

Gilbarco Veeder-Root – DEF Dispenser



Technology with a human touch.

Diesel Exhaust Fluid (UREA)

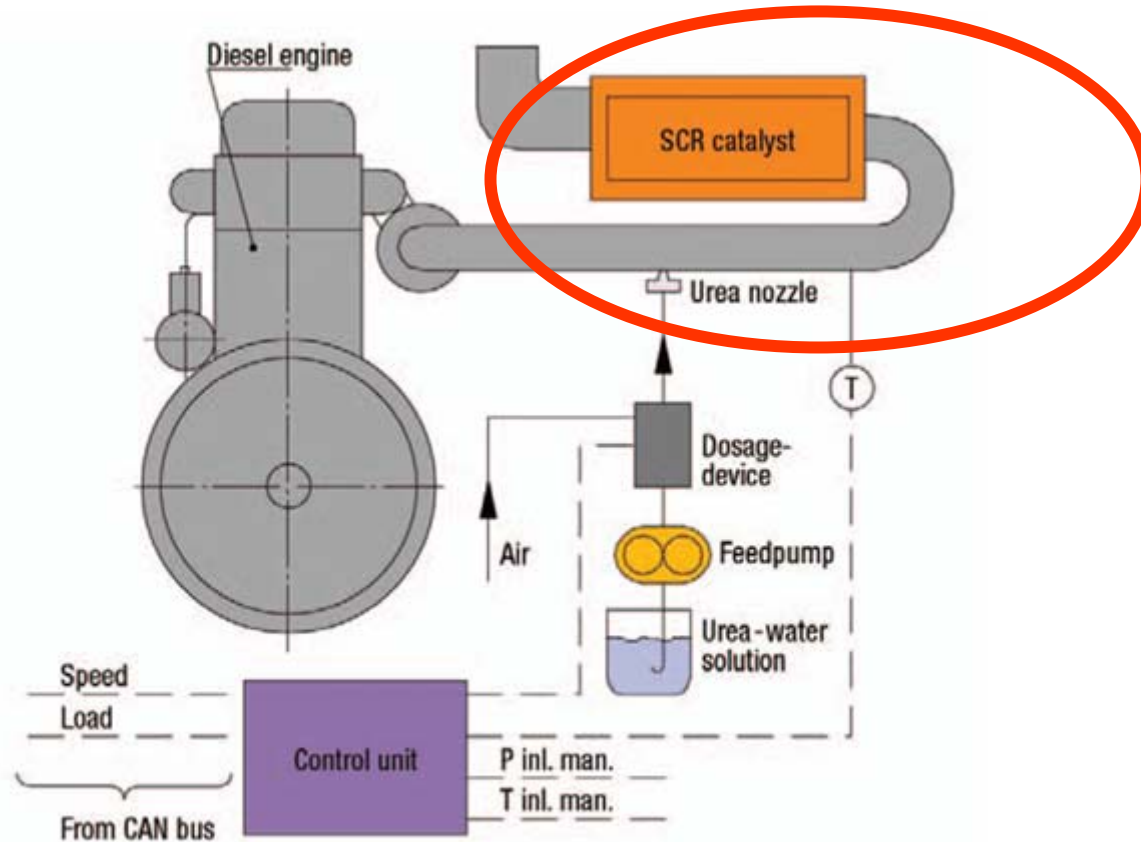


Figure 4: Typical SCR system configuration

Gilbarco DEF Dispenser

Innovation Leadership

- Shipping since 2006
- Built-in heaters

Outstanding Quality

- Unique meter
- Zero corrosion risk
- Rugged hose cabinet design

The Only Fully-Integrated Supplier

- Standard 2-wire Gilbarco protocol
- Proven payment technology



Gilbarco DEF Dispenser

Above ground skid tanks

- Heated storage cabinet
- Heated dispenser
- Pump included in cabinet








Below ground tanks

- Dispenser on standard island



Key Issues for US Market

Issue		Response
Product freeze point		Specialized heater design
Corrosive nature of Urea		Unique components, stringent testing
UL regulations		Working with regulatory contacts
Weights and Measures		Working with regulatory contacts
Service and Support		Extensive training with 4,000 technicians

Backup

Diesel Exhaust Fluid (UREA)

- New EPA Vehicle Emission Standards for Diesel Engines go into effect in 2010
- Selective Catalytic Reduction (SCR) Technology being deployed by over 75% of engine manufacturers to meet requirement
- SCR uses Diesel Exhaust Fluid (DEF) – injected into exhaust stream to reduce NOX emissions
- Truck will have a 20 gal tank = 6,000 miles between DEF fill-ups
- Fluid freezes at 12 degrees F and is highly corrosive (67.5% water)

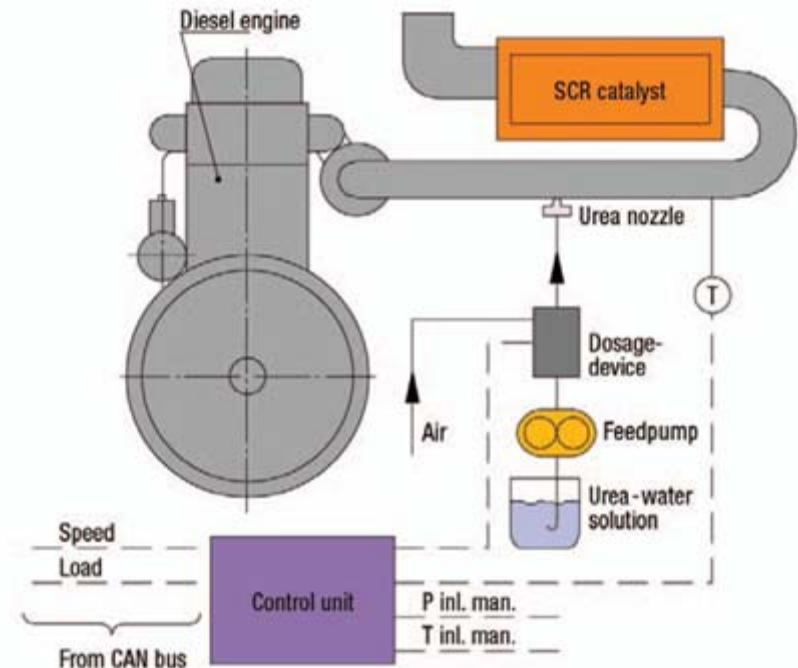


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