

<b>KAESER COMPRESSORS</b>	<h1>ENGINEERING DATA SHEET</h1>	
Doc. No.: TI.EDS-108 Version: 1.7	<h2>BOOSTERS</h2>	Date: 06-20-05

MODEL	N 60-G				N 153-G				N 253-G			
Inlet Pressure [psig]	75	110	145	190	75	110	145	190	75	110	145	190
<b>I. COMPRESSOR DATA:</b>												
Inlet Conditions												
Volume [cfm]	12.7	18.0	23.3	29.7	32.1	45.2	58.6	74.9	54.4	77.0	99.6	126.8
Capacity at various discharge pressures [cfm]												
145 psig	10.9	15.5	--	--	25.8	40.6	--	--	45.9	68.9	--	--
215 psig	10.2	15.2	20.1	--	24.4	38.1	49.4	--	43.4	61.4	88.3	--
290 psig	9.9	14.8	19.8	25.8	18.7	32.1	45.9	63.6	40.6	55.4	85.1	112.3
360 psig	9.9	14.1	19.1	25.1	16.2	28.6	42.4	56.5	37.1	51.2	81.2	107.0
435 psig	--	13.8	18.7	24.7	--	26.1	38.8	53.0	--	50.1	78.0	101.4
500 psig	--	13.8	18.4	24.4	--	24.0	35.3	49.4	--	49.8	75.2	100.3
580 psig	--	--	--	--	--	--	32.8	45.9	--	--	72.4	99.6
650 psig	--	--	--	--	--	--	--	--	--	--	68.2	96.1
<b>II. MOTOR DATA (BALDOR MOTORS):</b>												
Rated Drive Motor Horsepower at various discharge pressures [HP]												
145 psig	3	3	--	--	3	3	--	--	10	10	--	--
215 psig	3	3	3	--	3	3	3	--	10	10	10	--
290 psig	3	3	3	3	5	5	5	5	10	10	10	10
360 psig	3	3	3	3	5	5	5	5	10	15	15	15
435 psig	--	3	3	3	--	5	5	5	--	15	15	15
500 psig	--	3	3	3	--	5	5	5	--	15	15	15
580 psig	--	--	--	--	--	--	5	5	--	--	15	15
650 psig	--	--	--	--	--	--	--	--	--	--	15	15
Max. Drive Motor Amps [FLA] 3 Phases 460 V 60 Hz	3.4 (3 HP)				3.4 (3 HP), 5.6 (5 HP)				11.2 (10HP), 17.2 (15HP)			
Drive Motor Nominal Speed [rpm] Drive Motor Full Load Efficiency [%]	3600 88.5% (3 HP)				3600 88.5% (3 HP), 89.5% (5 HP)				3600 91.7% (10HP), 91.7% (15HP)			
Insulation Class Motor Enclosure Type	F TEFC				F TEFC				F TEFC			
<b>III. OTHER GENERAL DATA:</b>												
V-belts, quantity per set	1				2				2			
V-belt Type	SPB x 1650				SPZ x 2187 (2087 for 110 inlet/290 discharge)				SPZ x 2137 (10 HP) SPZ x 2287 (15 HP)			
Motor Pulley Dia. [mm] Compressor Pulley Dia. [mm]	104 360				93 500				190 500			
Recommended Receiver Tank [gal]	Receiver tank size will vary with application (min. 60 gal); please contact Project Support for more information											
<b>IV. PUMP MODEL:</b>												
Max. Duty Cycle	N 60 *				N 251 with enlarged exhaust chamber *				N 253 *			
Displacement [cfm]	2.12				5.3				8.8			

\* To determine duty cycle, first determine ambient temperature and pressure ratio (discharge pressure / inlet pressure). Then:



Maximum Pressure Ratio (for 1-2 cylinder pumps)		
Ambient Temperature	up to 85° F	from 85 to 105° F
100% Duty Cycle	3.75	3.4
80% Duty Cycle	4	3.65
65% Duty Cycle	--	4

100% = 24 Hr/day  
80% = 16 min/20 min  
65% = 13 min/20 min

Electrical data may vary in accordance with motor manufacturers specifications.

	<h1>ENGINEERING DATA SHEET</h1>	
Doc. No.: TI.EDS-108 Version: 1.7	<b>BOOSTERS</b>	Date: 06-20-05

MODEL	N 60-G	N 153-G	N 253-G
<b>Nominal Pump Speed [rpm]</b> <b>Minimum Pump Speed [rpm]</b>  <b>Number of Cylinders</b>  <b>Bore [mm]</b> <b>Stroke [mm]</b>	1040 725  1  40 46	660 660  2  45 72	1120 725  2  45 72
<b>V. COOLING DATA:</b>			
<b>Cooling System Available</b>  <b>Standard Max. Ambient Temp. Range [F]</b>  <b>Approach Temperature [F]</b>	A / C  35 - 104	A / C  35 - 104	A / C  35 - 104
<b>@ discharge</b>	<b>75</b>   <b>110</b>   <b>145</b>   <b>190</b>	<b>75</b>   <b>110</b>   <b>145</b>   <b>190</b>	<b>75</b>   <b>110</b>   <b>145</b>   <b>190</b>
145 psig	45   27   --   --	9   9   --   --	7.2   10.8   --   --
215 psig	45   45   36   --	18   18   9   --	7.2   10.8   16.2   --
290 psig	54   54   45   36	27   27   18   18	7.2   10.8   19.8   34.2
360 psig	54   54   45   45	27   27   27   27	7.2   10.8   21.6   37.8
435 psig	--   90   81   81	--   32   32   32	--   10.8   23.4   39.6
500 psig	--   108   108   108	--   32   32   32	--   10.8   23.4   39.6
580 psig	--   --   --   --	--   --   36   36	--   --   25.2   39.6
650 psig	--   --   --   --	--   --   --   --	--   --   25.2   39.6
<b>VI. PIPING CONNECTIONS [in.]:</b>			
<b>Suction Side [NPT]</b> <b>Air Discharge [NPT]</b>	1/2 1/2	3/4 1/2	3/4 1/2
<b>VII. NOISE LEVEL DATA:</b>			
<b>Standard (w/o enclosure)</b> <b>With Super Soundproofing</b> <small>[Measured in dB(A) at 1 m (approx. 40 in.)                      According to CAGI]</small>	74 64	74 64	76 66
<b>VIII. MAX. PUMP DIMENSIONS:</b>			
<b>Length [in.]</b> <b>Width [in.]</b> <b>Height [in.]</b>  <b>Floor Space [sq. ft.]</b>	36 1/4 15 21  3.8	55 1/8 28 31 1/2  10.7	55 1/8 28 31 1/2  10.7
<b>IX. NET SHIPPING WEIGHT [lbs]:</b>	121	441	530
<b>X. OIL SYSTEM DATA:</b>			
<b>Oil System Capacity [pints]</b>	0.5	3	3

		<h1 style="text-align: center;">ENGINEERING DATA SHEET</h1>								
Doc. No.: TI.EDS-111 Version: 1.7		<h2 style="margin: 0;">BOOSTERS</h2>						Date: 06-20-05		
MODEL		N 351-G				N 502-G				
Inlet Pressure [psig]		75	110	145	190	75	110	145	190	
<b>I. COMPRESSOR DATA:</b>										
Inlet Conditions										
Volume [cfm]		77.3	109.8	142.0	180.8	103.8	146.9	190.0	241.9	
Capacity at various discharge pressures [cfm]										
145 psig		67.1	101.4	--	--	86.2	130.0	--	--	
215 psig		62.5	95.0	132.4	--	81.2	124.3	167.0	--	
290 psig		57.9	90.8	128.5	176.6	76.6	119.4	161.7	216.1	
360 psig		54.7	88.3	125.0	173.4	71.3	114.1	156.1	201.3	
435 psig		--	85.8	118.7	157.9	--	108.4	150.8	195.6	
500 psig		--	82.6	115.8	154.7	--	103.1	145.1	190.7	
580 psig		--	--	113.0	151.5	--	--	139.5	185.4	
650 psig		--	--	105.9	148.0	--	--	133.8	179.8	
<b>II. MOTOR DATA (BALDOR MOTORS):</b>										
Rated Drive Motor Horsepower at various discharge pressures [HP]										
145 psig		15	15	--	--	15	15	--	--	
215 psig		15	15	15	--	15	15	15	--	
290 psig		15	15	15	15	15	15	15	15	
360 psig		15	15	15	15	15	15	15	15	
435 psig		--	20	20	20	--	20	20	20	
500 psig		--	20	20	20	--	20	20	20	
580 psig		--	--	20	20	--	--	25	25	
650 psig		--	--	20	20	--	--	25	25	
Max. Drive Motor Amps [FLA] 3 Phases 460 V 60 Hz		17.2(15HP),22.5(20HP)				17.2(15HP), 22.5(20HP), 28(25HP)				
Drive Motor Nominal Speed [rpm]		3600				3600				
Drive Motor Full Load Efficiency [%]		91.7%(15HP), 92.4%(20HP)				91.7%(15HP),92.4%(20HP),93%(25HP)				
Insulation Class		F				F				
Motor Enclosure Type		TEFC				TEFC				
<b>III. OTHER GENERAL DATA:</b>										
V-belts, quantity per set		2				2 (3 for 25 HP)				
V-belt Type		SPA x 2607 (15 HP) SPA x 2682 (20 HP)				SPA 2682 (15 & 20 HP) SPA 2882 (25 HP)				
Motor Pulley Dia. [mm]		190				Min: 165; Max: 185				
Compressor Pulley Dia. [mm]		600				680				
Recommended Receiver Tank [gal]		Receiver tank size will vary with application (min. 60 gal.); please contact Project Support for more information.								
<b>IV. PUMP MODEL:</b>										
Max. Duty Cycle		N 351				N 502				
Displacement [cfm]		*				*				
		12.4				17.7				

\* To determine duty cycle, first determine ambient temperature and pressure ratio (discharge pressure / inlet pressure). Then:

Maximum Pressure Ratio (for 2-cylinder pumps)		
Ambient Temperature	up to 85° F	from 85 to 105° F
100% Duty Cycle	3.75	3.4
80% Duty Cycle	4	3.65
65% Duty Cycle	--	4

100% = 24 Hr/day  
80% = 16 min/20 min  
65% = 13 min/20 min

Maximum Pressure Ratio (for 3-cylinder pumps)		
Ambient Temperature	up to 85° F	from 85 to 105° F
100% Duty Cycle	3.75	3.45
80% Duty Cycle	4.2	3.7

Electrical data may vary in accordance with motor manufacturers specifications.

Doc. No.: TI.EDS-111 Version: 1.7	BOOSTERS								Date: 06-20-05
MODEL	N 351-G				N 502-G				
Nominal Pump Speed [rpm]	910				970				
Minimum Pump Speed [rpm]	725				725				
Number of Cylinders	2				2				
Bore [mm]	58				65				
Stroke [mm]	76				76				
<b>V. COOLING DATA:</b>									
Cooling System Available	A/C				A/C				
Standard Max. Ambient Temp. Range [F]	35 - 104				35 - 104				
Approach Temperature [F] @ discharge	inlet	75	110	145	190	75	110	145	190
145 psig	5.4	9	--	--	5.4	9	--	--	--
215 psig	5.4	10.8	16.2	--	5.4	12.6	18	--	--
290 psig	5.4	12.6	19.8	23.4	5.4	14.4	19.8	25.2	25.2
360 psig	7.2	16.2	23.4	27	5.4	16.2	21.6	27	27
435 psig	--	16.2	27	34.2	--	18	23.4	27	27
500 psig	--	18	28.8	37.8	--	19.8	25.2	28.8	28.8
580 psig	--	--	30.6	41.4	--	--	28.8	30.6	30.6
650 psig	--	--	36	48.6	--	--	32.4	32.4	32.4
<b>VI. PIPING CONNECTIONS [in.]:</b>									
Suction Side [NPT]	3/4				1				
Air Discharge [NPT]	3/4				3/4				
<b>VII. NOISE LEVEL DATA:</b>									
Standard (w/o enclosure)	77				78				
With Super Soundproofing <small>(Measured in dB(A) at 1 m (approx. 40 in.) According to CAGI)</small>	67				68				
<b>VIII. MAX. PUMP DIMENSIONS:</b>									
Length [in.]	55				61 1/2				
Width [in.]	28				34 1/4				
Height [in.]	31 1/2				39 1/2				
Floor Space [sq.ft.]	10.7				14.6				
<b>IX. NET SHIPPING WEIGHT [lbs.]:</b>									
	529				1014				
<b>X. OIL SYSTEM DATA:</b>									
Oil System Capacity [pints]	3.2				6.3				

# KAESER COMPRESSORS ENGINEERING DATA SHEET



Doc. No.: TI.EDS-126  
Version: 1.4

## BOOSTERS

Date: 06-21-05

MODEL	N 753-G A/C				N 753-G W/C				N 1100-G A/C				N 1100-G W/C			
Inlet Pressure [psig]	75	110	145	190	75	110	145	190	75	110	145	190	75	110	145	190
<b>I. COMPRESSOR DATA:</b>																
<b>Inlet Conditions</b>																
Volume [cfm]																
290 psig	219	311	403	512	219	311	403	512	316	447	579	737	316	447	579	737
360 psig	219	294	360	512	219	294	360	512	316	447	579	624	316	447	579	624
435 psig	---	258	403	512	---	258	403	512	---	430	490	624	---	430	490	624
500 psig	---	311	388	477	---	311	388	477	---	392	462	584	---	392	462	584
580 psig	---	---	360	434	---	---	360	434	---	---	441	493	---	---	441	493
650 psig	---	---	340	410	---	---	340	410	---	---	419	493	---	---	419	493
<b>Capacity at various discharge pressures [cfm]</b>																
290 psig	180	278	378	487	180	278	378	487	259	401	533	652	259	401	533	652
360 psig	167	252	328	466	167	252	328	466	241	380	524	580	241	380	524	580
435 psig	---	212	353	470	---	212	353	470	---	357	435	574	---	357	435	574
500 psig	---	245	329	431	---	245	329	431	---	327	400	527	---	327	400	527
580 psig	---	---	297	378	---	---	297	378	---	---	371	437	---	---	371	437
650 psig	---	---	270	345	---	---	270	345	---	---	340	428	---	---	340	428
<b>II. MOTOR DATA (BALDOR MOTORS):</b>																
<b>Drive Motor Horsepower at various discharge pressures [HP]</b>																
290 psig	30	30	30	30	30	30	30	30	40	40	40	40	40	40	40	40
360 psig	30	30	30	40	30	30	30	40	40	50	50	50	40	50	50	50
435 psig	---	30	40	40	---	30	40	40	---	50	50	50	---	50	50	50
500 psig	---	40	40	40	---	40	40	40	---	50	50	50	---	50	50	50
580 psig	---	---	40	40	---	---	40	40	---	---	50	50	---	---	50	50
650 psig	---	---	40	40	---	---	40	40	---	---	50	50	---	---	50	50
Max. Drive Motor Amps [FLA] 3 Phases 460 V 60 Hz	33(30HP), 44(40HP)				33(30HP), 44(40HP)				47(40HP), 59 (50HP)				47(40HP), 59 (50HP)			
Drive Motor Nominal Speed [rpm] Drive Motor Full Load Efficiency [%]	3600 93% (30HP), 93.6%(40HP)				3600 93% (30HP), 93.6% (40HP)				3600 91.7%(40HP), 92.4 (50HP)				3600 91.7%(40HP), 92.4 (50HP)			
Insulation Class Motor Enclosure Type	F TEFC (IP 55)				F TEFC (IP 55)				F TEFC (IP 55)				F TEFC (IP 55)			
<b>III. OTHER GENERAL DATA:</b>																
V-belts, quantity per set V-belt Type	3 SPA				3 SPA				3 SPA				3 SPA			
Compressor Pulley Dia. [mm] Motor Pulley Dia. [mm]	Length varies with motor pulley 680				Length varies with motor pulley 680				Length varies with motor pulley 680				Length varies with motor pulley 680			
Recommended Receiver Tank [gal]	without				without				without				without			
<b>IV. PUMP MODEL:</b>																
Number of Cylinders	N 753 3				N 753 3				N 1100 3				N 1100 3			
Max. Duty Cycle	100%				100%				100%				100%			
Displacement [cfm]																
290 psig	37	37	37	37	37	37	37	37	53	53	53	53	53	53	53	53
360 psig	37	35	33	37	37	35	33	37	53	53	53	44	53	53	53	44
435 psig	---	30	36	36	---	30	36	36	---	51	44	44	---	51	44	44
500 psig	---	37	35	34	---	37	35	34	---	46	42	42	---	46	42	42
580 psig	---	---	33	31	---	---	33	31	---	---	40	35	---	---	40	35
650 psig	---	---	31	29	---	---	31	29	---	---	38	35	---	---	38	35
Nominal Pump Speed [rpm]																
290 psig	1300	1300	1300	1300	1300	1300	1300	1300	1300	1300	1300	1300	1300	1300	1300	1300
360 psig	1300	1230	1170	1300	1300	1230	1170	1300	1300	1300	1300	1100	1300	1300	1300	1100
435 psig	---	1080	1300	1300	---	1080	1300	1300	---	1250	1100	1100	---	1250	1100	1100
500 psig	---	1300	1250	1210	---	1300	1250	1210	---	1140	1040	1030	---	1140	1040	1030
580 psig	---	---	1170	1100	---	---	1170	1100	---	---	990	870	---	---	990	870
650 psig	---	---	1100	1040	---	---	1100	1040	---	---	940	870	---	---	940	870

\* To determine duty cycle, first determine ambient temperature and pressure ratio (discharge pressure / inlet pressure). Then:

Maximum Pressure Ratio (for 3-cylinder pumps)		
Ambient Temperature	up to 85° F	from 85 to 105° F
100% Duty Cycle	3.75	3.45
80% Duty Cycle	4.2	3.7

100% = 24 Hr/day  
80% = 16 min/20 min

Electrical data may vary in accordance with motor manufacturers specifications.

<b>KAESER COMPRESSORS</b>	<h1>ENGINEERING DATA SHEET</h1>	
Doc. No.: TI.EDS-126 Version: 1.4	<b>SUPER HIGH PRESSURE BOOSTERS</b>	Date: 06-21-05

MODEL	N 753-G A/C	N 753-G W/C	N 1100-G A/C	N 1100-G W/C																																																																																																																							
Minimum Pump Speed [rpm]	725	725	725	725																																																																																																																							
Bore [mm] Stroke [mm]	65 80	65 80	78 80	78 80																																																																																																																							
<b>V. COOLING DATA:</b>																																																																																																																											
Cooling System Available	A/C	W/C	A/C	W/C																																																																																																																							
Fan Motor Power [hp] Cooling Fan Capacity [cfm]	1.5 (low speed) / 2.6 (high speed) 8122 (low speed)/9535 (high speed)	--	1.5 (low speed) / 2.6 (high speed) 8122 (low speed)/9535 (high speed)	--																																																																																																																							
Standard Max. Ambient Temp. Range [F]	36 - 104	36 - 104	36 - 104	36 - 104																																																																																																																							
Approach Temperature @ discharge	<table border="1" style="width:100%; border-collapse: collapse; font-size: small;"> <thead> <tr> <th style="width:10%;"></th> <th colspan="4" style="text-align: center;">inlet</th> <th colspan="4"></th> <th colspan="4"></th> <th colspan="4"></th> </tr> <tr> <th></th> <th>75</th><th>110</th><th>145</th><th>190</th> <th>75</th><th>110</th><th>145</th><th>190</th> <th>75</th><th>110</th><th>145</th><th>190</th> <th>75</th><th>110</th><th>145</th><th>190</th> </tr> </thead> <tbody> <tr> <td>360 psig</td> <td>11</td><td>11</td><td>14</td><td>18</td> <td>5</td><td>7</td><td>7</td><td>9</td> <td>11</td><td>11</td><td>14</td><td>20</td> <td>5</td><td>7</td><td>7</td><td>9</td> </tr> <tr> <td>435 psig</td> <td>--</td><td>14</td><td>18</td><td>22</td> <td>--</td><td>7</td><td>7</td><td>9</td> <td>--</td><td>11</td><td>14</td><td>20</td> <td>--</td><td>7</td><td>7</td><td>9</td> </tr> <tr> <td>500 psig</td> <td>--</td><td>14</td><td>18</td><td>22</td> <td>--</td><td>7</td><td>9</td><td>11</td> <td>--</td><td>14</td><td>16</td><td>23</td> <td>--</td><td>7</td><td>9</td><td>11</td> </tr> <tr> <td>580 psig</td> <td>--</td><td>--</td><td>18</td><td>22</td> <td>--</td><td>--</td><td>9</td><td>11</td> <td>--</td><td>--</td><td>16</td><td>23</td> <td>--</td><td>--</td><td>9</td><td>11</td> </tr> <tr> <td>650 psig</td> <td>--</td><td>-</td><td>20</td><td>23</td> <td>--</td><td>--</td><td>9</td><td>11</td> <td>--</td><td>--</td><td>22</td><td>25</td> <td>--</td><td>--</td><td>9</td><td>11</td> </tr> </tbody> </table>					inlet																	75	110	145	190	75	110	145	190	75	110	145	190	75	110	145	190	360 psig	11	11	14	18	5	7	7	9	11	11	14	20	5	7	7	9	435 psig	--	14	18	22	--	7	7	9	--	11	14	20	--	7	7	9	500 psig	--	14	18	22	--	7	9	11	--	14	16	23	--	7	9	11	580 psig	--	--	18	22	--	--	9	11	--	--	16	23	--	--	9	11	650 psig	--	-	20	23	--	--	9	11	--	--	22	25	--	--	9	11
	inlet																																																																																																																										
	75	110	145	190	75	110	145	190	75	110	145	190	75	110	145	190																																																																																																											
360 psig	11	11	14	18	5	7	7	9	11	11	14	20	5	7	7	9																																																																																																											
435 psig	--	14	18	22	--	7	7	9	--	11	14	20	--	7	7	9																																																																																																											
500 psig	--	14	18	22	--	7	9	11	--	14	16	23	--	7	9	11																																																																																																											
580 psig	--	--	18	22	--	--	9	11	--	--	16	23	--	--	9	11																																																																																																											
650 psig	--	-	20	23	--	--	9	11	--	--	22	25	--	--	9	11																																																																																																											
Required Cooling Air Flow (w/ 18°F Approach Temp) [cfm]	3885 (30 hp) / 5297 (40 hp)	1942 (30 hp) / 2649 (40 hp)	5297 (40 hp) / 6533 (50 hp)	2649 (40 hp) / 3267 (50 hp)																																																																																																																							
Cooling Water Quantity [gpm]	--	13.2	--	18.1																																																																																																																							
<b>VI. PIPING CONNECTIONS [in.]:</b> Suction Side [G] (ISO 228/1-G) Air Discharge [G] (ISO 228/1-G) Cooling Water [NPT]	1 1/2 1 --	1 1/2 1 3/4	2 1 1/2 --	2 1 1/2 3/4																																																																																																																							
<b>VII. NOISE LEVEL DATA:</b>																																																																																																																											
Standard (w/o enclosure) With Super Soundproofing <small>(Measured in dB(A) at 1 m (approx. 40 in.) According to CAGI)</small>	80 70	78 68	80 70	81 71																																																																																																																							
<b>VIII. MAX. PUMP DIMENSIONS:</b>																																																																																																																											
Length [in.] Width [in.] Height [in.] Floor Space [sq.ft.]	109 3/4 39 3/4 41 30.3	78 40 1/4 40 1/4 21.7	109 1/2 40 1/4 39 3/4 30.6	78 1/3 39 40 1/6 21.2																																																																																																																							
<b>IX. NET SHIPPING WEIGHT [lbs.]:</b>	2,205	2,094	2,645	2,094																																																																																																																							
<b>X. OIL SYSTEM DATA:</b>																																																																																																																											
Oil System Capacity [pints]	10	10	10	10																																																																																																																							



# ENGINEERING DATA SHEET



Doc. No.: TI.EDS-131  
Version: 1.9

## BOOSTERS

Date: 03-06-07

MODEL	N 1400-G A/C				N 1400-G W/C				N 2001-G A/C				N 2001-G W/C			
Inlet Pressure [psig]	75	110	145	190	75	110	145	190	75	110	145	190	75	110	145	190
<b>I. COMPRESSOR DATA:</b>																
Inlet Conditions																
Volume [cfm]																
145 psig	--	--	--	--	--	--	--	--	484	731	--	--	484	731	--	--
215 psig	--	--	--	--	--	--	--	--	484	643	777	964	484	643	777	964
290 psig	--	--	--	--	--	--	--	--	459	544	703	780	459	544	703	780
360 psig	--	--	--	737	--	--	--	737	406	449	583	738	406	449	583	738
435 psig	--	447	579	737	--	447	579	737	--	--	--	--	--	--	--	--
500 psig	--	447	579	709	--	447	579	709	--	--	--	--	--	--	--	--
580 psig	--	--	521	624	--	--	521	624	--	--	--	--	--	--	--	--
650 psig	--	--	508	584	--	--	508	584	--	--	--	--	--	--	--	--
Capacity at various discharge pressures [cfm]																
145 psig	--	--	--	--	--	--	--	--	427	675	--	--	427	675	--	--
215 psig	--	--	--	--	--	--	--	--	410	576	720	893	410	576	720	893
290 psig	--	--	--	--	--	--	--	--	371	473	632	731	371	473	632	731
360 psig	--	--	--	685	--	--	--	685	319	392	544	682	319	392	544	682
435 psig	--	371	514	678	--	371	514	678	--	--	--	--	--	--	--	--
500 psig	--	373	501	640	--	373	501	640	--	--	--	--	--	--	--	--
580 psig	--	--	438	553	--	--	438	553	--	--	--	--	--	--	--	--
650 psig	--	--	412	506	--	--	412	506	--	--	--	--	--	--	--	--
<b>II. MOTOR DATA (BALDOR MOTORS):</b>																
Rated Drive Motor Horsepower at various discharge pressures [HP]																
145 psig	--	--	--	--	--	--	--	--	40	50	--	--	40	50	--	--
215 psig	--	--	--	--	--	--	--	--	50	50	50	50	50	50	50	50
290 psig	--	--	--	--	--	--	--	--	50	50	50	50	50	50	50	50
360 psig	--	--	--	60	--	--	--	60	50	50	50	50	50	50	50	50
435 psig	--	60	60	60	--	60	60	60	--	--	--	--	--	--	--	--
500 psig	--	60	60	60	--	60	60	60	--	--	--	--	--	--	--	--
580 psig	--	--	60	60	--	--	60	60	--	--	--	--	--	--	--	--
650 psig	--	--	60	60	--	--	60	60	--	--	--	--	--	--	--	--
Max. Drive Motor Amps [FLA] 3 Phases 460 V 60 Hz																
	66 (60 HP)				66 (60 HP)				45 (40 HP), 59 (50 HP)				45 (40 HP), 59 (50 HP)			
Drive Motor Nominal Speed [rpm] Drive Motor Full Load Efficiency [%]																
	3600 91.7% (40), 93% (60)				3600 91.7% (40), 93% (60)				3600 91.7% (40 HP), 92.4% (50 HP)				3600 91.7% (40 HP), 92.4% (50 HP)			
Insulation Class Motor Enclosure Type																
	F TEFC (IP 55)				F TEFC (IP 55)				F TEFC				F TEFC			
<b>III. OTHER GENERAL DATA:</b>																
V-belts, quantity per set V-belt Type																
	3 SPA Length varies with motor pulley				3 SPA Length varies with motor pulley				3 Length varies with motor pulley				3 Length varies with motor pulley			
Motor Pulley Dia. [mm]																
	680 Dia. varies with compressor speed min. 237 max. 302				680 Dia. varies with compressor speed min. 237 max. 302				680 Dia. varies with compressor speed min: 167 max: 302				680 Dia. varies with compressor speed min: 167 max: 302			
Compressor Pulley Dia. [mm]																
	without				without				without				without			
Recommended Receiver Tank [gal]																
	without				without				without				without			
<b>IV. PUMP MODEL:</b>																
Number of Cylinders																
	N 1100 3				N 1100 3				N 2001 3				N 2001 3			
Max. Duty Cycle																
	100%				100%				*				*			
Displacement [cfm]																
145 psig	--	--	--	--	--	--	--	--	81	86	--	--	81	86	--	--
217 psig	--	--	--	--	--	--	--	--	81	76	71	69	81	76	71	69
290 psig	--	--	--	--	--	--	--	--	76	64	64	56	76	64	64	56
360 psig	--	--	--	53	--	--	--	53	67	53	53	53	67	53	53	53
435 psig	--	53	53	53	--	53	53	53	--	--	--	--	--	--	--	--
500 psig	--	53	53	51	--	53	53	51	--	--	--	--	--	--	--	--
580 psig	--	--	47	44	--	--	47	44	--	--	--	--	--	--	--	--
650 psig	--	--	46	42	--	--	46	42	--	--	--	--	--	--	--	--

\* To determine duty cycle, first determine ambient temperature and pressure ratio (discharge pressure / inlet pressure). Then:

Maximum Pressure Ratio (for 2-cylinder pumps)		
Ambient Temperature	up to 85° F	from 85 to 105° F
100% Duty Cycle	3.75	3.4
80% Duty Cycle	4	3.65
65% Duty Cycle	--	4

100% = 24 Hr/day  
80% = 16 min/20  
65% = 13 min/20 min

Maximum Pressure Ratio (for 3-cylinder pumps)		
Ambient Temperature	up to 85° F	from 85 to 105° F
100% Duty Cycle	3.75	3.45
80% Duty Cycle	4.2	3.7

Electrical data may vary in accordance with motor manufacturers specifications.



# ENGINEERING DATA SHEET



Doc. No.: TLEDS-131  
Version: 1.9

## BOOSTERS

Date: 03-06-07

MODEL	N 1400-G A/C				N 1400-G W/C				N 2001-G A/C				N 2001-G W/C				
Nominal Pump Speed [rpm] 145 psig 215 psig 290 psig 360 psig 435 psig 500 psig 580 psig 650 psig	--	--	--	--	--	--	--	--	1100	1170	--	--	1100	1170	--	--	
	--	--	--	--	--	--	--	--	1100	1030	965	940	1100	1030	965	940	
	--	--	--	--	--	--	--	--	1040	870	870	760	1040	870	870	760	
	--	--	--	1300	--	--	--	1300	920	720	720	720	920	720	720	720	
	--	1300	1300	1300	--	1300	1300	1300	--	--	--	--	--	--	--	--	
	--	1300	1300	1250	--	1300	1300	1250	--	--	--	--	--	--	--	--	
	--	--	--	1170	1100	--	--	1170	100	--	--	--	--	--	--	--	--
	--	--	1140	1030	--	--	1140	1030	--	--	--	--	--	--	--	--	
Minimum Pump Speed [rpm]	725				725				720				720				
Bore [mm]	78				78				105				105				
Stroke [mm]	80				80				80				80				
<b>V. COOLING DATA:</b>																	
Cooling System Available	A/C								W/C								
Fan Motor Power [hp]	1.5 (low speed) / 2.6 (high speed)								--								
Cooling Fan Capacity [cfm]	8122 (low speed)/9535 (high speed)								--								
Standard Max. Ambient Temp. Range [F]	36 - 104								36 - 104								
Approach Temperature [F] @ discharge	75   110   145   190				75   110   145   190				75   110   145   190				75   110   145   190				
145 psig	--	--	--	--	--	--	--	--	13	13	--	--	5.4	5	--	--	
215 psig	--	--	--	--	--	--	--	--	13	20	23	25	5	5	7	7	
290 psig	--	--	--	--	--	--	--	--	13	22	27	25	5.4	5.4	7	9	
360 psig	--	--	--	22	--	--	--	9	14	23	29	25	5.4	7.2	7	9	
435 psig	--	16	18	25	--	7	7	9	--	--	--	--	--	--	--	--	
500 psig	--	16	18	25	--	7	9	11	--	--	--	--	--	--	--	--	
580 psig	--	--	18	25	--	--	9	11	--	--	--	--	--	--	--	--	
650 psig	--	--	23	27	--	--	9	11	--	--	--	--	--	--	--	--	
Required Cooling Air Flow (w/ 18°F Approach Temp) [cfm]	7946								3973								
Cooling Water Quantity [gpm]	--								22								
<b>VI. PIPING CONNECTIONS [in.]:</b>																	
Suction Side [G] (ISO 228/1-G)	2								2								
Air Discharge [G] (ISO 228/1-G)	1 1/2								1 1/2								
Cooling Water [NPT]	--								3/4								
<b>VII. NOISE LEVEL DATA:</b>																	
Standard (w/o enclosure)	80								82								
With Super Soundproofing <small>(Measured in dB(A) at 1 m (approx. 40 in.) According to CAGI)</small>	70								72								
<b>VIII. MAX. PUMP DIMENSIONS:</b>																	
Length [in.]	109 1/2								78 3/4								
Width [in.]	40 1/4								39								
Height [in.]	39 3/4								40 1/4								
Floor Space [sq.ft.]	30.6								21.3								
<b>IX. NET SHIPPING WEIGHT [lbs.]:</b>																	
2,866																	
2,425																	
2,491																	
2,205																	
<b>X. OIL SYSTEM DATA:</b>																	
Oil System Capacity [pints]	10								10								
									(with oil pump)								
									(with oil pump)								