

INTRODUCING THE **XLOAD**

SUPERIOR TANK CAR LEVEL
MEASUREMENT SENSOR

- ✓ REDUCE TRANSPORTATION COST
- ✓ INCREASE THROUGH-PUT
- ✓ REDUCE PROCESS TIME
- ✓ INCREASE SAFETY
- ✓ ELIMINATE SPILLS
- ✓ IMPROVE FLEET UTILIZATION

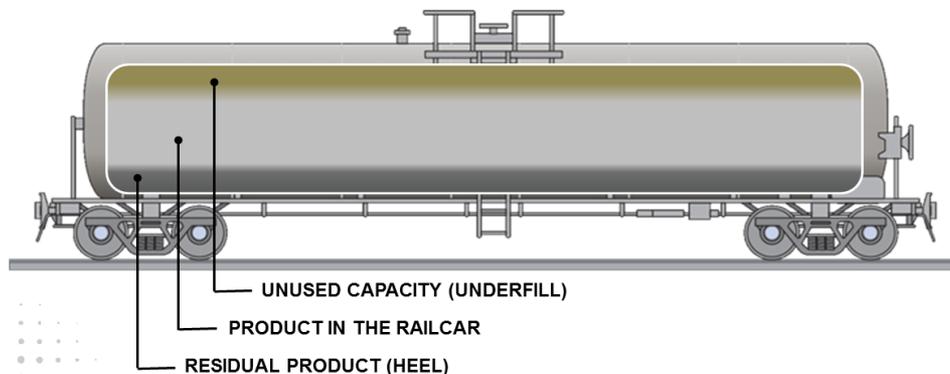


- ✓ ADVANCED TECHNOLOGY
- ✓ EASY OPERATION
- ✓ INSTANT DATA

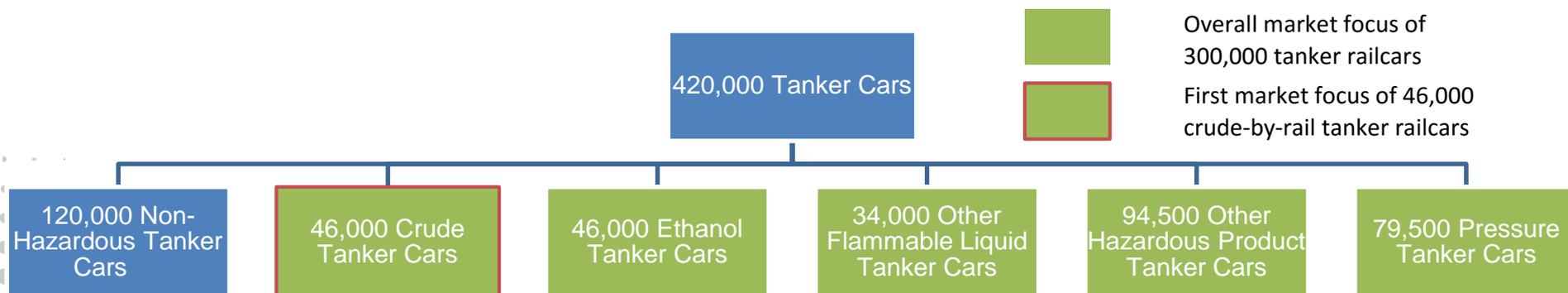
Improved Commodity Monitoring for Rail Safety, and Operations and Logistics Excellence

TARGET MARKET REQUIREMENTS

Rail tanker car customers require improved safety and operations and logistics efficiency in the loading, transit and unloading of tanker railcar commodities



There are numerous challenges with safely maximizing the amount of commodities loaded in and unloaded from tanker railcars and monitoring the commodity in transit



XLOAD DELIVERS SUPERIOR PERFORMANCE TO DELIVER EXCEPTIONAL SAFETY, LOGISTICS AND OPERATIONS RESULTS

How XLOAD Works:

1. Affixes to the fittings plate and travels with the tanker railcar; safe RF waves emitted inside of the railcar,
2. RF waves reflecting level, volume, temperature and other product data is captured by XLOAD's custom-engineered antenna and hardware,
3. Captured data is deciphered in milliseconds by XLOAD's proprietary software algorithms, specific to the make and model of railcar,
4. Real-time data is presented to local terminal operators on the sensor's LCD display and to their mobile devices through wireless local area network communications,
5. Web-based inventory and railcar data, while in transit and in terminals, is presented to remote operators, traders, operations and logistics managers, first responders, and other relevant stakeholders through constant wireless wide area network communications (Q4/2016).



More Sensor Advantages:



XLOAD

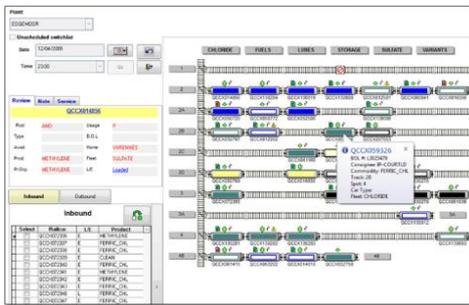
- ✔ Real time measurement and reporting of heel, loading and unloading levels, volume and temperature
- ✔ Effective for most hazardous, flammable and non-classified tanker railcar liquids
- ✔ Able to install and use on most tanker rail cars
- ✔ Intrinsically safe and FCC certified, pending AAR certification



XLOAD IMPROVES OPERATIONS & LOGISTICS PERFORMANCE



- ✔ Increase the throughput of product loaded into tanker rail cars
- ✔ Minimize the transportation cost of every liter, gallon, barrel or metric tonne of product shipped by tanker rail cars
- ✔ Reduce the process time necessary to load, unload and ship tanker rail cars



- ✔ Eliminate the cost and delays of spills
- ✔ Boost the utilization of tanker rail cars
- ✔ Lessen the costs of product reconciliation, and improve loss management



Initial TRIG pilot trials are proving a 3-400% return on leveraging the sensor technology to improve throughput and reduce transportation costs

- ✓ Eliminate exposing loading and unloading operators to hazardous products and gases inside of tanker rail cars
- ✓ Reduce loading overfills, spills and over weight and unbalanced tanker rail cars
- ✓ Reduce the risk to people and property through real-time tracking of the location of hazardous products inside of tanker rail cars
- ✓ FCC and intrinsically safe certified, pending AAR certification



THANK YOU

Peter Stunden,
pstunden@transrailinnovation.ca,
403-612-6395