

# Tri-lobe Blowers Trinado/Scirocco

**N10, N08** Blower Range:  
355 - 2033 (M<sup>3</sup>/HR)

## Based on Success

HR Blowers are one of the world's leading air blower manufacturers and have a reputation for quality, innovation and service.

### Design Features

The Scirocco Blower has been specially designed to reduce noise and power loss by utilising an exclusive wrap-around plenum and proprietary double Whispair® jet to control pressure equalisation - (feeding backflow in the direction of impeller movement, thereby aiding rotation).

The computer calculated impeller profiles ensures maximum volumetric efficiency with minimum absorbed power without sacrificing torsional rigidity.

The conservative load carrying capacity of the larger diameter rolling element bearings ensures an extended operating life. Timing gear life is also extended by a controlled lubrication system.

The gear and shaft strengths are substantially increased by the use of taper mounted gears which do not need keyways for location. Setting of the gear wheels to obtain correct timing of the impellers is simplified, a feature that facilitates field maintenance.

### Specification

**CASING:** The cylinder and headplates are manufactured from cast iron.

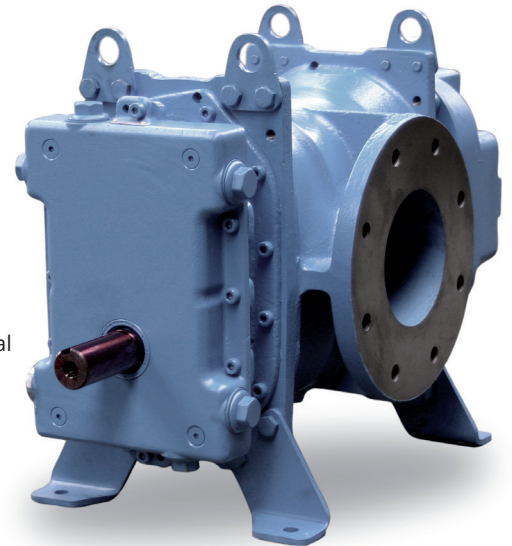
**IMPELLERS AND SHAFTS:** The dynamically balanced impellers have integral shafts and are made from ductile shafts.

The high rigidity of the impeller/shafts permits a higher pressure rise to be obtained than with other machines of comparable size. The generous shaft diameter keeps drive stresses low.

**GEARS:** Precision Ground Gears are used to ensure smooth, silent running and accurate timing of the rotary impellers. A controlled lubrication system is provided to ensure efficient operation without waste of energy in the gearcase. Timing gears are hardened and precision ground, spur gears are manufactured from high grade alloy steel.

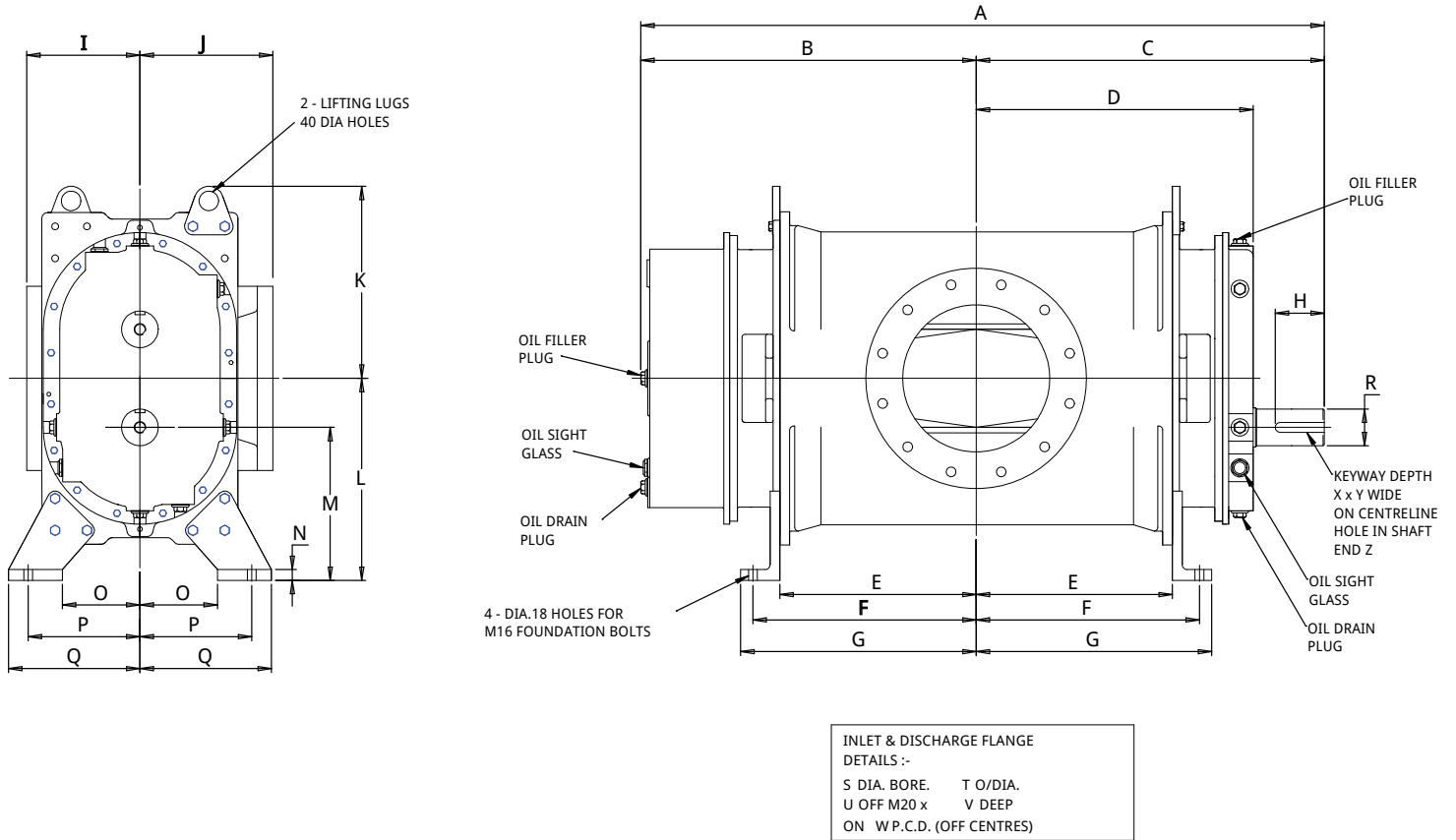
**BEARINGS:** The bearings at the drive end of the blower are spherical roller type of generous proportions to give long operational life. Parallel roller bearings are fitted at the gear end and are splash lubricated by oil from the gears.

**LUBRICATION:** Specially designed labyrinth seals and oil throwers are used at both ends. This feature eliminates maintenance associated with the use of lip seals. The Scirocco Whispair® blowers are constructed with air gaps which isolate the bearing and gear lubricants from the compression chamber.



### User Benefits

- The delivered air is guaranteed to be oil free because internal lubrication is unnecessary, and because the Scirocco Range of Positive Displacement Air Blowers are constructed with air gaps which completely isolate bearing and gear lubricants from the compression chamber.
- Noise Levels are kept to a minimum. Air noise is reduced by carefully designed air ports (utilising the special Whispair feature and by the elimination of resonant unbraced surfaces. Mechanical noise levels have been reduced by running accuracy of the taper mounted gears.
- The blower can be installed for either vertical or horizontal air flow simply by repositioning the mounted feet. Installation costs can be reduced by the versatility of mounting arrangements.
- The generous diameter of the drive shaft permits the use of V-belt drives without the need for a double outer bearing.
- Centre timing permits clockwise or anti-clockwise drive shaft rotation.



### Dimensions

Size	A	B	C	D	E	F	G	H	I	J	K	L	M	N	O	P	Q	R	S	T	U	V	W	X	Y	Z
N08	798	422	376	296	200	235	252	65	122	153	212	225	175	14	72	121	152	35.002/35.018	150	285	8 off M20	24	240	5	10	M12
N10	698	372	326	246	150	185	202	65	122	153	212	225	175	14	72	121	152	35.002/35.018	125	254	8 off M16	24	210	5	10	M12

### Blower Performance

	SPEED	300mbar		500mbar		700mbar		1000mbar	
		M <sup>3</sup> /HR	kW	M <sup>3</sup> /HR	kW	M <sup>3</sup> /HR	kW	M <sup>3</sup> /HR	kW
N10	2000	455	7.5	400	11	355	15	—	—
	3000	778	11	723	15	678	22	—	—
	3800	1037	15	981	22	936	30	879	45
	4500	1263	15	1207	30	1164	37	1105	45
	5300	1521	18.5	1465	30	1420	45	1364	55
N08	2000	609	11	535	15	475	22	—	—
	3000	1040	15	966	22	906	30	—	—
	3800	1386	18	1312	30	1251	37	—	—
	4500	1688	22	1614	37	1554	45	—	—
	5300	2033	30	1959	37	1899	55	—	—

For accurate performance characteristics please contact HR Blowers