

REFRIGERATED DRYERS

Cycling

30 – 6,000 scfm





THE IMPORTANCE OF CLEAN, DRY COMPRESSED AIR

Water jeopardizes everything you want your compressed air system to do. Failure to remove this water ruins product and fouls process. That's why it is vital to have a reliable air treatment system in place to help protect your equipment and your operations.

Sullair Refrigerated Air Dryers reliably remove harmful moisture and contaminants from compressed air, helping protect your compressed air system, machinery and downstream tools.

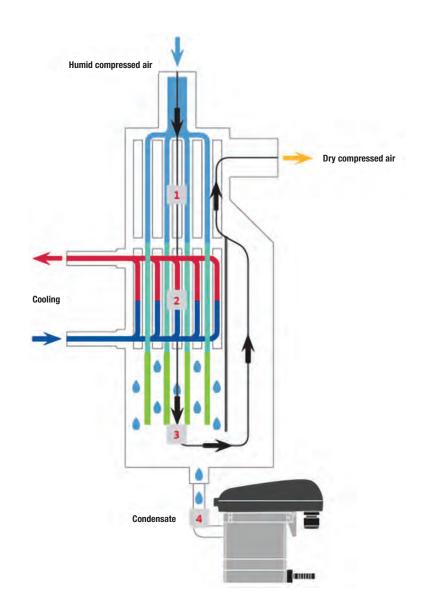
How?

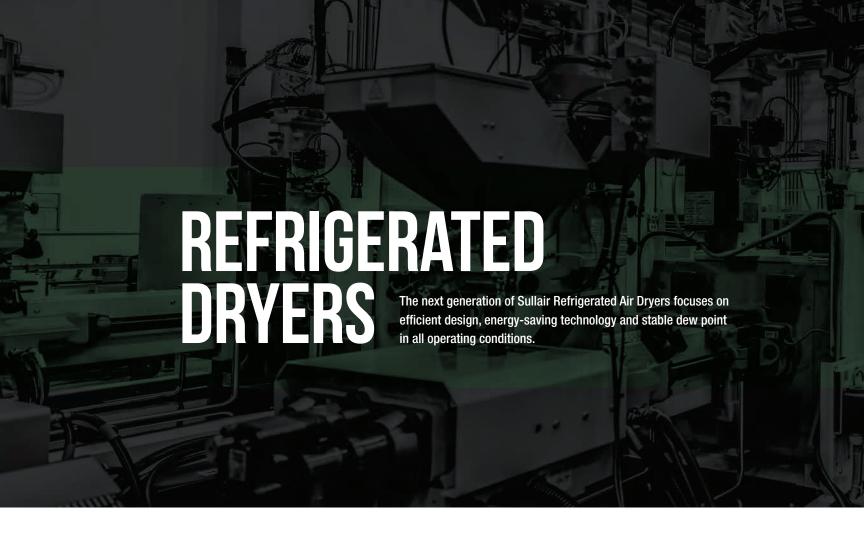
- 1. Saturated compressed air enters the system and is precooled in the air/air heat exchanger.
- 2. Then, precooled air moves downstream through the air/refrigerant heat exchanger. The heat exhanger's vertical profile design reduces condensed moisture by nearly 99% using gravitational force.
- **3.** To reliably prevent separated droplets from reentering the airstream, condensate collects in a large reservoir with subsequent recirculation where flow velocity is significantly reduced.
- **4.** Accumulated condensate is then discharged from the dryer via drain.

The dried, cold process air passes back through the heat exchanger to be reheated — reducing relative air humidity and recovering up to 60% cooling capacity.

Cycling

Cycling dryers are ideal for operations with variable flow rates. Sullair cycling dryers use solenoid valves that close during low demand periods and trap the refrigerant in the fully insulated heat exchanger acting as a thermal mass. Once the mass is chilled to a pre-determined temperature, the dryer is switched off for maximum energy savings.





SULLAIR REFRIGERATED AIR DRYERS ARE BUILT FOR DURABLE PERFORMANCE, OPTIMUM RELIABILITY AND MAXIMUM ENERGY SAVINGS

- Unique heat exchanger designed for minimum pressure drop and gravitational self-cleaning
- Hot gas bypass designed for stable dew point in all operating conditions
- Integrated SULLIMAXTM Drain for reliable condensate discharge and maximum energy savings
- Energy-saving technology
 - Oversized condensers
 - Smaller high-performance compressors
- Easy-open panels for simplified service

SULLAIR REFRIGERATED AIR DRYERS ARE AVAILABLE IN THE FOLLOWING CONFIGURATIONS:

- SRC Sullair Refrigerated Cycling Dryer 30 to 500 scfm
- SRV Sullair Refrigerated Variable Speed Dryer 800 to 6000 scfm





SRC SERIES

SULLAIR REFRIGERATED CYCLING DRYERS 30 – 500 scfm

- Vertical profile heat exchanger
 - Minimum pressure drop
 - Gravitational self-cleaning
- Independent operation controller and valve for maximum dew point stability
- Cold trap design
- High-efficiency performance
- Integrated Sullair SULLIMAX[™] Drain
- Easy-open panels for simplified service





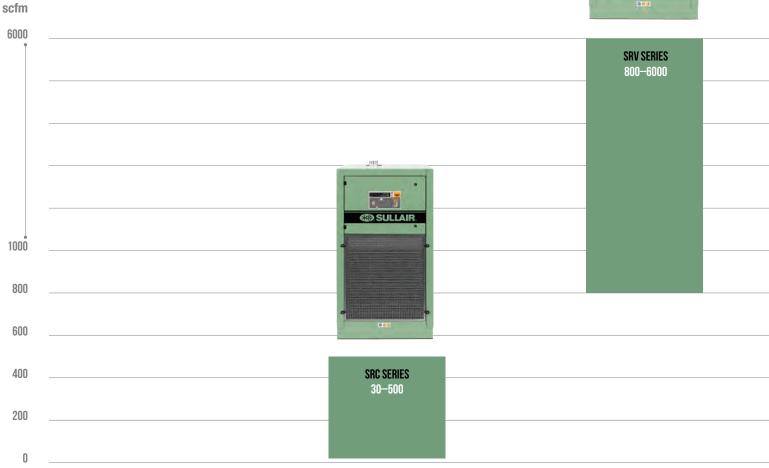
SRV SERIES

SULLAIR REFRIGERATED VARIABLE SPEED DRYERS 800 – 6000 scfm

- Vertical profile heat exchanger
 - Minimum pressure drop
 - Gravitational self-cleaning
- Variable Speed Technology for maximum energy savings
- Variable compressor and fan for maximum dew point stability
- High-efficiency performance
- Integrated Sullair SULLIMAXTM Drain
- Easy-open panels for simplified service

SULLAIR CYCLING REFRIGERATED DRYERS





| | SRC SERIES | SRV SERIES |
|--|-------------------|-------------|
| Flow Rates scfm | 30 – 500 | 800 – 6,000 |
| Max Inlet Air Temperature $^{\circ}\!F$ | 160 | 160 |
| Max Inlet Operating Pressure psig | SRC 30 – 50: 232 | 200 |
| | SRC 75 – 500: 200 | |
| Standard Outlet Pressure Dew Point $^{\circ}\!F$ | 35 – 45 | 35 – 45 |
| ISO 8573-1:2010 Air Quality Class | Class 4 – 5 | Class 4 – 5 |
| Standard Condensate Drain | SULLIMAXTM | SULLIMAXTM |

Sullair Refrigerated Dryers come with a 2-year bumper-to-bumper and 5-year heat exchanger warranty.



For more than 50 years, Sullair has been on the leading edge of compressed air solutions. We were one of the first to execute rotary screw technology in our air compressors, and our machines are famous all over the world for their legendary durability. As the industry moves forward, Sullair will always be at the forefront with quality people, innovative solutions, and air compressors that are built to last.

Sullair was founded in Michigan City, Indiana in 1965, and has since expanded with a broad international network to serve customers in every corner of the globe. Sullair has offices in Chicago and manufacturing facilities in the United States and China — all ISO 9001 certified to ensure the highest quality standards in manufacturing. In addition, Sullair Suzhou and Shenzhen facilities are ISO 14001 and OHSAS 18001 certified.

Sulliar is A Hitachi Group Company



These are the pillars that drive the quality of Sullair compressed air solutions. It's a promise we keep with every machine we make.

RELIABILITY

Customers who work with Sullair have found that the intangibles make all the difference—things like trust, confidence, and peace of mind. They go to work every day having full faith in their equipment, as well as the knowledge that dedicated distributors and Sullair personnel have their back every step of the way.

DURABILITY

Bulletproof. Built to last. However you spin it, Sullair compressed air solutions are in it for the long haul, driven by innovative designs pioneering the air treatment industry. And ready to stand the test of time.

PERFORMANCE

Sullair is constantly innovating to improve our compressed air solutions. For our compressed air treatment line, this means more energy efficiency. With air treatment being a vital part of your entire compressed air system, Sullair is committed to helping you protect your equipment and manage your operating expenses.

SRC SERIES CYCLING REFRIGERATED DRYERS



FREQUENCY: 60 Hz

| Model # | FLOW RATE (scfm) | CONNECTION SIZE (NPT) | PRESSURE DROP (psid) | Power Consumption — Load (kW) | Height (in) | Width (in) | Depth (in) | Weight (lbs) |
|---------|---------------------|--------------------------|-------------------------|----------------------------------|----------------|---------------|---------------|-----------------|
| SRC 30 | 30 | 1/2" | 1.16 | 0.27 | 29 | 14 | 17 | 64 |
| SRC 50 | 50 | 1/2" | 1.6 | 0.39 | 29 | 14 | 17 | 75 |
| SRC 75 | 75 | 1″ | 1.89 | 0.48 | 29 | 14 | 17 | 79 |
| SRC 100 | 100 | 1¼″ | 2.47 | 0.58 | 32 | 19 | 18 | 82 |
| SRC 125 | 125 | 1¼″ | 2.18 | 1 | 32 | 19 | 18 | 101 |
| SRC 150 | 150 | 1¼″ | 2.9 | 1.05 | 32 | 19 | 18 | 110 |
| SRC 200 | 200 | 1½″ | 2.18 | 1.1 | 35 | 22 | 23 | 121 |
| SRC 250 | 250 | 1½″ | 2.61 | 1.39 | 35 | 22 | 23 | 139 |
| SRC 300 | 300 | 2″ | 1.31 | 1.64 | 38 | 22 | 25 | 203 |
| SRC 350 | 350 | 2″ | 1.89 | 2.19 | 38 | 22 | 25 | 207 |
| SRC 400 | 400 | 2½″ | 1.02 | 2.48 | 44 | 26 | 29 | 331 |
| SRC 500 | 500 | 2½″ | 1.89 | 2.97 | 44 | 26 | 29 | 335 |

| CAPACITY CORRECTION FACTORS FOR DIFFERING OPERATING PRESSURE | | | | | | | | | | | | | |
|--|---|------|---|------|------|------|------|------|--|--|--|--|--|
| Operating Pressure psig | Operating Pressure psig 60 80 100 120 140 160 180 200 | | | | | | | | | | | | |
| Correction Factor | 0.79 | 0.91 | 1 | 1.07 | 1.13 | 1.18 | 1.23 | 1.27 | | | | | |

| CAPACITY CORRECTION FACTORS FOR DIFFERING AMBIENT AIR TEMPERATURES | | | | | | | | | | | | |
|--|------|------|-----|------|------|------|------|--|--|--|--|--|
| Ambient Air Temperature ${}^\circ\! F$ | 80 | 90 | 100 | 105 | 110 | 115 | 120 | | | | | |
| Correction Factor | 1.11 | 1.09 | 1 | 0.94 | 0.87 | 0.78 | 0.69 | | | | | |

| CAPACITY CORRECTION FACTORS FOR DIFFERING INLET AIR TEMPERATURES | | | | | | | | | | | | |
|--|------|-----|------|------|------|------|------|-----|--|--|--|--|
| Inlet Air Temperature ${}^{\circ}\!\mathit{F}$ | 90 | 100 | 110 | 120 | 130 | 140 | 150 | 160 | | | | |
| Correction Factor | 1.16 | 1 | 0.82 | 0.68 | 0.61 | 0.52 | 0.45 | 0.4 | | | | |

Required pre-filtration µm 1

Recommended post-filtration μm 0.01

Standard Operating Voltage

SRC 30–200 115V/1PH SRC 250–500 230V/1PH Optional Operating Voltage 575V Standard Outlet Pressure Dew Point $^{\circ}F$ 1SO 8573-1:2010 Air Quality Class Max inlet air temperature $^{\circ}F$ 160

Min/max ambient temperature °F 34/120

Max inlet pressure psig

SRC 30–50 232 **SRC 75–500** 200





SRV SERIES VARIABLE SPEED REFRIGERATED DRYERS



FREQUENCY: 60 Hz

| Model # | FLOW RATE (scfm) | CONNECTION SIZE (NPT) | PRESSURE DROP (psid) | Power Consumption — Load (kW) | Height (in) | Width (in) | Depth (in) | Weight (lbs) |
|----------|---------------------|--------------------------|-------------------------|----------------------------------|----------------|---------------|---------------|-----------------|
| SRV 800 | 800 | 3" Flange | 2.9 | 2.8 | 58 | 31 | 39 | 534 |
| SRV 1000 | 1000 | 3" Flange | 2.8 | 4.1 | 58 | 31 | 39 | 608 |
| SRV 1250 | 1250 | 3" Flange | 3.6 | 5 | 58 | 31 | 39 | 686 |
| SRV 1500 | 1500 | 4" Flange | 2.8 | 5.8 | 69 | 45 | 47 | 1021 |
| SRV 1750 | 1750 | 4" Flange | 1.9 | 6.4 | 69 | 45 | 47 | 1202 |
| SRV 2000 | 2000 | 4" Flange | 2.6 | 8 | 69 | 45 | 47 | 1202 |
| SRV 2500 | 2500 | 4" Flange | 3.6 | 10.1 | 69 | 45 | 47 | 1349 |
| SRV 3000 | 3000 | 6" Flange | 2.8 | 11.2 | 71 | 51 | 69 | 1850 |
| SRV 3750 | 3750 | 6" Flange | 3.8 | 13.8 | 71 | 51 | 69 | 2090 |
| SRV 4000 | 4000 | 8" Flange | 2.8 | 15.4 | 74 | 55 | 87 | 2350 |
| SRV 5000 | 5000 | 8" Flange | 4.1 | 17.1 | 74 | 55 | 87 | 2670 |
| SRV 6000 | 6000 | 8" Flange | 3.2 | 22.3 | 96 | 61 | 86 | 3660 |

| CAPACITY CORRECTION FACTORS FOR DIFFERING OPERATING PRESSURE | | | | | | | | | | | | | |
|--|---|------|---|------|------|------|------|------|--|--|--|--|--|
| Operating Pressure psig | Operating Pressure psig 60 80 100 120 140 160 180 200 | | | | | | | | | | | | |
| Correction Factor | 0.79 | 0.91 | 1 | 1.07 | 1.13 | 1.18 | 1.23 | 1.27 | | | | | |

| CAPACITY CORRECTION FACTORS FOR DIFFERING AMBIENT AIR TEMPERATURES | | | | | | | | | | | | |
|---|------|------|---|------|------|------|------|--|--|--|--|--|
| Ambient Air Temperature ♥ 80 90 100 105 110 115 120 | | | | | | | | | | | | |
| Correction Factor | 1.11 | 1.09 | 1 | 0.94 | 0.87 | 0.78 | 0.69 | | | | | |

| CAPACITY CORRECTION FACTORS FOR DIFFERING INLET AIR TEMPERATURES | | | | | | | | | | | | | |
|--|------|-----|------|------|------|------|------|-----|--|--|--|--|--|
| Inlet Air Temperature ${}^{\circ}\!\mathit{F}$ | 90 | 100 | 110 | 120 | 130 | 140 | 150 | 160 | | | | | |
| Correction Factor | 1.16 | 1 | 0.82 | 0.68 | 0.61 | 0.52 | 0.45 | 0.4 | | | | | |

Required pre-filtration μm 1 **Recommended post-filtration** μm 0.01

MODBUS ready

Standard Operating Voltage*460V/3PHStandard Outlet Pressure Dew Point $^{\circ}F$ 37-45ISO 8573-1:2010 Air Quality ClassClass 4-5Max inlet air temperature $^{\circ}F$ 160Min/max ambient temperature $^{\circ}F$ 34/115Max inlet pressure psig200





^{* 575}V line transformer shipped loose to be installed by your distributor

FOR MORE INFORMATION, CONTACT YOUR LOCAL AUTHORIZED SULLAIR DISTRIBUTOR.



