

# Four-Inch Submersible Pumps



## FOR HOME, FARM AND INDUSTRY

### Series "4F"

Low, medium and high capacity submersible pumps for home, farm, industry and many other domestic and commercial applications

- Stainless steel or cast iron suction and discharge housings
- Stainless steel pump shell
- Stainless steel hex drive shaft and coupling
- Stainless steel screen
- Corrosion resistant cable guard
- NEMA standard motor mounting ring
- Field replaceable cartridge assembly, cable guard, motor and motor lead wire assembly
- Stainless steel motors with lightning protection - (F&W available up to 2 HP)



**S SERIES, A SERIES AND G SERIES  
SUBMERSIBLES**



'S' Commander®  
Series — 304 SS  
Suction & Discharge

'A' Captain® Series  
— Cast Iron Suction  
& Discharge

5 thru 27 GPM - 'A' and 'S' Series

35 thru 85 GPM - Hi Cap 'A' and 'S' Series





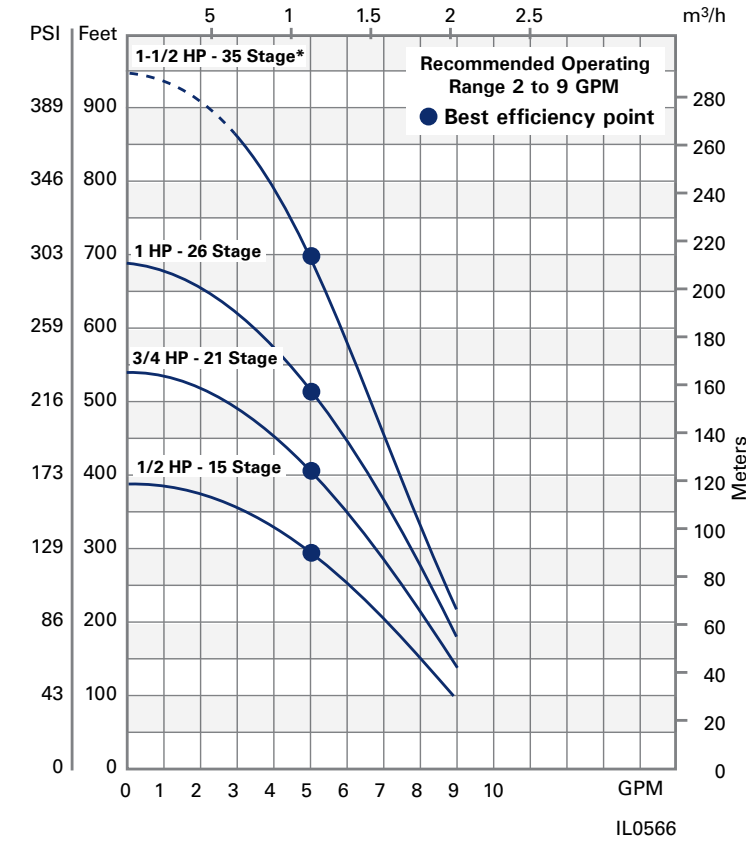
HP Size and Model No.	Stages	Weight		Disch. Pressure PSI	DEPTH TO WATER LEVEL IN FEET																Max. Pressure														
		Motor Type	Ship Wt.		CAPACITIES IN GALLONS PER MINUTE																Ft.	PSI													
					20	40	60	80	100	120	140	160	180	200	225	250	275	300	325	350			400	450	500	550	600	650	700	800					
1/2 HP 4F05A05 4F05S05 4F05G05	15	1 PH 3 Wire	29	0						8.9	8.5	8.2	7.8	7.4	7.0	6.5	5.9	5.3	4.7	4.0	3.2	390	168												
		1 PH 2 Wire	29	20	8.3	7.9	7.5	7.1	6.7	6.3	5.9	5.4	4.9	4.2	3.5	2.7																			
		1 PH 1 Wire	29	40	7.5	7.1	6.7	6.2	5.8	5.3	4.8	4.2	3.6	2.7																					
3/4 HP 4F05A07 4F05S07	21	1 PH 3 Wire	35	0						8.8	8.6	8.3	8.1	7.8	7.5	7.2	6.9	6.5	6.1	5.7	5.3	4.9	4.4	4.0	3.6	3.0	550	238							
		1 PH 2 Wire	35	20	8.7	8.5	8.2	8.0	7.7	7.5	7.2	6.9	6.5	6.2	5.7	5.3	4.9	4.5	4.1	3.7	3.3	2.9													
		1 PH 1 Wire	35	40	8.2	7.9	7.7	7.4	7.1	6.8	6.5	6.2	5.8	5.4	4.9	4.5	4.0	3.3	2.6	1.5															
1 HP 4F05A10 4F05S10	26	1 PH 3 Wire	43	0						9.0	8.8	8.6	8.4	8.2	7.9	7.7	7.4	7.2	6.9	6.6	6.0	5.3	4.6	3.7	2.4	695	300								
		1 PH 2 Wire	43	20						8.7	8.5	8.3	8.1	7.9	7.7	7.5	7.2	6.9	6.7	6.3	6.0	5.4	4.6	3.7	2.5										
		1 PH 1 Wire	43	40	8.5	8.3	8.1	7.9	7.7	7.5	7.2	7.0	6.7	6.4	6.1	5.8	5.5	5.1	4.7	3.9	2.7														
1-1/2 HP 4F05A15 4F05S15	35	1 PH 3 Wire	55	0												8.9	8.7	8.5	8.3	8.2	8.0	7.8	7.6	7.4	7.2	6.8	6.3	5.9	5.5	5.1	4.6	4.1	3.5	950	411
		1 PH 2 Wire	55	20							9.0	8.8	8.7	8.5	8.4	8.2	8.0	7.8	7.6	7.4	7.2	6.8	6.3	5.9	5.5	5.1	4.6	4.1	3.5						
		3 PH 3 Wire	52	40	8.8	8.6	8.5	8.4	8.2	8.0	7.9	7.7	7.5	7.3	7.1	6.8	6.6	6.4	6.0	5.6	5.1	4.7	4.1	3.5											

NOTE: Pipe friction loss in drop pipe is not included in chart above.  
1/2 thru 2 HP, 1 PH pumps feature Flint & Walling motors.

Component Description	Commander® 'S' Series 5, 7, 10, 15, 19 & 27 GPM 1/2 thru 5 HP	Captain® 'A' Series 5, 7, 10, 19 & 27 GPM 1/2 thru 5 HP	Commander® Plus 'S' Series 35, 55 & 85 GPM 1 thru 7-1/2 HP	Captain® Plus 'A' Series 35, 55 & 85 GPM 1 thru 7-1/2 HP
Discharge Head	Stainless Steel, 1-1/4" NPT, safety rope eyelet included	Cast Iron, 1-1/4" NPT, safety rope eyelet included	Stainless Steel, 2" NPT, safety rope eyelets included	Cast Iron, 2" NPT
Check Valve Poppet	Internal removable, with elastomer sealing ring		Check valve not included	
Top Bearing	Closed sintered lead free sleeve bearing		Closed sintered lead free sleeve bearing	Closed sintered lead free sleeve bearing
Pump Shell	Heavy wall stainless steel			
Cable Guard	Stainless steel	Stainless steel or Crush-proof PVC	Stainless steel	Stainless steel or Crush-proof PVC
Staging*	Noryl® impellers and diffusers; stainless steel floating bearing inserts and acetal diffuser plates			
Pump Shaft*	Stainless steel hex shaft with one piece motor-to-shaft coupling			
Motor Bracket	NEMA standard, stainless steel with stainless steel suction screen	NEMA standard, cast iron with stainless steel suction screen	NEMA standard, stainless steel with stainless steel suction screen	NEMA standard, cast Iron with stainless steel suction screen
Motor	All pumps driven by a complete selection stainless steel two wire or three wire motors. (F&W available up to 2 HP).		All pumps driven by a complete selection of stainless steel two wire or three wire motors. (F&W available up to 2 HP). Order motors separately.	
Motor Controls	F&W control boxes required for three-wire single phase motors. Magnetic starters and heaters are required for three phase models. Purchase at your local electrical outlet.			

\* Replacement cartridge assembly available for select models. Includes all necessary parts to restore pumps to like-new performance. No special tools required. Noryl® is a registered trademark of General Electric.

5 GPM • 1/2 - 1 1/2 HP



\* Pumps marked with asterisks not to be operated at GPM flows indicated by dotted line.







**4" 55 GPM • 1 1/2 thru 7 1/2 HP • 3450 RPM • 60 Cycle**

HP Size and Model No.	Stages	Phase	Weight		Discharge Pressure PSI	DEPTH TO WATER LEVEL IN FEET																				Maximum Pressure			
			Pump End	Motor End		20	40	60	80	100	120	140	160	180	200	220	240	260	300	350	400	450	500	550	Ft.	PSI			
						CAPACITIES IN GALLONS PER MINUTE																							
1-1/2 HP 4F55A15 4F55S15	4	1 3	12 12	28 25	0 40 60	70 42	60 23	71 47	62 33	50	36															135	58		
2 HP 4F55A20 4F55S20	5	1 3	14 14	30 28	0 20 40 60	74 56 30	68 45	75 59 34	69 50	61 38	51 15	42	29													165	71		
3 HP* 4F55A30 4F55S30	7	1 3	16 16	52 43	0 20 40 60		75 63 48	70 57 40	65 50 32	71 53 34	66 46 15	61 55	55 47	47 38	28											235	101		
5 HP* 4F55A50 4F55S50	11	1 3	19 19	69 53	0 20 40 60				73 67	70 64	66 55	74 67	71 64	68 60	64 56	61 52	57 47	53 42	44 31	30								365	158
7-1/2 HP* 4F55A75 4F55S75	18	3	28	69	0 20 40 60					75 73	74 70	72 68	74 66	73 64	71 62	69 62	67 62	66 57	62 50	56 42	49 35	41 24	33 20				600	259	

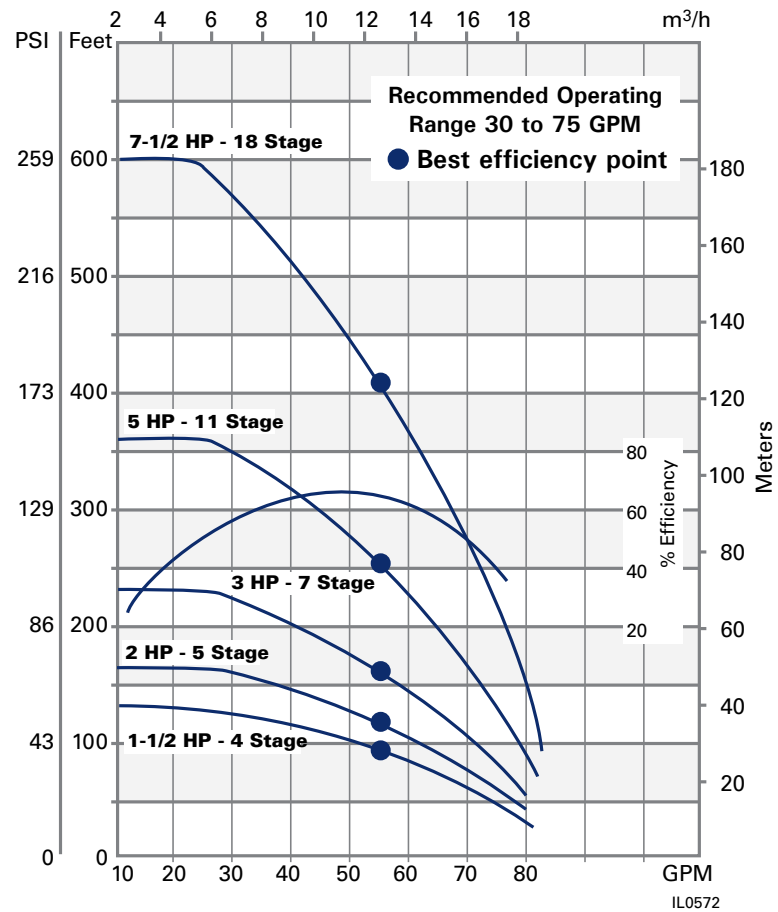
NOTE: Pipe friction loss in drop pipe is not included in chart above.  
 \*For 3 HP and above, refer to motor manufacturer's handbook for proper flow rates to cool motor.  
 1/2 thru 2 HP, 1 PH pumps feature Flint & Walling motors.

**4" 85 GPM • 2 thru 7 1/2 HP • 3450 RPM • 60 Cycle**

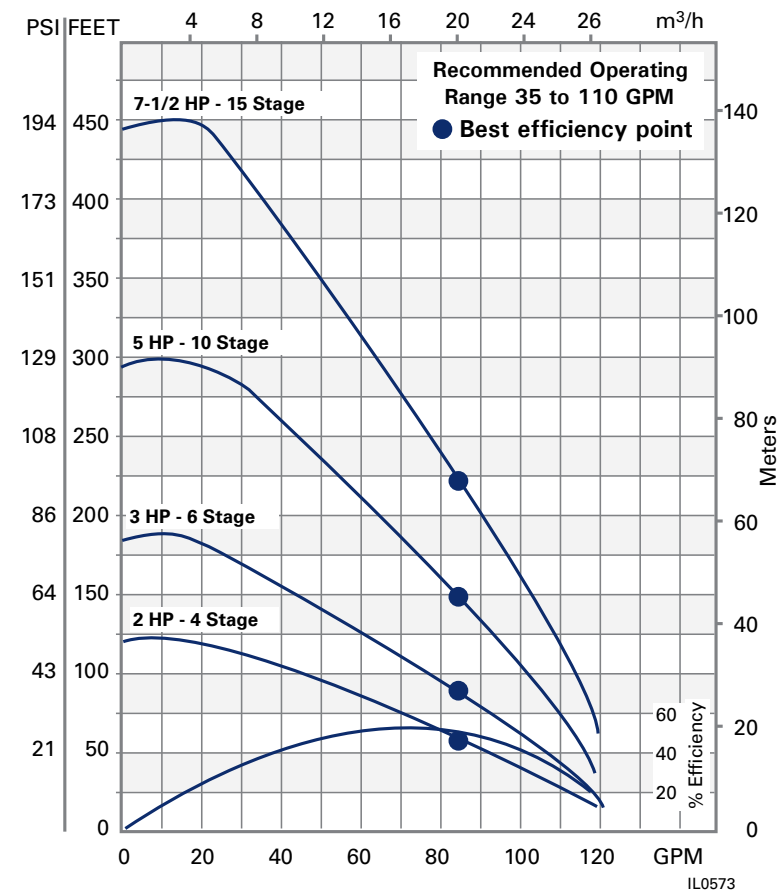
HP Size and Model No.	Stages	Phase	Weight		Discharge Pressure PSI	DEPTH TO WATER LEVEL IN FEET																				Max. Pressure			
			Pump End	Motor End		20	40	60	80	100	120	140	160	180	200	220	240	260	280	300	320	340	360	380	400	Ft.	PSI		
						CAPACITIES IN GALLONS PER MINUTE																							
2 HP 4F85A20 4F85S20	4	1 3	13 13	30 28	0 20 40 60	80 35	105 60	85 40	64 45																		120	52	
3 HP* 4F85A30 4F85S30	6	1 3	15 15	52 43	0 20 40 60	101 70 40	88 56 25	103 75 43	91 61 30	77 48	63 34	51	38														185	80	
5 HP* 4F85A50 4F85S50	10	1 3	20 20	69 53	0 20 40 60	100 81	108 91 73	102 83 65	110 94 57	103 86 49	95 78 41	87 70 33	79 62 20	71 54 25	63 46	55 38	48 30	40	32									300	130
7-1/2 HP* 4F85A75 4F85S75	15	3	27	69	0 20 40 60		109 97	104 92	110 99	106 94	101 88	95 83	90 77	85 72	79 66	74 61	69 56	64 45	59 40	53 34	48 27	43 30	38				450	195	

NOTE: Pipe friction loss in drop pipe is not included in chart above.  
 \*For 3 HP and above, refer to motor manufacturer's handbook for proper flow rates to cool motor.  
 1/2 thru 2 HP, 1 PH pumps feature Flint & Walling motors.

**55 GPM • 1 1/2 - 7 1/2 HP**



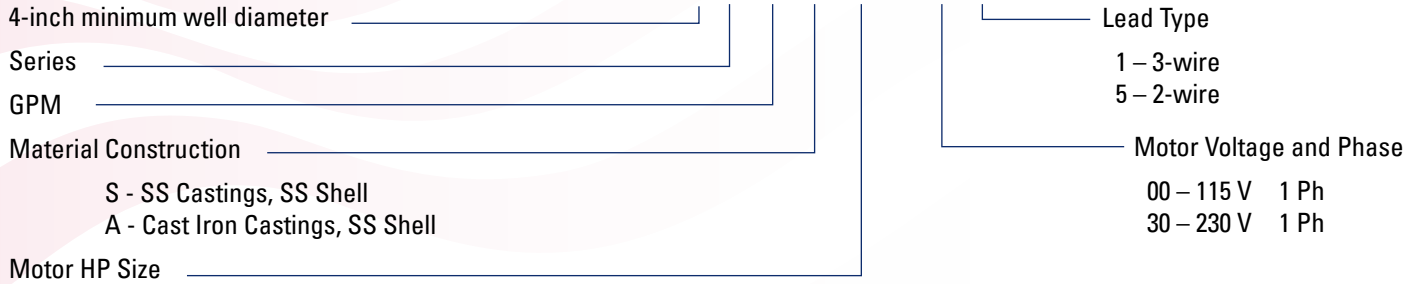
**85 GPM • 2 - 7 1/2 HP**



# Model Number Code

## 5 thru 27 GPM

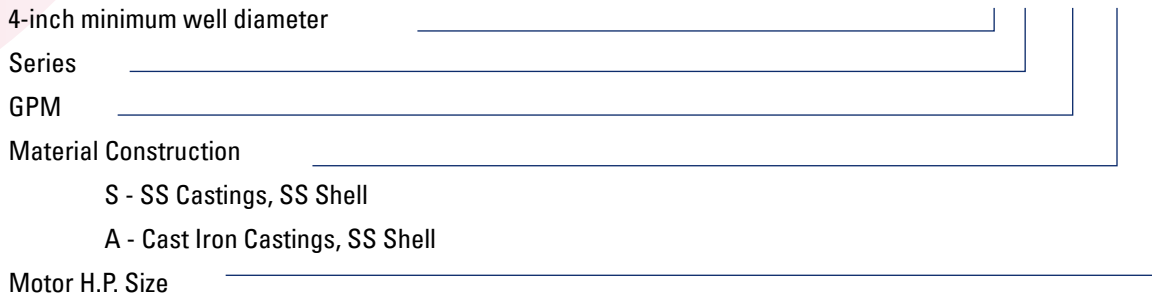
**4 F 10 A 05 - 30 1**



1/2 - 1-1/2 HP Single phase pump and motor assembly includes pump/motor unit with motor leads.  
Order control box for 3-wire units separately.  
On 2 - 7-1/2 HP and all 3 phase units, order pump, motor and control box separately. Magnetic starters must be purchased locally.  
Lead wire assembly included with motor.  
1/2 thru 2 HP, 1 PH pumps feature Flint & Walling motors.

## 35, 55 & 85 GPM

**4 F 35 A 20**



On 35, 55 & 85 GPM units order pump, motor and control box separately. Magnetic starters must be purchased locally.  
Lead wire assembly included with motor.

HP	Voltage & Phase	Motor Type	F&W Motor Thrust Rating	F&W Motor Order No.	F&W Control Box Order Number	Motor Order Number	Control Box Order Number
1/2	115V/1PH	3-Wire	700#	137426	022875	M137426	127185
	230V/1PH	3-Wire	700#	137428	022876	M137428	127189
	115V/1PH	2-Wire	700#	137412	N/A	M137412	N/A
3/4	230V/1PH	2-Wire	700#	137414	N/A	M137414	N/A
	230V/1PH	3-Wire	700#	137430	022877	M137430	127197
1	230V/1PH	2-Wire	700#	137416	N/A	M137416	N/A
	230V/1PH	3-Wire	700#	137432	022878	M137432	126319
1 1/2	230V/1PH	2-Wire	700#	137418	N/A	M137418	N/A
	230V/1PH	3-Wire	700#	137434	022879	M137434	133589
	230V/1PH	2-Wire	700#	137420	N/A	M137420	N/A
	200V/3PH	3-Wire	--	N/A	N/A	M137457	N/A
	230V/3PH	3-Wire	--	N/A	N/A	M137458	N/A
2	460V/3PH	3-Wire	--	N/A	N/A	M137460	N/A
	230V/1PH	3-Wire	700#	137435	025242	M137435	137224+ 126321++
	200V/3PH	3-Wire	--	N/A	N/A	M137461	N/A
	230V/3PH	3-Wire	--	N/A	N/A	M137462	N/A
	460V/3PH	3-Wire	--	N/A	N/A	M137464	N/A

HP	Voltage & Phase	Motor Type	F&W Motor Thrust Rating	F&W Motor Order No.	F&W Control Box Order Number	Motor Order Number	Control Box Order Number
3	230V/1PH	3-Wire	--	N/A	025243	M139422	136800+ 126322++
	200V/3PH	3-Wire	--	N/A	N/A	M139423	N/A
	230V/3PH	3-Wire	--	N/A	N/A	M139424	N/A
5	460V/3PH	3-Wire	--	N/A	N/A	M139425	N/A
	230V/1PH	3-Wire	--	N/A	025244	M137456	135269+ 137225++
	200V/3PH	3-Wire	--	N/A	N/A	M137469	N/A
7 1/2	230V/3PH	3-Wire	--	N/A	N/A	M137470	N/A
	460V/3PH	3-Wire	--	N/A	N/A	M137472	N/A
	200V/3PH	3-Wire	--	N/A	N/A	M137473	N/A
	230V/3PH	3-Wire	--	N/A	N/A	M137474	N/A
	460V/3PH	3-Wire	--	N/A	N/A	M137476	N/A

N/A Not available

- + Deluxe control box – includes magnetic contactor. Recommended for water systems which utilize pressure switch.
- ++ Standard control box.

## DOE Compliance

PUMP MODEL	Impeller Dia.	P.E.I.c.l
4F35	3.072"	0.89
4F55	3.075"	0.93
4F85	3.070"	0.99

