

# GDK55

50Hz

Model			GDK55-7A	GDK55-8A	GDK55-10A
<b>GENERAL PERFORMANCE DATA</b>					
Rated discharge Pressure		barg	7.0	8.0	10.0
Maximum Operating Pressure	(2)	barg	7.2	8.2	10.2
Minimum Operating Pressure		barg	4.5	4.5	4.5
Maximum Operating Ambient Temperature		°C	40	40	40
Minimum Operating Ambient Temperature		°C	2	2	2
Maximum System Temperature Setting		°C	109	109	109
Nominal Power - Main Motor		kW	55	55	55
Main Motor Efficiency	(3)	%	93.5%	93.5%	93.5%
Capacity FAD	(1)	m³/min	10.6	10.0	8.6
Package Input Power with Fan - Air Cooled	(4)	kW	66.8	66.9	65.4
Specific Power - Air Cooled	(4)(5)	kW/m³/min	6.30	6.80	7.60
<b>SOUND LEVEL</b>					
Noise Level Standard Package - Air Cooled	(6)	Sound Pressure - dB(A)	71	71	71
Noise Level Standard Package - Air Cooled		Sound Power - dB(A)	88	88	88
<b>COOLING DATA (@ Maximum Ambient Temperature &amp; Maximum Discharge Pressure)</b>					
Heat Removal (Oil Cooler)		kW	54.1	54.8	56.4
Heat Removal (Oil and Aftercooler)		kW	68.9	69.2	69.4
Permitted Additional Static Pressure		Pa	30	30	30
Fan Air Flow		m³/min	145	145	145
Fan Motor Nominal Power		kW	0.9	0.9	0.9
Cooling Air Temperature Rise @ 30°C		°C	20	20	20
Aftercooler CTD	(7)	°C	10.0	10.0	10.0
<b>AIR END DATA</b>					
Male Rotor Speed		RPM	2533	2433	2161
Tip Speed Rotor		m/sec	23.60	22.70	20.20
Full Load Shaft Power		kW	61.6	61.7	60.3
<b>COOLANT LUBRICATION DATA</b>					
Total Coolant Capacity - Air Cooled	(12)	litres	48	48	48
<b>PIPING CONNECTIONS</b>					
Air Discharge	(8)	Inches BSPP/G	2.0 INCH (FEMALE)	2.0 INCH (FEMALE)	2.0 INCH (FEMALE)
Coolant Drain		Inches BSPP/G	0.5INCH (FEMALE)	0.5INCH (FEMALE)	0.5 INCH (FEMALE)
Diameter of Power Inlet		mm	80	80	80
<b>DIMENSIONS AND WEIGHT</b>					
Length, Width, Height		mm	1969X1234X1605	1969X1234X1605	1969X1234X1605
Net Weight - Air Cooled		kg	1482	1482	1482
<b>ELECTRICAL DATA</b>					
Motor Protection	(13)		TEFC, IP55	TEFC, IP55	TEFC, IP55
Full Load Package Current - Air Cooled	(9)	Amps @ 380V	104	104	104
Main Motor Locked Rotor Current	(14)	Amps @ 380V	1050	1050	1050
Package Power Factor			0.86	0.86	0.86
<b>Electrical Installation</b>					
Recommended Supply Cable Size	(10)	mm²/Cu (Kcmil) @ 380V	50	50	50
Maximum Recommended Fuse Rating	(10)(11)	Amps @ 380V	250	250	250

**Notes:**

- FAD (Free Air Delivery) is full package performance including all losses. Tested per ISO 1217 : 2009 Annex C
- Maximum pressure at package discharge, value at which compressor will unload when unit operating at maximum target pressure
- IE2 efficiency motor
- Measured at rated capacity and rated pressure
- Specific power guaranteed in accordance with ISO 1217 : 2009 Annex C
- Measured in free field conditions per ISO 2151 using Hemispherical Method; ducted inlet and outlet, with + 3 dB(A) tolerance
- CTD based on 100°F/38°C inlet air at 40% Relative Humidity (For alternate conditions contact Ingersoll Rand)
- G for domestic standard
- Maximum current includes 5% additional current due to fouled filters and elements
- 90°C copper cables. Always apply local electrical codes for sizing cables and system protection
- Time delay fuse recommended. Apply local electrical codes for fuse sizing
- Coolant volumes listed are approximate. See operator manual for coolant fill procedure
- 50Hz (±2%) motor voltage tolerance: (380)-7/+7%
- Star-Delta starting current inrush is about 33% of direct starting current
- During the Star-Delta open-starting transition, the in-rush current value could instantaneously peak from 1.8 to 2.8 times the noted Locked-Rotor-Amperage (LRA) values