



LRS Series
L37RS - L45RS - L75RS - L90RS - L132RS
Regulated Speed Rotary Screw Compressors

NEW



Engineered to Save

➔ REGULATED SPEED ROTARY SCREW COMPRESSORS

Reliable compressed air provided at maximum efficiency under all operating conditions with quick, economical servicing and maintenance.

The CompAir LRS Series of rotary screw air compressors incorporates a variable speed inverter drive system of outstanding efficiency, offering the ability to precisely match power consumption with air demand.

Maximum efficiency at any level of demand cuts energy costs and saves money

The ability to precisely match output to demand allows the compressors to consume exactly the right amount of energy to do the job, and no more. This is achieved by varying the speed of the drive motor with a level of efficiency which cannot be matched.

The right variable speed compressor in the right application delivers significant energy savings and a stable consistent air supply.

In addition, precise pressure control and smooth acceleration and deceleration of rotary components extends service life improving payback on your investment.

Premium efficiency airend

The high output compression element with slow rotational speed reduces energy costs. In addition to this, the innovative design of the fail safe shaft seal, integrated oil filter and oil regulation valve, ensures external hoses are reduced to a minimum to guarantee the highest levels of quality and reliability are achieved.

Cost of Compressed Air Over 5 Years

Purchase Cost

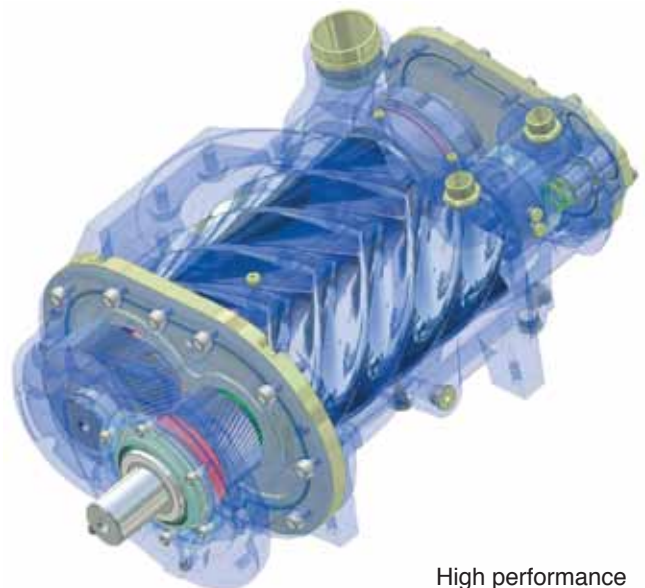
10%

Energy Cost

82%

Service,
Repair &
Maintenance
Cost

8%



High performance
compressed air element
(L75RS shown) with integrated oil
filtration and thermal mixing valve.

Eliminates Waste

- Regulates compressor speed to match output to system demand.
- Eliminates run-on time during periods of low system demand.
- Eliminates over pressurization.

Direct Drive

Maximizes efficiency by eliminating coupling losses.

Improves Process or Product Quality

Constant pressure air supply.

Proven & Dependable Inverter Drive System

- CompAir's inverter drive system incorporates the latest in inverter drive technology.
- Simple motor and controller design.
- Established, proven and reliable.

Wide Turndown Range

Capable of meeting a wide variety of air demand needs.

Reduces Electrical & Mechanical Loads

Soft starting with no current peaks.

Economical to Maintain

Grouped service components reduce down time and simplify servicing.

Easy to Install and Operate

Low noise level, free standing and simple operator controls.

Built-in intelligent controls

Precise operational control is essential to reduce running costs. All CompAir rotary screw compressors are supplied with intelligent, fully electronic controllers with efficient monitoring and user-friendly menu. This system optimizes performance to demand and monitors operating parameters of the unit on site and remotely.



The LRS Series of compressors are designed to operate effectively as stand alone units or in conjunction with other compressor packages to provide maximum air efficiency at all times.

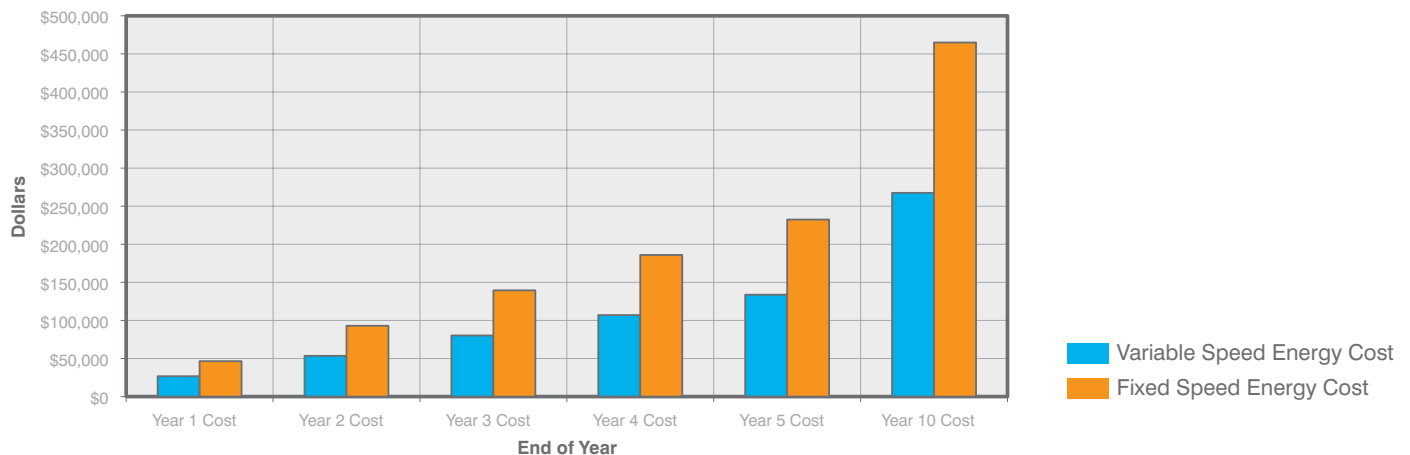
Remarkable energy savings

Air compressors are designed to be capable of performing continuously at maximum output capacity and the CompAir LRS Series is no exception.

However, many times the maximum capacity is only required at limited, peak times with a majority of air compressors operating at an average 50–70% of full capacity. Below maximum capacity is where the true energy saving potential of the LRS Series can be realized.

With energy consumption in near perfect proportion to demand, the energy wasted with conventional regulation systems can be saved. Combine this energy saving concept with the CompAir designed, developed and manufactured compression element, giving high air output for minimum power consumption, and you have a formidable duo with significant energy saving potential.

Variable Speed to Fixed Speed
Energy Cost Comparison





Inverter drive system delivers maximum efficiency at all operating conditions.



Grouped service components and easy access keeps service downtime and costs to a minimum.



Easy operator interface and status monitoring via the microprocessor based control system.



Drive efficiency losses are eliminated by direct coupling of the motor and compression element.

➔ The LRS Series compressors use proven and dependable variable speed inverter drive technology.

Enhanced reliability

The CompAir variable speed drive systems are inherently soft starting, with smooth and controlled acceleration and deceleration, reducing stress on mechanical and electrical components. The electronically controlled regulation of the LRS Series simplifies system construction resulting in a 'less to go wrong' enhanced reliability concept.

Quality you can rely on

An ISO 9001 certified design and manufacturing process, continuously audited by our internal auditors ensures a high quality and reliable product.

Easy to install

The compressor's small installation footprint, lifting slots and vertical air discharge simplify installation.

Easy starting

All conventional motor drive systems require a high starting peak current. The LRS Series compressor drive system, however, is able to start without any increase in power supply current above normal running levels, reducing stress on the site power supply system and eliminating peak current energy cost penalties.

Easy to operate

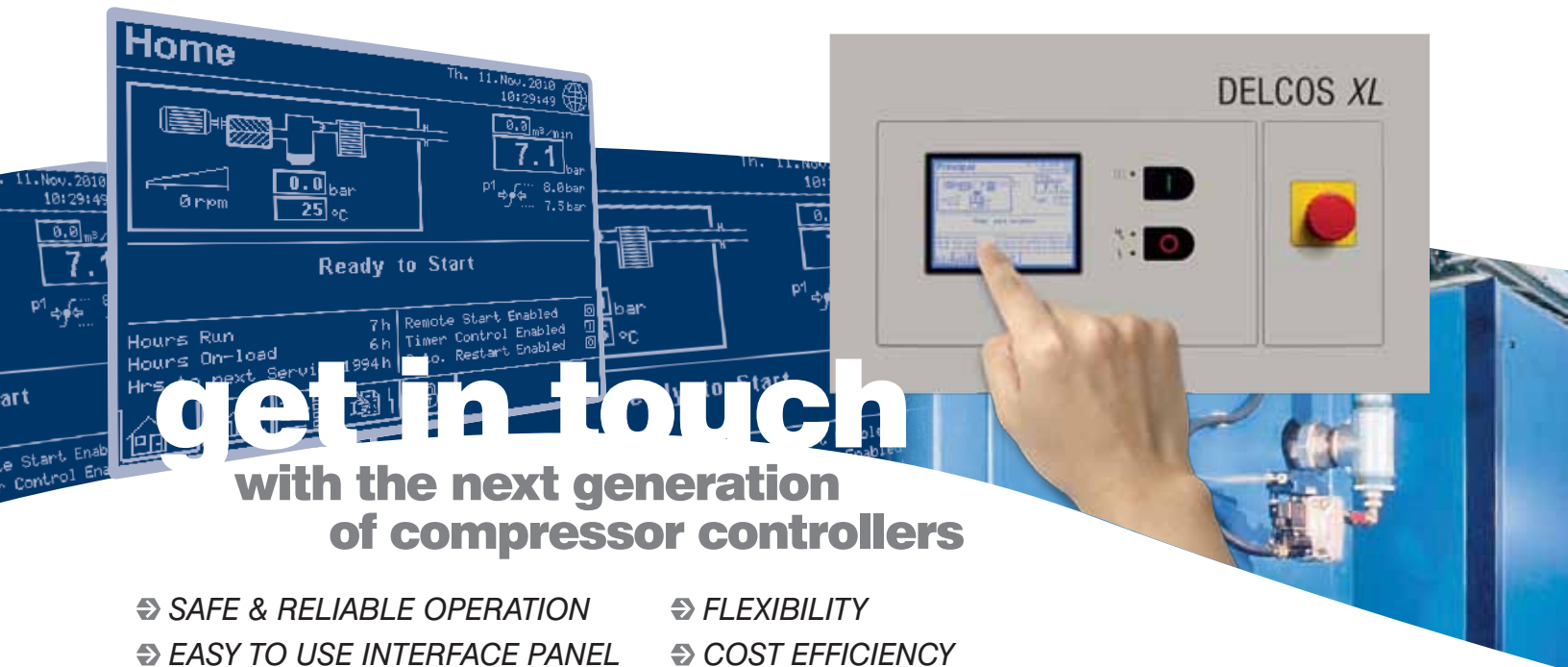
The compressor controller continuously protects your investment by monitoring every vital operational parameter. Once installed and commissioned, just tell any of the LRS Series compressors what pressure you require and press the start button.

⇒ INTELLIGENT CONTROLLER TECHNOLOGY BY COMPAIR

DELCOS XL: Innovative Touch Screen Compressor Controller

The DELCOS XL with its high resolution touch screen display is extremely **intuitive** and user-friendly. All functions are clearly structured in five main menus and are **easily navigated**.

The multilingual DELCOS XL control system ensures reliable operation and protects your investment by continuously monitoring the operational parameters, which is essential for reducing your running costs.



⇒ SAFE & RELIABLE OPERATION

⇒ EASY TO USE INTERFACE PANEL

⇒ FLEXIBILITY

⇒ COST EFFICIENCY

Trend Diagrams

DELCOS XL has the ability to display detailed system analysis in the form of trend diagrams and also graphs operating parameters which can be precisely set to maximize the efficiency.

Features & Functions

- Home Page – instant overview of the compressor status
- Real Time Clock – allows pre-setting of compressor starting/stopping
- Second Pressure Setting
- Integrated Cooling & Dryer Control
- Line/Network Pressure
- Motor Speed (Regulated Speed)
- On Load Hours/Total Hours Run & Average Volume Flow
- Weekly Average Volume Flow
- Fault History Log – for in-depth analysis
- Remote Control via Programmable Inputs
- Auto Restart after Power Failure
- Optional SD Card – stores several run characteristics



SmartAir Master: Highly Efficient Multi-Compressor Control System (Optional)

Modern compressed air systems are required to be more energy efficient, reliable and meet higher standards of safety than ever before.

The SmartAir Master can efficiently control up to 12 compressors of any combination, fixed or variable speed, and will reduce energy consumption by tightening the network pressure to the smallest

possible band, keeping off-load running to the absolute minimum.

Demand responsive operation ensures that where multi-capacity compressors are installed, only the correct combinations of compressors are selected to meet the system demand, resulting in maximum energy savings.



Benefits at a Glance

- User-friendly and intuitive color graphics displayed via touch screen
- Maximum energy and cost savings by reducing off-load times to a minimum
- Simple installation with low cabling costs using a data cable with a “bus structure”
- Complete overview of the status of the entire compressed air station
- The DELCOS controllers can be connected without any additional hardware



The single largest “cost” item, during the life of a compressor is the cost of the electricity required to run the compressor. With *e•Compare*, the CompAir Rotary Screw Energy Cost Calculator, no matter what load demand, the cost of the electricity used by a compressor can be calculated. Ask your local CompAir Authorized Distributor to demonstrate this unique cost-saving tool.

Compressor Energy Cost Estimator

Nominal kW	Operating Cost per Year (5000 hours) at Cost per kWh (\$)				
	\$.04	\$.06	\$.08	\$.10	\$.12
55	11,000	16,500	22,000	27,500	33,000
75	15,000	22,500	30,000	37,500	45,000
90	18,000	27,000	36,000	45,000	54,000
110	22,000	33,000	44,000	55,000	66,000
150	30,000	45,000	60,000	75,000	90,000
180	36,000	54,000	72,000	90,000	108,000
220	43,600	65,400	87,200	109,000	130,800
260	52,000	78,000	104,000	130,000	156,000

Note: Hours of operation based on two 8-hour shifts, 6 days per week.
Calculations based on nominal kW.



Easy to maintain

The compressor is designed to help reduce maintenance costs. It will provide you with advance indication of service requirements allowing you to schedule maintenance at convenient times.

Servicing is simple, quick and economical. All routine maintenance parts are conveniently grouped behind the hinged and removable service door, providing instant access and reducing service times.

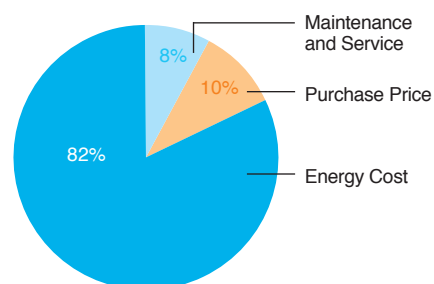


Protection you can count on.

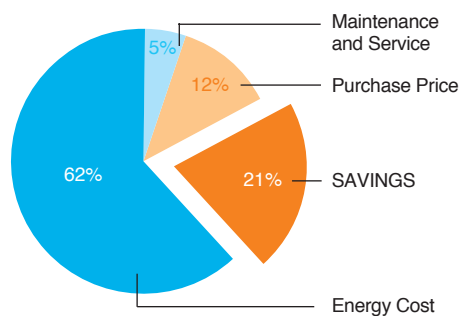
➔ LRS Series compressors represent CompAir's commitment to providing innovative and high technology solutions for complete compressed air systems

Annual Cost of Ownership

A typical oil-lubricated rotary screw air compressor operating at 70% load.



A typical comparison of an LRS Series compressor with a conventional air compressor.



➔ GENUINE SPARE PARTS

Enjoy complete peace of mind with CompAir

Genuine CompAir spare parts and lubricants ensure that compressed air plant reliability and efficiency is maintained at the highest standards. CompAir spare parts and lubricants are distinguished by the following characteristics:

- Long service life, even under the harshest conditions
- Minimal losses contributing to energy savings
- High reliability improves plant “up time”
- Products manufactured within the strictest Quality Assurance Systems

Immediate availability of spare parts and lubricants

CompAir's stock control policy makes use of best practice found in the aerospace and automotive industries. This ensures that the most appropriate spare parts and lubricants are available on demand, guaranteed. This guarantee of the availability of parts applies throughout the service life of your installation, whatever the purchase date of your compressor.



Advanced Design – Easy Servicing

The design of these packages assures the service points are readily accessible. The enclosure side doors are hinged and removable to allow complete access to all service points. The reduced number of moving parts also lowers maintenance costs.

Frame 3

Compressor Model		L37 RS				L45 RS			
Normal Pressure	psi g	75	100	125	190	75	100	125	190
	bar g	6	7.5	9	13	6	7.5	9	13
Drive Motor	HP (kW)	50 (37)				60 (45)			
Free Air Delivered Minimum-Maximum	Scfm	53–244	52–242	51–228	91–186	53–283	52–280	51–265	47–217
Noise Level	dB(A)	68 (at 70% Load)				69 (at 70% Load)			
Weight	Lbs (kg)	2099 (952)				2147 (974)			
Dimensions	L x W x H inches (mm)	68 x 36 x 65 (1722 x 920 x 1659)				68 x 36 x 65 (1722 x 920 x 1659)			
Discharge Pipe Size	NPT	1.5"				1.5"			

Frame 4

Compressor Model		L75 RS			
Normal Pressure	psi g	72	100	125	190
	bar g	6	7.5	9	13
Drive Motor	HP (kW)	100 (75)			
Free Air Delivered Minimum-Maximum	Scfm	81–494	80–482	79–452	138–377
Noise Level	dB(A)	70 (at 70% Load)			
Weight	Lbs (kg)	3968 (1800)			
Dimensions	L x W x H inches (mm)	85 x 48 x 78 (2158 x 1223 x 1971)			
Discharge Pipe Size	NPT	2.0"			

Frame 5

Compressor Model		L90 RS				L132 RS			
Normal Pressure	psi g	75	100	125	190	75	100	125	190
	bar g	6	7.5	9	11	6	7.5	9	13
Drive Motor	HP (kW)	125 (90)				180 (132)			
Free Air Delivered Minimum-Maximum	Scfm	171–627	168–623	167–583	219–451	171–807	169–803	167–760	203–609
Noise Level	dB(A)	72 (at 70% Load)				76 (at 70% Load)			
Weight	Lbs (kg)	6102 (2768)				6142 (2786)			
Dimensions	L x W x H inches (mm)	92 x 54 x 80 (2337 x 1368 x 2039)				92 x 54 x 80 (2337 x 1368 x 2039)			
Discharge Pipe Size	NPT	2.5"				2.5"			

Aftermarket Parts & Lubricants

Protect the Investment in CompAir

Regular maintenance and service of CompAir product is critical to the performance and longevity of the equipment. Only CompAir can provide the assurance that the investment will provide a lifetime of productivity.

Reliability

Only CompAir can provide aftermarket parts and services that are engineered for use in CompAir products. The parts and lubricant have been tested under rigorous conditions at the factory to the highest quality standards.

Performance

Only CompAir can provide aftermarket parts designed specifically for the CompAir product. Use of OEM parts ensures that the investment in CompAir will continue to perform year in and year out with the same reliability and efficiency.

Ease of Doing Business

Only CompAir can provide the peace of mind of turning to one supplier and one source for all aftermarket needs. CompAir has the support network in place to handle all customer service, service and technical support needs.

Value

Only CompAir can provide the high quality aftermarket parts and services for the life of the investment in CompAir. Proper care of the CompAir product is vital to the equipment's performance and efficiency. Lean on a trusted source—CompAir.



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