

# VACUOGRIP VGH

## Horizontal vacuum lifting devices

Horizontal handling of loads from 100 to 1,000 kg



Industry-specific applications



Movements



Horizontal

The VACUOGRIP VGH line of vacuum lifting devices is COVAL's standard product addressing such needs as handling smooth and non-porous loads by a single user.

They are easy to use and stand out due to their reliability and all-round ruggedness.

VGH VACUOGRIP vacuum lifting devices are specifically designed for the following applications:

- Palletizing and depalletizing
- Feeding machinery
- Unloading conveyors

Lifting capacity	Max. load (kg)									
Model	100	200	300	400	500	600	700	800	900	1000
VACUOGRIP VGH1	█									
VACUOGRIP VGH3	█	█	█							
VACUOGRIP VGH5	█	█	█	█						
VACUOGRIP VGH8	█	█	█	█	█					
VACUOGRIP VGH10	█	█	█	█	█	█	█	█	█	█

### PACK PK2\_ and PK4\_

Powerful warning light to warn the operator of a power failure.

### SPRING SYSTEMS

To guarantee that all the suction cups come into contact with the load, VACUOGRIP units are equipped with spring systems as standard:



### SUCTION CUPS

The suction cups are made of nitrile, which guarantees that handled loads won't be damaged and also offers excellent resistance to hydrocarbons (oils).

Ø 120 mm VPG120NBR  
Ø 200 mm VPG200NBR  
Ø 240 mm SPL240NBRTS  
Ø 340 mm SPL340NBRTS

### PACK PK1\_

Control panel including the Pick up / Release buttons as well as safety features.

### PACK PK3\_

For applications that require remote control of the lifting device, the PK3 PACK provides a control box that can be removed and snapped onto the handlebar, which includes the Pick up / Release controls and a 4 m long cable sheath.

In addition, the control box housing the safety features is in a vertical position for better visibility.



### 1/4 TURN VALVE

For applications requiring frequent format changes, the VACUOGRIP lifting devices can be equipped with 1/4 turn shutoff valves on each suction cup.



### OPTIONS: INTEGRATION OF ELECTRIC HOIST CONTROLS



Controls of the electric hoist and/or of the bridge crane are integrated in the control panel or in the removable control box (low-voltage control, 48 V max.):

#### PK\_1

- 1 "emergency stop" button
- 1 "up" button
- 1 "down" button

#### PK\_2

- 1 "emergency stop" button
- 1 "up" button
- 1 "down" button
- 1 "left" button
- 1 "right" button

#### PK\_3

- 1 "emergency stop" button
- 1 "up" button
- 1 "down" button
- 1 "left" button
- 1 "right" button
- 1 "forward" button
- 1 "reverse" button

# VACUOGRIP VGH

## Horizontal vacuum lifting devices

Horizontal handling of loads from 100 to 1,000 kg



**OPTION PACKS**

**VG H 5**      **E2 \_ 6 \_ X \_ \_**      **PK 1 X**

TYPE	POWER	1/4 TURN VALVE	VACUOGRIP CONTROL	HOIST CONTROL
horizontal <b>H</b>	Pneumatic <b>P1</b>	<b>X</b> Without valve	Control buttons on handlebar <b>1</b>	<b>X</b> No hoist control
<b>SWL</b>	Pneumatic with water trap <b>P3</b>	<b>V</b> With valve	Same as 1 + visual alarm via a warning light <b>2*</b>	<b>1</b> Integrated hoist control Up/Down
100 kg <b>1</b>	3-phase 230 V <b>E1</b>		Control buttons on removable control box (snappable onto handlebar) <b>3</b>	<b>2</b> Integrated hoist control Up/Down + Left/Right
300 kg <b>3</b>	3-phase 400 V <b>E2</b>		Same as 3 + visual alarm via a warning light <b>4*</b>	<b>3</b> Integrated hoist control Up/Down + Bridge crane Left/Right Forward/Reverse
500 kg <b>5</b>	3-phase 400 V: lubricated rotary vane pump with water trap <b>E3</b>			
800 kg <b>8</b>	Single-phase 230 V <b>E4</b>			
1,000 kg <b>10</b>				

*\* Only available in electric version*

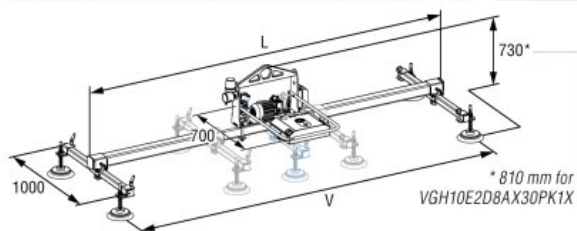
**NUMBER OF SUCTION PADS (to be determined based on table below)**

Min. thickness	Max. dimensions of sheet metal to be handled (LxW) in mm				
	2000x1000	3000x1500	4000x2000		
0.5 mm	6	8	-	4	<b>4</b>
1 mm	4	6	8	6	<b>6</b>
1.5 mm	4	6	8	8	<b>8</b>
2 mm	4	4	8		

**ACCESSORIES (upon request)**

We have several accessories available upon request that will enable you to further integrate your VACUOGRIP in your facility:

- Coiled power cable
- Coiled cable for integration of hoist controls, etc.



### CUSTOM-MADE VERSIONS

There may be situations in your business where our standard versions are not perfectly suited to your needs.

COVAL can provide custom-made solutions that meet your specifications, by integrating custom functions or by offering tailor-made vacuum lifting devices (adjusted in size or with a different type of suction cup).

### 4-suction cup VACUOGRIP VGH

Max. load (kg)	Length of main beam (L)	No. of auxiliary beams	Distance between suction cups (V)	Min. sheet format	Type of suction pads	Spring system	Weight	Part no.*
100	1700 mm	2	from 825 mm to 1725 mm	400 x 900 mm	VPG120NBR	TS4 50	104 Kg	VGH1E2A4AX17PK1X
300				500 x 1000 mm	VPG200NBR	TS4 50	107 Kg	VGH3E2C4AX17PK1X
500				550 x 1050 mm	SPL240NBR	TS4 50	112 Kg	VGH5E2D4AX17PK1X
800				750 x 1150 mm	SPL340NBR	TS5 60	147 Kg	VGH8E2E4BX17PK1X
1000				750 x 1150 mm	SPL340NBR	TS5 60	147 Kg	VGH10E2E4BX17PK1X

### 6-suction cup VACUOGRIP VGH

Max. load (kg)	Length of main beam (L)	No. of auxiliary beams	Distance between suction cups (V)	Min. sheet format	Type of suction pads	Spring system	Weight	Part no.*
100	2500 mm	3	from 825 mm to 2550 mm	400 x 900 mm	VPG120NBR	TS4 50	117 Kg	VGH1E2A6AX25PK1X
300				500 x 1000 mm	VPG200NBR	TS4 50	120 Kg	VGH3E2C6AX25PK1X
500				600 x 1050 mm	SPL240NBR	TS4 50	130 Kg	VGH5E2D6AX25PK1X
800				750 x 1150 mm	SPL340NBR	TS5 60	180 Kg	VGH8E2E6BX25PK1X
1000				750 x 1150 mm	SPL340NBR	TS5 60	180 Kg	VGH10E2E6BX25PK1X

### 8-suction cup VACUOGRIP VGH

Max. load (kg)	Length of main beam (L)	No. of auxiliary beams	Distance between suction cups (V)	Min. sheet format	Type of suction pads	Spring system	Weight	Part no.*
100	3000 mm	4	from 1210 mm to 3025 mm	400 x 1300 mm	VPG120NBR	TS4 50	137 Kg	VGH1E2A8AX30PK1X
300				500 x 1500 mm	VPG200NBR	TS4 50	143 Kg	VGH3E2C8AX30PK1X
500				500 x 1500 mm	VPG200NBR	TS4 50	143 Kg	VGH5E2C8AX30PK1X
800				500 x 1620 mm	SPL240NBR	TS4 50	163 Kg	VGH8E2D8AX30PK1X
1000				500 x 1620 mm	SPL240NBR	TS4 50	175 Kg	VGH8E2D8AX30PK1X

\* Weight and part number are specified for VACUOGRIP VGH Electric 3-ph. 400 V, without 1/4 turn valve, with Pick up/Release controls on control panel, without hoist control integration option