

# ROTARY SCREW AIR COMPRESSORS

Fixed speed, variable speed, oil free & More

COMPLETE AIR  
& POWER SOLUTIONS



# CAPS AUSTRALIA COMPLETE AIR & POWER SOLUTIONS

CAPS Australia is a privately owned and proud Australian company intent on remaining at the forefront of compressed air, gas and power generation solutions.

## WHO IS CAPS AUSTRALIA?

- Over **40 years of experience** in the Australian market.
- **10 branches** reach right around the country with **over 160 employees**.
- **60 service technicians** covering the full national footprint with a **24/7 service** offering.
- A vast inventory of **spare parts**.
- An **independent company** with the flexibility to search globally for the best products and technologies that best serve the **Australian market's needs**.
- CAPS has world-renowned partner brands such as Ingersoll Rand, Kohler, AIRMAN, Sauer, Pedro Gil, Next Turbo Technologies, Lamson and many more.
- **Custom design, manufacturing, supply and service**
- ISO 9001 accredited facilities

## WHO DO WE SERVE?

- Mining
- Manufacturing
- Food and beverage
- Public and private utilities
- Waste and water treatment plants
- Oil and gas
- And much more throughout Australia and internationally, having exported turn-key packages to over 35 countries.



*"At CAPS, we think outside the box to develop integrated, agile solutions that are designed around the specific needs of our customers."*



A family  
owned  
Australian  
business

# WHY CHOOSE A ROTARY SCREW COMPRESSOR?

Rotary screw air compressors have many benefits over piston compressors. You'll find rotary screw air compressors in industries such as, Mining, Automotive, Mining, Construction, as well as in metal Processing Plants.

All of where high-quality equipment is required with a continuous flow.

Rotary screw compressors come in two main classifications: Oil-lubricated (also known as oil-injected or oil-flooded) and Oil-free (Class Zero).

Deciding on which is right for you will depend on the application.

Oil injected compressors use specific compressor oil to aid the compression process, provide lubrication to the air end bearings and assist to maintain a constant discharge air temperature.

Oil-free compressors offer a cleaner alternative for industries that require no contamination at all, like the medical or food manufacturing industries.

The benefits of rotary screw air compressors over other compressor types include:

- Continuous airflow / 100% duty cycle
- Larger quantities of air
- Higher CFM per horse power
- Longer lifespan
- Quieter
- Energy efficient

Most people appreciate the longevity, reliability, and easy access to instant air. Because rotary screw air compressors can run continuously, there's no need to wait for an air receiver tank to fill before you can start using the air.

## WHAT SHOULD YOU CONSIDER BEFORE CHOOSING YOUR COMPRESSOR?

- What are you going to be using it for?
- What are you going to be running off it (tools, equipment)?
- What power do you have?
- Have you got the correct piping system in place?
- What's important to you? i.e. energy efficiency?

## CAPS ROTARY SCREW COMPRESSOR RANGE

Nominal kW	Belt Drive	Gear Drive	HRM Motor	Fixed Speed	Variable Speed	Single Stage	Two Stage	Pressure Range bar(g)	Flow Range (cfm)	Flow Range (m3/min)
<b>OIL FLOODED COMPRESSORS</b>										
2 - 4	✓	X	X	✓	X	✓	X	7 - 13	9 - 20	0.25 - 0.57
5 - 22	✓	✓	X	✓	✓	✓	X	7 - 14	27 - 141	0.76 - 3.99
30 - 75	X	✓	✓	✓	✓	✓	X	7 - 14	184 - 683	5.21 - 19.34
90 - 355	X	✓	✓	✓	✓	✓	✓	7 - 14	644 - 2,507	18.24 - 70.99
<b>OIL FREE COMPRESSORS</b>										
37 - 355	X	✓	X	✓	✓	X	✓	7 - 10	88 - 1,882	2.5 - 53.3
37 - 160	X	✓	✓	✓	✓	X	✓	7 - 10	88 - 901	2.5 - 25.6

✓ Available    x Not available

# DIFFERENT TECHNOLOGIES DIFFERENT BENEFITS

In the world of rotary screw air compressors, different technologies apply to the electric motors, air-end and other components. They all impact on the life of the compressor, energy consumption and required maintenance.

Depending on your compressed air needs and your investment priorities, CAPS has a comprehensive range of rotary screw compressors to perfectly complement the scale and requirements of your operation.

## HYBRID RELUCTANCE MOTOR (HRM)

### Limitless starts and stops

HRM motors are designed to start and stop limitlessly to meet your compressed air demands. They are fitted with Ferrite magnets which are 100% recyclable.

The added advantage is that the HRM has optimal efficiency at all operating points and one of the few IE5 products currently on the market today.

This technology also has unmatched efficiency throughout the turn-down range, providing savings no matter what your demand profile requires.



### No wasted energy

HRM motor requires less power at start-up, never operates at more than full-load amps, and shuts down immediately at minimum speed to avoid wasted energy.

It ensures constant pressure throughout the entire operating range. At start-up, induction motors require a power surge of up to twice full-load current in order to overcome initial inertia. They also run unloaded when demand is below minimum, reducing efficiency and driving up energy costs.

### Simpler and more reliable

The motor used on the VFD Ingersoll Rand compressor is a ferrite magnet assisted synchronous reluctance type electric motor with efficiency  $\geq 95\%$ .

Hybrid Reluctance Motor (HRM) technology is unique to Ingersoll Rand. HRM is a compact, simple design with a unique shaped rotor imbedded with ferrite magnets that allow the motor to maintain the flux field down to zero speed. The motor is direct mounted to the air-end with the rotor mounted directly to the input shaft.

Protection rating is standard as IP55. Low loss design results in lower bearing temperature to extend the life time of the motor.



## **SINGLE-STAGE VS TWO-STAGE**

There are two basic types of rotary screw compression: single stage and two stage.

A single-stage rotary screw air compressor contains a single set of rotors in a single stator housing and is typically driven directly by the motor shaft through a set of gears, or by a belt and pulley arrangement. A two-stage rotary screw air compressor contains two sets of synchronized rotors and can be housed in a common stator enclosure or two separate stator enclosures bolted together.

The difference between the two is not the end result, rather the energy required to produce the end result. Basically you save energy by using two rotors instead of one.

### **Single-stage air compressors pros and cons**

Single-stage rotary screw air compressors are lower in initial cost than two-stage air compressors, so if you have a limited budget, there are plenty of reliable and efficient solutions available in CAPS range of products.

Single stage compressors are available in a wider range of sizes and therefore can fit your air needs more accurately.

Even though the life expectancy of any rotary screw air end depends on the installation conditions and the level of maintenance performed, single-stage air end life expectancy is generally less than that of a two-stage rotary screw air end.

### **Two-stage air compressors pros and cons**

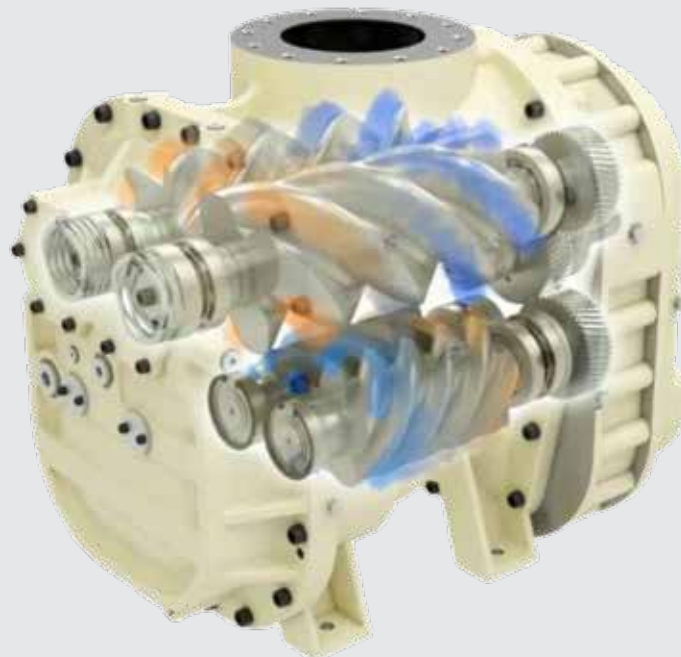
Two-stage technology is more limited in terms of horsepower range and its initial cost is higher.

Two-stage air compressors are available in different configurations like the single stage ones but also have further limitation due to its size. Its footprint for the same horsepower will be generally larger.

The energy efficiency advantages of two-stage compression over single stage compression are maximised when the air compressor runs at 100% full load, all the time.

In large manufacturing operations, two-stage rotary screw air compressors can reduce waste and increase plant efficiency. There are substantial savings to be had when utilising a two-stage compressor compared with a single-stage compressor in these circumstances. Compressing air in two stages instead of one provides an energy saving of between 10 to 12 per cent.

Furthermore, two-stage compressors operate at a slower speed. Along with splitting the pressure ratio into two stages they significantly reduce the bearing load, extending the compressor life.



**TWO-STAGE AIR-END**

## FIXED SPEED VS VSD - WHICH OPTION IS BEST FOR YOUR NEED?

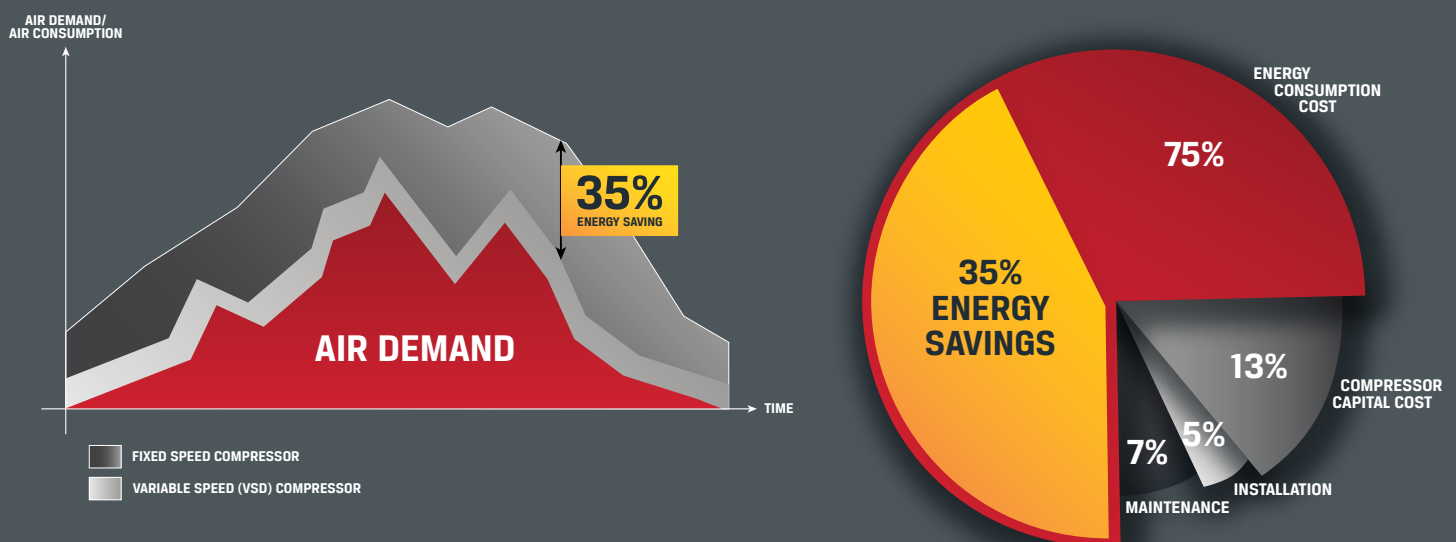
Both kinds of compressors have differences in how they operate. On a fixed speed air compressor, the motor will run at one constant speed/fixed RPM. When air demand is placed on the system, the inlet valve will open, and then close again once the demand is removed. Therefore, due to the motor only running at one fixed speed, it will maintain a pressure of 0.7 bar above the air demand at all time.

A Variable Speed Drive compressor will use a variable speed, or VFD drive, which allows the motor to actually ramp up and down, allowing for power consumption savings. Properly sized for the same end use, a VSD compressor can yield power savings upwards of 35% in some cases.

Energy is always a significant cost to any business and reducing energy consumption can yield large savings. Aside from the variable motor speed when in operation, the inverter in the VSD system performs a "soft" start operation by ramping up the motor speed slowly, which reduce the high draw peaks that are typical when a fixed speed motor is started. This also helps protect electrical and mechanical components from the starting mechanical stresses that can shorten the life of an air compressor.

**So, overtime, choosing the variable speed option will save you up to 35% in power cost but will also make your installation last longer and avoid downtime.**

## FIXED SPEED VS VSD - UP TO 35% ENERGY SAVINGS



## BELT OR GEAR DRIVE?

Every machine requires a source of energy to perform a certain task. For air compressors, this is typically an electric motor or a diesel engine. This source of energy is connected to the air-end by either friction force (belt drive) or direct drive (gear drive). Each drive has certain advantages over the other.

This difference often comes down to cost, as a gear drive system will require more integrated componentry with much higher precision required. Belt drives allow for more variation and distance from the motor to the air-end but are limited by the frictional characteristics of the contact surfaces. Typically gear drives translate approximately 99% of their energy through and are suited to very high power and torque applications. Belt drives typically transmit around 92-96% of the power, so are less efficient due to energy loss via friction.

In terms of maintenance, gear drives require full lubrication and initial cost and maintenance costs can be marginally higher.

So depending on the power and torque ratings of the compressor, our manufacturers will have chosen the right drive technology, or in some ranges you will have the choice between the two.



# OIL FLOODED ROTARY SCREW AIR COMPRESSORS



CAPS' RANGE OF ROTARY SCREW AIR COMPRESSORS DELIVER RELIABILITY, EFFICIENCY, AND PRODUCTIVITY. AT CAPS, WE ARE ALL ABOUT DELIVERING COMPRESSOR SOLUTIONS THAT DRIVE PRODUCTIVITY AND IMPROVE PROFITABILITY FOR THOUSANDS OF OUR CUSTOMERS. WE ACHIEVE THIS BY OFFERING ENERGY EFFICIENT, PRECISION ENGINEERED, RELIABLE ROTARY SCREW AIR COMPRESSORS THAT ARE BUILT TO LAST.

A COMPREHENSIVE SELECTION OF COMPRESSORS, RANGING FROM 5.5 TO 350 KW.

# OIL FLOODED COMPRESSORS

Ingersoll Rand oil-flooded rotary screw air compressors offer businesses the very best combination of time-proven designs and technologies plus new, advanced features that ensure the highest levels of reliability, efficiency, and productivity available.

Created using Ingersoll Rand design expertise, many of our screw compressors are available with variable speed drives and an intuitive user interface.

## THE RS SERIES

Ingersoll Rand works to keep you ahead of your competition with Next Generation R-Series air compressors that boost productivity, lower operating expenses and extend equipment life. And with a variable speed drive (VSD), the compressor automatically adjusts its compressed air output to achieve the highest efficiency for your operation, minimizing energy use at any load. Next Generation R-Series air compressors.

## THE RM SERIES

The RM-Series oil-flooded screw air compressors leverage an advanced compressor core to achieve exceptional performance and reliability standards. The optimized rotor profile and standard IE3 premium efficiency motor provide efficiency gains of up to 16%, resulting in lower energy costs and reduced operational spend. Equipped with a Luminance Series intelligent controller with powerful remote management capabilities, the RM-Series air compressors increase your productivity and give you peace of mind.



## CAPS PRODUCT RANGE

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5 - 22	✓	✓	X	✓	✓	✓	X	7 - 14	27 - 141	0.76 - 3.99
30 - 75	X	✓	✓	✓	✓	✓	X	7 - 14	184 - 683	5.21 - 19.34
90 - 355	X	✓	✓	✓	✓	✓	✓	7 - 14	644 - 2,507	18.24 - 70.99

✓ Available    x Not available



# INTEGRATED SOLUTIONS

Integrated Solutions rotary screw compressors include a dryer and air receiver and are an ideal choice for a wide range of workshop, industrial and commercial applications.

Mounted on a massive air receivers, they provide many benefits; this includes cooler air to improve air quality, extra storage capacity to lessen spikes in air demand, and longer cycle times to reduce power and wear from frequent stop/starts.

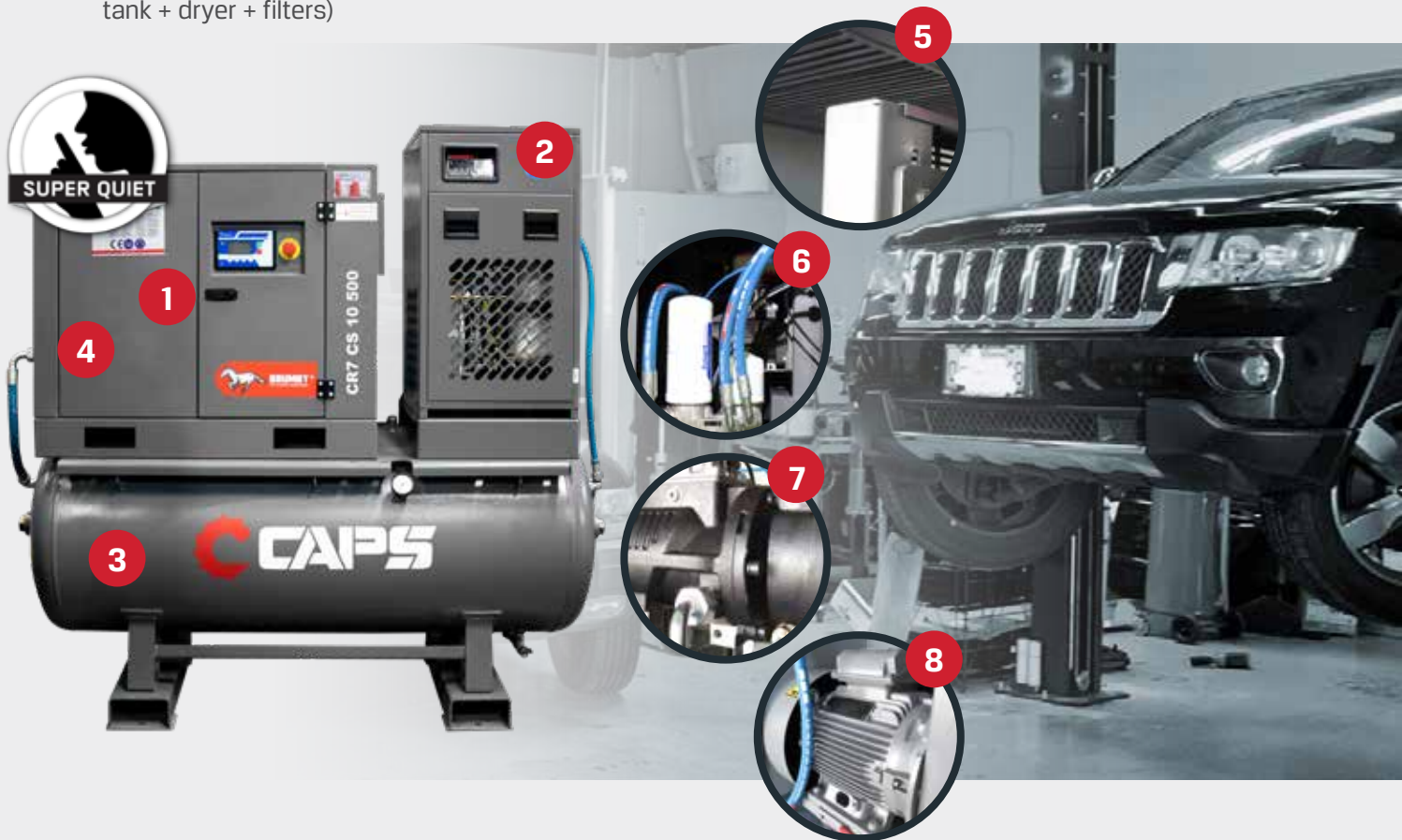
## 4 CONFIGURATIONS AVAILABLE TO SUIT YOUR SPECIFIC NEED

- **FIXED SPEED TANK MOUNTED 5 TO 15KW** (compressor + 500L tank)
- **FIXED SPEED COMPLETE SOLUTION 5 TO 15KW** (compressor + 500L tank + dryer + filters)
- **VARIABLE SPEED TANK MOUNTED 5 TO 15KW** (compressor + 500L tank)
- **VARIABLE SPEED COMPLETE SOLUTION 5 TO 15KW** (compressor + 500L tank + dryer + filters)



## SAVE 25% ON SERVICE COST

CAPS Brumby components are so competitively priced that you can save up to 25% on service costs compared to equivalent compressors on the market equipment.



1. **EASY TO OPERATE STANDARD ELECTRONIC CONTROLLER**
2. **OVERSIZED DRYER INCLUDING PRE/POST FILTRATION PACKAGE**
3. **MASSIVE 500 LITRE AIR RECEIVER TO EN286-1 AND AS1210 COMPLIANT**
4. **LOW SOUND ACOUSTIC ENCLOSURE**
5. **AIR-COOLED DESIGN WITH 43°C AMBIENT CONTINUOUS-DUTY RATING**
6. **EASILY ACCESSIBLE SERVICE COMPONENTS**
7. **HIGH EFFICIENCY RELIABLE ASSYMETRIC AIREND**
8. **ENERGY SAVING IE3, TEFC ELECTRIC MOTOR**

# CAPS BMF COMPRESSORS 15-45KW

## HIGH EFFICIENCY PERMANENT MAGNET



### CAPS NEW RANGE OF ENERGY EFFICIENT PERMANENT MAGNET VSD DIRECT DRIVE COMPRESSORS

Energy efficiency and reducing your carbon footprint is a critical goal for any business. This is why CAPS has introduced our new range of rotary screw compressors packed with the latest energy saving technology which translates in to reduced energy costs and less impact on the environment.

Our new BMF range is affordable and built to last. With a 2-year warranty on the complete unit and a lifetime warranty on the airend\* you can have the piece of mind you are buying a quality product which will keep you up and running.

All the compressors in this range come standard with a variable speed drive (VSD) and a permanent magnet motor.

## FEATURES & BENEFITS

### BENEFITS

- **Save up to 50% in energy** - compared to an equivalent fixed speed compressor
- **Pay back initial investment from energy savings in 1-2 years** (subject to a number of variables)
- **Low capital cost** - compared with other brands of fixed speed machines
- **Quiet Operation** - Quality acoustic designed cabinet
- **Easy access for maintenance** - cabinet design allows for full access to all of the internal components

### FEATURES

- **Highest rated IPM motor efficiency**, which outperforms IE3 efficiency levels. Variable range of 30-100%
- **Inovance vector VSD control technology**
- **Soft start**
- **High efficiency airend**
- **Energy saving controller**
- **IPM oil cooled motor** with no cooling fan reduces power draw
- **1:1 ratio direct drive** ensures no loss of energy through gears or belts

# HIGH EFFICIENCY MOTOR

## VSD-HIGH EFFICIENCY PERMANENT MAGNET DRIVE MOTOR

The Interior Permanent Magnet (IPM) motor uses DC power via an inverter to seamlessly speed up and slow down the compressor to match your air demands. On the 37 & 45kw models, when the compressor reaches its off-load pressure the motor stops with no offload running.



### IPM motor advantages

- Soft start
- Highest motor efficiency, even outperforming IE3 efficiency levels
- Variable range of 30-100%
- No off load running (37kw – 45kw)
- Direct Drive (1:1 ratio) – eliminates gearing or transmission losses

# THE CONTROLLER

Right across the range of the BMF series, they all come with a consistent controller, designed specifically for these machines.

- Operation screen readings for pressure & temperature
- Power/frequency/run hours & compressor status
- Day time scheduling start/finish
- Master slave operation
- Stop/start remote
- Service intervals/alarm with service provider details
- Date and time
- Digital graphs showing usage data (wave form data)
- Total KW per hour usage reading
- Operating temperatures -20°C~+60°C
- Fault diagnostic read out with problem solving diagnostics
- Fault history
- Monitoring alarms
- Supports MODBUS RTU protocol



# THE RANGE

MODEL	MOTOR	PRESSURE (BAR)	FLOW CAPACITY		AIR OUTLET	DIMENSIONS LxWxH (MM)	WEIGHT (KG)
	POWER (KW)		M <sup>3</sup> /MIN	CFM			
BMF15-8	15	8	2.2	78	3/4"	1,010x770x1,035	275
BMF19-8	18.5	8	2.7	95	1"	1,200x840x1,150	380
BMF22-8	22	8	3.3	117	1"	1,200x840x1,150	400
BMF30-8	30	8	5	177	1 1/2"	1,370x950x1,360	515
BMF37-8	37	8	6.3	222	1 1/2"	1,370x950x1,360	540
BMF45-8	45	8	7.25	256	2"	1,670x1,000x1,500	730

# UNDERGROUND MINERS PACK

CAPS assembles all the underground miners pack in house at our Perth manufacturing & assembly plant.

## THE PREMIUM HARDWARE USED IN OUR ASSEMBLIES TO DELIVER OUR MINERS PACK CONSIST OF:

- **INGERSOLL RAND** air compressor (M160KT) modified to comply with typical mine regulations.
- Standard operation at 415V/3/50Hz or optionally configured for 1,000V/3/50Hz power supply.
- A generous CAPS 2,400L air receiver, fabricated to the latest AS1210 standard inclusive of statutory design documentation and manufacturer's data report (MDR).
- Package includes all pressure safety valves with AS1271 test certificate, pressure gauge, discharge isolation valve and auto-drains on all condensate lines.
- Skid frame and roof fully welded to a high quality fabrication standard, complete with accompanying Material Data Report (MDR).

Every single miners pack goes through a two hour factory acceptance test in our state-of-the-art test bay, be it in a 415V or 1000V configuration.

## PRODUCT RANGE

- **Capacity:** 5.6m<sup>3</sup>/m (198cfm) to 54m<sup>3</sup>/m (1,911cfm)
- **Pressure:** 7 bar to 14 bar (100psi to 203psi)
- **Voltage:** 415V or 1,000V



## THE OPTIONS THAT CAN BE FITTED TO THE MINERS SKID INCLUDE:

- Operation at 415V/3/50Hz or conversion to 1,000V/3/50Hz
- High dust filtration
- IP65 marine window on compressor control panel
- Reinforced earthing
- Residual current breaker with over-current on control circuit.
- Isolator switch
- Automatic Detection Fire Suppression system with or without automatic stop





# OIL FREE ROTARY SCREW AIR COMPRESSORS



OUR RANGE OF 100% OIL FREE INDUSTRIAL COMPRESSORS ARE IDEAL FOR HIGH-QUALITY AIR APPLICATIONS, INCLUDING DENTAL, MEDICAL, PAINTING, FOOD PROCESSING AND PHARMACEUTICAL MANUFACTURING.

CAPS PROVIDE A RANGE OF OIL FREE AIR COMPRESSORS WHICH OFFER FLEXIBILITY FOR VARYING AIR DEMAND CONDITIONS, WHILST HELPING YOU SAVE ON ENERGY COSTS. THE OILLESS AIR COMPRESSORS PROVIDE PURE AND CLEAN OIL FREE AIR FOR A BROAD RANGE OF CRITICAL APPLICATIONS.

# OIL FREE AIR, A NECESSITY FOR SOME INDUSTRIES

Our range of 100% oil free industrial compressors are ideal for high-quality air applications, including dental, medical, painting, food processing and pharmaceutical manufacturing.

CAPS provide a range of oil free scroll air compressors which offer flexibility for varying air demand conditions, whilst helping you save on energy costs. The oilless air compressors provide pure and clean oil free air for a broad range of critical applications including:

- Food & beverage processing
- Printing
- Medical & dental
- Electronic
- Spray painting & more.
- Laboratory

Having exclusive access to a diverse portfolio of air quality solutions means that our expert team will only ever recommend oil-free industrial air compressors based on what you really need.

## CAPS PRODUCT RANGE

Nominal kW	Belt Drive	Gear Drive	HPM Motor	Fixed Speed	Variable Speed	Single Stage	Two Stage	Pressure Range bar(g)	Flow Range (cfm)	Flow Range (m3/min)
37 - 355	X	✓	X	✓	✓	X	✓	7 - 10	88 - 1,882	2.5 - 53.3
37 - 160	X	✓	✓	✓	✓	X	✓	7 - 10	88 - 901	2.5 - 25.6





# TECHNICALLY OIL FREE COMPRESSORS

Some applications don't require an oil free compressor but still need a very clean air with really limited oil contamination. This can be achieved by using a set of accessories such as filtration and dryers.

## HOW PURE DOES YOUR AIR NEED TO BE?

One of the keys to ensuring you achieve and maintain acceptable air quality for your critical application is to know industry air quality standards and their allowable levels of contaminants. The lower the particular class rating, the purer the air should be.

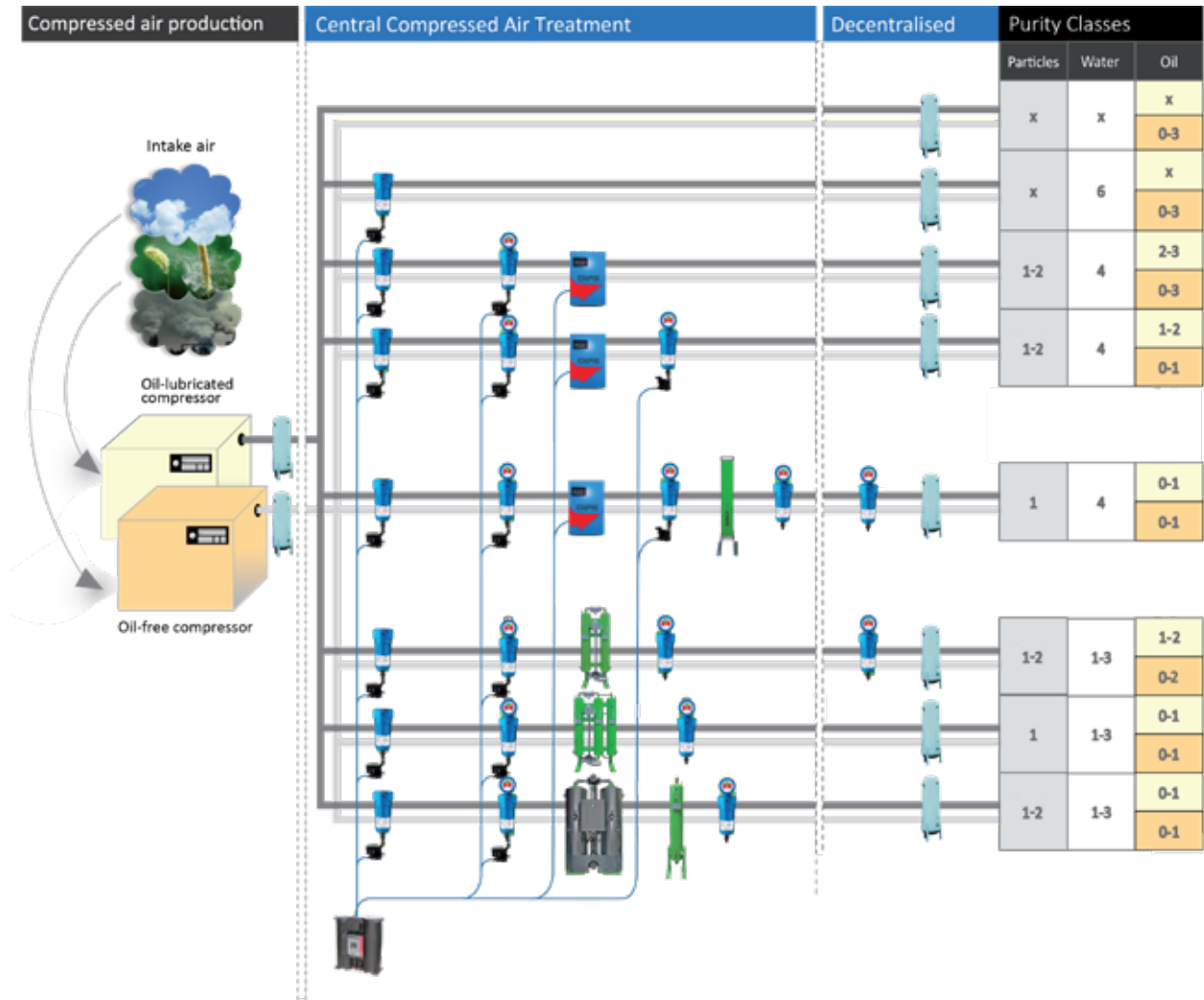
## ISO 8573.1 PURITY CLASSES

Developed by the International Standards Organisation (ISO), compressed air purity classes (as defined by ISO 8573-1), classify what levels of solid particle, water and oil are acceptable in each given class.

Class	Solid Particle Maximum number of particles per m <sup>3</sup>			Water Pressure Dewpoint (°C)	Oil Inc. vapour mg/m <sup>3</sup>
	0.1-0.5 micron	0.5-1.0 micron	1.0-5.0 micron		
0	As specified by the equipment, user or supplier and more stringent than Class 1				
1	100	1	0	-70	0.01
2	100,000	1,000	10	-40	0.1
3	-	10,000	500	-20	1
4	-	-	1,000	3	5
5	-	-	20,000	7	-
6	-	-	-	10	-
X	-	-	-	>10	>10

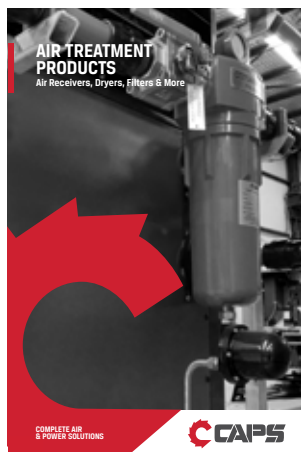
Depending on the purity class needed for your installation, different combination of air treatment products will be necessary. The drawing below shows you the most common scenario. Our CAPS expert will be able to help you to select the best solution for your need.





CAPS Australia developed a range of the best quality accessories to clean the air to the level expected for your application.

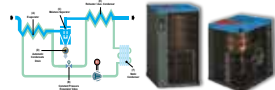
**Please request the CAPS Air Treatment catalogue for more details on those products such as dryers, filters, drains etc.**



### REFRIGERATED COMPRESSED AIR DRYERS

**CDS SERIES**

- CONDENSER WITH NO COOLING FAN**
  - No maintenance required
  - Quietest model operation
  - Lowest operating costs
  - Reducing operating energy
  - Robust design and compact size
- UNIQUE REFRIGERANT COOLING SYSTEM**
  - Technically certified on desiccant drum
  - Comes complete with dryer to reduce changing
  - Excellent dry point performance under all conditions
  - Compact design and heat exchanger



Model	Flow Capacity (m³/min)	Absorbed Power (kW)	Pressure Connections (inch)	Weight (kg)	Dimensions (mm)
CDS15	0.52	0.1	0.54	20	300x300x300
CDS30	1.03	0.17	0.62	34	500x500x500
CDS60	1.87	0.31	0.68	54	550x550x550

Flow Rate (m³/min)	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16
Correction Factor	0.90	0.88	0.85	0.82	0.78	0.74	0.70	0.66	0.61	0.56	0.51	0.46	0.41	0.36	0.31	0.26

### DESICCANT COMPRESSED AIR DRYERS

High quality, robust desiccants form the basis for cost-effective, efficient and stable adsorption drying. Heatless adsorption dryers are filled with robust, durable and high-grade drying molecular sieve desiccant.

With its large specific surface and high drying capacity, molecular sieve ensures a stable and low pressure dew-point down to -70°C.

**This results in long, energy saving cycle times.**

Molecular sieve also has the special ability to achieve stable and low pressure dew-points even under conditions that are unfavourable for desiccant, e.g. in the case of low moisture input due to an upstream refrigeration dryer.

All adsorption dryers are filled with a 2-layer desiccant bed, i.e. with an additional water resistant silica gel W5 safeguard layer at the inlet of the desiccant filling.

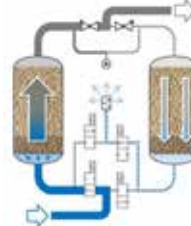
This reliably prevents degradation of the desiccant caused by liquid water and ensures continuous, stable operation of the adsorption dryer as well as long service life of the desiccant.

#### HOW IT WORKS

Regeneration from top to bottom prevents backflow of the upper, lower desiccant during regeneration. This considerably reduces desiccant abrasion and development of dust during regeneration.

During regeneration, moisture stored in the desiccant is removed from top to bottom in reverse flow to adsorption via the bottom, vent and water resistant silica gel at the inlet of the dryer (reverse flow principle). This creates a highly regenerated layer of desiccant at the outlet of the dryer, which ensures a stable and low pressure dew-point for the next switch-over.

The reduced desiccant abrasion and the discharge of moisture via the water resistance also reduces the service life of the desiccant and thus the performance stability of the entire adsorption dryer.



### INLINE FILTERS

**HIGH EFFICIENCY POLYMER FIBRE CARTRIDGE AND ULTRAFINE COARSE COMPRESSED AIR**

Compressed air is a powerful and valuable energy source. Compressed air also contains contaminants from the manufacturing process and from the compression process. It is estimated that an average of 40 million air particles are found in a cubic metre of air.

95 percent of these contaminants are so small they will pass through your compressed air filter. And because the only protection is a filter, clean compressed air is essential for the quality of your products. That is why it makes sense to incorporate compressed air treatment into your compressed air system.



#### CS-SERIES FILTERS TECHNICAL DATA

Filter Model	Core Size	Capacity @ 7 Bar g	Max Operating Pressure (bar)	Weight (kg)	Dimensions (mm)
CS10	10"	6,380	10	12	160 x 160 x 410
CS18	18"	10,8	10	12	160 x 160 x 510
CS25	25"	14,6	10	12	160 x 160 x 510
CS30	30"	24,6	10	16	160 x 160 x 510
CS62	7"	3,73	10	3,8	100 x 250 x 400
CS10	10"	6,75	10	4,2	100 x 250 x 400
CS15	15"	10,62	10	4,6	100 x 250 x 400
CS21	15"	13,58	10	6,4	100 x 250 x 400
CS24	2"	20,00	7,7	34,30	100 x 100 x 65,37
CS24	2"	20,00	10,00	55,83	100 x 100 x 65,37

#### CS-SERIES F SERIES FILTERS TECHNICAL DATA

Filter Model	Core Size	Capacity @ 7 Bar g	Max Operating Pressure (bar)	Weight (kg)	Dimensions (mm)
CS25	25"	14,6	10	21,5	150 x 200 x 510
CS75	3"	48,62	16,6	7,7	215 x 150 x 200
CS10	10"	52,32	16,6	8,7	150 x 150 x 200
CS20	20"	34,8	17,6	16	150 x 150 x 200
CS40	40"	54,7	17,6	16	150 x 150 x 200
CS10	10"	56,38	17,6	21,5	150 x 150 x 200

# ENGINEERING CUSTOMISED SOLUTIONS

Early into its establishment, CAPS also quickly developed in-house significant engineering capability, operating under a ISO9001 accredited quality system, which gave the company the ability to design and build equipment that suited Australia's hot, dusty and harsh conditions as well being able to create bespoke installations.

One of our key points of difference is that CAPS can take a standard OEM product and work with our customers to determine solutions to meet or exceed their exact requirements. CAPS Engineering can not only modify and fully engineer the compressors to suit the Australian conditions and unique technical requirements, but also provide a full compressed air system solution, from the compressor right through to the complete system build, controls, testing and installation.

Our engineering capability is critical to offering high quality, reliable system packages for our customers, whether that be modified control or monitoring packages, enhanced environmental durability or packaging on a skid to allow for mobility of the package or minimisation of work on remote sites. Another key element is it allows us to improve the safety features for many existing products to make them compliant to site policies of our customers, over and above requirements of Australian standards.

Our expert team of engineers is fully trained to provide end-to-end solutions to suit our clients' unique air requirements and provide a quality design service that incorporates the air industry's latest innovative technology. From initial design to final delivery, we pride ourselves on attention-to-detail to ensure your project runs as smoothly as possible, from start to finish.

## OUR CUSTOMISED AIR ENGINEERING SOLUTIONS PROCESS INCORPORATES

- System design (in either 2D & 3D CAD)
- Supply
- Installation
- Commissioning & testing
- Ongoing maintenance

## OUR CUSTOMISED AIR ENGINEERING SOLUTIONS

- Skid packaging of complete compressed air systems
- Engineered or custom air receivers and N2 storage vessels in AS1210 or ASME VIII
- Customisation & options for heavy-duty compressed air applications, such as
- Mining & minerals processing
- Energy & power stations
- Chemical process & heavy industrial manufacturing
- General manufacturing industries
- High-pressure compressor and engine starting applications
- MDG15 compliance for diesel-driven air compressors



# 24/7 RAPID RESPONSE NATIONWIDE SUPPORT

## 10 BRANCHES SERVICING ALL AUSTRALIA



### AUSTRALIA WIDE

With our extensive network of branches and regional service locations, CAPS can service anywhere in Australia.

From the metro area through to a remote mine-site, we have you covered with experts located all around Australia.

### SPARE PARTS

A complete range of spare parts and accessories to help you get the most out of your industrial equipment.



### HIGHLY TRAINED TECHNICIANS

Enjoy the peace of mind of having an expert at your doorstep. **Their knowledge is continually updated**, and they have the model by model knowledge to fix your generator first time, every time.

Whether you have one generator or have complex systems with multiple pieces of equipment, **our technicians will give you the advice you need to ensure continuous operation.**

### PREVENTATIVE MAINTENANCE

We're always aiming to help you to **reduce operating costs and interruptions to your production.** Our factory-authorised programs include routine inspections, condition monitoring and the use of sophisticated diagnostic equipment to identify any potential problems before they impact you.

### SAFETY COMPLIANCE

Safety is a core value of CAPS and our goal is never to put people, plant or the environment at risk. You can be confident that our technicians will be **completely compliant to any site specific safety requirements** you have.

## NATIONAL HIRE



### LONG TERM AND SHORT TERM HIRE AVAILABLE

At CAPS, we have a large range of equipment that's suitable for every kind of project.

CAPS check their equipment before every hire to ensure the highest standard of safety and service. When you hire through CAPS you are speaking to experts who can assist you with selecting the right equipment for the job every time.

Hire and you protect your staff, control your costs, avoid depreciation, maintenance and borrowing expenses.



# CORE PRODUCTS

## AIR COMPRESSORS

ROTARY SCREW



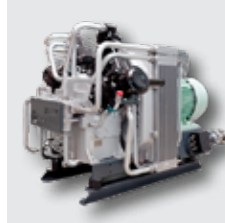
PORTABLE DIESEL



OIL FREE



HIGH PRESS. RECIPS.



SMALL RECIPS.



## AIR BLOWERS

ROTARY LOBE

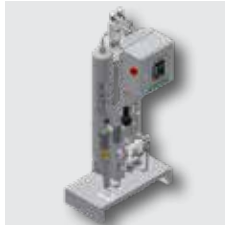


CENTRIFUGAL



## GAS GENERATORS & COMPRESSORS

NITROGEN



OXYGEN



OTHER GASES



## AIR TREATMENT

AIR DRYERS



AIR RECEIVERS



FILTRATION

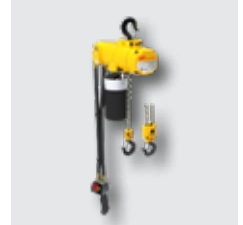


## TOOLS & MATERIAL HANDLING

TORQUE CONTROL



WINCHES & HOISTS



## POWER GENERATION & RENEWABLES

STANDBY



PRIME



BATTERY STORAGE



# ONLINE SHOPPING

[CAPSSHOP.COM.AU](http://CAPSSHOP.COM.AU)

If you are looking for spare parts or tools for your air and power equipment, visit our online shop.



# SOLVING YOUR AIR AND POWER CHALLENGES

## ROTARY SCREW AIR COMPRESSORS OVERVIEW

**Inquiries:** 1800 800 878

**Service & 24/7 Support:** 1800 802 697

**Website:** caps.com.au

**Email:** info@caps.com.au

### BRANCH LOCATIONS

PERTH (HEAD OFFICE) | ADELAIDE | BRISBANE | DARWIN | KALGOORLIE | LAUNCESTON  
MACKAY | MELBOURNE | NEWCASTLE | SYDNEY

### INTERNATIONAL

MALAYSIA | GHANA



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