

## Case Study – Fuel Management System at Cummins India Ltd.

From 2001, Fluidyne Control Systems has been supplying flowmeters, Tanker Unloading Systems and to Cummins India Ltd. for their internal Fuel Management. Fuel Consumption Monitors is a one of the most used instruments with their various DG sets across India.

Part of a landmark decision of 2017, CIL collaborated with our company for precision measurement Fuel Consumption Monitors for Railway Power Car Application. Up till 2020 we supplied more than 2000 FCMs only for Railway Power Car Application.

Fluidyne FCM is suitable for all types of DG sets including Cummins PT Based Engines which removes hot air from fuel in return line.

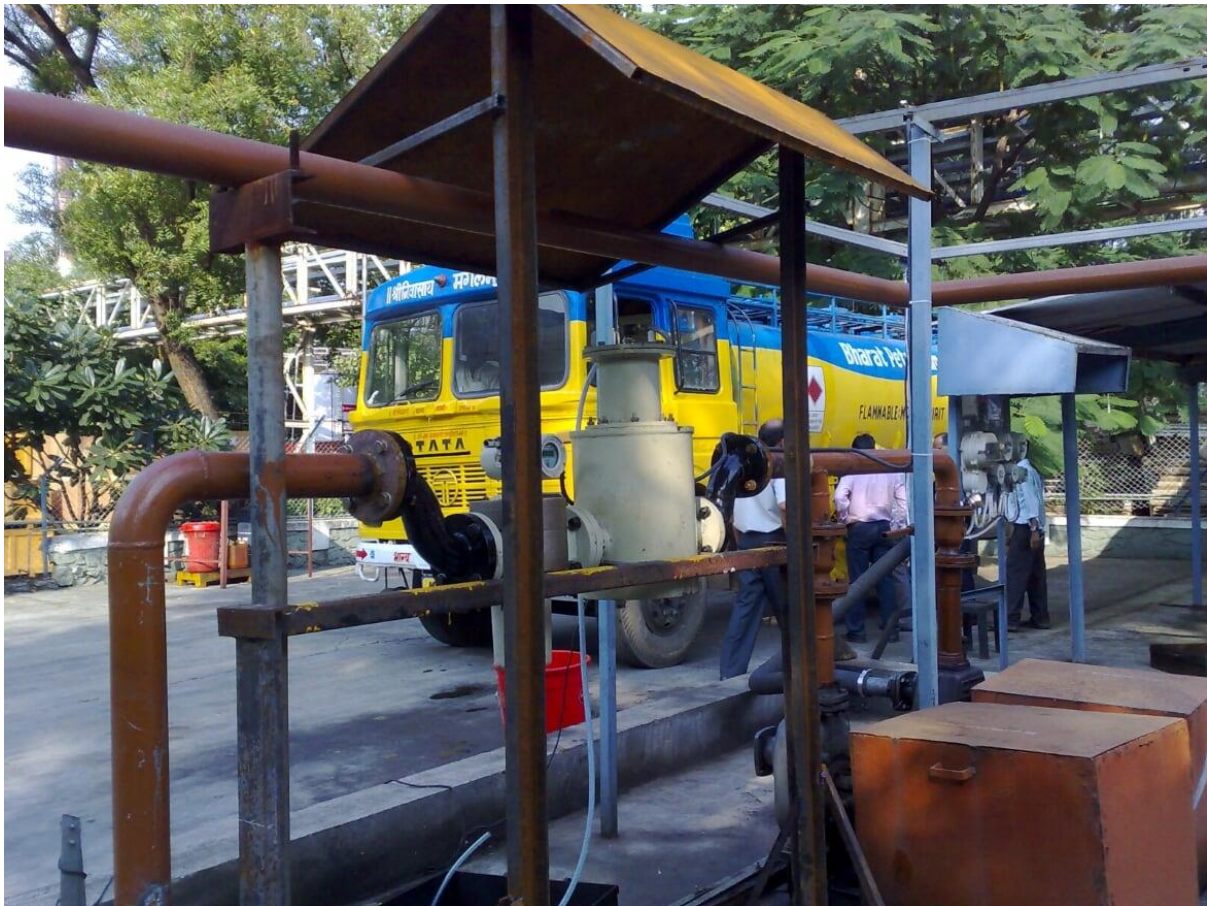
The crux of the FCM is the PD Flowmeter which provide ideal flow measurement solution when precision flow sensors are required to be interfaced with Industrial control and automation systems. A choice of analog, frequency and serial data outputs is ideal for all industrial applications



Fig. Installation of FCM on 500 kVA Cummins PT Based Engine, Railway Power Car

The Fuel Consumption Monitoring Systems are used for inline fuel monitoring and fuel consumption which includes Inlet line, Outlet Line and Return line while P D flowmeters are used to measure Inline flow between Main Storage tanks to Buffer tanks. FCMs are selected on the basis of –

1. Make of DG set
2. Model of DG set
3. KVA rating of DG set



The Tanker Unloading System has proved to be dependable method of unloading diesel and engine oil in Cummins. Our TUS is removes air from liquid and PD flowmeter measures pure liquid which is very important for statistical calculations and audit purpose. All our systems are easy to use, require minimal maintenance and durable life and on time service support.

Positive Displacement meters are used in R&D and testing divisions and a host of different outputs such as Local Display, 4-20mA, Remote Rate Indicator, RS485 Modbus Output, Bluetooth, RF transmitter with Cloud Computing data access can be provided.



Fig. Positive Displacement Flow meter used to measure inline flow