



Material Handling

Smooth, Precise and Intelligent Efficiency

Lift safely and easily with Binar Handling.



SOLUTIONS FOR YOUR SPECIFIC INDUSTRY

Vacuum handling systems from Schmalz are used in a wide variety of industries all looking to ensure safe and efficient material flows. Our years of experience coupled with a commitment to understand our customers' needs means we produce products that meet the highest standards and provide innovative solutions. Schmalz Handling Systems allow for loads to be handled quickly and efficiently all while protecting your employee's safety. Schmalz can even work with you to provide a complete workplace solution with a handling system and crane designed specifically for your needs.

Here are some of the industries where our handling systems have streamlined processes:



Logistics



Wood



Metal & Metal Sheets



Food & Beverage



Chemical & Pharmaceuticals



Automotive



Plastic



Glass



Solar



Wind Energy



Let Us Develop a Personalized Solution for Your Handling Systems Needs



Fill out this questionnaire to find out which Schmalz products are best for your specific needs. Give us the exact details of your workpiece and application and our engineers will determine the best solution to streamline your workflow.



With our Test Material Submission Form, you can send materials inhouse for review and testing. Our applications engineers will provide a video of the solution they come up with for you to review.



Binar Handling – Offering Ergonomic Handling Technology

- Products are available worldwide via the Schmalz global network in 80 + countries
- Sold through subsidiaries and dealers in 35 countries
- 6 locations in 5 countries for outstanding customer service
- 43 years of offering innovative ergonomic handling solutions

Binar Handling is the Leading Manufacturer of Electric Manipulators Including End Effectors

Schmalz acquired Swedish company Binar Handling AB in March 2022. Binar Handling is headquartered in Trollhättan, Sweden, and has subsidiaries in Germany, France, Turkey, and China. Founded in 1979, Binar Handling develops and manufactures a wide range of ergonomic lifting devices and lifting systems.

The control handle embodies the expert knowledge required to prevent repetitive strain injuries due to poor working posture and unnecessary lifting maneuvers. Binar Handling products are used in different applications in many industries. The Binar Handling product list includes:



Manipulator Arms



Rail Systems



Control Units



End Effectors

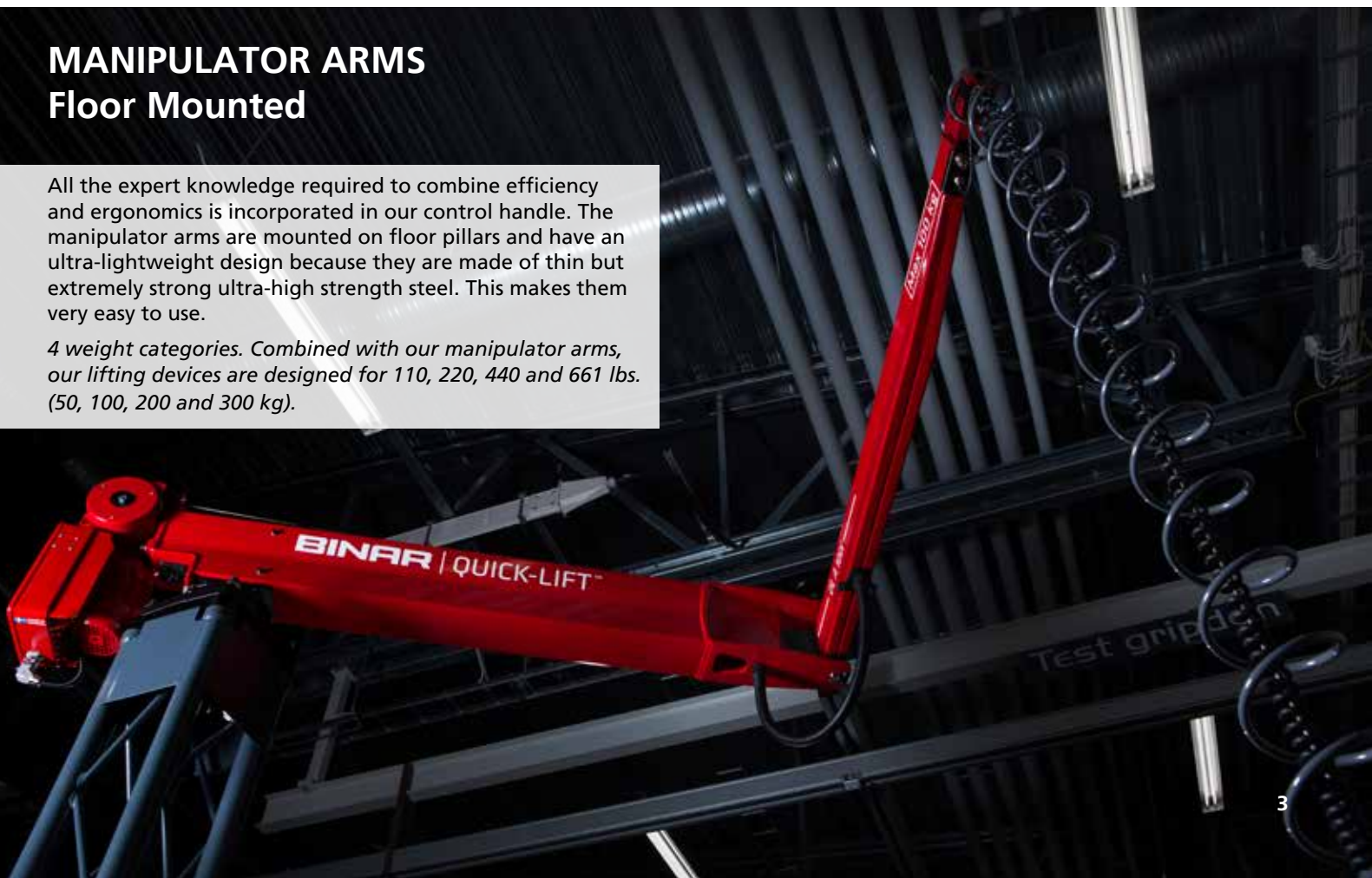


NEO 30

MANIPULATOR ARMS Floor Mounted

All the expert knowledge required to combine efficiency and ergonomics is incorporated in our control handle. The manipulator arms are mounted on floor pillars and have an ultra-lightweight design because they are made of thin but extremely strong ultra-high strength steel. This makes them very easy to use.

4 weight categories. Combined with our manipulator arms, our lifting devices are designed for 110, 220, 440 and 661 lbs. (50, 100, 200 and 300 kg).



RAIL SYSTEMS

Available in Quick-Lift Rail and Quick-Lift Driven

The Quick-Lift Rail is rail mounted equipment with manual movement in the X and Y axes. Vertical lifting is very smooth when using our precision control handle. The Quick-Lift Driven is mounted to ceiling or floor rails and offers unique motor-assisted operation on the X and Y axes, following even the most minor movements of the operator. This helps maintain an effortless motion over long distances without strain.

The Quick-Lift Rail and the Quick-Lift Driven equipment is the optimum solution when working in a large area.



CONTROL UNITS

Get a Grip with Ergonomic Lifting Devices



Our ergonomic control handle converts the movement of your hand into electronic signals. It is available in several different configurations. There is also a configuration where it can be split into two parts so that the operator's work posture is more ergonomic even when using large end effectors.

Safety is built in. The handle sensors ensure that the control handle detects the movements of your hand correctly. The load cell with built-in auto balance float mode clearly signals when you can let go of the control handle and move the workpiece by hand. The software of the control system converts the signals from the handle and sends them to the motor, where another monitoring software unit checks the movement signal.

Quick-Lift Rail can lift 1,320 lbs. (600 kg) without any effort. The ergonomic lifting device is an extension of the movement of your hand and arm, so you only need to move the handle slightly to raise or lower your goods.

Rotating Swivel Increases Productivity

The wire rope, the compressed-air line, and the signal cable always follow the lifting device smoothly thanks to the rotating and robust swivel made of anodized aluminum. The swivel is standard and effortlessly prevents any unnecessary stops in production.

The wire rope is rotation free, which means it is subject to less wear and lasts longer. The signal cable is spiral shaped and wound around the wire rope as is the compressed-air line. This means that they never get entangled. The signal cable's swivel connection has special protective casing.

Our rotating swivel is standard for our lifting devices.



NEO 30 Innovation Beyond Gravity



The NEO 30 is a revolutionary smart-lifting device that sets the new standard of lifting goods in a fast and easy way. It was developed to meet an existing challenge on the market, and combines the quality, safety and user-friendliness that come from the Binar team's expert knowledge.

Use NEO 30 to lift goods up to 66 lbs. (30 kg) with minimum effort. It's battery-driven and easy to move around. It can operate on different working stations and works with a wide range of standard end effectors. The package comes with the NEO 30, a swivel, adapter, charger, two batteries, a hook and product manual.

Start using the NEO 30 in three easy steps:

- 1. Hang it on any attachment.*
- 2. Insert the battery.*
- 3. Push the green button.*

You're now ready to go!

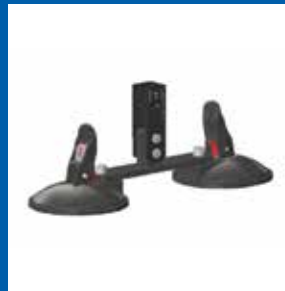
NEO 30 End Effectors



Productivity Hook



Single Suction Cup



Double Suction Cups



Canister Hook



Magnet



Adjustable Scissor

STANDARDIZED SOLUTIONS

MECHANICAL END EFFECTORS

Hooks

Fixed Hook with Spring Lock



- Fixed hook can be mounted with either internal thread or quick connect
- WLL: 300 kg/660 lbs.

Fixed Hook with Safety Latch



- Fixed hook can be mounted with either internal thread or quick connect
- WLL: 300 kg/660 lbs.

Productivity Hook with Internal Thread



- The manual lever for opening and closing the safety of the hook provides easy use and above all a safe working condition for the operator.
- WLL: 125 kg/275 lbs.

Drum Hook



- The Drum Hook is designed for a quick and easy grab and release of drum handles.
- Can be mounted with either internal thread or quick connect
- WLL: 50 kg/100 lbs.

Scissors

Scissor (small)



- The scissor's arms can be manually adjusted between 260-500mm.
- The design of the scissor's arms minimizes the pinching risk while operating the end effector.
- Can be mounted with either internal thread or quick connect
- WLL: 50 kg/88 lbs.

Scissor (large)



- The scissor's arms can be manually adjusted between 380-620mm.
- The design of the scissor's arms minimizes the pinching risk while operating the end effector.
- Can be mounted with either internal thread or quick connect
- WLL 125 kg/275 lbs.

END EFFECTORS

with Pneumatic Clamping

Round Bar End Effector
50 - 70mm



- End Effector for pick and place of round bars.
- Grip and release is controlled using the two lower push buttons.
- Non-drop functionality for maximum operator safety allowing grip and release only when lifting object is put down.
- WLL 30 kg/66 lbs.

Round Bar End Effector
70 - 90mm



- End Effector for pick and place of round bars.
- Grip and release is controlled using the two lower push buttons.
- Non-drop functionality for maximum operator safety allowing grip and release only when lifting object is put down.
- WLL 45 kg/99 lbs.

Triple Jaw End Effector
for Internal Grip



- End Effector for pick and place of circular objects.

Triple Jaw End Effector
for External Grip



- End Effector for pick and place of circular objects.

END EFFECTORS

with Suction for Vacuum

- Grip and release is controlled using the lower push button.
- Non-drop functionality for maximum operator safety allowing grip and release only when lifting object is put down.
- Supervision of vacuum level at all time, no lifting allowed during low vacuum.
- Low vacuum is indicated both with buzzer and warning led.

Vacuum End Effector
Single Cup



- End Effector for pick and place of flat objects.
- WLL 40 kg/88 lbs.

Vacuum End Effector - Tiltable
with Two Suction Cups



- Tiltable 0-90 degree End Effector for handling flat objects.
- WLL 60 kg/ 133 lbs.

Vacuum End Effector - Double
Suction Cup for Box Handling



- For pick and place of cardboard boxes.
- Suitable for cardboard box and other non-porous lifting objects.
- WLL 22 kg/ 49 lbs.

Vacuum End Effector
Area Gripper



- Equipped with foam underneath for handling uneven surfaces as well as objects in a variety of sizes.
- WLL 15 kg/33 lbs.

STANDARDIZED SOLUTIONS (continued)

MAGNET END EFFECTORS

Fixed Magnet End Effector



- Can be used for both round as well as flat objects.
- WLL 110 kg/243 lbs.

Magnetic End Effector Tilttable



- Can be used for both round as well as flat objects.
- WLL 275 kg/ 606 lbs.

MODULAR for End Effectors Design

Small Parallel End Effector Module



- Building block for clients looking to build their own lifting tool
- Built in mechanical grip/release function which is activated every other occasion that the tool is fully unloaded.
- WLL 115 kg/254 lbs.

Large Parallel End Effector Module



- Building block for clients looking to build their own lifting tool.
- Built in mechanical grip/release function which is activated every other occasion that the tool is fully unloaded.
- Designed for gripping under the lifting object, not for lifting with friction clamping.
- WLL 115 kg/254 lbs.

MODULAR END EFFECTORS

- A modular based concept based on Schmalz SRX profiles.
- The round main frame allows each cup/magnet to be rotated in multiple directions to find the proper position and angle towards the lifting object.
- Using handle with built in valve to control all cups/magnet with a single push button.



Vacuum End Effector Adjustable 2 Suction Cups



- Multi-use End Effector for handling a variety of flat objects with non-porous surfaces.
- With 2 suction cups, WLL 30 kg/66 lbs.

Vacuum End Effector Adjustable 4 Suction Cups



- Multi-use End Effector for handling a variety of flat objects with non-porous surfaces.
- With 4 suction cups WLL 40 kg/88 lbs.

Magnetic End Effector 4 Magnets

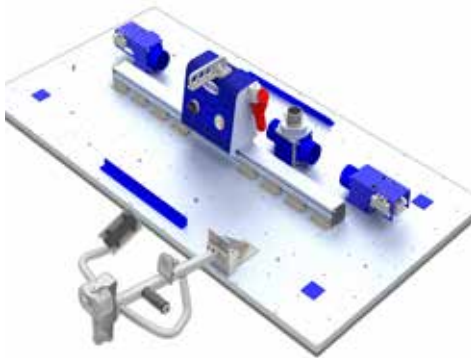


- Adjustable and extendable magnet End Effector for pick and place
- All joints designed with stepless rotary settings to allow almost endless possibilities for adjustment.
- WLL 40 kg/88 lbs.

CUSTOM MADE IS STANDARD WITH US

Every problem has its solution. We are intrigued by the opportunity to come up with yet another intelligent customized solution for our clients. The way we go about it is optimizing the correlation of ergonomics and productivity in every step in the lifting moment. The result is another happy customer and new innovations!

Foam Layer Gripper with External Blower



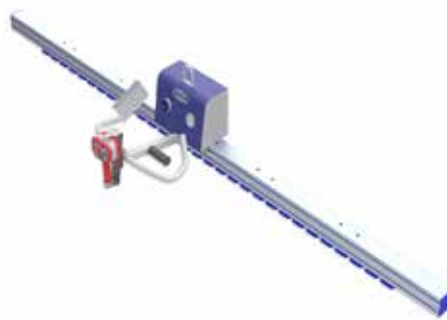
- Lifts raw material and post machining parts of various size and shape
- 150 lbs capacity

Tool Features:

Auto-Balance, Anti-Drop, Float Mode



VacuMaster Comfort with Custom Head



- Lifts long, skinny workpieces
- 350 lbs capacity

Tool Features:

Auto-Balance, Anti-Drop, Float Mode

Battery Gripper



- Lifts batteries off conveyor and placing in containers.
- 35 lbs capacity

Tool Features:

Auto-Balance, Anti-Drop, Positive Pick Confirmation, Blow-Off, Float Mode



Plenum Can Gripper



- Depalletizes 24 cans and loads into a hopper.
- 24 can capacity

Tool Features:

Auto-Balance, Anti-Drop, Blow-Off, Float Mode

Can Gripper and Packer



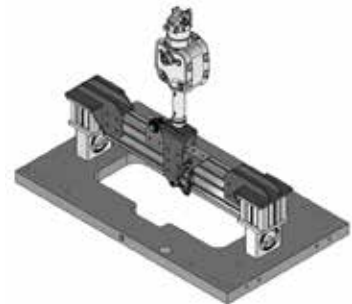
- Built to lift 3 rows of 5 cans from the conveyor lines, placing in the correct footprint and then inserting into a box.
- 15 can capacity (12 or 16 oz)

Tool Features:

Auto-Balance, Anti-Drop, Positive Pick Confirmation, Position Activated Cup Contraction, Additional External Output for Conveyor System, Float Mode



Magnetic End Effector



- Dual function tool for magnetically lifting workpiece into a vice, then positioning and mounting the assembly of the workpiece and vice into a tombstone chuck in a vertical mill.
- 210 lb. magnetic capacity, 260 lb. hook capacity.

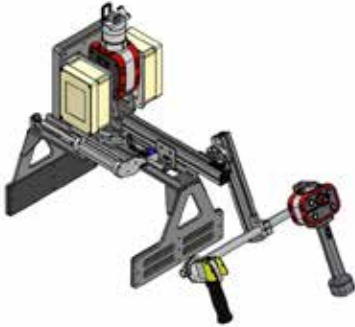
Tool Features:

Anti-Drop, Float-Mode, Magnet Status Indicator



CUSTOM MADE IS STANDARD WITH US (continued)

Pneumatic Clamp Tool



- Custom Pneumatic Clamp Tool with ability to grip open-top produce containers plus pails and sacks.
- 50 lb. capacity.

Tool Features:

Auto-Balance, Anti-Drop, Thumb Controlled External Handle, Two Hand Activation, 90 Degree Manual Rotation, Float Mode



Rubber Bale Gripper



- Tool for lifting rubber bales.
- Can be used with any standard Ergo 85/110 End Effectors.
- 250 lb. capacity.

Tool Features:

Auto-Balance, Anti-Drop, Positive Pick Confirmation, Float Mode



Dual FMP Gripper



- Tool can safely lift \$10,000+ servers into boxes and lift the filled boxes on to pallets.
- 150 lb. capacity.

Tool Features:

Auto-Balance, Anti-Drop, Positive Pick Confirmation, Float Mode



Mechanical ID Gripper



- Built for lifting wheel drums with varying diameters and thickness.
- 300 lb. capacity.

Tool Features:

Auto-Balance, Float Mode



ERGO GLASS END EFFECTORS

Developed to Handle Objects with a Flat Surface Such as Glass and Windows

Our high quality Ergo Glass end effectors are used in many different applications, from pick and place to more complex operations where the glass and windows are tilted and rotated. The ergonomic Ergo Glass end effectors ensure sustainable, safe, precise and efficient lifting and can be combined with any of the intelligent Quick-Lifts.

The Ergo Glass end effectors are offered with different configurations based on the expected use. They are available in a wide variety of options to cover the most challenging applications. If your need is not covered within the standard configurations, talk with a sales representative for a customized solution.

Six standard versions of Ergo Glass end effectors are available.



Schmalz End Effectors

Schmalz offers many additional end effectors that have evolved from the needs of our customers. These can be used with our line of Jumbo tube lifters and/or our can be adapted to our Binar Handling servo hoist products. And we're always open to developing new solutions:



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