

ON-BOARD WEIGHING SOLUTIONS



Why Aptella

We're there when you need us

Topcon on-board weighing systems are designed to increase efficiency and productivity in construction, mining and industrial applications by delivering accurate weight information to the machine operator via an easy-to-read control box mounted inside the cab. Loading accurately each time reduces return trips to the stockpile, saving on fuel usage and machine wear.

Aptella's expert team is unrivalled in the industry - our people are passionate about what they do and committed to supporting our customers whenever and wherever they're working.

With more than 350 employees across Australia, New Zealand and Southeast Asia, no other company can deliver the depth of expertise and boots on the ground support that Aptella has to offer. We source the latest and most advanced technology from leading suppliers worldwide, ensuring it is fit for the local market and assisting customers with training, service, calibration and support to suit their unique business needs.



Workshop services

Comprehensive product service, maintenance, repairs and advice are provided via our local service centres with manufacturer-trained technicians. We guarantee all our work and can supply calibration certificates if required.



Training

Our expert trainers are here to help you get productive immediately and enable you to take control of your digital jobsite. Our training is application specific and tailored to your industry, providing the perfect foundations to tackle any task or project.



Hire or lease options

A full range of systems, from laser levels through to machine systems and survey instruments, can be hired or leased to suit any application and reduce capital outlay. Get the flexibility to customise technology to suit unique site requirements.





LM-100

On-board weighing solutions for loaders

The Topcon Loadmaster LM-100 is a CAN-based system that combines cutting edge sensor technology and signal processing techniques to deliver precise and consistent weight information and sets a benchmark for the industry.

Loadmaster LM-100 has been designed to operate within the fastest loading environments and toughest of conditions compensating for uneven, sloped ground and restricted loading areas reducing cycle times and maximising tons per hour performance.

Loading correctly first time eradicates return trips to the stockpile reducing vehicle movement, fuel usage and machine and tyre wear. Plus, you can opt for a Trade verison that enables you to transact from your weight figures.



- > Colour touch screen display for intuitive operation
- Dynamic weighing technology uses accelerometers, enabling superior weight accuracy & repeatability in tough terrains
- > Hydraulic oil temperature compensation
- > Target load- set individual product target
- GPS product recognition
- > Adjustable weighing height to suit specific application
- > Pre-set Tare function for pallets and containers
- > SQL database functionality
- Stores, multiple job and blend capability with advanced memory job search and report function

TECHNICAL SPECIFICATIONS					
Operating voltage 10-30 Volts DC					
Temperature range -20 to +70°C operating					
System accuracy +/-2% of capacity					
Sensor range	0-400 bar				
EMC protection	Complies with 2004/108/EC ISO 14982				
Warranty	2 years				
Env. protection	Instrument sealed to IP65				



Loadmaster a50

On-board weighing solutions for wheel loaders

The Topcon Loadmaster $\alpha 50$ is a highly accurate on-board weighing system for loaders that helps increase loading efficiency by reducing vehicle movements onsite, which increases safety and ensures trucks are correctly loaded the first time.

The Loadmaster $\alpha 50$ uses a 7" colour-resistive touchscreen display and additional physical keys providing a modern and ergonomic operator interface.

Suitable for use with up to 10 different attachments, e.g., buckets or forks, thesystem can be retrofitted onto wheeled, telescopic and tractor type loaders. It offers the input of a target weight from which it indicates the remaining load required. It also has a last bucket tip-off function that allows the adjustment of the final bucket load to the exact amount required.



- > Colour touch screen display for intuitive operation
- > Target load ensures correct loading of vehicles or product
- > Live last bucket "tip-off" facility
- Net weighing for pallets and containers
- > Accurate record keeping, traceability & stock management
- Multi-channel and grand summary providing load accumulation for up to 10 attachments
- > Printer option for hard copies of load summaries, totals etc.
- > Static and dynamic weighing modes for 'weighing on the lift'
- > Calibration Nudge to match site reference

TECHNICAL SPECIFICATIONS				
Operating voltage 10-30 Volts DC				
Temperature range	-20 to +70°C operating			
System accuracy	+/-2% of capacity			
Sensor range	0-250 bar			
EMC protection	Complies with 2004/108/EC			
Warranty	2 years			
Env. protection	Instrument sealed to IP54			



Weighlog a10

On-board weighing solutions for compact loaders

The Topcon Weighlog $\alpha 10$ incorporates the latest colour touchscreen technology providing a user-friendly on-board weighing system that can be used for trailer and hopper loading, batch blending or check weighing.

Loading correctly first time maximises productivity, reduces vehicle movement, fuel usage and machine and tyre wear.

Suitable for use with up to 10 different attachments e.g. buckets or forks, the system can be retrofitted onto compact wheeled loaders, telescopic handlers, forklifts and skidsteer type loaders. The system measures hydraulic pressure using up to four sensors at a certain position during the lifting cycle compensating for pressure changes in the system.



- > Colour touch screen display for intuitive operation
- > Target load ensures correct loading of vehicles or product
- > Accurate record keeping, traceability & stock management
- Communication via SD card & USB memory stick for safe and efficient data handling
- > Static and dynamic weighing modes for 'weighing on the lift'
- Multi-channel and grand summary providing load accumulation for up to 10 attachments
- > Printer option for hard copies of load summaries, totals etc.
- > Calibration Nudge to match site reference

TECHNICAL SPECIFICATIONS				
Operating voltage 10-30 Volts DC				
Temperature range	-20 to +70°C operating			
System accuracy	stem accuracy +/-2% of capacity			
Sensor range	0-250 bar			
EMC protection	Complies with 2004/108/EC			
Warranty	2 years			
Env. protection	Instrument sealed to IP54			

Loadlog 300

Load measurements for loaders with single attachments

Specifically designed for loaders and forklifts, Loadlog 300 combines an integrated sensor measuring hydraulic pressure with an easy-to-use display to provide accurate, real-time load measurements.

TECHNICAL SPECIFICATIONS				
Operating voltage 11 – 28 VDC				
Temperature range	-20° to +50°C operating			
System accuracy	+/-2% of capacity			
Sensor range	0-250 bar			
EMC protection	Full RFI/EMI protection 2014/30/EU, ISO 14982			
Warranty	2 years			
Env. protection	Instrument sealed to IP67			





LX-100

On-board weighing solutions for excavators

With the ever increasing focus on productivity, LX-100 has been designed to operate within the fastest loading environments maximising tons per hour performance.

This easy-to-use system gives operators accurate bucket weight information at their fingertips, to increase productivity and reduce machine wear.

With the ability to store data for accurate record keeping, traceability and stock management, LX-100 is a flexible solution that can be customised to suit a wide range of earthmoving applications, attachments and accommodate a variety of active jobs simultaneously.



- > Colour touch screen display for intuitive operation
- Dynamic weighing technology uses accelerometers, enabling superior weight accuracy & repeatability in tough terrains
- Accurate weight information within normal operating temperatures
- > Target load to ensure corect loading of vehicles or product
- > GPS product recognition for automatic product selection
- > Reversing camera input
- > Adjustable weighing height to suit specific application
- > Pre-set Tare function for pallets and containers
- > Live last bucket 'tip off' at any position

TECHNICAL SPECIFICATIONS				
Operating voltage 10-30 Volts DC				
Temperature range	ature range -20 to +70°C			
System accuracy +/-3% of capacity				
Sensor range	0-400 bar			
EMC protection	Complies with 2004/108/EC ISO 14982			
Warranty	2 years			
Env. protection	Instrument sealed to IP54			



Loadex 200

Material handler scales

A material handler weighing solution for Liebherr swing grab machines, Loadex 200 by Topcon is a user-friendly and accurate hydraulic scale system.

Accurately load trucks to mitigate chain of responsibility risk, measure productivity and reduce machine wear and fuel costs.

- > No capacity reduction
- > No bulky frame
- > Simply replaces the load pin on machine for a neat, fully integrated solution



- > Easy to operate, user-friendly design
- > Accurate record of every lift to ensure optimised loading of trucks
- > Mitigate chain of responsibility risk and eliminate overloading
- Load cell based system to accurately load trucks and increase productivity
- Integrated gyro to measure inertia on swing grab for accurate weight records
- Compact solution replaces the load pin so there is no bulky frame or capacity reduction
- Unlimited input of products, customers, trucks, locations, and more for even the largest operations
- > Dynamic weighing accurate at any point in the lift range

TECHNICAL SPECIFICATIONS				
Operating voltage	10-30 Volts DC			
Temperature range	-25 to +50°C operating			
System accuracy	+/-3% of capacity			
EMC protection	Complies with 2014/30/EU + ISO 13766 and with EN 13309:2010			
Warranty	2 years			
Env. protection	Instrument sealed to IP54			



Liftlog 100+

Weighing system and load monitor with load totalising function

The new LIFTLOG 100+ from Topcon is a cost-effective weighing and load monitoring instrument specifically designed for forklift trucks that displays the weight and calculates loading totals.

It also features visual and audible overload warning alarms.

The Topcon LIFTLOG 100+ is an operator friendly product that has been specifically designed for use on forklift trucks working in a despatch yard or warehouse environment.

Using a sensor to measure hydraulic pressure in the system, the LIFTLOG 100+ informs the operator of load as a 'calculated' weight in tons or kg. This load can then be confirmed through the 'Enter' button and added to the total channel.



- > Quick and easy installation.
- Overload logging capability.
- LCD indicates load as a 'calculated' weight with a bar graph of load status.
- > Initial audible alarm at 90% of permitted load with continuous audible alarm and flashing display at and in excess of 100%.
- > Total channel displays sum of all entered load weights.
- > Three button user control for easy operation.
- > Unique bracket enables installation of the instrument in any position.

TECHNICAL SPECIFICATIONS:				
Operating voltage 10-30 Volts DC				
Temperature range	-20 to +40°C operating			
System accuracy	+/-2% of truck capacity			
Sensor range 0-250 bar				
Warranty	2 years			
Env. protection	Instrument sealed to IP67			



Loadex 200

Material handler scales

The Topcon LIFTLOG 1000 is an operator friendly product that has been specifically designed for use on forklift trucks working in a despatch yard or warehouse environment.

Loading correctly first time eradicates return trips to the stockpile reducing vehicle movement, fuel usage, machine and tyre wear.

Using a sensor to measure hydraulic pressure controlled in a drop valve, the LIFTLOG 1000 informs the operator of load as a 'calculated' weight in Tonnes, kgs, lbs and US Tons. This load can then be confirmed automatically or via the 'Enter' button and added to the Accumulated total and will also be added to the Grand total.



- > Colour touch screen display for intuitive operation
- > Pre-determined pallet and stillage weights for faster operation.
- > Safe & efficient data handling for transfer of stored data to and from office or added external data storage.
- > Set alarm at approach and at overload threshold to increase site safety.
- Quick and easy calibration adjustment to match site reference. Pin code protect option.
- Stores time and date of last 10 overloads identifying operators and forklifts at risk.
- Maintains accuracy minimising machine downtime for servicing or repair. Maintains lifting capacity and driver visibility.

TECHNICAL SPECIFICATIONS				
Operating voltage 12 Volts DC				
Temperature range	-20 to +50°C operating			
System accuracy	+/-0.5% of truck capacity			
Sensor range	0-250 bar			
Warranty	2 years			
Env. protection	Instrument sealed to IP54			



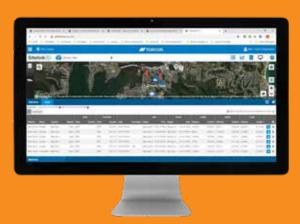
Sitelink3D V2

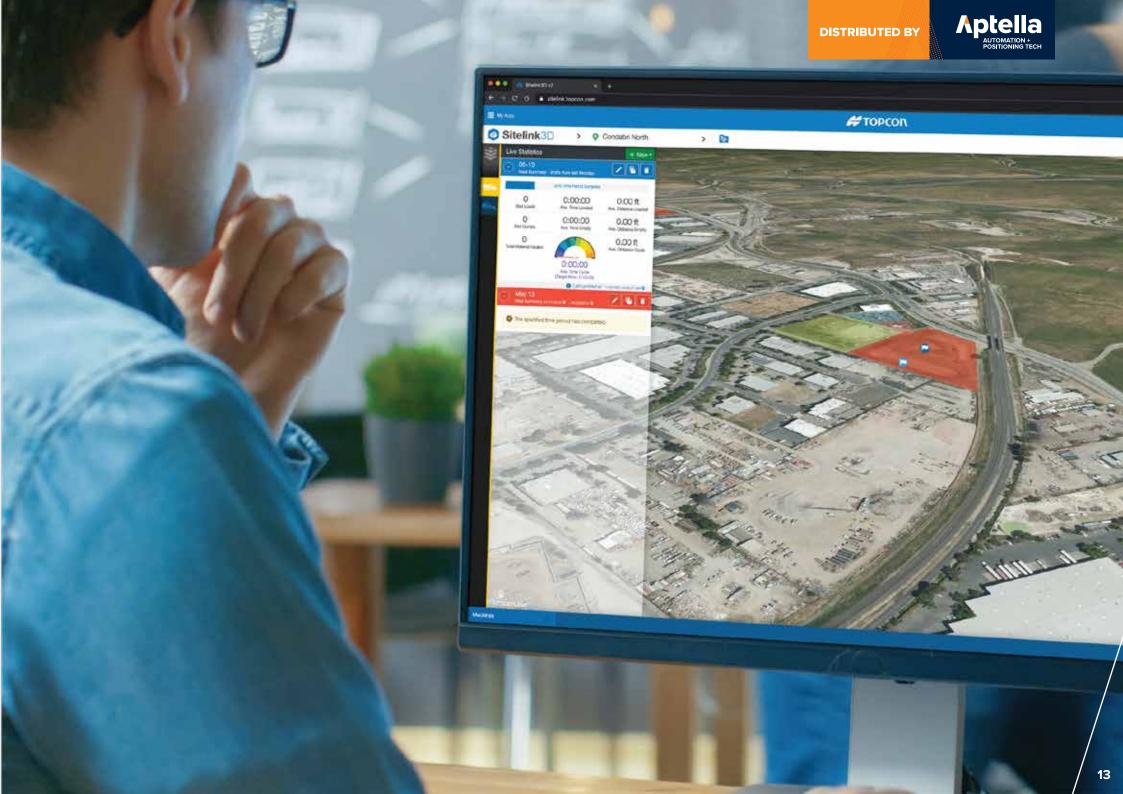
Do more with your data and create customized reports from your desk. Sitelink3D $^{\text{m}}$ gives you the ability to better manage your material in real time. Plan, schedule, define machine tasks, and run customized reports to satisfy DOT requirements.

- > Productivity reports
- > Job site planning
- > Track progress, run volume/haul reports



- Increase productivity with live performance metrics: event-driven, real-time performance tracking on haul cycles with live statistics widgets
- > Efficiently manage multiple jobs: create and manage multiple sites and projects, with defined user roles and access levels, as well as file and metadata management
- Keep an eye on progress: overlay design files, alignments and drone imagery to visualise the project in 2D or 3D. Track all connected machines
- Customise to suit your project needs: create regions, materials, activities, delays, shift plans, operator and asset lists. Also supports material bulking factors and states
- Integrates to your workflow: supports import/export to multiple industry-standard formats





Haul Truck Management

Available on Android and iOS devices, Topcon's Haul Truck app eliminates paper-based reporting to streamline haul operations. With the ability to monitor equipment, location and activity in real time, managers can quickly identify inefficiencies and ensure loads are collected and offloaded where they should be. Drivers have an easy to use, hands free view of their routes with colour-coded load and dump regions, haul counts and more.

Benefits

- Reduces costs by only charging for days the equipment is in use on site
- > A mobile app means no special hardware to purchase
- Monitors equipment in real time and in 3D so managers can quickly identify operational inefficiencies
- Tasks provide drivers with information tailored specifically to their assigned operations
- > Haul reports are viewable in the Sitelink3D web portal and can be downloaded to Excel for import into other software platforms
- Reports include aggregated summaries and material shrink/swell calculations
- Supports the main bed, plus up to two additional independent trailers
- Dates, times and locations of each load and dump event, GPS locations along entire routes driven, Vehicle IDs and drivers' names, material types and delays

Topcon Haul App

Hardware-free digital records of load and dump cycles to increase productivity, save time and save money.

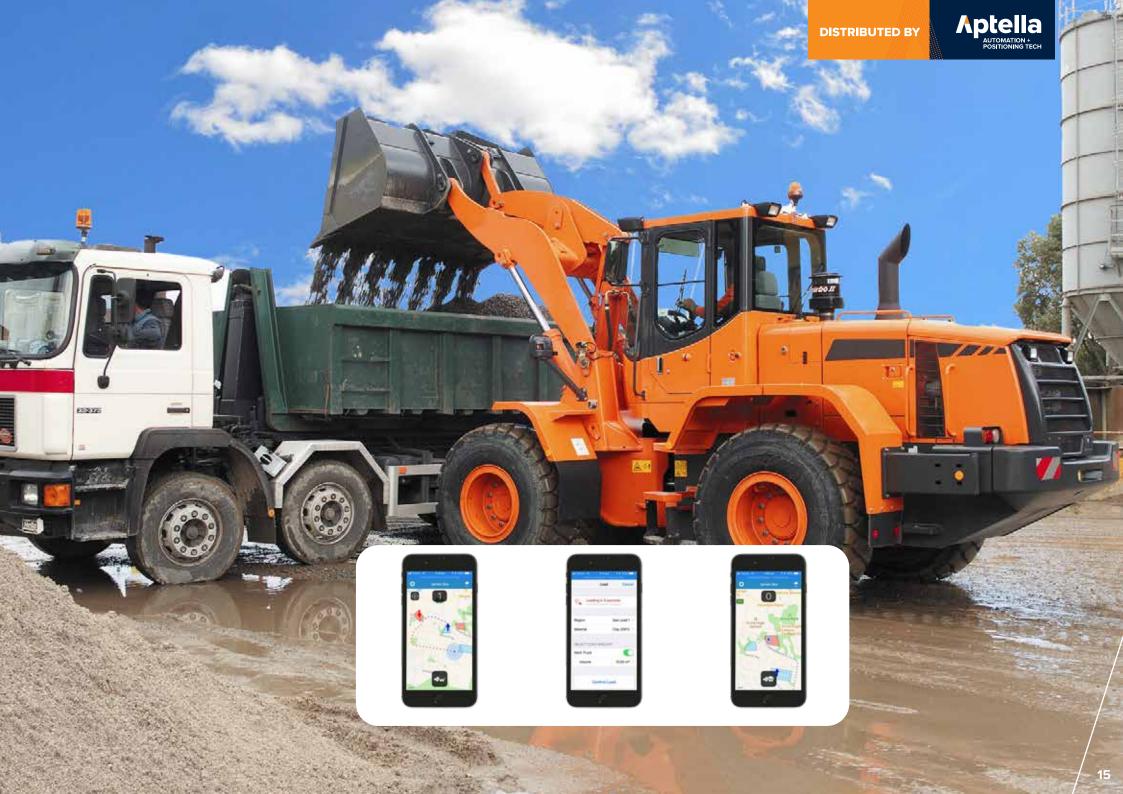
- Cost effective: no hardware required, drivers simply download the Topcon Haul app on their iPhone or Android device
- > Accurate records: app tracks hauls, load and dump metrics
- Time savings: App automatically finds nearby sites and records delays to improve routing

Digital Loading Records

- > Automatic records when loaded by loader or excavator with on-board scales
- Automatic records when stopped in designated load area
- > Easy manual entries available by tapping the load icon
- Excavators and loaders without on-board scales can use the Haul App to assign weights to trucks they fill

Digital Dumping Records

- Automatic records by stopping in a designated dump area
- > Easy manual entries by tapping the dump icon





Tokara

Connect machine data to the office with Aptella' award-winning Tokara service. Via a small telemetry modem installed in every machine, Tokara is the conduit between your machines and the office-based software, enabling the use of Isosync, Sitelink3D and Equinox software.

Tokara also enables Aptella technicians to login and remotely troubleshoot technical issues with your equipment, saving time and keeping everyone working without the need to wait for a site visit.



Scale Calibration Service

Aptella has a fleet of trucks available to calibrate scales and weighbridges, to ensure systems are working accurately and within tolerance. It is recommended to calibrate your scales every 6 months to ensure optimal performance.

- > Loader scales
- > Excavator scales
- > Forklift scales
- > Weighbridges
- > Belt scales



Scale calibration for all makes of machine and all brands of on-board scales



Available Australia-wide with trucks covering East and West Coasts



Mine-spec machines and weighbridge calibrations available

Product Comparison

	Loadlog 300	Weighlog a10	Loadmaster a50	LM-100	LX-100	Loadex 200	Liftlog 100+	Liftlog 1000
Applications	Skid Steer/Backhoe/ Tractor loaders/ Open cab Loaders	Small Loaders/ Backhoe/ Telehandlers/tractor Loaders	Wheel Loaders – All sizes	Wheel Loaders – All sizes/Forklift	Excavators	Swing grab Material Handlers	Warehousing / General Forklift	High accuracy Forklift Requirements
Check Weighing	√	√	✓	✓	✓	✓	✓	✓
Vehicle Loading	✓	✓	✓	✓	✓	✓	✓	✓
Net Load Weighing		✓	✓	✓	✓	✓		✓
Batch/Blending		✓	✓	✓	✓	✓		
Trade-Approved Weighing			ТВА	✓				
Stock & Customer Management		√	√	√	√	✓		√
Multi Trailer Weighing				✓	✓			



Product Features

	Loadlog 300	Weighlog a10	Loadmaster a50	LM-100	LX-100	Loadex 200	Liftlog 100+	Liftlog 1000
Applications	Skid Steer/Backhoe/ Tractor loaders/ Open cab Loaders	Small Loaders/ Backhoe/ Telehandlers/tractor Loaders	Wheel Loaders – All sizes	Wheel Loaders – All sizes/Forklift	Excavators	Swing grab Material Handlers	Warehousing / General Forklift	High accuracy Forklift Requirements
Dynamic Weighing	✓	✓	✓	✓	✓	✓	✓	
Static Weighing	✓	✓	✓	✓	✓	✓	✓	
Load Sensors	2	2>4	2>4	2>4	2		1	1
Strain Gauge Sensing	Optional	Optional	Optional	Optional		STD		
Colour Touchscreen		✓	✓	✓	✓	✓		✓
SQL Database Functionality				✓	✓	✓		
XML Data Output				✓	✓	✓		
GPRS & Wi-Fi Connectivity				✓	✓	✓		
GPS Product Recognition				✓	✓	✓		
Reversing Camera Input				✓	✓	✓		
Overload Warning	✓	✓	✓	✓	✓	✓	✓	✓
Overload Logging				✓	✓	✓		
Live Last Bucket		✓	✓	✓	✓	✓		
Target Weight		✓	✓	✓	✓	✓		✓
Auto/Man Load Accumulation	✓	✓	✓	✓	✓	✓	✓	✓
Lift Speed Compensation	✓	✓	✓	✓	✓	✓		
Angle Compensation				✓	✓	✓		
Temperature Compensation				✓	✓			
Attachments	1	10	10	10	10	1	1	
Printer Option	✓	✓	✓	✓	✓	✓		√
Telemetry Option				✓	✓	✓		
SD Card Data Transfer		✓	✓					✓
USB Data Transfer		✓	✓	✓	✓	✓		✓
Scanner/RF ID Input Option				✓	✓	√		
Waterproof Instrument	✓							
*Accuracy (+/-%)	2	2	2	1	3	3	2	0.5
*Accuracy is dependent on correct operat	tion							

