

SCROLLVAC 3/3S plus

Superior performance in a compact package





Clean, compact & capable

Looking for compact yet powerful pumping performance to drive your R&D projects forward?

It's time you discovered the advantages of clean, dry, and oil-free scroll technology!

The Leybold SCROLLVAC 3S plus extends the Leybold range of scroll pumps, combining high pumping speed with good ultimate vacuum in a compact, flexible, quiet, and reliable package.

A technology requiring very little maintenance...

The SCROLLVAC 3S plus is as easy to use as it is to integrate in your laboratory setting.

As such, it offers a clean alternative to oil-sealed rotary vane pumps and an ideal dry solution for backing the Leybold TURBOVAC i range of turbos.

Applications

With its high build quality, outstanding performance, flexible design, and compact footprint, the SCROLLVAC 3 and SCROLLVAC 3S plus are ideally suited to smaller-scale laboratories and R&D applications.

- Universities
- Research institutions
- Small system builders and OEMs
- Clean industrial application
- Leak detectors



Main benefits



CLEAN & DRY PERFORMANCE

The pump that packs plenty of punch
The SCROLLVAC 3S plus gives you all the
advantages of scroll pump technology in a
clean, dry, and compact package.
All the clean, dry, high-performance pumping
without the oil to worry about.

- Less hassle
- Less risk
- Less maintenance
- Less running costs
- Less environmental impact

VERSATILE DESIGN FOR FLEXIBLE SYSTEM BUILDING

Extending the range of advanced Leybold scroll pumps, the SCROLLVAC 3S plus is optimized for backing the Leybold TURBOVAC i range of turbomolecular pumps. Making it a great choice for small-scale R&D applications.

- More choice
- More modular building blocks
- More cost-effective solutions





COMPACT YET POWERFUL

Small on footprint, big on performance Weighing in at just 8kg, the SCROLLVAC 3S plus is the smallest in the range of Leybold dry scroll pumps. But don't be fooled by its size! With peak pumping speeds of up to 3 m³/h at 50Hz (or 3.5 m³/h at 60Hz) and a typical ultimate vacuum of 0.1 mbar, the SCROLLVAC 3S plus is a very capable and dry alternative to diaphragm pumps.

■ Higher pumping speeds & better ultimate vacuum in a light, compact, & reliable package.

SYSTEM DESIGN MADE EASY

Plug, play, and repeat

The small footprint and light weight of the SCROLLVAC 3S plus make it easy to combine with your other Leybold products and integrate into your system.

Supplied as standard with DN 16 ISO-KF inlet and push-fit exhaust connections along with mains-driven motor, IEC connection, and an on-off switch for easy operation.





LONG SERVICE INTERVALS

Just fit and forget

Oil-free operation means longer service intervals and overall lower total cost of ownership.

Unlike oil-sealed rotary vane pumps, all you have to do is replace the tip seal of your SCROLLVAC 3S plus every couple of years. Which you can easily do yourself.

FLEXIBLE INSTALLATION

The SCROLLVAC 3S plus can be mounted either horizontally or vertically, if required. Optional mounting brackets and base plates make it even easier to attach the pump to any structure. The base plate can also be used to retrofit your SCROLLVAC 3S plus onto an existing Leybold Turbocart. So you can upgrade your existing system to scroll technology quickly and easily.





EFFECTIVE VAPOR HANDLING

Built-in manual gas ballast

Does your exhaust gas contain some moisture? Not to worry.

The built-in manual gas ballast on your SCROLLVAC 3S plus is capable of handling a fair amount of water vapor while still maintaining a good ultimate vacuum for reliable and consistent performance.

QUIET EFFICIENCY

High speed, low vibration

The SCROLLVAC 3 plus and SCROLLVAC 3S plus are optimized for low vibration and quiet operation.

Both models utilize a full fan cowl design. An exhaust line can also be fitted directly to the standard push-fit exhaust fitting. Otherwise, an exhaust silencer filter accessory can be used for free-standing operation. This silencer accessory is supplied as standard with the SCROLLVAC 3S plus.





SECURE PERFORMANCE

Full-feature design for a reliable seal
Both the SCROLLVAC 3 plus and SCROLLVAC
3S plus come fitted with a built-in exhaust valve
as standard, just like the larger SCROLLVAC
pumps, providing effective protection from
rapid pressure rise in the event of a power
failure.

For extra system protection, the SCROLLVAC 3S plus offers the added peace of mind of a fast-acting solenoid inlet valve to isolate the pump from your system and preserve the vacuum inside your system.

Already have protection valves built into your system? The standard SCROLLVAC 3 plus without built-in inlet valve may be better suited to your requirements.

Delay relay

And when the power is restored, a delay relay switch built-in to the SCROLLVAC 3S plus prevents the inlet valve from opening for 10 seconds to allow the pump get up to speed and evacuate itself.

QUALITY GUARANTEED

Designed and manufactured in house by Leybold

Giving you extra peace of mind!







1. Mains driven motor

- Compact air cooled motor
- Select appropriate motor variant for local electric supply
- Plug in IEC power cable
- On/off switch for local control
- Easy to set up and run



2. DN 16 ISO-KF inlet flange

Vertical or horizontal orientation for flexible system design.

Push-fit connection available as an accessory.



3. Gas ballast

Manually configured for light gas pumping and low vapour load handling, with optional adaptor for inert gases



4. Push-fit exhaust fitting

For easy connection, available on both models



5. Exhaust valve

Preventing rapid pressure rise in the backing line



6. Solenoid inlet valve* with 10 sec delay relay

Extra protection in the event of power failure. (* supplied fitted with SCROLLVAC 3S plus)



7. On/Off switch

Full control, even if plugged in at a distance from the unit itself



8. Carry handle

Built for mobility and flexible installation

Technical data & ordering information

Technical data

| | | SCROLLVAC 3 plus | SCROLLVAC 3S plus |
|---|--------------------------------|------------------------------|--|
| Max Pumping Speed (50Hz) | m ³ h ⁻¹ | | 3 |
| Max Pumping Speed (60Hz) | m ³ h ⁻¹ | | 3.5 |
| Ultimate pressure with closed gas ballast | mbar | | 0.1 |
| Ultimate pressure with gas ballast (1 turn) | mbar | | 0.15 |
| Gas Ballast flow rate (1 Turn) | slm | | 2.5 |
| Mains Voltage | V | 1 | 00 +/- 6% 1 phase 50/60 Hz |
| | V | 1 | 15 +/- 10% 1 phase 50/60 Hz |
| | V | 20 | 00 +/- 10% 1 phase 50/60 Hz |
| | V | 23 | 30 +/- 10% 1 phase 50/60 Hz |
| Power Consumption at Ultimate | w | 180 | 210 |
| Mains Connector | | IEC EN60320 C13 | |
| Noise level | dB(A) | 54 | |
| Inlet flange | | DN 16 ISO-KF | |
| Exhaust connection | | 1/8 inch BSP for 6x8 mm hose | 1/8 inch BSP for 6x8 mm hose Exhaust filter supplied |
| Weight | kg | 7.8 | 8 |
| Dimensions (W x H x D) | mm | | 158 x 231 x 224 |

Ordering information - pumps

| Part number | Description | | |
|--------------------|------------------------------------|--|--|
| Standard version | | | |
| 142030V330 | SCROLLVAC 3 plus 230V 1ph 50/60Hz | | |
| 142030V320 | SCROLLVAC 3 plus 200V 1ph 50/60Hz | | |
| 142030V310 | SCROLLVAC 3 plus 115V 1ph 50/60Hz | | |
| 142030V300 | SCROLLVAC 3 plus 100V 1ph 50/60Hz | | |
| Scientific version | | | |
| 142030V430 | SCROLLVAC 3S plus 230V 1ph 50/60Hz | | |
| 142030V420 | SCROLLVAC 3S plus 200V 1ph 50/60Hz | | |
| 142030V410 | SCROLLVAC 3S plus 115V 1ph 50/60Hz | | |
| 142030V400 | SCROLLVAC 3S plus 100V 1ph 50/60Hz | | |

Ordering information - Spares

| Part number | Description |
|-------------|-----------------------------|
| GK7440001 | Tip Seal Kit |
| GK7440002 | Bearing replacement Kit |
| GK7440003 | Gas ballast and Exhaust kit |
| GK7440004 | Inlet KF16 adaptor Kit |

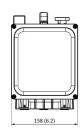
Ordering information - Accessories

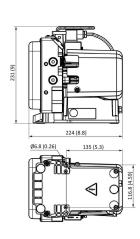
| Part number | Description |
|---------------------|---|
| 142030V450 | Inlet Valve 100 - 120V |
| 142030V451 | Inlet Valve 200 - 240V |
| 142030V452 | Delay Relay |
| 142030 V 455 | Gas ballast or Exhaust push-in fitting 1/8 inch BSP |
| 142030V456 | Gas ballast fine restrictor |
| 142030V457 | Inlet Push-in fitting 1/4 inch BSP |
| 142030V458 | Inlet 1/4 inch BSP adaptor |
| 142030V459 | SCROLLVAC 3 plus Base mounting plate |
| 142030V460 | Bracket |
| 142030V461 | Exhaust Silencer / gas ballast filter 1/8 inch BSP |
| 142030V462 | Vibration Isolator Kit |
| 142030 V 466 | Adhesive rubber pads (pack of 4) |
| 140125T | Inlet Filter DN25 ISO KF |
| 800102V0003 | Lead Assembly, 10 Amax, C13, UK |
| 800102V0002 | Lead Assembly, 10 Amax, C13, Europe |
| 800102V1002 | Lead Assembly, 10 Amax, C13, USA |

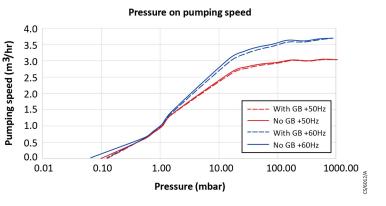
Dimensions & Pumping speed

... small and performant

DIMENSIONS







— PUMPING SPEED

SCROLLVAC 3/3S plus



Leybold

Pioneering products. Passionately applied.

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