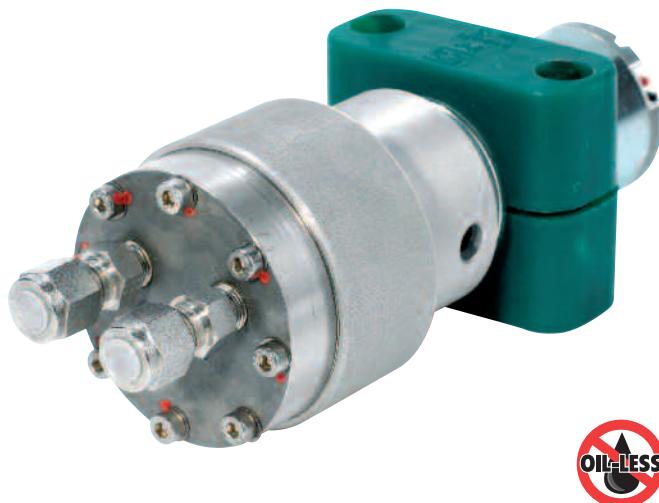




## Gascirculators

**Series GK-M 02, GK-M 04, GK-M 07,  
TFK-M 1, TFK-M 5.1, TFK-M 16.1**



### Product Features

- Magnetically coupled
- Oil-less
- Air tight
- System pressure to 150 bar
- Wetted parts made out of stainless steel, carbon, viton, ceramics, magnet material
- Pump speed adjustable by changing voltage supply (DC)

### Range of Applications

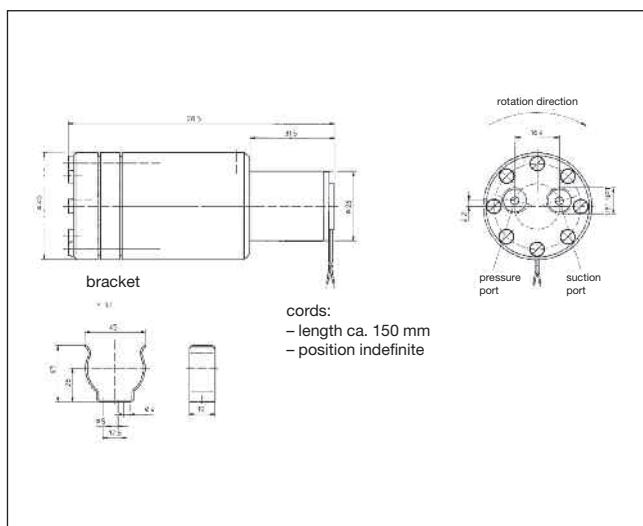
- Conveyance of critical gasses
- Gas analysis
- All applications where air tightness of the system is a must



# Gascirculator GK-M 02

**THOMAS**  
A Gardner Denver Product

<b>Flow</b>	<b>2,8 l/min</b>
<b>Max. pressure</b>	<b>75 mbar</b>
<b>Max. vacuum</b>	<b>-125 mbar</b>



## Pneumatic Data

Description	GK-M 12/02	GK-M 24/02
Part number	51402	51403
Max. flow	2,5 l/min	2,8 l/min
Max. pressure	75 mbar	75 mbar
Max. continuous pressure difference <sup>1)</sup>	75 mbar	75 mbar
Max. vacuum	-100 mbar	-125 mbar
Max. system pressure	150 bar	150 bar

## Electrical Data

Motor type	Permanent magnet	Permanent magnet
Nominal voltage	12 V DC	24 V DC
Max. current consumption <sup>2)</sup>	0,12 A	0,10 A
Motor rating	9,1 W	13 W
Motor insulation class	B	B
Protection class	IP40	IP40
Motor bearing	Sleeve bearing	Sleeve bearing

## General Data

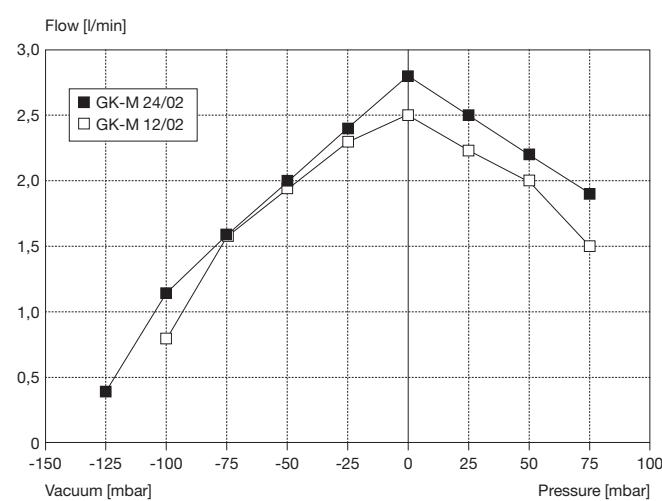
Max. ambient temperature	30 °C	30 °C
Max. medium temperature	60 °C	60 °C
Weight	0,5 kg	0,5 kg
Direction of rotation	cw	cw

<sup>1)</sup> Measured at open system with pressure side throttled.

<sup>2)</sup> Measured at max. differential pressure.

All flow values measured on suction side.  
Gascirculator is not ATEX approved.

## Flow curves

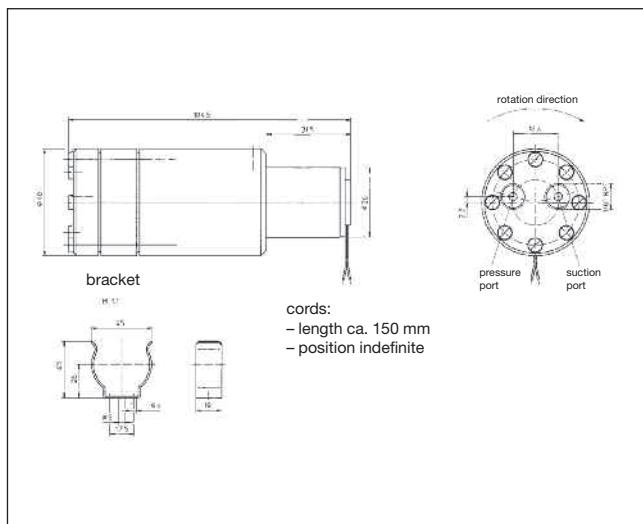


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## Gascirculator GK-M 04

<b>Flow</b>	4,7 l/min
<b>Max. pressure</b>	100 mbar
<b>Max. vacuum</b>	-125 mbar



## Pneumatic Data

Description	GK-M 12/04	GK-M 24/04
Part number	51407	51438
Max. flow	4,2 l/min	4,7 l/min
Max. pressure	100 mbar	100 mbar
Max. continuous pressure difference <sup>1)</sup>	100 mbar	100 mbar
Max. vacuum	-125 mbar	-125 mbar
Max. system pressure	150 bar	150 bar

## Electrical Data

Motor type	Permanent magnet	Permanent magnet
Nominal voltage	12 V DC	24 V DC
Max. current consumption <sup>2)</sup>	0,26 A	0,18 A
Motor rating	9,1 W	13 W
Motor insulation class	B	B
Protection class	IP40	IP40
Motor bearing	Sleeve bearing	Sleeve bearing

## General Data

Max. ambient temperature	30 °C	30 °C
Max. medium temperature	60 °C	60 °C
Weight	0,5 kg	0,5 kg
Direction of rotation	cw/ccw	cw/ccw

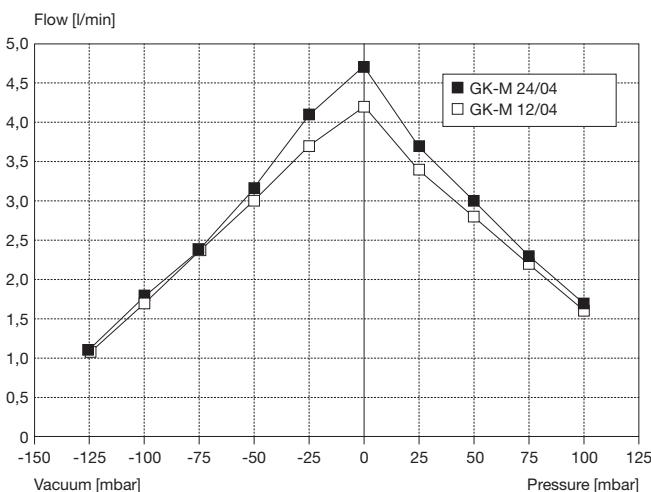
<sup>1)</sup> Measured at open system with pressure side throttled.

<sup>2)</sup> Measured at max. differential pressure.

All flow values measured on suction side.

Gascirculator is not ATEX approved.

## Flow curves



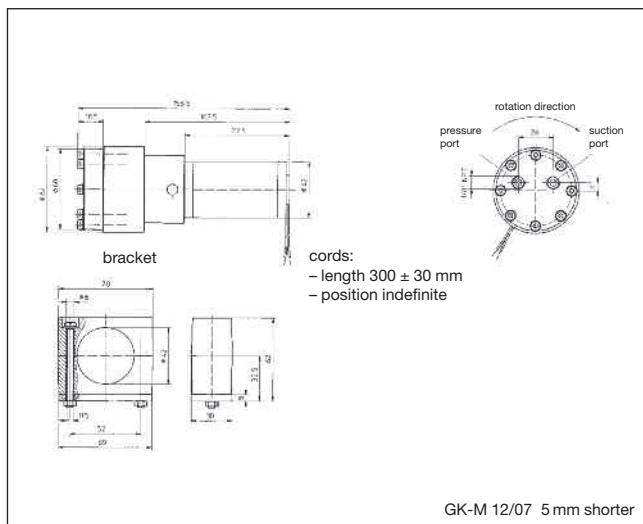
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# Gascirculator GK-M 07

**THOMAS**  
A Gardner Denver Product

<b>Flow</b>	<b>7,4 l/min</b>
<b>Max. pressure</b>	<b>100 mbar</b>
<b>Max. vacuum</b>	<b>-325 mbar</b>



GK-M 12/07 5 mm shorter

## Pneumatic Data

Description	GK-M 12/07	GK-M 24/07
Part number	51444	51440
Max. flow	7,4 l/min	6,2 l/min
Max. pressure	100 mbar	100 mbar
Max. continuous pressure difference <sup>1)</sup>	100 mbar	100 mbar
Max. vacuum	-325 mbar	-325 mbar
Max. system pressure	150 bar	150 bar

## Electrical Data

Motor type	Permanent magnet	Permanent magnet
Nominal voltage	12 V DC	24 V DC
Max. current consumption <sup>2)</sup>	1,2 A	0,5 A
Motor rating	18 W	24 W
Motor insulation class	E	E
Protection class	IP40	IP40
Motor bearing	Sleeve bearing	Sleeve bearing

## General Data

Max. ambient temperature	30 °C	30 °C
Max. medium temperature	60 °C	60 °C
Weight	1,5 kg	1,4 kg
Direction of rotation	cw/ccw	cw/ccw

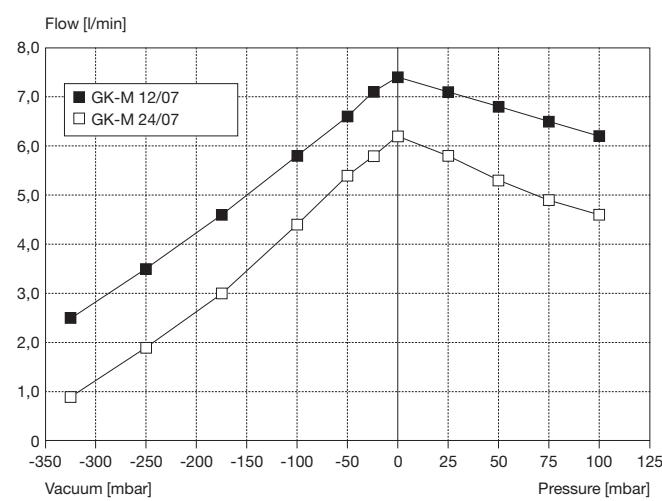
<sup>1)</sup> Measured at open system with pressure side throttled.

<sup>2)</sup> Measured at max. differential pressure.

All flow values measured on suction side.

Gascirculator is not ATEX approved.

## Flow curves



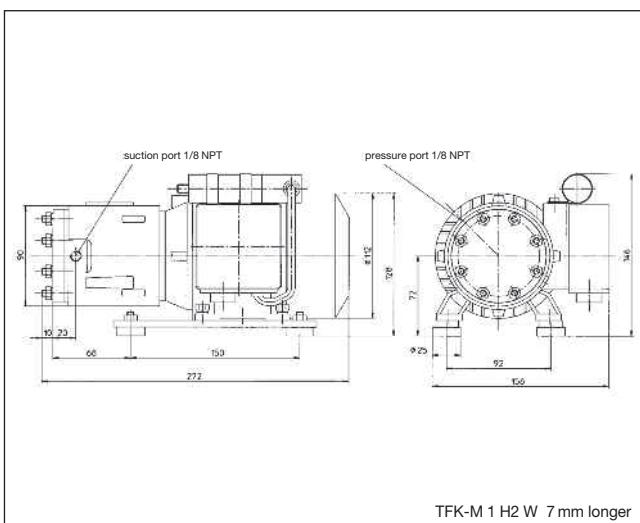
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# Gascirculator TFK-M 1

**THOMAS**  
A Gardner Denver Product

<b>Flow</b>	<b>1,6 m<sup>3</sup>/h</b>
<b>Max. pressure</b>	<b>300 mbar</b>
<b>Max. vacuum</b>	<b>-300 mbar</b>



## Pneumatic Data

Description	TFK-M 1 W	TFK-M 1 H2 W
Part number	51467	51468 <sup>3)</sup>
Max. flow	1,6 m <sup>3</sup> /h	1,6 m <sup>3</sup> /h
Max. pressure	300 mbar	300 mbar
Max. continuous pressure difference <sup>1)</sup>	200 mbar	200 mbar
Max. vacuum	-300 mbar	-300 mbar
Max. system pressure	150 bar	50 bar

## Electrical Data

Motor type	Capacitor	Capacitor
Nominal voltage	230 V/50 Hz	230 V/50 Hz
Max. current consumption <sup>2)</sup>	0,7 A	0,7 A
Motor rating	90 W	90 W
Motor insulation class	F	F
Protection class	IP54	IP54
Motor bearing	Ball bearing	Ball bearing

## General Data

Max. ambient temperature	30 °C	30 °C
Max. medium temperature	60 °C	60 °C
Weight	6,2 kg	6,5 kg
Direction of rotation	cw	cw

<sup>1)</sup> Measured at open system with pressure side throttled.

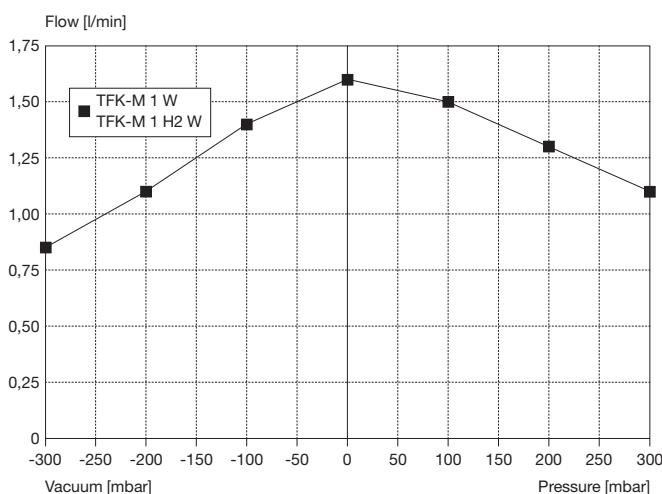
<sup>2)</sup> Measured at max. differential pressure.

<sup>3)</sup> Recommended for use if pumping medium contains hydrogen.

All flow values measured on suction side.

Gascirculator is not ATEX approved.

## Flow curves



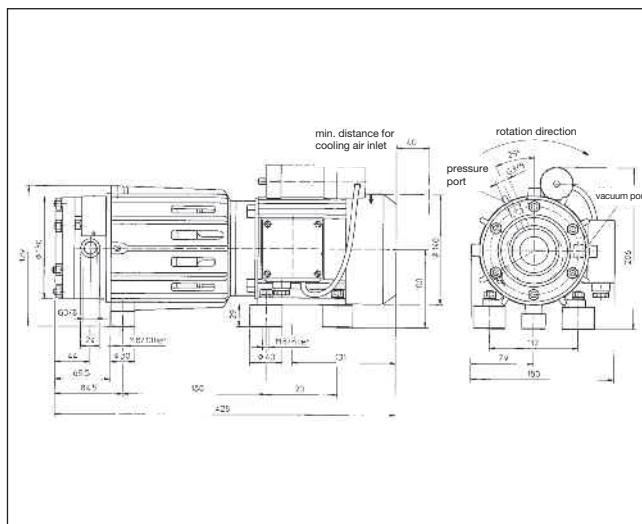
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# Gascirculator TFK-M 5.1

**THOMAS**  
A Gardner Denver Product

<b>Flow</b>	<b>4,6 m<sup>3</sup>/h</b>
<b>Max. pressure</b>	<b>500 mbar</b>
<b>Max. vacuum</b>	<b>-600 mbar</b>



## Pneumatic Data

Description	TFK-M 5.1 D
Part number	51462
Max. flow	4,6 m <sup>3</sup> /h
Max. pressure	500 mbar
Max. continuous pressure difference <sup>1)</sup>	400 mbar
Max. vacuum	-600 mbar
Max. system pressure	50 bar

## Electrical Data

Motor type	Three phase AC
Nominal voltage	400 V/50 Hz
Max. current consumption <sup>2)</sup>	0,7 A
Motor rating	370 W
Motor insulation class	F
Protection class	IP54
Motor bearing	Ball bearing

## General Data

Max. ambient temperature	30 °C
Max. medium temperature	60 °C
Weight	21,8 kg
Direction of rotation	cw

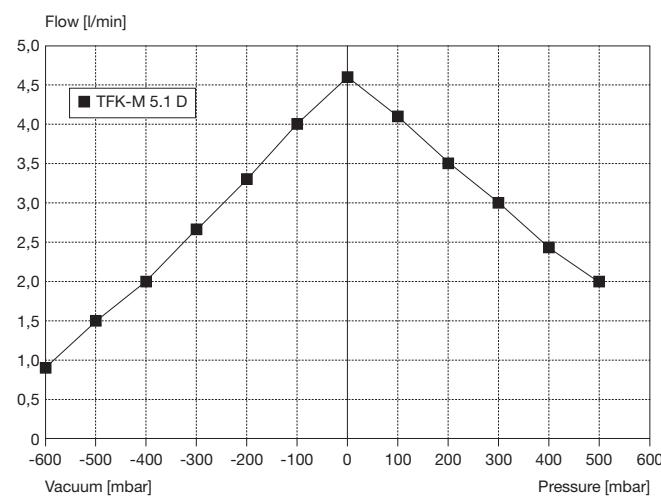
<sup>1)</sup> Measured at open system with pressure side throttled.

<sup>2)</sup> Measured at max. differential pressure.

All flow values measured on suction side.

Gascirculator is not ATEX approved.

## Flow curves



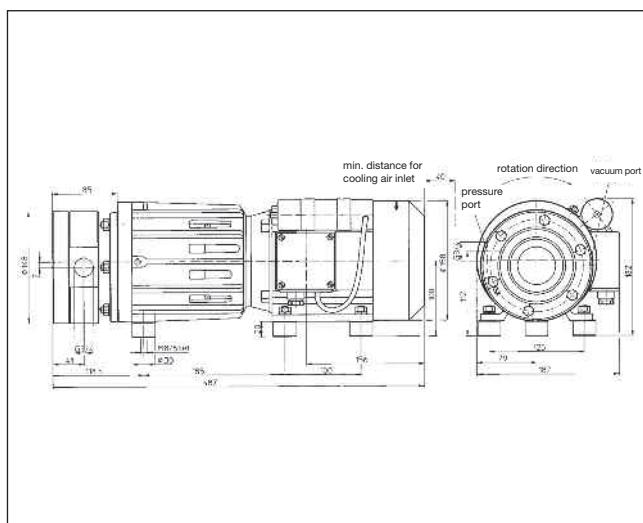
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# Gascirculator TFK-M 16.1

**THOMAS**  
A Gardner Denver Product

<b>Flow</b>	<b>15,5 m<sup>3</sup>/h</b>
<b>Max. pressure</b>	<b>500 mbar</b>
<b>Max. vacuum</b>	<b>-800 mbar</b>



## Pneumatic Data

Description	TFK-M 16.1 D
Part number	51433
Max. flow	15,5 m <sup>3</sup> /h
Max. pressure	500 mbar
Max. continuous pressure difference <sup>1)</sup>	400 mbar
Max. vacuum	-800 mbar
Max. system pressure	50 bar

## Electrical Data

Motor type	Three Phase AC
Nominal voltage	400 V/50 Hz
Max. current consumption <sup>2)</sup>	1,7 A
Motor rating	750 W
Motor insulation class	F
Protection class	IP54
Motor bearing	Ball bearing

## General Data

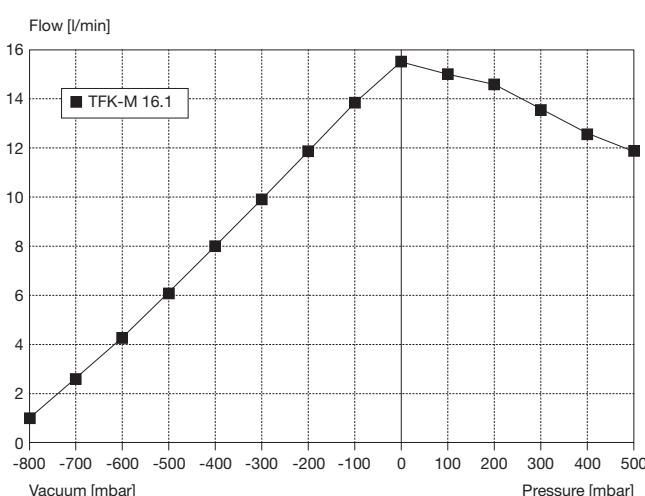
Max. ambient temperature	30 °C
Max. medium temperature	60 °C
Weight	28,5 kg
Direction of rotation	cw

<sup>1)</sup> Measured at open system with pressure side throttled.

<sup>2)</sup> Measured at max. differential pressure.

All flow values measured on suction side.  
Gascirculator is not ATEX approved.

## Flow curves



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