

# 5 to 30HP



## HDI SERIES 5HP TO 30HP RECIPROCATING AIR COMPRESSORS

- › **RUGGED & RELIABLE**  
Ideal for Demanding Industrial Environments
- › **PRESSURE-LUBRICATED, CAST-IRON PUMPS**  
Built for Heavy-Duty Operation
- › **SLOW COMPRESSOR PUMP RPM**  
Long-Lasting Operation
- › **DEEP-FINNED CAST-IRON DESIGN**  
Enhanced Heat Dissipation
- › **7 YEAR LIMITED WARRANTY**



**BUILT BETTER**



## HDI SERIES 5HP TO 30HP

### HEAVY DUTY INDUSTRIAL AIR COMPRESSORS

#### BALANCED PISTONS

Heat treated and stress relieved connecting rods are cast from ductile iron for strength and long life. High pressure pistons are made from solid cast iron to withstand extreme forces while the low pressure pistons are made from aluminum alloy. The tin-plated compression rings are designed to work in concert with the oil control rings and scraper.

#### BABBITT INSERTS

Greatly reduce wear on crankshaft.

#### SOLID CAST IRON CYLINDERS

Solid cast iron minimizes distortion from assembly torque and heat. Precision-machined cylinder walls are honed to reduce friction and minimize oil carry over. Extra-deep fins provide increased cooling and greater strength.

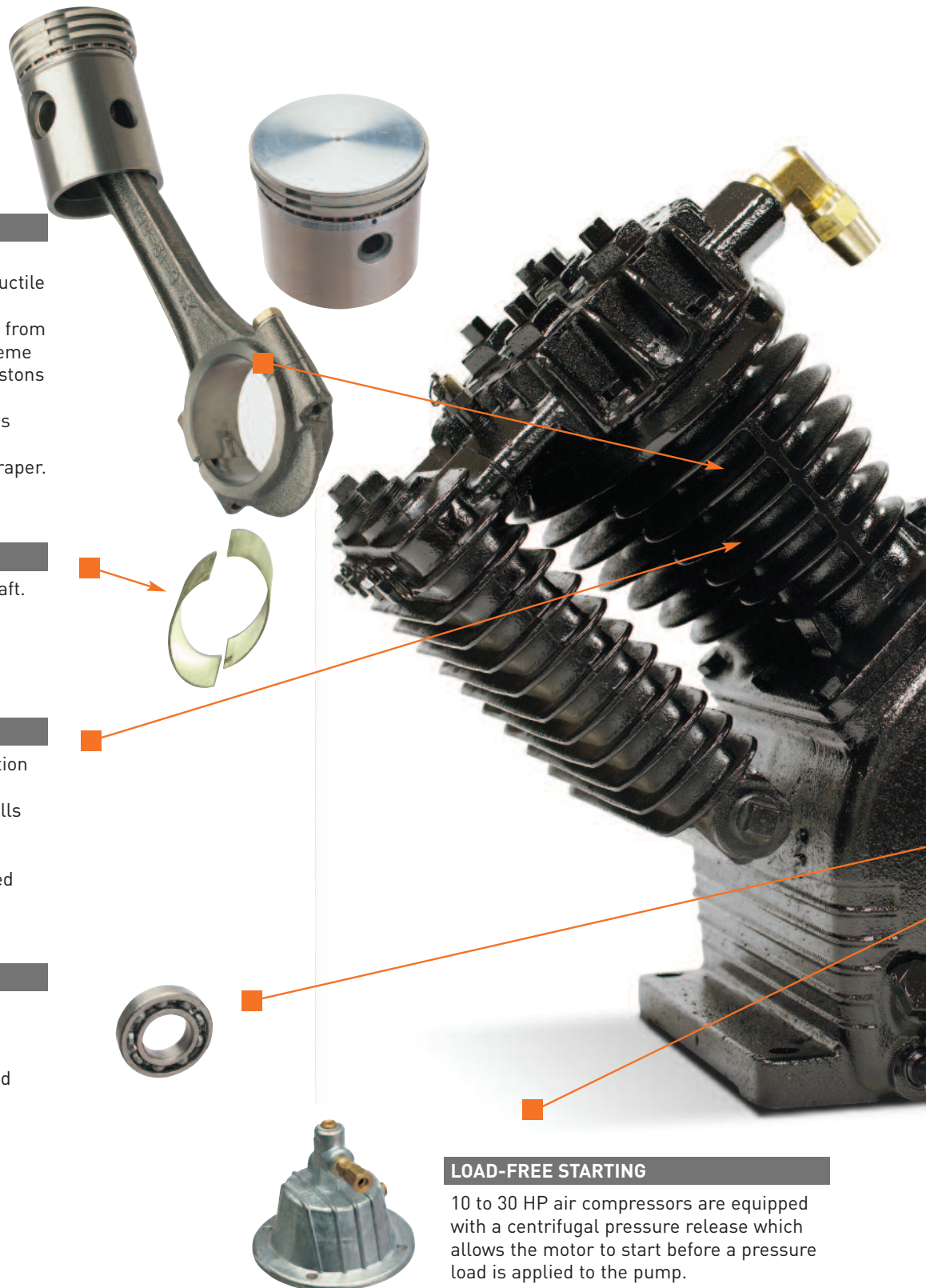
#### BALL BEARINGS

Assuring an exceptionally free-running crankshaft, heavy load capacity ball bearings used in DV Systems outfits are lubricated from the crankcase and require no maintenance.

#### LOAD-FREE STARTING

10 to 30 HP air compressors are equipped with a centrifugal pressure release which allows the motor to start before a pressure load is applied to the pump.

BUILT BETTER



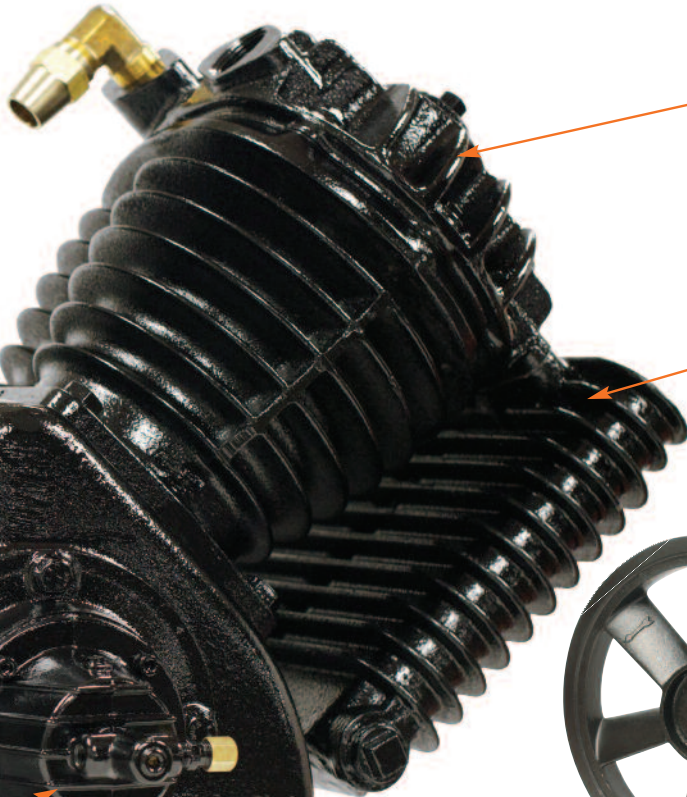


**All moving components** of the 247/447 are machined, honed, balanced and assembled at our factory. Once assembled, each unit is tested twice under industrial conditions to ensure it meets our exacting operational standards. Rugged construction and long life allows DV Systems to confidently offer an unprecedented **7 Year Warranty**.



#### QUIET, QUICK-ACTING VALVES

Machined carbon steel valves balance air passages and structural integrity, for maximum airflow and dependability. Hardened carbon steel valve guides complement the stainless steel Valve Discs and Springs.



#### COOL CYLINDER HEAD

Deep directional fins provide quick cooling; compact streamlined air passages in the cylinder head allow a fast, efficient flow of cooler intake air and rapid removal of exhaust.

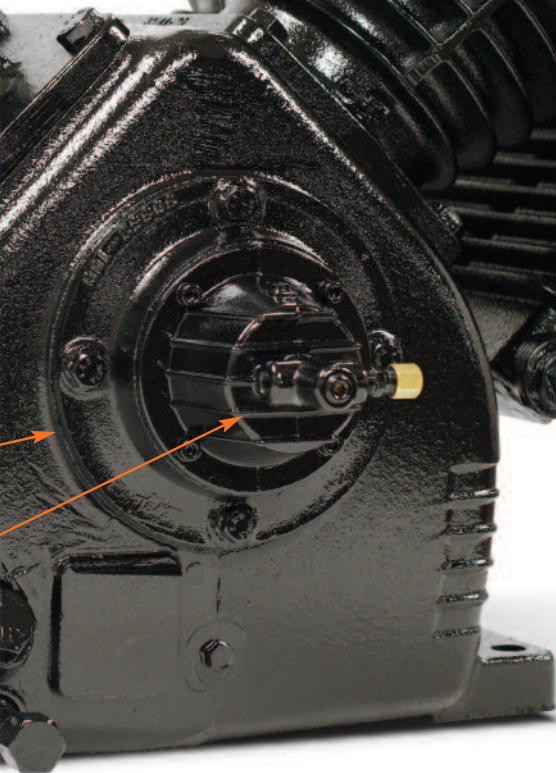
#### DEEP-FINNED CAST-IRON INTER-COOLERS

Reliable deep-finned cast-iron intercoolers provide superior cooling between compression stages, enhancing heat dissipation.



#### BALANCED FAN-TYPE FLYWHEEL

Airfoil-type spokes provide a continuous powerful blast of cooling air for all portions of the compressors. Balanced, it assures smooth, vibration-free operation.

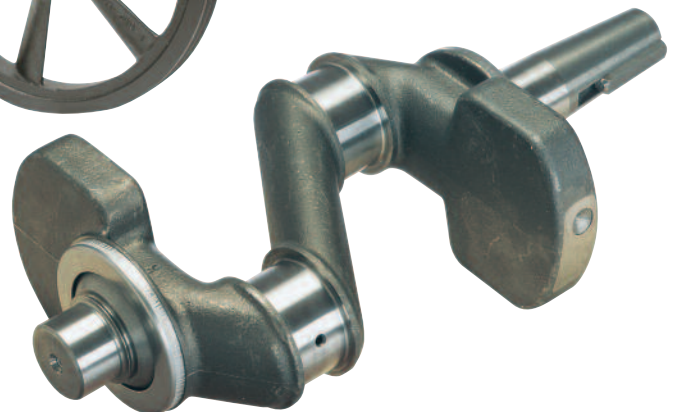


#### SHORT STROKE DESIGN

The combination of large bore, short stroke and slow operating speeds improves life expectancy and provides high air delivery.

#### PRECISION BALANCED, OVERSIZED CRANKSHAFT

The crankshaft, with integral counter weights, is balanced to ensure longer life and smooth operation. Journals are precision ground and furnished with inserts for long trouble free life. The crankshaft is drilled and ported to allow centrifugal force to carry oil to bearing surfaces. Babbitt bearing inserts further ensure balanced operation.





## HDI SERIES 5HP TO 30HP

### HEAVY DUTY INDUSTRIAL AIR COMPRESSORS

**The Air-Cooled, Pressure-Lubricated, Reciprocating Heavy Duty Industrial Series** is engineered to provide a Heavy-Duty, Durable and Dependable Air Compressor built to withstand the most demanding industrial environments.

Available in both Simplex & Duplex configurations, the HDI Series 5HP to 30HP is equipped with 2-Stage, 2-cylinder (247) or 4-cylinder (447) cast-iron compressor pumps powered by premium-efficiency North American made open drip proof (ODP) motors, providing reliable, high duty-cycle operation.

The heavily weighted cast iron pumps and Low RPM enhance heat dissipation and enable up to 80% duty cycle. Pressure lubrication ensures oil is delivered to journal bearings and all necessary components, minimizing oil carry-over and friction.

#### Configurations

Available in Simplex, Duplex & Custom Engineered

- › **BASIC** Pump, ODP Motor & Air Receiver
- › **MS** + Definite Purpose Magnetic Starter & Alternator Relay (on Duplex Units)
- › **XL** + Definite Purpose Magnetic Starter & Alternator Relay (on Duplex Units), Low Oil Level Sight / Shut-Down Monitor & Auto Drain
- › **ACP** Alternator Control Panel

#### HIGHLIGHTS

##### **Cast-Iron Construction, Low RPM**

Solid cast-iron cylinders, head & crankcase enhances heat dissipation and enables low-distortion, long-lasting, reliable operation

##### **Pressure Lubrication Technology**

Ensures oil is delivered to journal bearings and all necessary components, minimizing oil carry-over & friction

##### **Deep-Finned Cast-Iron Inter-Cooler**

Enhanced Heat Dissipation

##### **Reliable & Safe**

OSHA Fully-Enclosed Belt-Guard, Motor with Overload Protection, CRN & ASME Approved Air Receivers.

##### **7 Year Limited Warranty**



## 5 & 7.5 HP

### ELECTRICAL

**Single-Phase** 230V

**3-Phase:** 200-208V/230V/460V/575V

### CONFIGURATIONS

**Base-Mounted** No Air Receiver

**Tank-Mounted** 80 Gal Horizontal or Vertical ASME Approved & CRN Registered Air Receiver

### PACKAGES

**Basic**

**MS** Definite Purpose Magnetic Starter

**XL** Definite Purpose Magnetic Starter, Low Oil-Level Sight / Shut-Down Monitor & Auto Drain

## 10 & 15 HP

### ELECTRICAL

**3-Phase:** 200-208V/230V/460V/575V

### CONFIGURATIONS

**Base-Mounted** No Air Receiver

**Tank-Mounted** 120 Gal Horizontal or Vertical ASME Approved & CRN Registered Air Receiver

### PACKAGES

**Basic**

**MS** Definite Purpose Magnetic Starter

**XL** Definite Purpose Magnetic Starter, Low Oil-Level Sight / Shut-Down Monitor & Auto Drain

**Optional** Constant Run-Stop-Start Controls

## 13 HP GAS

**13 HP Honda Gas Engine**

### CONFIGURATIONS

**Base-Mounted** No Air Receiver

**Tank-Mounted** 30 Gal Horizontal ASME Approved & CRN Registered Air Receiver

**Standard**

Automatic Unloader & Electric Starter on Engine

## 25 & 30 HP

### ELECTRICAL

**3-Phase:** 200-208V/230V/460V/575V

### CONFIGURATIONS

**Base-Mounted** No Air Receiver

**Tank-Mounted** 240 Gal Horizontal ASME Approved & CRN Registered Air Receiver

### PACKAGES

**Basic**

**XL** Definite Purpose Magnetic Starter, Low Oil-Level Sight / Shut-Down Monitor & Auto Drain

**Optional** Constant Run-Stop-Start Controls

## PERFORMANCE SPECIFICATIONS

Model	HP	Tank	Displacement		Delivery CFM		Pump RPM
			CFM	175psi	150psi	100psi	
TAP-5052	5	80 Gal. Hor.	23.4	19.1	19.8	20.3	635
TAPV-5052	5	80 Gal. Vert.	23.4	19.1	19.8	20.3	635
TAS-5052	7.5	80 Gal. Hor.	28.9	25.8	25.9	26.2	800
TASV-5052	7.5	80 Gal. Vert.	28.9	25.8	25.9	26.2	800
TASE-5030	13 Gas	30 Gal. Hor.	28.9	25.8	25.9	26.2	800
TASE-5000	13 Gas	Base Mtd.	28.9	25.8	25.9	26.2	800

Model	HP	Tank	Displacement		Delivery CFM		Pump RPM
			CFM	175psi	150psi	100psi	
VAT-5063	10	120 Gal. Hor.	43.3	36.5	36.8	37.3	590
VATV-5063	10	120 Gal. Vert.	43.3	36.5	36.8	37.3	590
VAV-5062	15	120 Gal. Hor.	64.8	51.8	52.1	52.9	880
VAVV-5062	15	120 Gal. Vert.	64.8	51.8	52.1	52.9	880
VAX-5081	25	240 Gal. Hor.	108.2	86.6	87.0	88.5	735
VAY-5081	30	240 Gal. Hor.	124.1	99.3	99.9	101.5	845



# HDI SERIES DUPLEX

## 5HP / 7.5HP / 10HP / 15HP

### HEAVY DUTY INDUSTRIAL AIR COMPRESSORS

**Duplex units** are equipped with 2-Stage, 2-Cylinder 247 [5HP & 7.5HP] or 4-Cylinder 447 [10HP & 15HP] cast-iron compressor pumps, 2 ODP motors, and 2 optional magnetic starters with an alternator relay, or an optional alternating control panel [ACP] providing reliable, continuous-use, 24/7 operation.

#### Available in 4 Configurations

- [BASIC] Duplex
- [MS] Magnetic Starter & Alternator Relay
- [XL] MS Configuration + Low Oil Level Shutdown Monitors / Switches & Pneumatic Auto Drain
- [ACP] Alternator Control Panel



#### Built-In Back-Up System

Duplex system provides reliable, continuous-use operation.

#### 5 & 7.5 HP

##### ELECTRICAL

**Single-Phase** 230V

**3-Phase:** 200-208V/230V/460V/575V

##### PACKAGES

**Basic**

**MS** Definite Purpose Magnetic Starter

**XL** Definite Purpose Magnetic Starter, Low Oil-Level Sight / Shut-Down Monitor & Auto Drain

#### 10 & 15 HP

##### ELECTRICAL

**3-Phase:** 200-208V/230V/460V/575V

##### PACKAGES

**Basic**

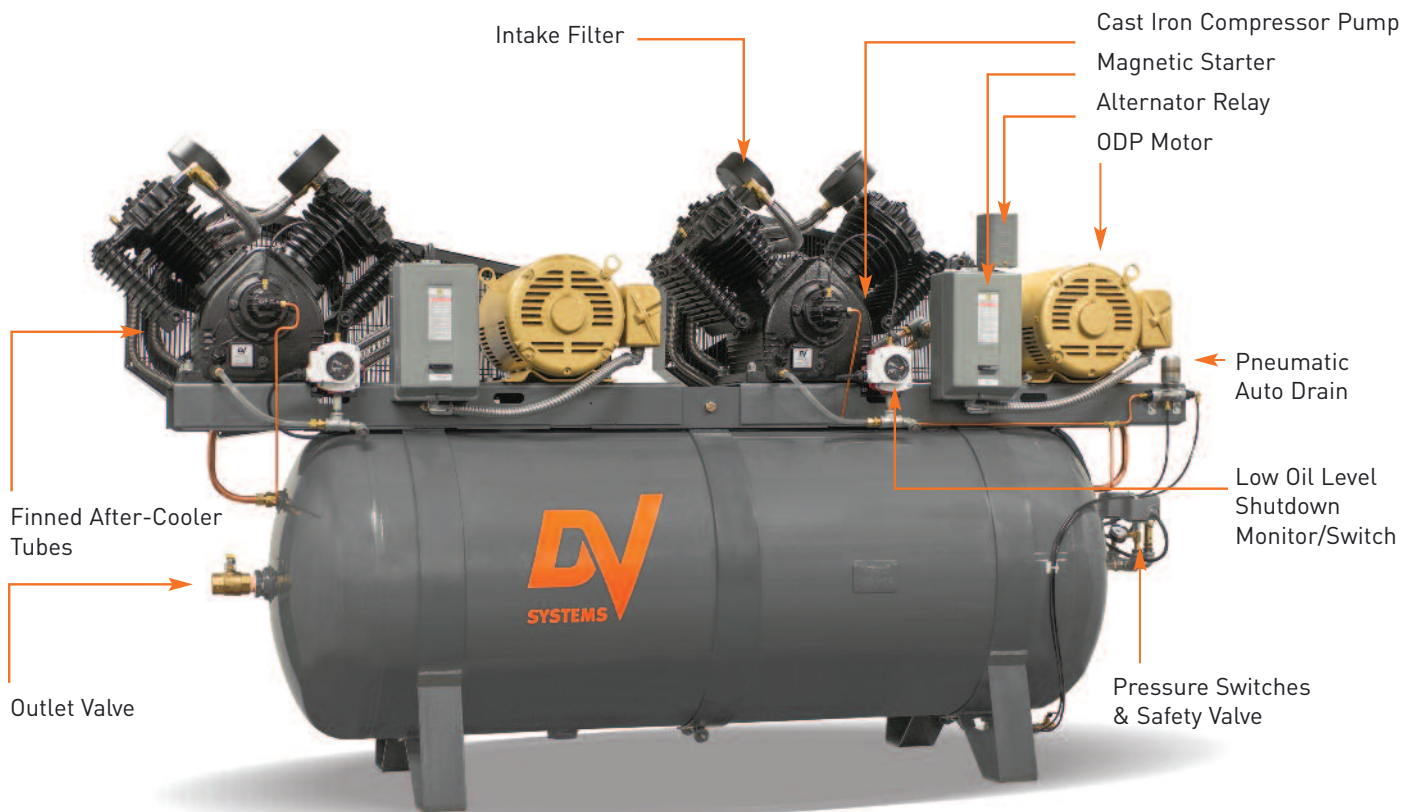
**MS** Definite Purpose Magnetic Starter

**XL** Definite Purpose Magnetic Starter, Low Oil-Level Sight / Shut-Down Monitor & Auto Drain

#### ▶ AVAILABLE MODELS

MODEL	HP	TANK	SCFM 150 PSI	PUMP	PUMP RPM	HEIGHT	WIDTH	DEPTH	WEIGHT (lbs)
TAP-5562	5	120 Horiz.	2 x 19.8	2 x 247	635	54 3/4"	81 1/2"	26 1/2"	1073
TAS-5562	7.5	120 Horiz.	2 x 25.9	2 x 247	800	54 3/4"	81 1/2"	26 1/2"	1103
VAT-5583	10	240 Horiz.	2 x 36.8	2 x 447	590	62 1/2"	107 3/4"	30 3/4"	1940
VAV-5582	15	240 Horiz.	2 x 52.1	2 x 447	880	62 1/2"	107 3/4"	30 3/4"	2074





### XL Package - Magnetic Starters & Alternator Relay with Low Oil Level Shutdown Monitors & Auto Drain

Features the basic duplex + two definite purpose magnetic starters & alternator relay, two low oil level shutdown monitors / switches & pneumatic auto drain.

The magnetic starters & alternator relay act as a simple alternator, enabling each pump & motor combination to start alternately.

### MS Package - Magnetic Starters & Alternator Relay

Features the basic duplex + two definite purpose magnetic starters & alternator relay. The magnetic starters & alternator relay act as a simple alternator, enabling each pump & motor combination to start alternately.

### ACP - Alternator Control Panel

An advanced alternator option enabling each pump & motor combination to start alternately, providing reliable, continuous-Use, 24/7 operation. If the active pump & motor cannot deliver the desired demand, the secondary pump & motor is automatically enlisted.

The ACP configuration includes the Duplex air compressor + an alternator control panel driven by a logic relay preloaded with an alternating program.

### Basic Duplex Package

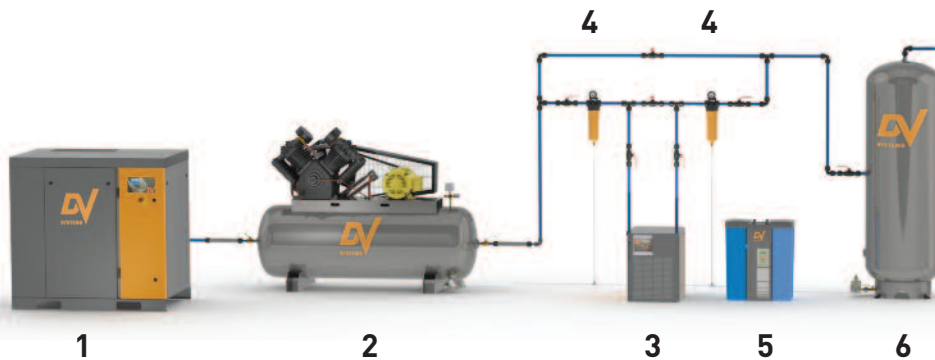
Features two cast-Iron compressor pumps, two high-efficiency North American made open drip proof [ODP] motors, and an air receiver.



# HDI SERIES 5HP TO 30HP HEAVY DUTY INDUSTRIAL AIR COMPRESSORS

**Compressed air quality** is critical in maintaining an effective, efficient & properly operating compressed air system. An air dryer with appropriate filtration ensures the delivery of cool, clean, dry compressed air, promoting air system efficiency and reliable operation.

DV Systems provides a comprehensive range of compressed air treatment products and compressed air system accessories, including air dryers, filters, separators, air receivers, ETC oil-free converters and air compressor management systems.



- 1 Rotary screw compressor
- 2 Piston compressor
- 3 Compressed air dryer
- 4 Air filters
- 5 Ecotron oil water separator
- 6 Air receiver

## 125+ YEARS OF MANUFACTURING EXCELLENCE

**DV Systems** is a designer of high-performance, high efficiency compressed air systems. We have been engineering and manufacturing industrial air compressors since 1954 and our commitment to a culture of innovation dates back 125 plus years. Our objective is to provide reliable, innovative products and compressed air system solutions, strengthened by a commitment to exceptional customer service.

**FOR MORE INFORMATION VISIT**  
**DVSYSTEMS.COM**

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ATTENTION: TO MAINTAIN WARRANTY PLEASE USE ONLY ORIGINAL SERVICE PARTS AND OFFICIAL DV SYSTEMS MAINTENANCE KITS. AS WE ARE COMMITTED TO CONTINUOUS IMPROVEMENT AND INNOVATION OF OUR PRODUCTS, SPECIFICATIONS ARE SUBJECT TO CHANGE WITHOUT NOTICE.

