TRUCK AXLES OVERLOAD PROTECTION SYSTEM

PREVENT FINES AND VEHICLE WEAR BY MONITORING AXLE WEIGHTS
Benefit from load monitoring, fleet tracking and payload optimization with Veil On-board Weighing’s new overload protection system. TrueLoad is specifically designed for larger capacity vehicles up to 60 tonne (66 tons), with mechanical and/or air spring suspension.

Offering vehicle weight indication as standard for individual axles and vehicle gross, this overload protection system incorporates patented technology. Utilization of state of the art solid state sensors ensures maximum durability in harsh environments and since there are no moving parts it is not susceptible to wear or slipping out of calibration because of stretched springs which are common in other axle load monitoring systems. For continuous monitoring of load conditions, it can also be linked to third party tracking software and is compatible with all options offered.

TrueLoad is a simple to operate, durable, low cost positive contribution to safe driving.

THE IDEAL SOLUTION FOR MONITORING OF LOAD AND OVERLOAD

TrueLoad is overload monitoring, load distribution and payload optimisation for use on vehicles with steel spring or air suspension or a combination of the two.

AXLE LOAD MONITORING

Combinations of our patented axle transducers and/or air pressure transducers obtain the loading information of each axle or axle group.

With TrueLoad sensors, all truck combinations can be monitored without modifying the truck’s chassis or frame structure. No moving parts between the frame and the spring allow high durability and no wear as on typical encoder sensors.

• TrueLoad axle transducers that measure suspension deflection for use on mechanically spring suspension systems. Sensors are glued onto spring, no welding or bolting, easy and safe installation.

• Air pressure transducers for use on air suspension systems. In order to support all known chassis types, various system options can be configured using either of the above transducers or certain combinations of the two.

OPTIMIZE YOUR PAYLOAD AND AVOID FINES

OPTIMIZE YOUR PAYLOAD AND AVOID FINES
TRUELOAD COMPONENTS

TRUELOAD DIGITAL INDICATOR
Specially engineered for on-board use, the TrueLoad indicator is a versatile head unit designed to suit a variety of trucks from 7.5 tonne to 50 tonne GVW. Its mounting flexibility ensures that it is suitable for both DIN radio mount and dash mount.

TRAILER IDENTIFICATION
TrueLoad automatically recognises the overload monitoring system on the trailer, so there is no need to recalibrate every time the trailer is swapped.

TELEMATICS OUTPUT
Connection to third party tracking systems is easily achieved via TrueLoad’s standard telematics output.

OPTIONAL
External Alarm

TrueLoad
There is only one head unit per system; this is where the weights are calculated. The head unit is used for all display, setup, calibration and diagnostic functions.

CAN Junction Boxes
The axle transducers connect to the head unit via junction boxes.
- 4 way junction box
- 6 way junction box

Axle Transducer
Each steel suspension axle uses a pair of TrueLoad axle transducers.

Single Air Transducer and Interface
Air suspension groups will use an air transducer and interface unit for each group. An air group can be 1 or more axles connected to the same air circuit.

Dual Air Transducer and Interface
Where pressure is controlled independently on left and right hand sides a dual air transducer unit must be used.
Benefits

Maximize payload capacity
AxleWatch - axle weight and overload indication
Trailer identification
Accuracy - Better than 2% Max Gross Weight according to VEI usage guide and number of axles
Reduce vehicle wear and tear and fuel consumption
Protect your license
Avoid fines and overload endorsements
Simple to operate
Balanced load distribution
No driver input required
Axle and gross overload warnings
7.5–50 tonne GVW
Rugged for harsh environments

Features

<table>
<thead>
<tr>
<th>Feature</th>
<th>Standard</th>
<th>Option</th>
</tr>
</thead>
<tbody>
<tr>
<td>Gross vehicle overload</td>
<td>●</td>
<td></td>
</tr>
<tr>
<td>AxleWatch individual axle overload</td>
<td>●</td>
<td></td>
</tr>
<tr>
<td>Built in alarm sounder</td>
<td>●</td>
<td></td>
</tr>
<tr>
<td>Trailer swap trailer identification</td>
<td>●</td>
<td></td>
</tr>
<tr>
<td>CAN bus</td>
<td>●</td>
<td></td>
</tr>
<tr>
<td>RS232 output</td>
<td>●</td>
<td></td>
</tr>
<tr>
<td>Password protection</td>
<td>●</td>
<td></td>
</tr>
<tr>
<td>Telematics output</td>
<td>●</td>
<td></td>
</tr>
<tr>
<td>External alarm</td>
<td></td>
<td>●</td>
</tr>
</tbody>
</table>

Applications

SUITABLE FOR THE FOLLOWING TYPES OF TRUCKS:
Articulated tippers - Rigid tippers - Trailer units
Skip loaders - Hook loaders - Pick-up trucks.
All vehicles with spring and/or air suspension.

Hardware characteristics

<table>
<thead>
<tr>
<th>Characteristic</th>
<th>Specification</th>
</tr>
</thead>
<tbody>
<tr>
<td>Power supply</td>
<td>12± 24Vdc</td>
</tr>
<tr>
<td>Working temperature</td>
<td>Sensors -40 ÷ +80 °C</td>
</tr>
<tr>
<td></td>
<td>junction boxes -40 ÷ +120 °C</td>
</tr>
<tr>
<td>Sensor communication</td>
<td>canbus</td>
</tr>
<tr>
<td>Shocks</td>
<td>40g</td>
</tr>
<tr>
<td>Protection Class</td>
<td>meter IP54</td>
</tr>
<tr>
<td></td>
<td>Sensors IP69</td>
</tr>
<tr>
<td></td>
<td>Junction boxes IP69</td>
</tr>
<tr>
<td></td>
<td>Connectors IP69</td>
</tr>
<tr>
<td>Size</td>
<td>DIN Radio slot type mm. 180 x 50</td>
</tr>
<tr>
<td>Display</td>
<td>Backlit Graphic black and white</td>
</tr>
<tr>
<td>Keyboard</td>
<td>membrane</td>
</tr>
<tr>
<td>Telematics or printer</td>
<td>RS232</td>
</tr>
</tbody>
</table>

www.veigroup.com - info@veigroup.com

DYNAMIC WEIGH SYSTEMS
Ivan van Heerden
Cell: +27 (0)82 965 2406
Tel: +27 (0) 39 975 3230
Skype: ivanvahn
Email: ivan@dynamicweighsystems.com