

# CATALOGUE



# The newest Terberg Environmental subsidiary in the heart of the Middle East

#### **Terberg Group**

Terberg Environmental is part of the Royal Terberg Group, a family business, focused in the long term. Sustainability and reducing the environmental impact of our products are therefore extremely important. We work to meet these objectives whilst also providing a good working environment for operatives using our equipment daily. Having members of the fifth Terberg family generation working in our business, after gaining valuable experience elsewhere, supports the continuity of our operations for the future.

All Terberg businesses pride themselves on listening to their customers and giving them the best possible support in line with their needs. The fact that we have served many of customers for decades confirms that this approach results in great customer loyalty which again we are truly thankful for.

## Terberg Ros Roca

#### Vehicle Manufacturing LLC

Established in Dubai, United Arab Emirates, the latest addition to the Royal Terberg Family opened for business in the middle of the global pandemic.

Our factory assembles refuse collection bodies supplied as "flat packs" from the plant in Spain, offers complete refurbishing, maintenance and painting services, and provides spare parts delivery and plastic and metal side and rear loading containers from our partners throughout the GCC. Upholding brand values, replicating proven production techniques and service expertise from TRRG's factories throughout Europe, TRRVM aims to provide customers with the full OEM experience, from factory safety, product and manufacturing standards, genuine parts, detailed maintenance, and comprehensive aftersales support.



## Terberg Ros Roca VM International Partners

BUSIGROUP

#### Busi Group

Busi Group is a leader in Italy specialising in the design, manufacture and marketing of innovative products and systems for the collection, compaction and transport of waste.

The group is made up of several companies (BTE, OMB and MEC) that have been working in the field for years: a virtuous network of progressive companies capable of providing concise professional advice to private and public companies that deal with waste collection and management, with the aim of helping to improve the way we live in the environment around us.

## **Formatik** Plastik Gogić

#### Plastik Gogić

The company Plastik Gogić has specialized in the field of injection moulding of various plastic products. The basic principles have not changed since the inception of the company in 1974: perseverance, professional approach and social responsibility.

There are four areas in which Plastik Gogić offers its products to the market.: plastic bins and waste containers, which are delivered to numerous partners around the world; production of multifunctional surfaces and chairs for stadiums; round tubs of different sizes (110-1,000 litres), as well as products for home, professional and industrial use.



#### Tenax

**Products** 

Tenax International is an Italian company, the first in the world dedicated to the design and production of low-voltage, genuinely 100% electric road sweepers and street washers. With over 35 years of experience, incomparable technical expertise and over 700 machines sold and supported in more than 42 countries over 5 continents, we are specialised in the creation of cutting-edge machinery powered by clean energy,

with genuinely extraordinary performance.

## Terberg Ros Roca VM International Partners



## Baron

Baron Srl has developed a range of solutions dedicated to meeting all the needs of the waste collection industry.

**On-board weighing systems**: Systems to detect the exact weight loaded on board, the weight of the single bin and the total load, proving dynamic and static solutions.

**On-board RFID identification**: Identification systems for collected bins.

Access control systems for containers: Including smart locks that are able to identify users.

**Management software**: Displaying and interacting with on-board weighing systems, RFID systems and access control systems on bins.

**Overload control systems:** Devices dedicated to detecting excess load on the truck.







Products

#### KWS

Krickl weighing systems develops, manufactures and distributes products and solutions for vehiclemounted weighing and identification, from small transport cars to large multi-axle trucks.

Used in applications as different as silo vehicles, unloading tippers, skip dumpers and garbage trucks, the structure is fixed to the weighting cells, which are mounted on the truck frame. KWS install from 4 to 16 weighting cells on the truck structure, depending on the size and weight. The container is in turn placed on the weighing cells. The weighing system is susceptible to shock and does not require fixing.

## **Olympus AЯT Rear Load Compactor**



Olympus ART is specifically developed and thoroughly proved in operations under the harshest environments of temperature, humidity and dust in Asia, Africa, GCC, Russia and LATAM markets. Coupled with one of our bin lifts, Olympus ART offers exceptional value, providing a solid performance, robust build and comprehensive aftermarket support.

Products

- Constructed from one piece rolled side sheets high tensile steel and braced by front and rear hoops, with pressed integral channel and "keel" type floor for improved body strength and lower leachate corrosion.
- ▶ Hardox floor in HiACE 450 in 4/5/4 mm configuration optional.
- Hardox tailgate sides in on single pieces no welding 7 mm and hopper floor 8 mm included.
- ➤ Integral floor sump to prevent liquid seepage and to allow clean discharge of any liquid content. (100 mm depth).
- ➢ Optimised 2.8 mc swept volume capacity, resulting in fewer packing cycles, reducing wear, fuel consumption and noise.
- ☆ Reinforcement on tailgate lock.
- ➤ Hydraulic packer plate cylinders are positioned to eliminate damage from waste.
- ✤ External cylinders for carriage plate away from waste
- ➤ Ejection plate face is manufactured from high tensile abrasion resistant steel, forming a smooth and unobstructed discharge surface.
- ➤ Self-lubricating bearings guide the ejection plate and unobstructed discharge surface.
- ➤ Compaction Cycle Time, Nominal: 18 sec.
- ☆ Operating pressure: 180 bar.



## Olympus AЯT & Olympus Mini AЯT Rear Load Compactors



## Olympus AAT Mini

Carrying forward the genes of the Olympus, the Mini is ideally suited to collections in narrow areas. Olympus Mini ART is a rear loading refuse compaction vehicle for the collection of domestic and organic waste as well as recycling materials in areas with narrow streets and restricted access that requires a high level of manoeuvrability. Compact and with proven technology, Olympus MINI ART offers high quality and reliability.

- Yoverall Body width: 2000mm.
- Volume capacities from 6-10 m<sup>3</sup> and compaction ratios up to 7:1.
- ☆ Compaction Cycle Time, Nominal: 15 sec.
- Tailgate capacity NARROW (V3 calculated to EN1501 with 1400mm rave height): 1 m<sup>3</sup>.
- ☆ Operating pressure: 170 bar.



Products

## Olympus ART with crane chute

Olympus ART is specifically developed and thoroughly proved in operations under the harshest environments of temperature, humidity and dust in Asia, Africa, GCC, Russia and LATAM markets. Coupled with one of our bin lifts, Olympus ART offers exceptional value, providing a solid performance, robust build and comprehensive aftermarket support.

- ➤ Available as 2.2m Narrow and 2.5m Wide variants.
- Yolume capacities from 10-27m<sup>3</sup> and compaction ratios up to 7:1.
- ☆ Compaction Cycle Time, Nominal: 18 sec.
- Mathematical M
- ➤ Tailgate capacity WIDE (calculated to EN1501 1400mm rave height): 2.58 m<sup>3</sup>.
- Y Tailgate capacity NARROW (V3 calculated to EN1501 with 1400mm rave height): 2.22 m<sup>3</sup>.
- Y Operating pressure: 180 bar.

## Lifters for Rear Load Compactors



## MOC 800 Lifter

The MOC 800 is a compact, robust and reliable bin lifter that can safely handle 2 and 4 wheel containers. This product is specifically engineered for use In Asia, in cooperation with Olympus and Olympus Narrow Rear-load compactor, with a compact design with minimum overhang to reduce risk of rear axle overloading and a simple lever or push button operation.

- Handling Capacity: Single binlift frame for all containers, capacity 800 kg.
- ▶ Hydraulic Requirements: 20 l/min., 190 bar.
- ➢ Operation Mode: Manual. Easy to use button and lever controls for safe operation in all conditions.
- Y Cycle Time: 2 and 4-wheel containers 13 sec. Skips 30 sec.
- Mounting Method: Integrated on Olympus tailgate



## TGV Lifter

A heavy duty binlift that will handle a wide variety of containers up to 4.5m<sup>3</sup>, the TGV is primarily designed to empty pocket arm containers of up to 4.5m<sup>3</sup>. With the addition of an optional binlift comb and DIN arms, its flexibility will deliver higher efficiency on collection rounds. Its simple and robust design make it ideal for demanding environments.

- Handling Capacity: Single binlift frame for all containers, capacity 1500 kg.
- ▶ Hydraulic Req.: Ideal 40 l/min., maximum 60 l/min., 180 bar.
- Operation Mode: Manual. Easy to use button and lever controls for safe operation in all conditions.
- Mounting Method: Integrated on Olympus tailgate



## **OmniGV** Lifter

The OmniGV's robust, innovative design is capable of handling a wide variety of containers from 120 l. wheeled containers all the way up to 10m<sup>3</sup> skips. The construction with Hardox Steel makes it well suited to operation in conditions with extremes of temperature, humidity and dust and ensures long life.

- Handling Capacity: 160kg (2 wheel) / 800kg (4 wheel) / 2000kg (Pocket Arm) / 7000kg (Skips).
- Hydraulic Requirements: Ideal 40 l/min., maximum 60 l/min.,
  200 bar.
- Y Operation Mode: Manual.
- Cycle Time: 2-wheel containers 15 sec, 4-wheeled 15 sec, Pocket Arms 15 sec, Skips 45 sec
- Mounting Method: Integrated on Olympus tailgate



## Lifters for Rear Load Compactors



#### **Omni DEL**

Offering robust build, minimal maintenance and a safe operation synonymous with the Terberg brand the OmniDEL offers twin split lifting chairs that are perfect for high volume, high density urban collections of two-wheeled bins. OmniDEL also switches seamlessly to 4-wheel commercial container mode to enable emptying of larger containers thanks to our intelligent, timesaving 4-wheel recognition and Auto Gather features.

- Handling Capacity: 170kg (split) / 500kg (linked)
- Hydraulic Requirements: ideal 40 l/min., maximum 60 l/min., 180 bar
- Y Operation Mode: Automatic & Manual
- ▶ Cycle Time: 2wheels: 6-7 secs. 4 wheels: 10-12 secs.



## Omni Deka

The OmniDEL is the best available low level automatic solution for all RCV bodies including our Olympus range of RCVs. The OmniDEKA combined with our Olympus RCV, offers a superb tailgate swept volume to minimise the number of packing cycles and to maximise efficiency via the twin split lifting chairs. Additionally, it stores Kinetic energy during the lifting cycle to provide an energy free chair return under gravity, which in turn reduces noise, saves energy and keeps wear and tear to a minimum

- Handling Capacity: 170kg (split) / 750kg (linked)
- ▶ Hydraulic Req.: Ideal 40 l/min., maximum 60 l/min., 180 bar.
- Y Operation Mode: Automatic & Manual.
- Y Cycle Time: 2wheels: 6-7 secs. 4 wheels: 10-12 secs.



#### 4 wheel container recognition, Auto Gather, Single Button Tip and Intelligent Speed Selection all comes as standard with the OmniTRADE commercial bin lift to provide you with a superbly engineered, fully featured and flexible bin lift system geared towards efficiency and safety. Maintenance and whole life costs are kept to a minimum through the use of ultrasonic sensors, low maintenance bearings and stainless steel axles.

- Handling Capacity: 170kg (2 wheel) / 750kg (wheel)
- Mydraulic Req.s: Ideal 40 I/min., maximum 60 I/min., 180 bar
- Y Operation Mode: Manual
- Y Cycle Time: 2-wheel containers 6 7 sec. 4-wheeled 10-12
  - sec



## Side & Front Load Compactors



## Speedline SLM

Speedline SLM this side load collector is very efficient, robust and full of innovations. The equipment allows the operator to precisely reposition the container thanks to the elevator's innovative side-shift function.

- Ip to 14 Ton payload. ▼
- ∑ 2, 3 & 4 Axle configurations.
- 🖌 Lifting Capacity: Up to 1200 Kg
- 🖌 Skip Volume: 15 to 28 m3.
- Marms compatible with container handlers from 1.1 to 3.2 m3.
- Mathematical Stress Ma
- Includes a revolutionary new telematics system, Terberg Connect, as standard.



## Speedline Scope / CWS

Speedline Scope side loader offers a large-volume paddle press, designed to efficiently handle the contents of Side Loading containers up to 3,200 l. Fast lifting cycles also allow the collection of 2 and 4-wheel large waste containers of 60 - 1,100.

- Y Up to 10/13 ton Payload.
- ➢ Lifting Capacity: Up to 1500 kg .
- ▶ Body Volume up to 28 Sqm.
- Compaction Hopper Volume: 4 m<sup>3</sup>
- Marm Type: DUAL TELESCOPING Lateral range 3,000 mm.
- ➤ CWS (Container Swap System) option available.
- In-Cab Control Panel: MD4 controller, 7 or 10" touch screen

## **Olympus Millenium**

The Millennium front-end loader range is a single-person operation, economical answer to the requirements of large volume commercial and industrial waste collections.

- Volume: From 33m3 to 43 m3.
- Y 3 & 4 Axle chassis configuration.
- ✗ Container Handling: 120 I to 10 m³
- Lifting capability: Up to 3600 kgs.
- Y Up to 13 Ton Payload.
- 🕅 Arm Type: Front loader lifter
- ➤ Lifter Chair Configuration: Combination Fork for FEL containers and 1100 | flat lid bins.
- ℜ Remote Diagnostics: Remote maintenance via Bluetooth.

Products



## **OMB Side Load Compactors**



#### CWS B4

CWS B4 side loader main feature is that the body is not permanently fixed to the chassis structure. The container is interchangeable and it can be demounted and replaced with another one empty, thanks to the special device integrated in the CWS system by means equipped with a standard hook-lift equipment.

The system makes a separation between the collection and the transportation, allowing higher levels of efficiency, optimizing the collection and the transport phase.

- ➤ Suitable for long distance between the collection area and the waste destination,
- ▶ Special touristic areas characterized by extreme variability of the service during the year.
- You Quick and efficient increased capacity.

## CMPL7ETSA Model

The CMPL7 ETSA side loader compactor has been designed to maximize the payload of the equipment, keeping the strength and reliability that have always characterized OMB compactors. The proportional hydraulic system allows to combine speed, precision and movement fluidity, reducing mechanic stress on both the machine and the bins, limiting noise and energy consumption.

- Multiply Improved electronic system "state of the art" in waste collection field, providing high-tech features and "user friendly" layout for an easy use.
- Chassis configuration: two, three and four axles version with specific solutions (Natural gas-Glass).



## Binwashers



## Rear Load Bin Washer

The rear-loading container washer uses high pressure water to clean the inner part of the containers by means of rotating heads and the outer with a fix bar fitted with various nozzles. Capable of washing EN840 containers: 80 to 390l (EN840-1), flat cover containers with capacities from 500 to 1200l (EN840-2) and round cover 770 to 1300l (EN840-3).

- → Water volume capacity: From 5,500 to 12,000 litres.
- ➢ High pressure cleaning via a heavy-duty pump at 122I/min and 120 bar.
- M Mathematical Mathematical
- Optional water heater.
- ➢ Bin lift and washing compartment in 304 stainless steel.



## Side Load Bin Washer

The Side Load Bin Washer uses high pressure water to clean both the inner and outer side of metal and plastic containers with sizes ranging from 1800 to 3200 L (According to EN 12574 & EN 840-4). Designed and manufactured to improve and optimize the cleaning of all the side load currently available in the market.

- Water volumes: 5000 & 6000 litres. Water tank manufactured in Stainless Steel 304.
- High pressure cleaning via a heavy-duty pump at 61I/min and 150 bar.
- Y Optional high-pressure lance and chassis mounted hose reel.
- All the Hydraulic, electric, pneumatic installation is located in a back side cabinet.
- Lifter: capable of collecting containers from 1700 to 3200 L, Max 400 kg to avoid lifting full containers.
- Washing chamber manufactured in Aluminium.
- M Optional Lifter for rear load containers 700-1100 L and Underground containers.

### Organic & Front Load Collectors

## Products





The ORUS TP Range allow the collection of two streams of waste in one truck, organic and plastic, for instance. The compactor has two elements, which can be divided 50/50 or 70/30, with a total capacity of 7m3.

- Volume: 3.5 m3 x2 or 2,1+4,9 m<sup>3</sup>
- ▶ Hydraulic lifter for bins between 120 and 750 l.
- Optional polypropylene pannier that fits onto the TLL360 bin comb to provide a efficient hand or bag loading solution.
- 7 cubic metre total volume on a 7.5 Ton GVW chassis ( Aprox payload of 2750 kgs)
- Outstanding manoeuvrability in narrow and/or confined spaces with a leakproof watertight body.



## ORUS

The ORUS range of compact satellite collection RCV's offer an alternative solution for the collection of organic materials offering leakproof, watertight bodies with optimised compaction ratio's for the dense organic waste.

- Volume: From 5m3 to 7 m3, (light chassis from 3.5 to 7.5t).
- ➤ Hydraulic bin lift for the simultaneous handling of two 120/240/360 L bins or one 660/770/1100 L bin.
- M DIN arm lifting system for 770/1,100L containers.
- ☆ Compartments: 1 to 2.
- Number of lifts: Rear as standard, optional side lift (on Combi TD).
- Outstanding manoeuvrability in narrow and/or confined spaces with a leakproof watertight body.



## ORUS Combi

Multi-fraction collection for municipal solid waste at the rear (5 or 7 m3) and a separate side-loaded compartment without compaction with a bin lift for the organic fraction or glass (3.5 m3).

There is an option, **ORUS TP COMBI TD** with the two-compartment compaction at the back and a separate side-loading front compartment (without compaction and with no bin lift) to facilitate the collection of organic fractions or glass (1.5 m3).

The TP Combi TD offers three different fractions on a single route.

Volume: From 5m3 to 7 m3, (light chassis from 3.5 to 7.5t).

- Y Compartments: 1 to 3.
- Number of lifts: Rear as standard (Din + comb), optional side lift (on Combi TD).
- Outstanding manoeuvrability in narrow and/or confined spaces with a leakproof watertight body.

Products

## Specialized equipment



## Kerbloader

The Terberg Kerbloader<sup>®</sup> range is developed specifically for 'segregated at source' kerbside collection of dry recyclables and food waste. Collection of multiple recyclable waste streams is made possible by the combination of a high-level automated plastic/can press system, various removable stillages, a cardboard press unit and various storage compartments.

- Body volumes ranging from 15m<sup>3</sup> to 37.5m<sup>3</sup> in chassis with GVW: 7.5 to 12 tonnes
- ➢ Automatic upper deck plastic and can press system
- Compartments: 7 to 9.
- Latest technology 'Plug & Play' components used to ensure reduced risk of vehicle downtime





## Toploader

Developed to process collections in areas where local access restrictions, recycling collection strategies or other limitations dictate the employment of a 'bring scheme' system, the Toploader<sup>®</sup> is perfect to segregate the collection of one type of recyclable or up to six, to carry low, high or mixed density materials and to work in a restricted area, urban, rural or all three.

- 🖌 Volume: 16 -32 m3
- Compartments: 1 to 6
- TLL360 and/or TLL1280 side/rear lift option to facilitate collection of 2 and 4 wheel containers.

## PBUV

Designed for the harsh requirements of organic collection, the PBUV body is constructed from a robust Polypropylene material. As well as being able to withstand daily steam cleaning, the body won't corrode and is leakproof to a height of 300mm.Volume: 16 -32 m3. The PBUV is available in two sizes with the larger 8.5 cubic metre volume version on a 7.5 tonne GVW chassis giving a typical usable payload of 2750 kgs\*.

- 🖌 Volume: 6.5 to 8.5 m3
- ✗ Lifter: TLL360 to facilitate collection of 2 wheel containers.
- Y Tipping body



## E-Collect





## E-Collect Fully Integrated Electric RCV

This is the world's first all-electric Refuse Collection Vehicle from an OEM. It produces zero emissions so it doesn't add to climate change or pollute the air we breathe. It's a full-sized eRCV and built to last. Yet it is more efficient and cheaper to run. And it comes with the kind of support you'd only expect from Dennis Eagle.

The eCollect is based on our most popular RCV configuration. An Elite Narrow 6x2 rear-steer chassis – with an electric drive system instead of diesel. Our market-leading Olympus OL19 Narrow body and our Terberg 'Omni' range of automatic split lifts.

eRCVs have no diesel engine and no exhaust system so do not need the elements that make these systems run smoothly, such as AdBlue, DPF filters and regular engine oil changes

- First fully electric RCV in the world.
- No Air Pollution, Zero Emissions.
- 2 models, 4x2 (with a compactor OL10 Narrow) and 6x2 (OL19 Narrow).
- ✤ Low cabin increases safety and visibility (5 Starts DVS Rating).
- Quiet operation an Idle, under 60 Db.
- 6x2 model includes a 300 Kw/h Battery, suited for 8 hours of operation and 150 km.
- Fast charging method, 80% in 4 h, 100% in 6.5 h.
- 100 units already in operation in United Kingdom.

Products

## Side & Rear Loading Bins



## **Plastic Rear Loading**

The most widely used refuse collection system, the bins and plastic containers from Plastik Gogić are fully compliant with the EN-840.1, 2 & 3 and ensure long lasting even in the harshest environments of heat and dust.

- Highly customizable with Thermal Printing for municipalities and service companies and optional accessories.
- Treated with UV protection additives to prevent discoloration.
- Image: Second Secon
- ➤ Wide range of colours available.
- 🕅 Low cost of ownership.
- You Quick delivery times even for large volumes.





## **Plastic Side Loading**

Currently with two different models and sizes, side loading waste containers were created with current trends in cities in mind, and designed to help the public to recycle and facilitate the work of service companies.

- ➤ 2 Volumes: 2200 & 3200 L and 2 models, Barcelona and ICON.
- Main Improved watertightness in the joint of the lid.
- ➤ User lid lock with progressive system maximizes the efficiency of the discharge.
- Central operation pedal which prevents the sides from being struck and the faults that arise as a consequence.
- Mathematical Sector Sector
- ➤ Easy access to the mechanism from the outside, even when the container is full.
- Mechanisms outside the refuse area and protected against the direct action of the washing water / weather conditions.
- M Uniformity of bolts to facilitate assembly and maintenance.

## **Metal Side Loading**

Containers suitable for Automatic Side Loading collection. Option for free full opening of the lid, or a turning/rotating semi-drums with an identification system (smart lock with Access card) working by a transponder badge.

This container model can offer standard mechatronic customized solutions in order to avoid any structural or functional troubles

- 3 volumes: 1800, 2200 and 3200 L
- Made of 3 pieces for improved structural strength
- Symmetrical (Round) and Asymmetrical lid options.
- Optional customizations: Inlets, pedal, Filling sensor, painting...
- Mighly resistant to temperatures, shocks, dust, fire...
- Easy repairing and painting.
- M 1 person operation from the truck with Side compactors.
- Fully recyclable with high value post use.

## Professional Refurbishing & Maintenance services

Refurbishing and Maintenance

## Inspection & Refurbishing

441461

MD UT-2

- Full body Inspection and refurbishment including carriage plate, packer, tailgate, lifter, body floor & sides.
- ℜ Replacement of parts with original OEM Spare parts
- Main Inspection, repair and refurbishment of hydraulic cylinders.
- Main Inspection and replacement of hydraulic and tubes.
- Y Full body painting & primer.
- Main Installation of skip lifter arms and Stabilizer ( if required).

## **Maintenance Services**

Services

TERBERG

- 1 year warranty included in all capital equipment sales.
- 2 & 3 years after sale warranty extensions.
- Maintenance Training from our technicians
- Welding and operative modifications.
- Software updates and fixing. Troubleshooting assistance.
- Weekly/monthly/yearly scheduled revisions and servicing.
- ▶ Electromechanical experts with over 15 years experience.



## Spare parts



## Spare parts

We understand the importance of great, world class service. We know that a product however good is still just a product.

For a truly great whole life experience, you need exceptional after-sales support, a trustworthy service response, a reliable spare parts service and excellent training which is exactly we offer each and every client to ensure a cradle to grave package that is unmatched in our industry.

- Large stock of spare parts immediately available.
- TRRG provides a 24/7 service in case of emergency call.
- Spare parts available in 24/48 hours maximum.
- Moriginal OEM Spare parts.

- Monline parts ordering
- Extensive package of commercial and technical training and expertise at the disposal of worldwide distributors.
- → OEM service centre across the globe with 24/7 support
- M Distributors and factories worldwide & Single point factory contacts
- M Dedicated team for Global Markets with experienced worldwide personnel.
- Main Innovative online platforms for support and aftercare.
- Excellent and experienced distributors across the world providing factory standard service and support



# **THANK YOU**

