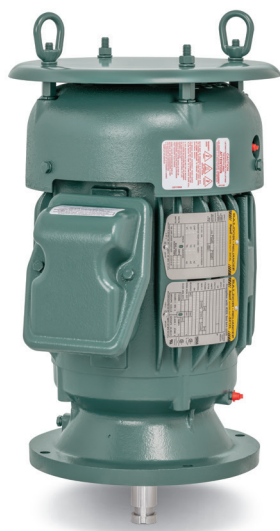


# IEEE 841XL P-Base vertical solid shaft motors

## Uncompromised reliability



**BALDOR • RELIANCE**

Designed to provide outstanding performance, reliability and ease of maintenance. This P-base vertical motor is the most cost-effective solution for waste water, oil and gas and chemical processing applications. The features of IEEE 841XL motors make it an excellent choice for any application that would benefit from longer service life and reduced maintenance.

Upgrade to the Baldor-Reliance 841XL motor in place of your standard duty or severe duty motor. It is engineered to provide the highest efficiency and reliability under the harshest conditions. It has been designed to suit any of your pumping needs and provide years of uninterrupted service.

IP56 sealing provides superior protection from ingress of contaminants into the bearings and motor housing. The premium efficient winding insulation system is designed for inverter use. These motors meet or exceed NEMA MG1 part 31.4.4.2

Baldor-Reliance® Severe Duty IEEE 841XL P-base vertical solid shaft motors have lower vibration and superior positive bearing lubrication which makes this the ideal motor for your severe duty pumping applications.

The new 841XL P-Base vertical solid shaft motors are available when you need them and where you need them. They are stocked in locations across the country.

From stock, we offer 3 bearing designs to support all your thrust load requirements.

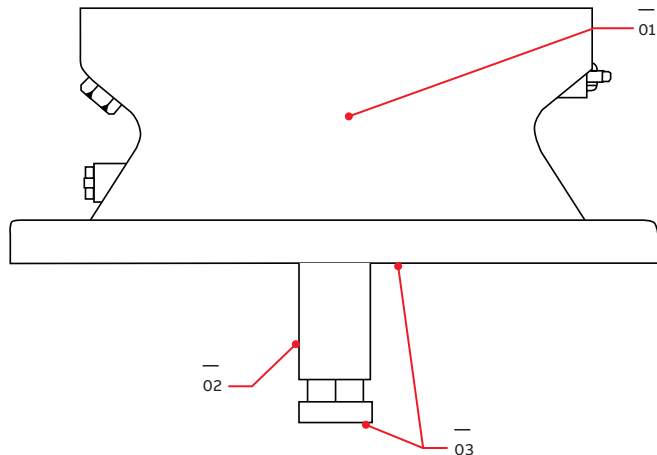
- **Normal thrust HP**
- **Medium thrust LP** - API 610 compliant
- **High thrust VP**

**Available custom options**

- API 610 compliant construction
- Non stock horse power or base speed ratings
- Bearing isolation
- Custom shaft
- Custom mounting face

Standard features - 460 VAC

<b>Normal thrust HP range</b>	3 to 75
Frame	180HP - 360 Hp
<b>Medium thrust LP range</b>	3 to 40
Frame	180LP - 360LP
<b>High thrust VP range</b>	50 to 75
Frame	320VP - 365VP
<b>Poles</b>	2, 4
<b>Bearing caps</b>	Sealed, cast iron
<b>Bearing protection</b>	IP56 INPRO seal on both ends frames 180 - 360
<b>Sealed lead opening</b>	Leads are individually sealed preventing contaminants from entering
<b>Nameplate</b>	Stainless steel
<b>Drain</b>	Stainless steel T-drain
<b>Fasteners</b>	Grade 5
<b>Efficiency</b>	Meets or exceeds NEMA table 12-12
<b>Lubrication</b>	PLS grease system with grease inlet & auto relief fittings on DE and ODE
<b>Inverter capabilities</b>	Meets NEMA MG-1 part 31.4.4.2
<b>Classification</b>	Class I, Division 2, Group A,B,C,D
<b>Insulation system</b>	Class F insulation with B rise
<b>NEMA design</b>	B
<b>Ground</b>	Frame ground lug and ground connection in oversized conduit box
<b>Service factor @ 40C</b>	1.15
<b>Drip cover</b>	Cast iron
<b>Warranty</b>	5 years
<b>Documentation</b>	Performance and vibration test results ship with each motor
<b>Unfiltered vibration (2 and 4 pole)</b>	.008 in/sec peak velocity measured in any direction
<b>LP (Medium thrust)</b>	
<b>Shaft run-out</b>	.001 inch Total Indicator Reading (TIR)
<b>Face to shaft perpendicularity</b>	.001 inch Total Indicator Reading (TIR)
<b>HP and VP (Normal thrust and high thrust)</b>	
<b>Shaft run-out</b>	AK (face rabbet) = 8.25 inch .002 inch TIR AK =13.5 inch .002 TIR
<b>Face run-out</b>	AK (face rabbet) = 8.25 inch .001 inch TIR AK =13.5 inch .006 TIR



- 01 - The load bearing is in the ODE end plate to protect it from the heat
- 02 - Special balance to reduce vibration. Less vibration provides longer motor life and reduces wear on the connected equipment.
- 03 - Reduced face and shaft run out provides better alignment to the pump shaft and mount. Better equipment alignment provides less vibration and less mechanical stress on the motor and connected equipment.

**P-Base IEEE 841 XL motor family, normal thrust**

Hp	RPM	NEMA frame	Enclosure	Catalog number	List price	Mult. sym.	Voltage
3	3600	182HP	TEFC	VHECP83660T-4	2,123	SD	460
	1800	182HP	TEFC	VHECP83661T-4	2,170	SD	460
5	3600	184HP	TEFC	VHECP83663T-4	2,241	SD	460
	1800	184HP	TEFC	VHECP83665T-4	2,175	SD	460
7-1/2	3600	213HP	TEFC	VHECP83769T-4	3,125	SD	460
	1800	213HP	TEFC	VHECP83770T-4	2,997	SD	460
10	3600	215HP	TEFC	VHECP83771T-4	3,296	SD	460
	1800	215HP	TEFC	VHECP83774T-4	3,090	SD	460
15	3600	254HP	TEFC	VHECP82394T-4	4,033	SD	460
	1800	254HP	TEFC	VHECP82333T-4	4,108	SD	460
20	3600	256HP	TEFC	VHECP84106T-4	4,347	SD	460
	1800	256HP	TEFC	VHECP82334T-4	4,841	SD	460
25	3600	284HP	TEFC	VHECP84107T-4	7,239	SD	460
	1800	284HP	TEFC	VHECP84103T-4	7,460	SD	460
30	3600	286HP	TEFC	VHECP84108T-4	7,279	SD	460
	1800	286HP	TEFC	VHECP84104T-4	7,623	SD	460
40	3600	324HP	TEFC	VHECP84109T-4	8,914	SD	460
	1800	324HP	TEFC	VHECP84110T-4	9,126	SD	460
50	3600	326HP	TEFC	VHECP84114T-4	9,327	SD	460
	1800	326HP	TEFC	VHECP84115T-4	9,521	SD	460
60	3600	364HP	TEFC	VHECP84310T-4	15,285	SD	460
	1800	364HP	TEFC	VHECP84314T-4	14,780	SD	460
75	3600	365HP	TEFC	VHECP84313T-4	17,758	SD	460
	1800	365HP	TEFC	VHECP84316T-4	16,711	SD	460

**P-Base IEEE 841 XL motor family, medium thrust**

Hp	RPM	NEMA frame	Enclosure	Catalog number	List price	Mult. sym.	Voltage
3	3600	182LP	TEFC	VLECP83660T-4	2,606	SD	460
	1800	182LP	TEFC	VLECP83661T-4	2,624	SD	460
5	3600	184LP	TEFC	VLECP83663T-4	2,766	SD	460
	1800	184LP	TEFC	VLECP83665T-4	2,960	SD	460
7-1/2	3600	213LP	TEFC	VLECP83769T-4	3,731	SD	460
	1800	213LP	TEFC	VLECP83770T-4	3,811	SD	460
10	3600	215LP	TEFC	VLECP83771T-4	3,858	SD	460
	1800	215LP	TEFC	VLECP83774T-4	3,916	SD	460
15	3600	254LP	TEFC	VLECP82394T-4	7,167	SD	460
	1800	254LP	TEFC	VLECP82333T-4	7,242	SD	460
20	3600	256LP	TEFC	VLECP84106T-4	7,497	SD	460
	1800	256LP	TEFC	VLECP82334T-4	10,157	SD	460
25	3600	284LP	TEFC	VLECP84107T-4	10,758	SD	460
	1800	284LP	TEFC	VLECP84103T-4	10,994	SD	460
30	3600	286LP	TEFC	VLECP84108T-4	10,821	SD	460
	1800	286LP	TEFC	VLECP84104T-4	11,079	SD	460
40	3600	324LP	TEFC	VLECP84109T-4	12,629	SD	460
	1800	324LP	TEFC	VLECP84110T-4	12,818	SD	460

**P-Base IEEE 841 XL motor family, high thrust**

<b>Hp</b>	<b>RPM</b>	<b>NEMA frame</b>	<b>Enclosure</b>	<b>Catalog number</b>	<b>List price</b>	<b>Mult. sym.</b>	<b>Voltage</b>
50	3600	326VP	TEFC	VPECP84114T-4	10,820	SD	460
	1800	326VP	TEFC	VPECP84115T-4	10,762	SD	460
60	3600	364VP	TEFC	VPECP84310T-4	18,758	SD	460
	1800	364VP	TEFC	VPECP84314T-4	18,262	SD	460
75	3600	365VP	TEFC	VPECP84313T-4	19,464	SD	460
	1800	365VP	TEFC	VPECP84316T-4	18,533	SD	460

ABB Motors and Mechanical Inc.  
5711 R.S. Boreham, Jr. Street  
Fort Smith, AR 72901  
Ph: 1.479.646.4711

We reserve the right to make technical changes or modify the contents of this document without prior notice. With regard to purchase orders, the agreed particulars shall prevail. ABB does not accept any responsibility whatsoever for potential errors or possible lack of information in this document.

We reserve all rights in this document and in the subject matter and illustrations contained therein. Any reproduction, disclosure to third parties or utilization of its contents – in whole or in parts – is forbidden without prior written consent of ABB.  
Copyright© 2017 ABB  
All rights reserved