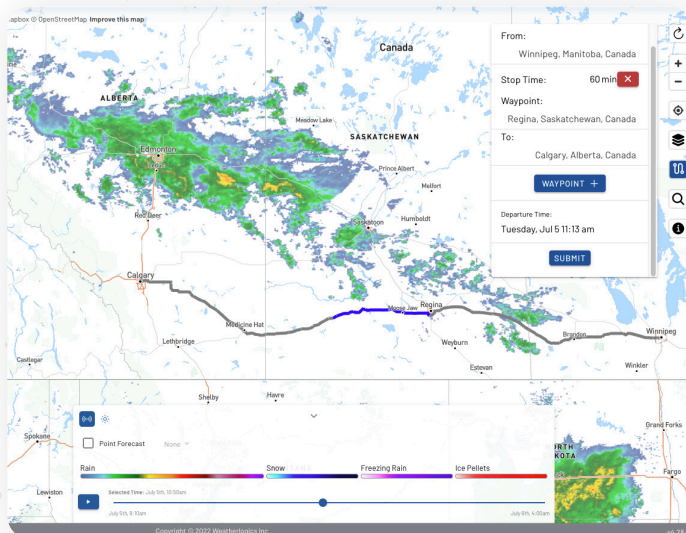
What is unique about the technology?

By focusing specifically on road conditions, the impact on driver safety could be more accurately measured. Traditional weather forecasts might say it's going to rain or snow, but this new technology was able to predict if roads would become snow-covered or icy.

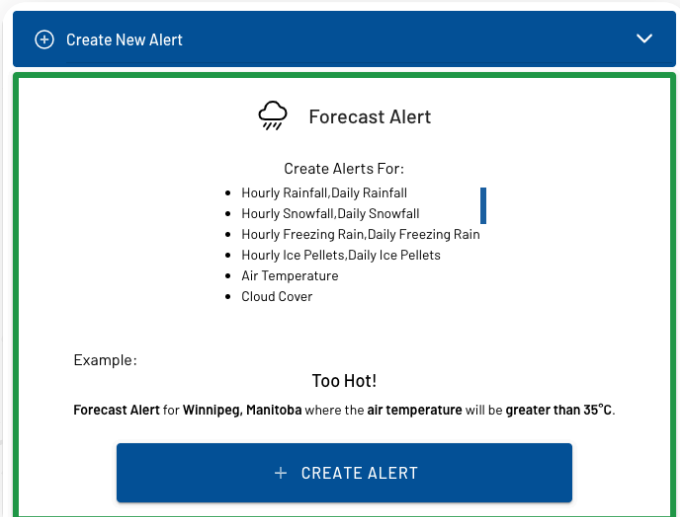


The Weatherlogics App

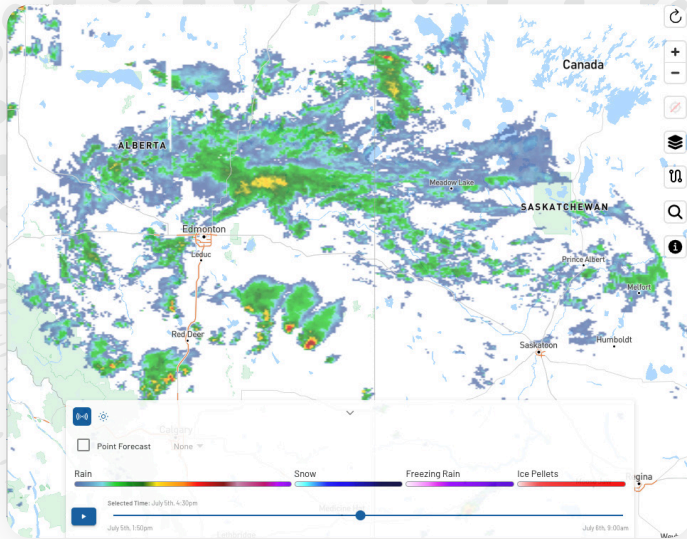
The application allowed users to view a vast array of data in one convenient place. The app included real-time road conditions, highway cameras, weather observations, radar, and fleet locations. Also included was the ability to view future road conditions and set custom weather alerts based on specific routes or locations.



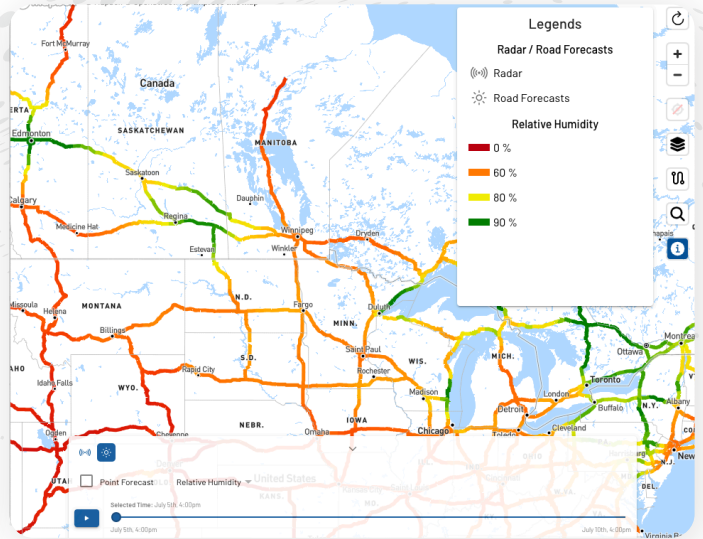
Interactive Map: Custom Route Creation



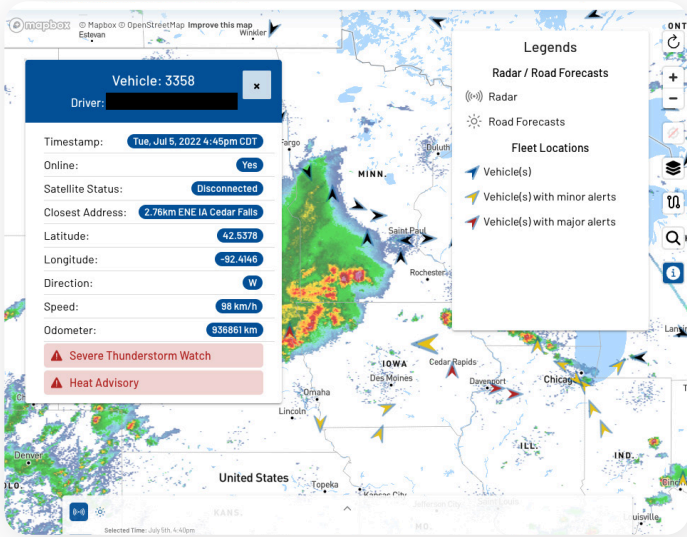
Custom Alerts: Forecast, Current Conditions, Route



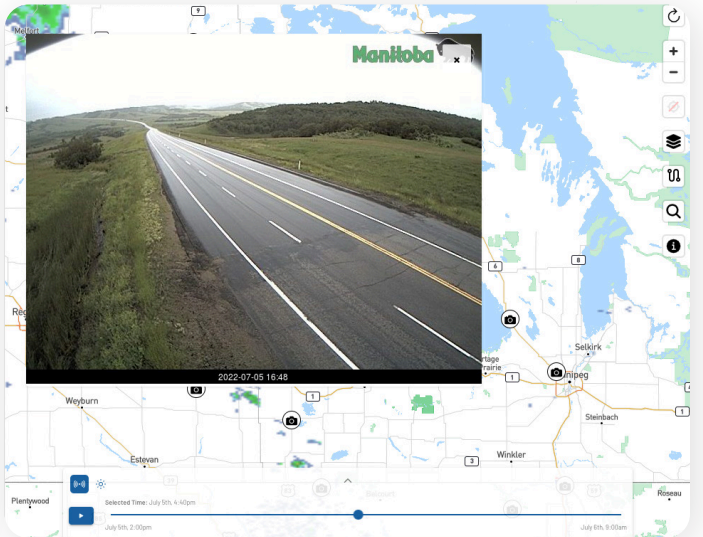
Interactive Map: Radar



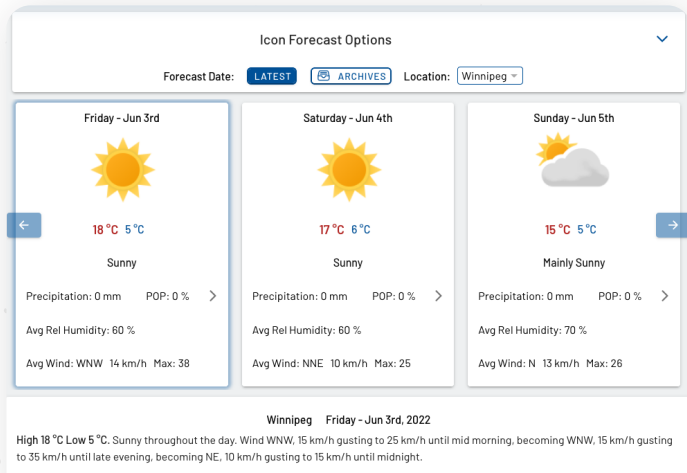
Interactive Map: Road Condition Forecast



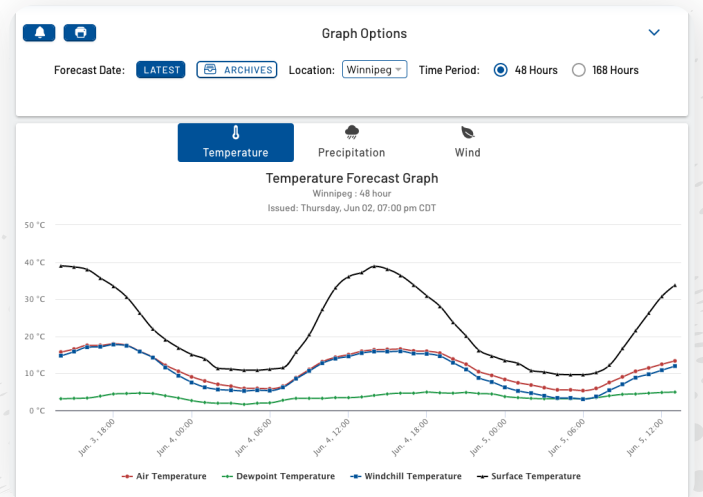
Interactive Map: Fleet Data



Interactive Map: Road Cameras



Icon Forecast: 5 Day Forecast



Interactive Graphs: Temperature

What improvements did participants note?



SAVINGS

\$100,000



Our users reported a 20% reduction in weather-related accidents, saving approximately \$100,000 per year for an average fleet of 300 trucks

20%↓
decrease in
**weather-related
accidents**

2021-2022 Winter Weather Conditions

The winter of 2021-22 was severe across Canada. In Winnipeg, it was the third snowiest winter on record. While in Toronto, the third largest snowstorm since 1937 occurred in January 2022. Extreme cold also gripped western Canada for much of the season.

How will we scale the technology?

The success of this new technology in the transportation industry holds great promise for the future. Severe weather is one of the most significant hazards faced by drivers and also one of the hardest to predict. With our new road weather platform, this previously unhandled risk, can now be managed more effectively!

Future Improvements

As the technology continues to mature, more improvements will be made. In the future, we hope that individual trucks can automatically be tracked, and that artificial intelligence can produce truck-specific warnings before severe weather strikes. By continuing to work with the transportation industry, we can make great strides in improving road safety for all users.



www.weatherlogics.com 

info@weatherlogics.com 

1-877-852-4500 