













Compressed Air Treatment

Meeting & Exceeding Expectations

Unwanted substances can and do occur in compressed air – from the ambient air inducted and generated by the process, e.g. dirt, dust, water, oil, and other micro-contaminants. By installing the correct air treatment system for your application, moisture and contaminants that will damage your production and application efficiency and increase costs will be avoided altogether. In addition, air treatment enables the delivery of compressed air to the exact quality specified by the application or process.

Meeting or exceeding even the most stringent air purity standards by removing contaminants from compressed air with the correct filtration will undoubtedly lower operating costs significantly and extend the service life of your compressed air systems and application equipment.

In the same way, choosing the correct dryer for your application will help to eliminate moisture and prevent corrosion, avoiding expensive equipment failure and product damage.

Compressed air treatment solutions designed and manufactured by CompAir, protect your systems and processes and deliver an energy-efficient, cost-effective and environmentally-friendly solution.



Compressed Air Treatment ARRIVALS





Meeting & Exceeding Expectations

Some of the latest developments and additions from CompAir:



Refrigerant Dryers

3,200 - 4,800 m³/h

- Up to 16% lower spec power
- 27% lower pressure drop
- Up to 88% lower carbon footprint
- 34% footprint reduction
- 13 to 14 bar(g)
- Reversible air headers
- iConn enabled



Sub-Freezing Dryers

1,600 m³/h

- Patented technology
- ISO Class 3: -20°C PDP
- Lowest TCO
- Stable PDP
- Compatible with all compressors
- Based on previous models' experience
- iConn equipped as standard



Heated Blower Dryers

11,000 - 4,500 m³/h

- True Zero Purge: 0% purge needed
- PDP & Temp spike reduction by 50%
- Power consumption saving by 15%
- New 7" display touchscreen
- New high-performance media option
- Remote monitoring with iConn

Compressed Air Treatment ARRIVALS





Meeting & Exceeding Expectations



High-Temperature Filters

30 - 2,700 m³/h

- Zero clearance design
- Low-pressure drop
- Different grades of filtration



Oil-Water Separators

Smaller size: 120m³/h

- Disposable to serviceable
- <5ppm at discharge
- Same wall mount brackets
- 100% recycled PP plastic
- DIBT certified
- PBT for customers <3yr



Condensate Drains

Timer Controlled, Electric No-Loss, Magnetic No-Loss **Drains & Saver Lock Valves**

- Reliable
- Compact Designs
- Ease-of-Use & Maintenance
- Energy Efficient
- Patented Technology



Compressed Air Purity – Installation Recommendations

Compressed Air Treatment utilising a Refrigerant Dryer for Oil-Lubricated Installations (Pressure Dew Point to +3°C)

Compressed Air Treatment utilising a Refrigerant Dryer for Oil-Free Installations (Pressure Dew Point to +3°C)

Centrifugal

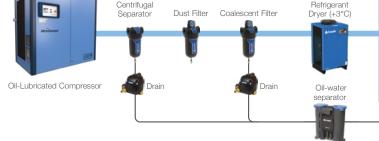
Separator

Oil-Free Air Compressor

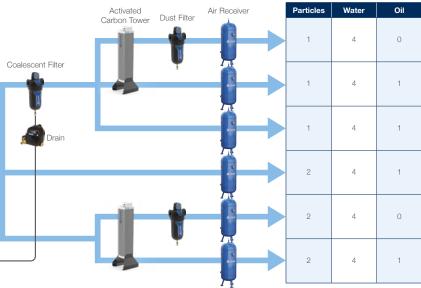
Dust Filter

Refrigerant

separator



Compressed Air Classification Achievable



Compressed Air Classification Achievable

	Activated Carbon Tower	Dust Filter	Air Receiver		Particles	Water	Oil
Ocalescent Filter	Carbon lower			→	1	4	0
Coalescent Filter	4	Т	-0-	→	1	4	1
Drain				→	1	4	1
++-				→	2	4	1
	TÎ.	T T		→	2	4	0
	•	Т		→	2	4	1

ISO 8573-1:2010 compressed air contaminants and purity classes

	Particles				
Class	By Particle Size (maximum number of particles per m³)			By Mass	
Glass	0.10 - 0.5		[mg/m³]		
0	As specified by the equipment user or supplier and more stringent than class 1				
1	≤ 20,000	≤ 400	≤ 10	-	
2	≤ 400,000	≤ 6,000	≤ 100	-	
3	-	≤ 90,000	≤ 1,000	-	
4	-	-	≤ 10,000	-	
5	-	-	≤ 100,000	-	
6	-	-	-	0 - ≤ 5	
7	-	-	-	0 - ≤ 10	
8	-	-	-	-	
9	-	-	-	-	
X				-	
Microbiological Contaminants					
	No purity classes are identified				

Water						
Class	Vapor Pressu	re Dewpoint	Liquid			
[°C]		[°F]	[g/m³]			
0	As specified by the equipment user or supplier					
Ü	and mo	re stringent than	class 1			
1	≤ -70	≤ -94	-			
2	≤ -40	≤ -40	-			
3	≤ -20	≤ -4	-			
4	≤ +3	≤ +37	1			
5	≤ +7	≤ +45	-			
6	≤ +10	≤ +50	-			
7	-	-	≤ 0.5			
8	-	-	≤ 5			
9	-	-	≤ 10			
Χ	-	-	>10			
	Other Gaseous Contaminants					

No purity classes are identified. Gases mentioned are: CO, CO₂, SO₂, NOX, Hydrocarbons in the range of C₁ to C₅

	Oil				
Class	Liquid, Aerosol & Vapor				
Class	[mg/m³]				
0	As specified by the equipment user or supplier and more stringent than class 1				
1	≤ 0.01				
2	≤ 0.1				
3	≤ 1				
4	≤ 5				
5	-				
6	-				
7	-				
8	-				
9	-				
X	>5				
	Other Gaseous Contaminants				

No purity classes are identified. Gases mentioned are: CO, CO_0 , SO_0 , NOX, Hydrocarbons in the range of C, to C_0



Compressed Air Purity – Installation Recommendations

Compressed Air Treatment utilising a Sub-Freezing Dryer for Oil-Lubricated Installations (Pressure Dew Point to -20°C)

Compressed Air Treatment utilising a Sub-Freezing Dryer for

Centrifugal

Separator

Dust Filter

Sub-Freezing

Dryer (-20°C)

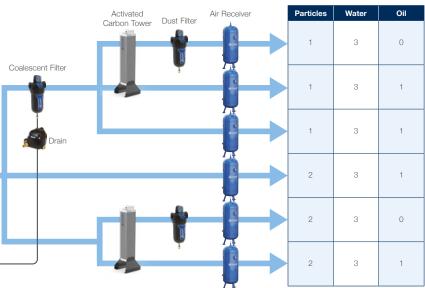
separator

Oil-Free Installations (Pressure Dew Point to -20°C)

Oil-Free Air Compressor



Compressed Air Classification Achievable



Compressed Air Classification Achievable

	Activated Carbon Tower	Dust Filter	Air Receiver		Particles	Water	Oil
				→	1	3	0
Coalescent Filter		Ŧ		+	1	3	1
Drain				+	1	3	1
-			Ğ	+	2	3	1
	Tİ			+	2	3	0
		T		→	2	3	1

ISO 8573-1:2010 compressed air contaminants and purity classes

	Particles				
Class	By Particle Size (maximum number of particles per m³)			By Mass	
Glass	0.10 - 0.5		[mg/m³]		
0	As specified by the equipment user or supplier and more stringent than class 1				
- 1	≤ 20,000	≤ 400	≤ 10	-	
2	≤ 400,000	≤ 6,000	≤ 100	-	
3	-	≤ 90,000	≤ 1,000	-	
4	-	-	≤ 10,000	-	
5	-	-	≤ 100,000	-	
6	-	-	-	0 - ≤ 5	
7	-	-	-	0 - ≤ 10	
8	-	-	-	-	
9	-	-	-	-	
X	-	-	-	-	
Microbiological Contaminants					
No purity classes are identified					

Water					
Class	Vapor Pressu	Liquid			
Class	[°C] [°F]		[g/m³]		
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1	≤ -70	≤ -94	-		
2	≤ -40	≤ -40	-		
3	≤ -20	≤ -4	-		
4	≤ +3	≤ +37	-		
5	≤ +7	≤ +45	-		
6	≤ +10	≤ +50	-		
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	Oil				
Class	Liquid, Aerosol & Vapor				
Class	[mg/m³]				
0	As specified by the equipment user or supplier and more stringent than class 1				
1	≤ 0.01				
2	≤ 0.1				
3	≤ 1				
4	≤ 5				
5	-				
6	-				
7	-				
8	-				
9	-				
X	>5				
	Other Gaseous Contaminants				

No purity classes are identified. Gases mentioned are: CO, CO_0 , SO_0 , NOX, Hydrocarbons in the range of C, to C_0



A leading global manufacturer of a wide range of world-class compressed air solutions, CompAir is dedicated to providing a complete solution for our industry partners. From the latest advances in oil-free and oil-lubricated technologies to a complete range of downstream equipment, air treatment and accessories.

An extensive network of dedicated CompAir sales companies and premium partners across all continents provide global expertise with a truly local service, ensuring our advanced technology is backed up with the right support.

CompAir has consistently been at the forefront of compressed air systems development, culminating in some of the most energy efficient and low environmental impact compressors on the market today, helping customers achieve or surpass their sustainability targets.

CompAir compressed air product range

Advanced Compressor Technology

Lubricated

- Rotary Screw
 - > Fixed and Regulated Speed
- Portable

Oil-Free

- · Water Injected Screw
- > Fixed and Regulated Speed
- Two Stage Screw
- > Fixed and Regulated Speed
- Rotary Scroll
- Ultima®

Complete Air Treatment Range

- Filter
- Refrigerant and Desiccant Dryer
- Condensate Management
- Heat of Compression Dryer
- Nitrogen Generator

Modern Control Systems

- CompAir DELCOS Controllers
- SmartAir Master Plus Sequencer
- iConn Smart Compressor Service

Value Added Services

- Professional Air Audit
- Performance Reporting
- Leak Detection

Leading Customer Support

PureAir

CompAir

- Custom Engineered
 Solutions
- Local Service Centres
- Genuine CompAir Parts and Lubricants