

## **Product Description: GA11+, GA15+, GA18+, GA22+, GA26+, GA30 FF** ATLAS COPCO OIL INJECTED ROTARY SCREW COMPRESSOR

### **General Description**

The GA11+-30 oil-injected screw compressors are available in 11kW, 15kW, 18kW, 22kW, 26kW and 30kW provide an industry leading efficient and reliable work place air compressor that minimizes the total cost of ownership. These air compressors are designed to withstand the harshest of environments while providing you with a quiet air compressor with sound levels ranging between 67 and 70 dB(A). The GA11+-30 series are designed and manufactured in accordance with ISO 9001, ISO 14001 and ISO 1217 which insures a reliable trouble-free air compressor. Additionally, these units boast a very compact footprint and utilize the next generation Elektronikon® Touch controller. This touch screen controller offers you a great variety of control and monitoring features that allow you to increase your compressor's efficiency and reliability. As standard these units are designed to operate in 46°C/115°F ambient conditions. The GA11+-30 has an integrated dryer.



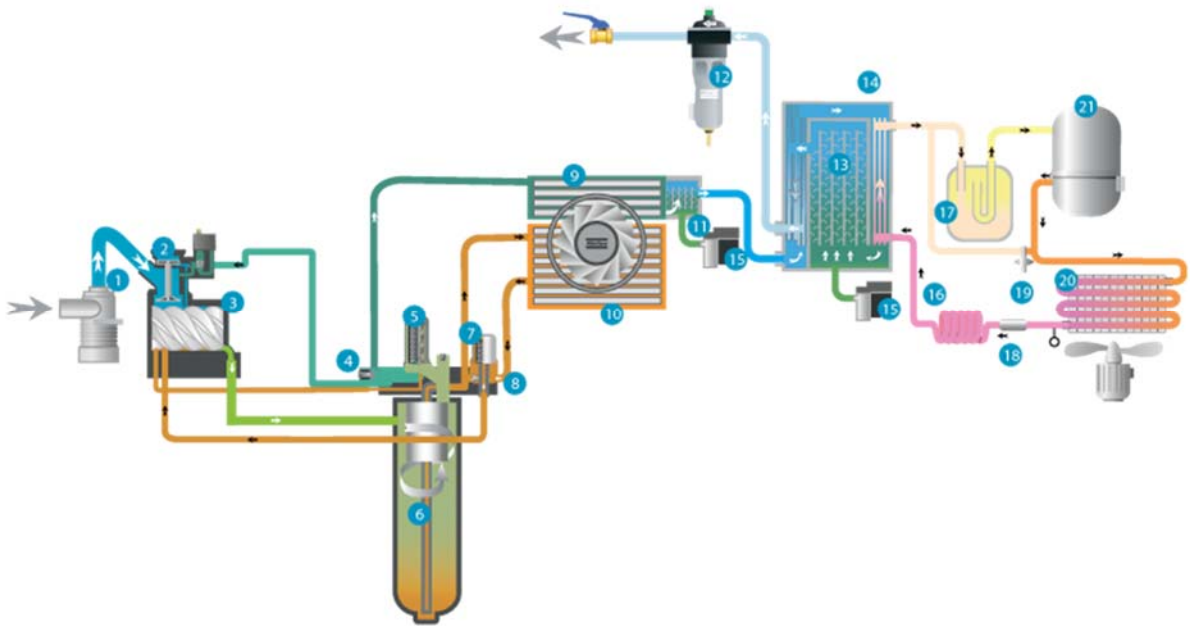
The GA11+-30 air compressors are available in 11kW, 15kW, 18kW, 22kW, 26kW and 30kW variants with flows ranging from 39.4 – 93.8 l/s (78.8-199.2 cfm).

The compressors are constructed with the following major components:

- State of the art compression element
- IP55 (TEFC) motor meeting or exceeding IEEE and NEMA Premium efficiency standards with greased for life bearings
- Elektronikon® Touch controller
- High efficiency aftercooler
- Moisture separator
- Inlet air filter
- Integrated smartbox

## Operating Principle

Air is drawn in through the air filter and the inlet valve into the compression element. This compressed air is forced through the air/oil separator, past the minimum pressure valve and into the after-cooler through the water separator to the discharge.



1. Air intake filter
2. Unloader valve
3. Compression element
4. Thermostatic valve
5. Air-oil separator
6. Air-oil separator vessel
7. Oil filter
8. Safety valve
9. Aftercooler
10. Oil cooler
11. Water separator

12. Coalescing filter
13. Water separator
14. Evaporator
15. Water drain
16. Capillary tube
17. Accumulator
18. Refrigerant dryer/filter
19. Hot gas bypass valve
20. Condenser
21. Refrigerant compressor

## Scope of supply

### Drive Train

The Atlas Copco oil injected Screw element is at the heart of this compressor. This state of the art compression element paired with an IE4 efficiency rated motor provides you with unparalleled efficiency and performance. Completely protected against dirt, the high efficiency gearbox maximizes reliability in any environment and completely eliminates the need for maintenance on the drive train.



### Oil Separator and Oil Filter

The high efficiency 2-step air-oil-separator system for reduced oil consumption ensures low maintenance costs and a good oil separation result in between 2 service intervals. The oil filter cleans the oil continuously from particles bigger than 25 microns with 99% efficiency in order to protect the lubrication quality and health of the rotating components. Additionally, the compact size of this vessel there is less oil required and less compressed air blow off when the unit unloads resulting in money savings for you.



## **ELEKTRONIKON**

### **Elektronikon® Touch controller**



### **Elektronikon® Touch with compressor visualization:**

The next-generation Elektronikon® Touch controller provides you with an intuitive easy to use touch screen controller. The Elektronikon® Touch controller additionally offers a great variety of control and monitoring features that allow you to increase your compressor's efficiency and reliability thanks to the many embedded advanced control algorithms.

### **Elektronikon® Touch regulator module**

The regulating system includes the Elektronikon® Touch controller to regulate, control and monitor compressor operation. All Elektronikon® Touch control modules display and monitor the following:

1. Compressor Status Indication
  - Voltage on
  - Automatic operation
  - Service timer
  - Compressor speed
2. Temperature, numerical readouts
  - Element outlet
  - Ambient air temperature
3. Pressure, numerical readouts
  - Delivery air
4. Compressor Control
  - Start / Stop
  - Reset / Test
5. Hour meters
  - Total running hours
  - Total loading hours (in different speed zones)
6. Timers
  - Programming compressor time-based start/stop commands
7. Service requirement indications
  - Air filter
8. Compressor safety - warning indications
  - High element outlet temperature.
  - Electronic drain operation

- Sensor error
  - High dew point
  - Cooling water inlet temp (for water cooled versions)
  - Cooling water outlet temp (for water cooled versions)
  - Pressure drop over PD/DD filters (optionally)
9. Compressor safety - shutdown indications
- High element outlet temperature.
  - Drive motor/fan motor overload
  - Emergency stop
10. Digital output relays for remote monitoring (voltage free)
- Automatic operation / Manual operation
  - General warning
  - General shutdown
11. SMARTBOX for SMARTLINK\*: Data Monitoring Program
- Remote monitoring system that helps you optimize your compressed air system and save energy and costs.
  - Provides a complete insight in your compressed air network.
  - Anticipates on potential problems by warning you up-front.

## **Features & Benefits**

### **Energy Savings**

- State of the art compression element
  - Low energy consumption and high output of compressed air
- Integrated Dryer with Saver cycle technology
  - Reduces the energy consumption of the integrated air treatment in light load conditions. Water separation is improved. Pressure Dew Point (PDP) becomes more stable
- Fully Integrated & Compact design
  - Controller to ensure optimum efficiency and reliability. Ensures compliance with your air requirements and makes the best use of your valuable floor space.

### **Quite operation**

- Sound insulated canopy
  - No separate compressor room required. Allows for installation in most working environments.

### **Highest reliability**

- Robust Air Filter
  - Offers long lifetime and high reliability for long service intervals and low maintenance needs. Air filter is very easy to replace.
- IP55 (TEFC) Motor
  - Totally enclosed fan cooled motor insures reliability. Efficiency ratings at or above premium regulations