

Designers and Manufacturers of Traffic Data Collection, Monitoring and Enforcement Systems

# WB30L AXLE WEIGHBEAM



The WB30L axle weighbeam is a robust steel structure supported in each corner by four folded 'S' tensile load cells mounted within specially designed shoes. The platform itself sits in a sturdy steel pit frame, which is set into a flat and level concrete apron (weigh lane).

## **Technical Data:**

Accuracy:

Note: Vehicle gross weight and axle weight accuracy is dependent upon site construction in accordance to TDC specifications.

- Rigid & robust steel structure
- Minimum maintenance
- Easy access to junction box and cable connections Structural strength to 70 tonnes
- Weighing capacity 30 tonnes
- 80% overload without failure or loss of calibration

- Environment Protection:
   Junction box sealed to IP67
   Load cells sealed to IP68
- Lightning protection system & load cell earth bridging as standard
- Four 10,000Kg Load Cells
- Load Cells rated for 50% overload
- Load Cells OIML R60 Class III Approval
- Platform Size: 900 x 3000mm
- Unit Weight:

Weighing Platform: 900Kg
Pit Frame: 250Kg
Shipping Weight: 1,250Kg

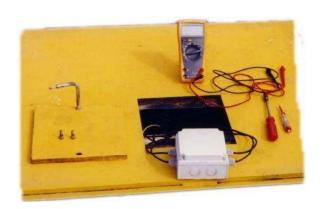
### **Weighing Platform**

The weighbeam structure presents a very rigid support to the vehicle axle. It is designed to weigh one axle at a time and has a loading capacity of 30 tonnes. The top surface is a mild steel plate, 16mm thick, and presents a smooth surface to passing axles.

### **Load Cells**

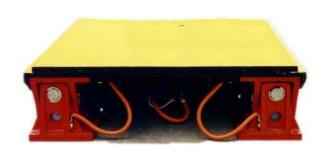
The weighbeam is fitted with four load cells; mounted in specially designed shoes, which prevent both curbing and tilting of the weighing platform. Each load cell has a capacity of 10,000Kg with an over range limit of 50% without losing calibration. The load cells are sensitivity matched to ensure inter-changeability and are hermetically sealed to IP68 rating to prevent the ingress of dust and moisture. Extensive earthing is incorporated to minimise damage due to lightning.

The load cells are approved to OIML R60 Class III.



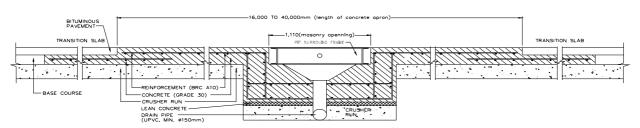
#### **Pit Surround Frame**

The weighbeam pit surround frame is a steel structure installed into the concrete weigh lane. The weighing platform is supported within the frame by two load-bearing plates. The frame provides a solid interface between the weighbeam, the load cells and the concrete apron. The pit is drained via a 150mm drainage pipe.



### **Junction Box & Summation PCB**

A cable junction box, sealed to IP67 rating is located under a removable plate in the top of the weighbeam. All load cell cables are terminated on a summation PCB. The PCB contains protection devices to guard against high voltage transient spikes such as those induced by lightning. A screened low voltage signal cable connects the weighbeam to the weighing electronics.





Note: Installation drawings, procedures and photographs supplied on request



58 Buckingham Road Weston Industrial Estate Weston-Super-Mare North Somerset BS24 9BG England

Tel: +44 (0)1934 644299 Fax: +44 (0)1934 644255 Email: sales@tdcsystems.co.uk

www.tdcsystems.co.uk