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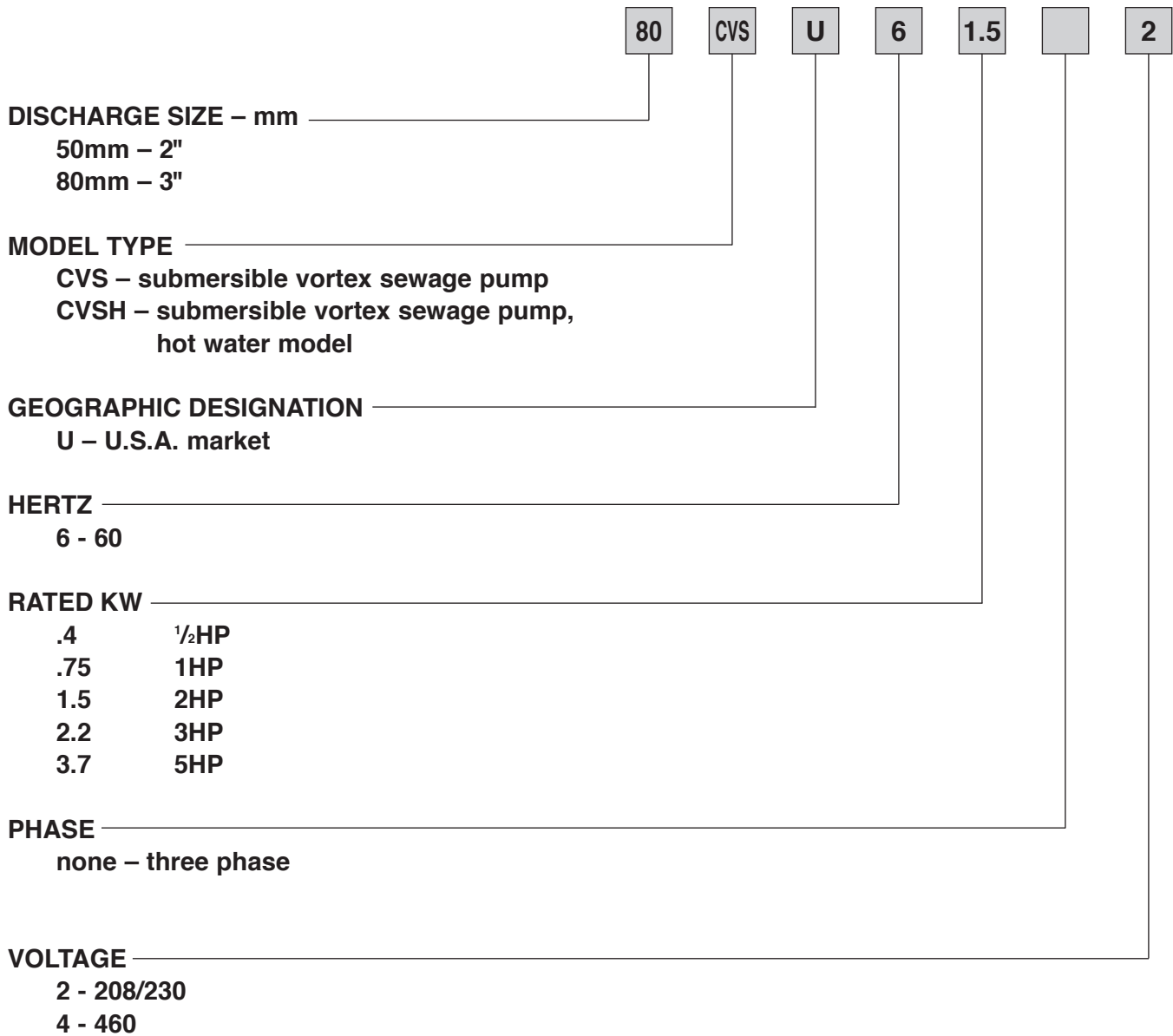
**Model**

50CVSHU6.4  
50CVSHU6.75  
50CVSHU61.5  
80CVSHU6.75  
80CVSHU61.5  
80CVSU62.2  
80CVSHU62.2  
80CVSU63.7  
80CVSHU63.7

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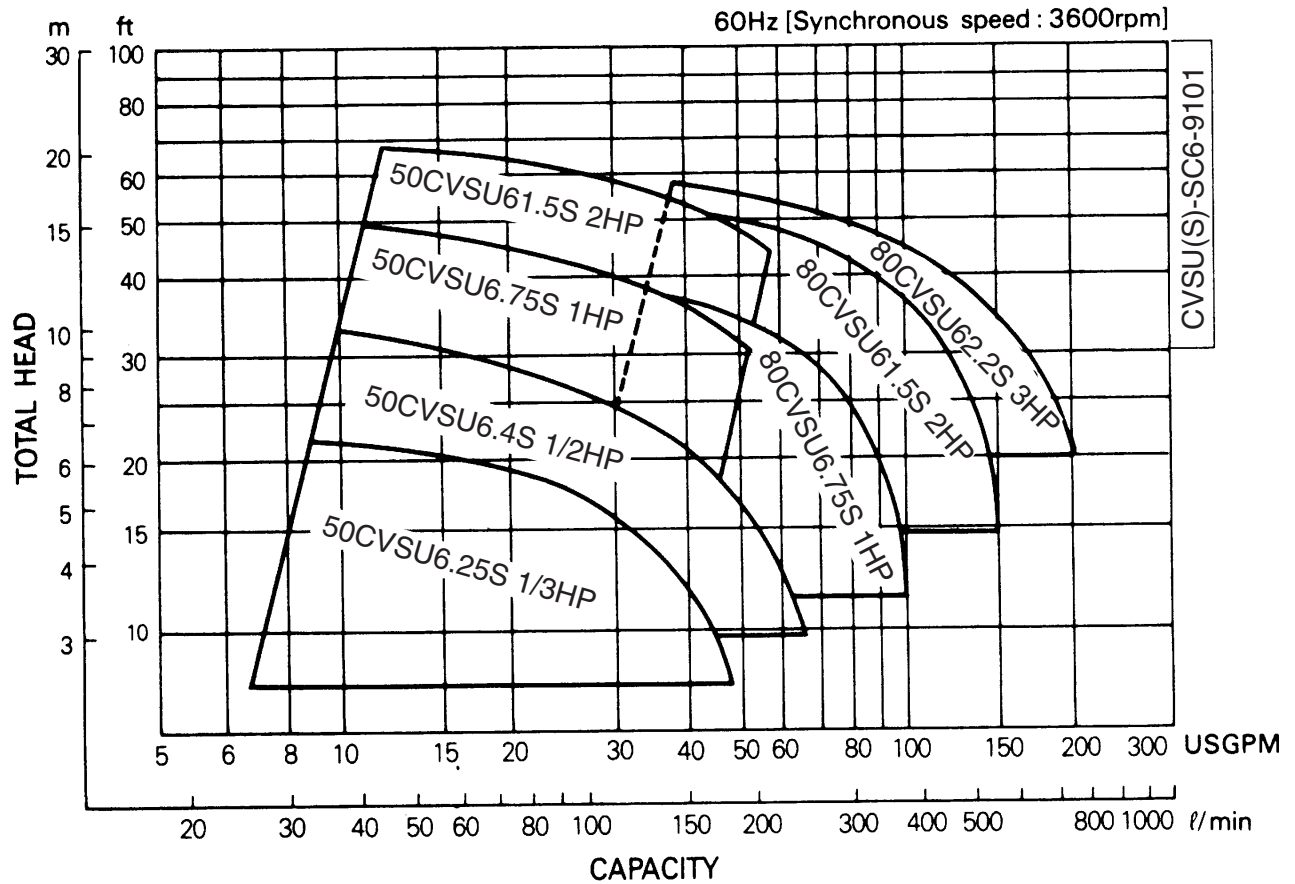
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**Model CVSU**
**EBARA PRO Cast Vortex Sewage Pumps**
**Model Designation**


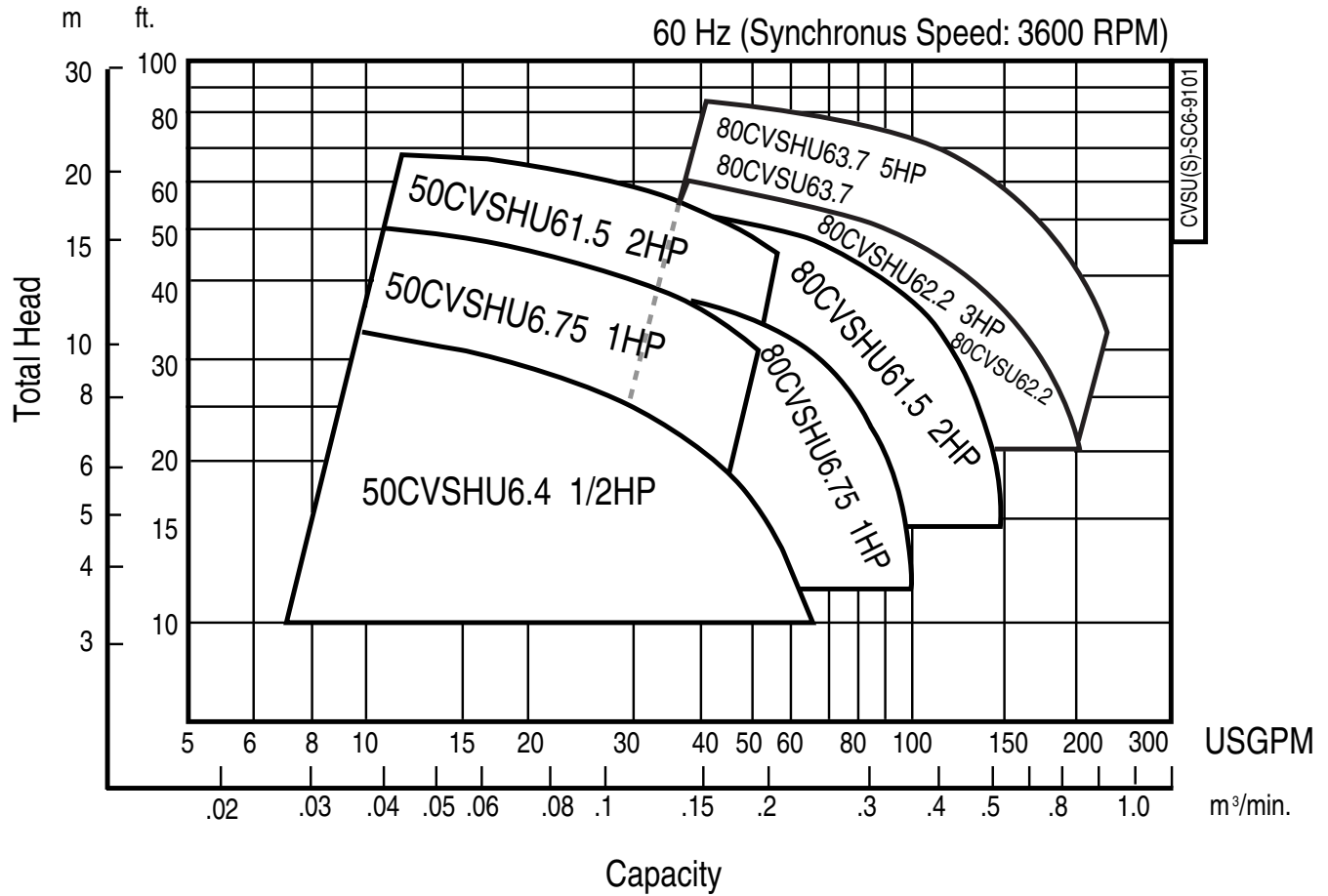
**Model CVSU**
**EBARA PRO Cast Vortex Sewage Pumps**
**Specifications**

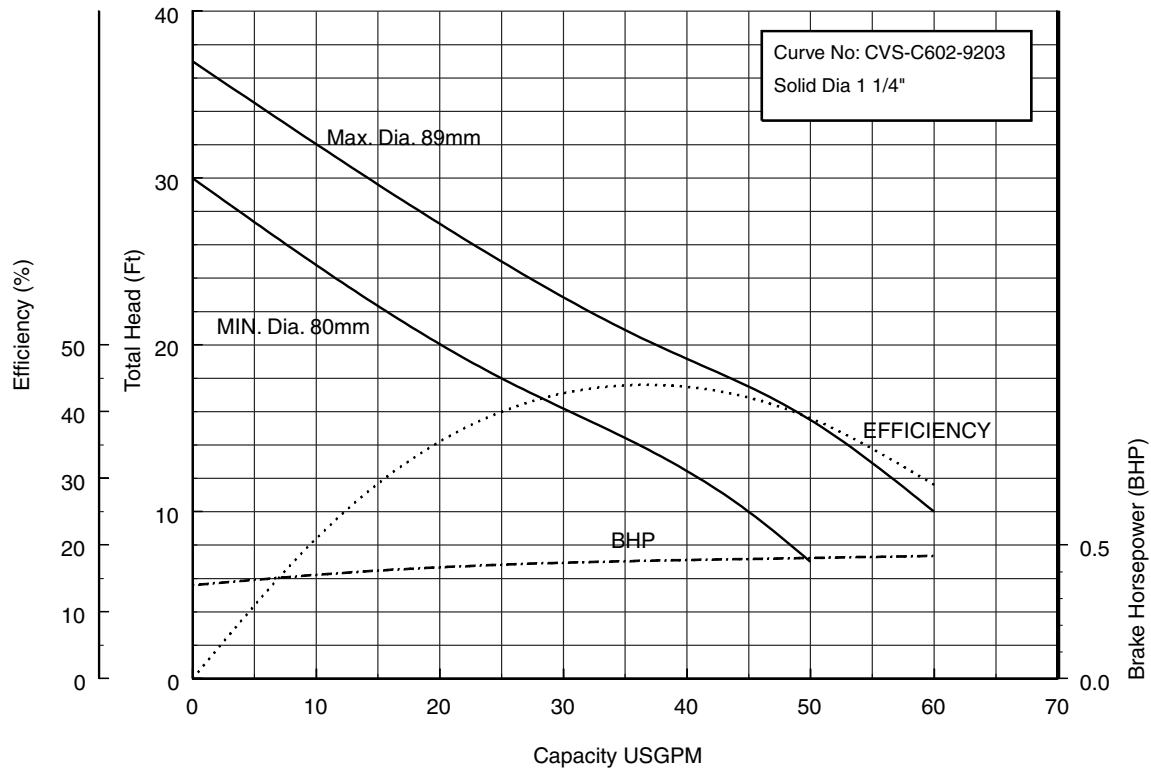
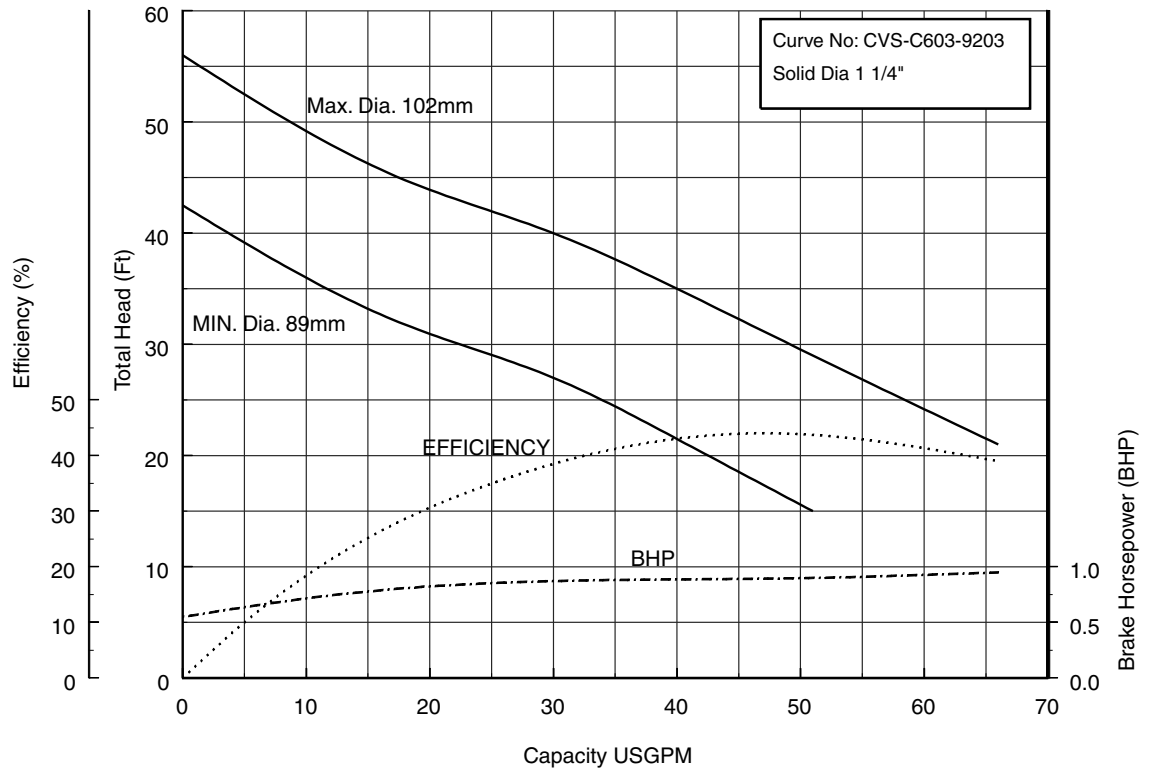
	Standard	Optional
Size	3 inch	
Range of HP	3 HP to 5 HP	
Range of Performance	Capacity 29 to 240 GPM Head 20 to 80 feet	
<b>Limitation</b> Maximum Water Temperature	122°F (50°C)	
<b>Synchronous Speed</b>	3600 RPM	
<b>Materials</b> Casing Impeller Shaft Motor Frame Fastener	Cast Iron Cast Iron 403 Stainless Steel Cast Iron 304 Stainless Steel	
<b>Mechanical Seal</b> Material – Upper Side Material – Lower Side Impeller Type Bearing Motor Three Phase Service Factor Motor Protection Submersible cable Accessories	Double Mechanical Seal Carbon/Ceramic Silicon Carbide/Silicon Carbide Semi-open recessed vortex Prelubricated Ball Bearing Air-filled, Insulation Class F 208/230, 460V 1.15 Built-in Auto Cut - overload, out of phase, single phasing protection 33 ft. Cast iron discharge elbow	66 ft. QDC System

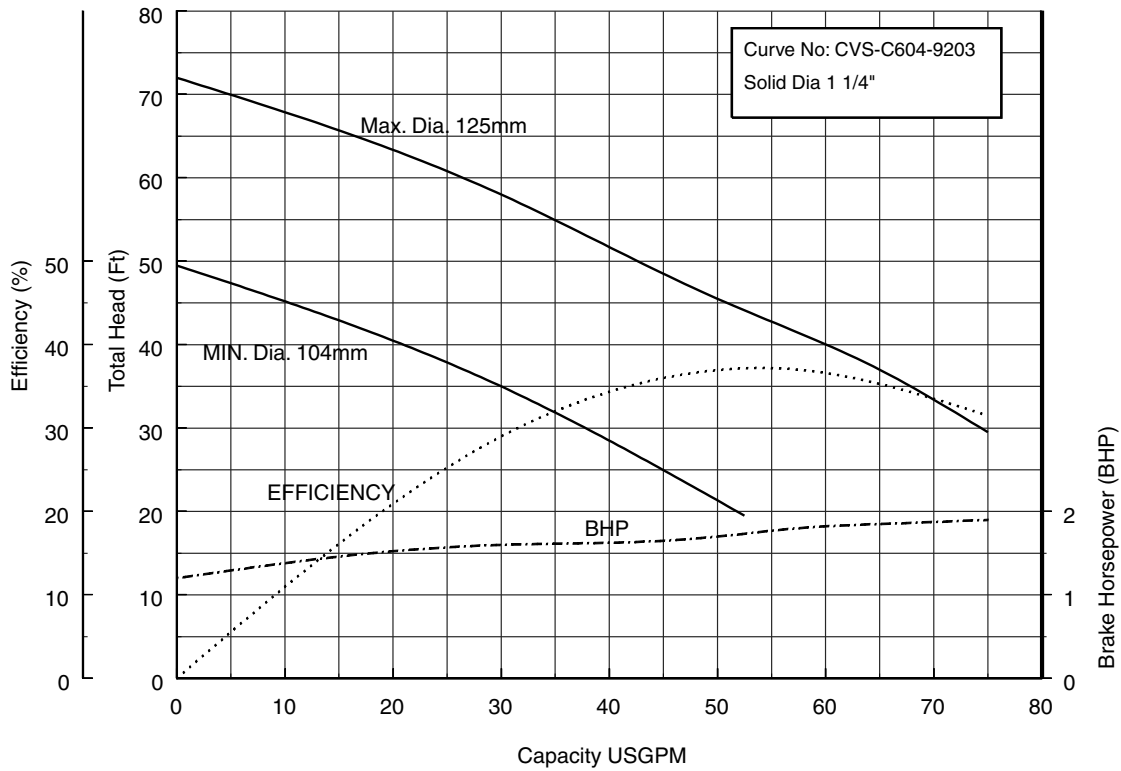
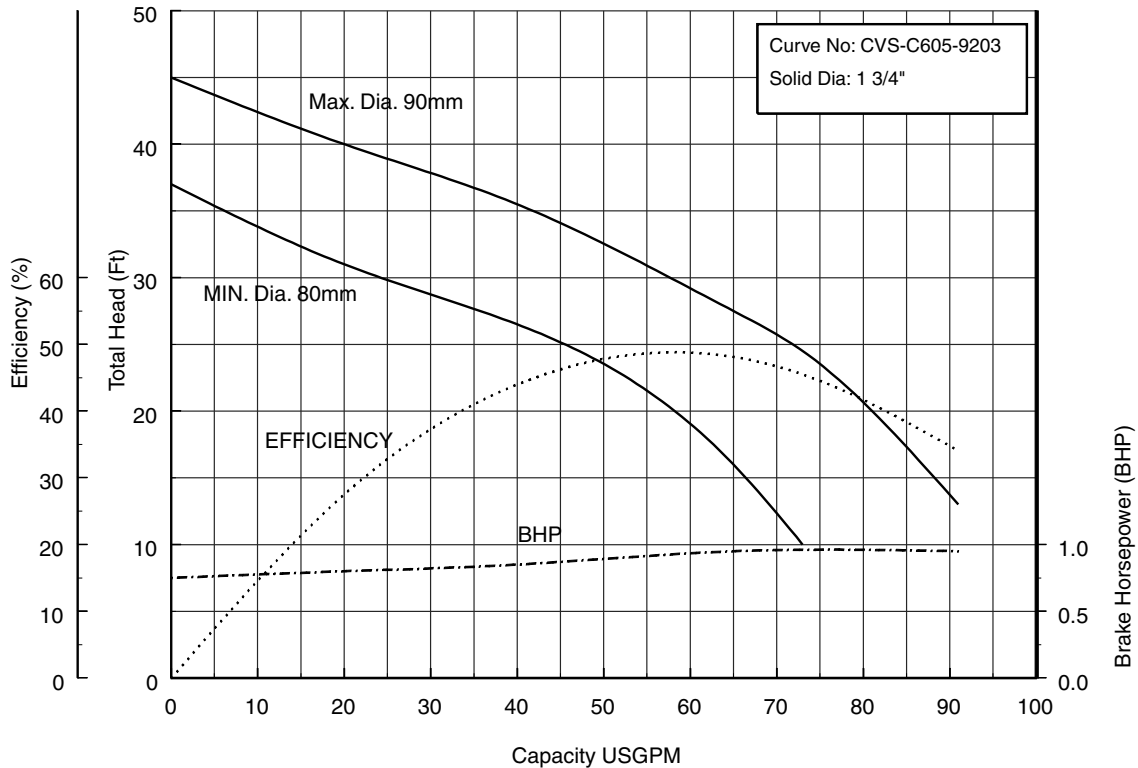
**Three phase**


**Model CVSHU – Hot Water Pumps  
Specifications**
**EBARA PRO Cast Vortex Sewage Pumps**

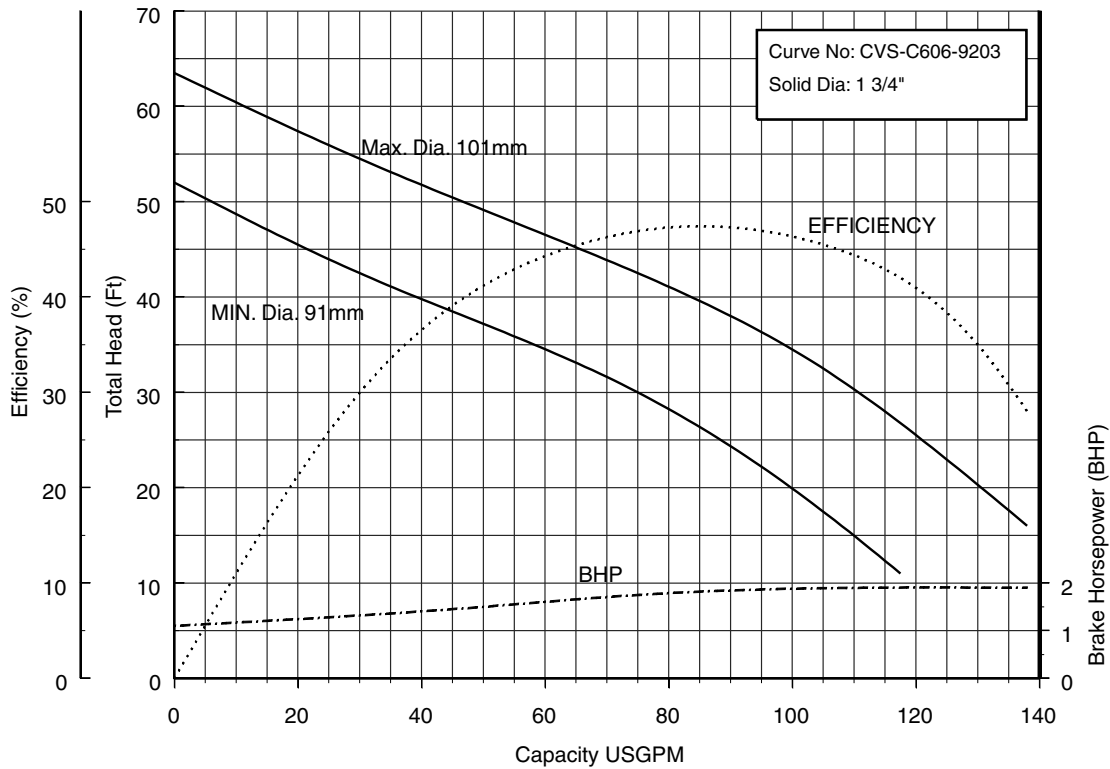
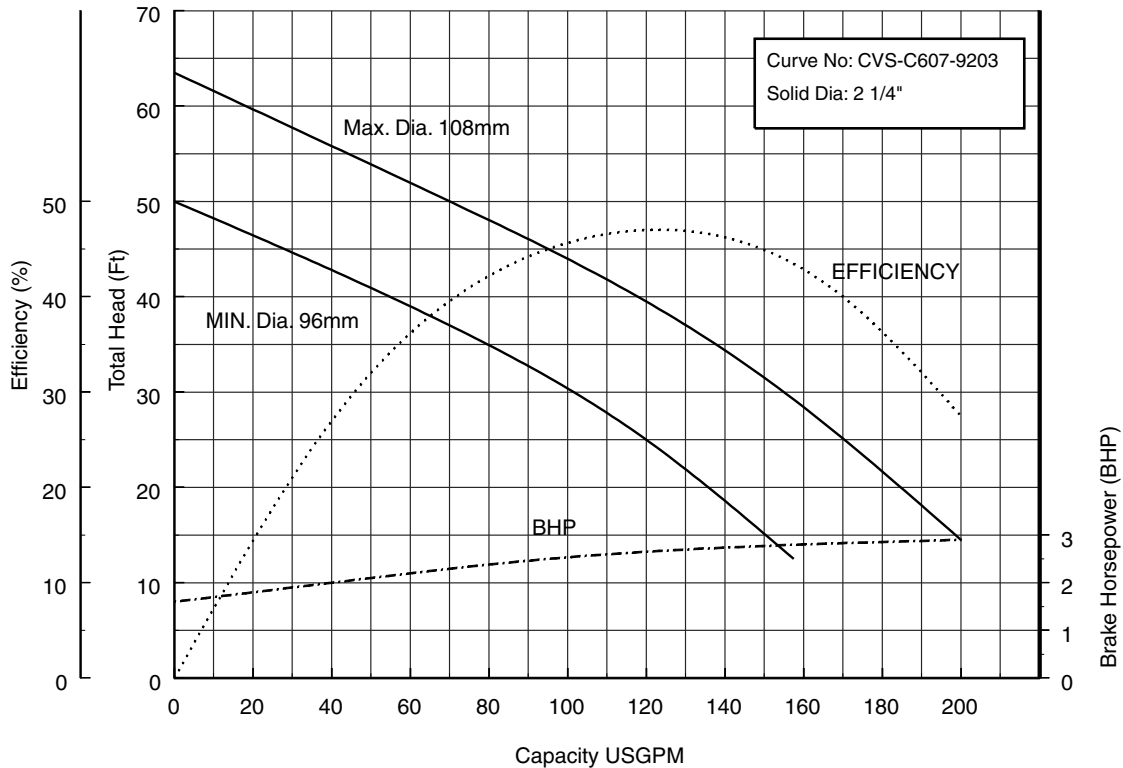
	Standard	Optional
Size	2, 3 inch	
Range of HP Range of Performance	1/2 HP to 5 HP Capacity 5 to 240 GPM Head 10 to 75 feet	
<b>Limitation</b> Maximum Water Temperature	158°F (70°C) 1/2, 1 HP 176°F (80°C) 2 to 5 HP 200°F (93°C) Operation is limited to 10 minutes	
<b>Synchronous Speed</b>	3600 RPM	
<b>Materials</b> Casing Impeller Shaft Motor Frame Fastener	Cast Iron Cast Iron 403 Stainless Steel Cast Iron 304 Stainless Steel	
<b>Mechanical Seal</b> Material – Upper Side Material – Lower Side Impeller Type Bearing Motor Three Phase Service Factor Motor Protection Submersible cable Accessories	Double Mechanical Seal Silicon Carbide/Silicon Carbide Silicon Carbide/Silicon Carbide Semi-open recessed vortex Prelubricated Ball Bearing Air-filled, Insulation Class H, F 208/230V, 460V 1.15 Built-in Overload Protection 33 ft. Cast iron companion flange with NPT thread (2", 1/2 to 2HP) Cast iron discharge elbow (3", 1 to 5HP)	66 ft. QDC System

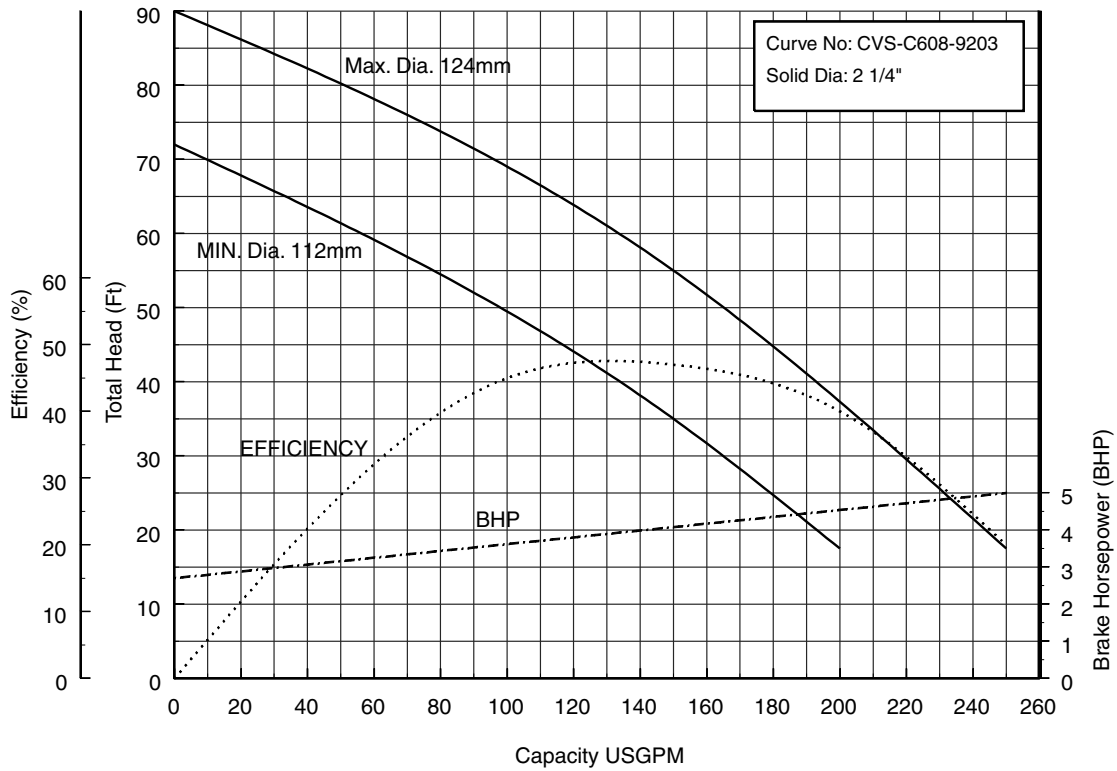
**Three phase**


**50CVSH6.4 (1/2HP)**
**Synchronous Speed: 3600 RPM**
**2 inch Discharge**

**50CVSH6.75 (1HP)**
**Synchronous Speed: 3600 RPM**
**2 inch Discharge**


**Model CVSU**
**EBARA PRO Cast Vortex Sewage Pumps**
**Performance Curves**
**50CVSH61.5 (2HP)**
**Synchronous Speed: 3600 RPM**
**2 inch Discharge**

**80CVSH6.75 (1HP)**
**Synchronous Speed: 3600 RPM**
**3 inch Discharge**


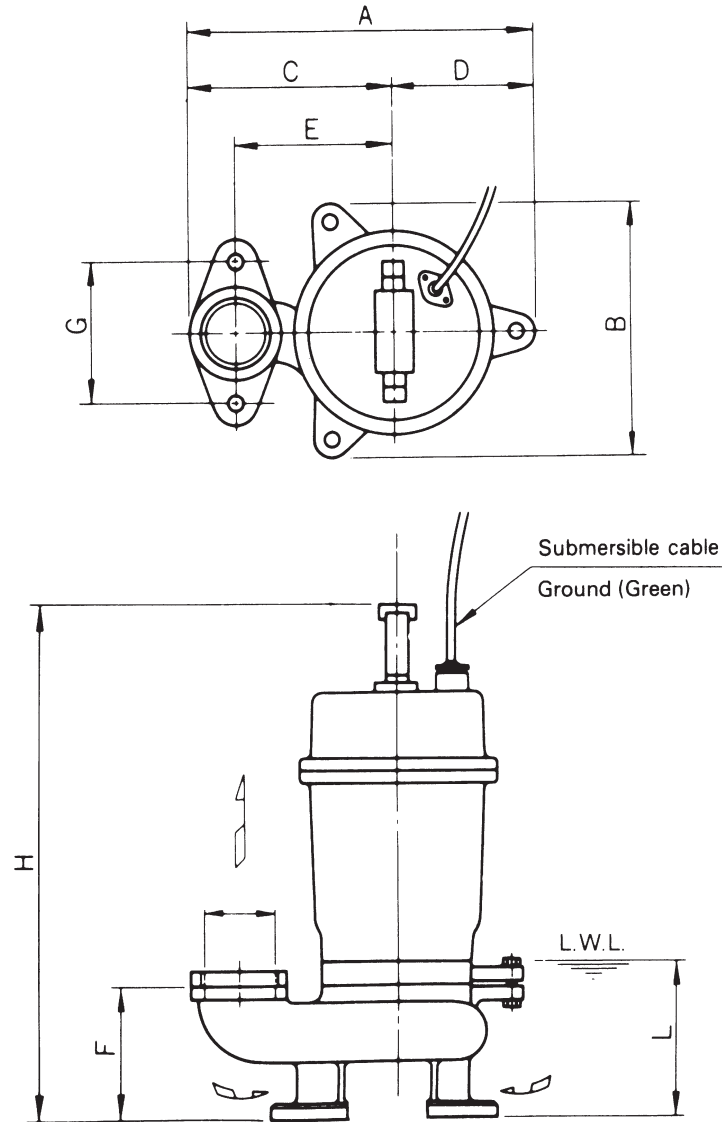


**80CVSH61.5 (2HP)**
**Synchronous Speed: 3600 RPM**
**3 inch Discharge**

**80CVS62.2 80CVSH62.2 (3HP) Synchronous Speed: 3600 RPM**
**3 inch Discharge**




**Dimensions**

Hot Water Pumps  
50CVSHU, 1/2 to 2HP


**Dimensions: inch**

PHASE	SIZE <sub>d</sub>	MODEL	OUTPUT		PUMP & MOTOR									WEIGHT Lb
			kW	HP	A	B	C	D	E	F	G	H	L	
THREE	2	50CVSHU6.4	0.4	1/2	9 <sup>7</sup> / <sub>16</sub>	6 <sup>5</sup> / <sub>16</sub>	5 <sup>13</sup> / <sub>16</sub>	3 <sup>9</sup> / <sub>16</sub>	4 <sup>5</sup> / <sub>16</sub>	3 <sup>1</sup> / <sub>4</sub>	3 <sup>3</sup> / <sub>4</sub>	15 <sup>7</sup> / <sub>16</sub>	4 <sup>7</sup> / <sub>8</sub>	31
		50CVSHU6.75	0.75	1	9 <sup>13</sup> / <sub>16</sub>	6 <sup>3</sup> / <sub>4</sub>	6 <sup>7</sup> / <sub>16</sub>	3 <sup>3</sup> / <sub>8</sub>	4 <sup>15</sup> / <sub>16</sub>	3 <sup>1</sup> / <sub>4</sub>	3 <sup>3</sup> / <sub>4</sub>	15 <sup>5</sup> / <sub>8</sub>	4 <sup>1</sup> / <sub>8</sub>	42
		50CVSHU61.5	1.5	2	9 <sup>13</sup> / <sub>16</sub>	6 <sup>3</sup> / <sub>4</sub>	6 <sup>7</sup> / <sub>16</sub>	3 <sup>3</sup> / <sub>8</sub>	4 <sup>15</sup> / <sub>16</sub>	3 <sup>1</sup> / <sub>4</sub>	3 <sup>3</sup> / <sub>4</sub>	17 <sup>5</sup> / <sub>16</sub>	4 <sup>1</sup> / <sub>8</sub>	60

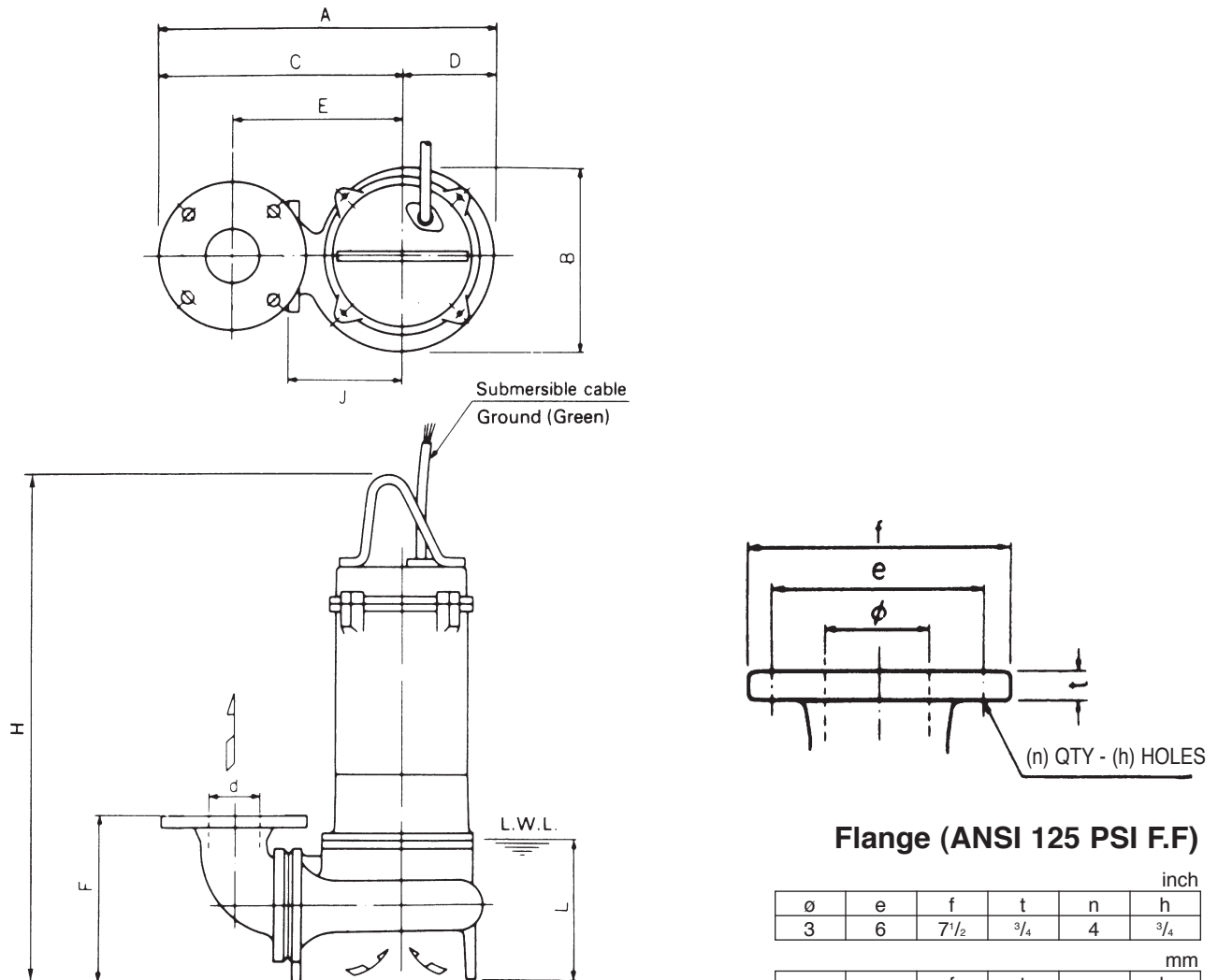
**Dimensions: mm**

PHASE	SIZE <sub>d</sub>	MODEL	OUTPUT		PUMP & MOTOR									WEIGHT kg
			kW	HP	A	B	C	D	E	F	G	H	L	
THREE	50	50CVSHU6.4	0.4	1/2	239	160	148	91	110	83	96	392	105	14
		50CVSHU6.75	0.75	1	249	171	163	86	125	83	96	391	105	19
		50CVSHU61.5	1.5	2	249	171	163	86	125	83	96	440	105	27



**Model CVSU**
**EBARA PRO Cast Vortex Sewage Pumps**
**Dimensions**

Hot Water Pumps  
80DVSHU, 1 to 5 HP



inch					
ø	e	f	t	n	h
3	6	7 <sup>1</sup> / <sub>2</sub>	<sup>3</sup> / <sub>4</sub>	4	<sup>3</sup> / <sub>4</sub>

mm					
ø	e	f	t	n	h
80	152	191	19	4	19

**Dimensions: inch**

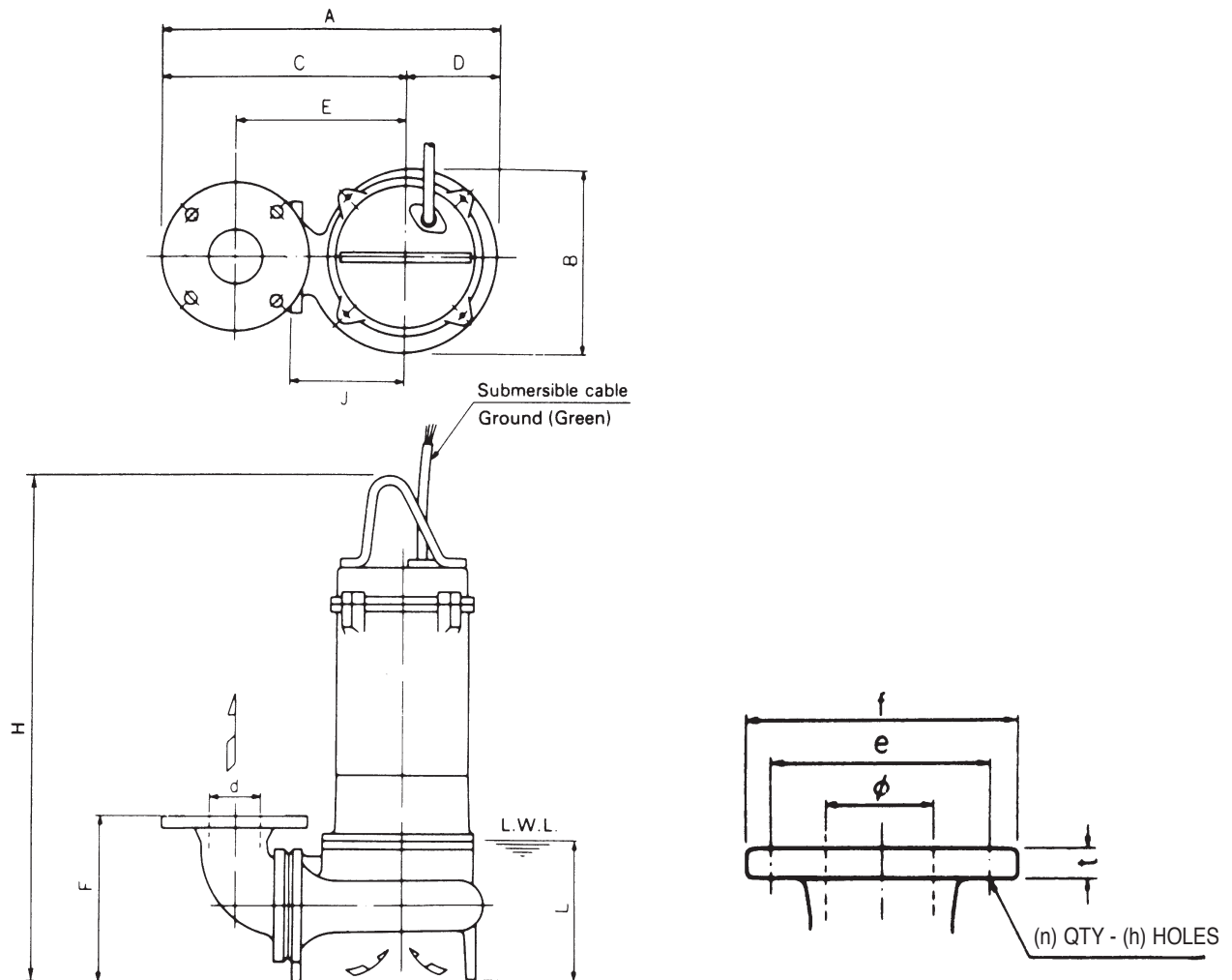
PHASE	SIZE d	MODEL	OUTPUT		PUMP & MOTOR									WEIGHT Lb
			kW	HP	A	B	C	D	E	F	H	J	L	
THREE	3	80CVSHU6.75	0.75	1	16 <sup>3</sup> / <sub>16</sub>	8	12 <sup>5</sup> / <sub>16</sub>	3 <sup>7</sup> / <sub>8</sub>	8 <sup>11</sup> / <sub>16</sub>	7 <sup>3</sup> / <sub>16</sub>	18 <sup>3</sup> / <sub>8</sub>	5 <sup>11</sup> / <sub>16</sub>	4 <sup>15</sup> / <sub>16</sub>	57
		80CVSHU61.5	1.5	2	16 <sup>3</sup> / <sub>16</sub>	8	12 <sup>5</sup> / <sub>16</sub>	3 <sup>7</sup> / <sub>8</sub>	8 <sup>11</sup> / <sub>16</sub>	7 <sup>3</sup> / <sub>16</sub>	20 <sup>7</sup> / <sub>16</sub>	5 <sup>11</sup> / <sub>16</sub>	4 <sup>15</sup> / <sub>16</sub>	77
		80CVSHU62.2	2.2	3	17 <sup>3</sup> / <sub>8</sub>	12 <sup>15</sup> / <sub>16</sub>	12 <sup>15</sup> / <sub>16</sub>	4 <sup>1</sup> / <sub>2</sub>	9 <sup>1</sup> / <sub>4</sub>	8 <sup>1</sup> / <sub>8</sub>	25 <sup>7</sup> / <sub>8</sub>	6 <sup>5</sup> / <sub>16</sub>	6 <sup>1</sup> / <sub>8</sub>	112
		80CVSHU63.7	3.7	5	17 <sup>3</sup> / <sub>8</sub>	12 <sup>15</sup> / <sub>16</sub>	12 <sup>15</sup> / <sub>16</sub>	4 <sup>1</sup> / <sub>2</sub>	9 <sup>1</sup> / <sub>4</sub>	8 <sup>1</sup> / <sub>8</sub>	27 <sup>3</sup> / <sub>16</sub>	6 <sup>5</sup> / <sub>16</sub>	6 <sup>1</sup> / <sub>8</sub>	132

**Dimensions: mm**

PHASE	SIZE d	MODEL	OUTPUT		PUMP & MOTOR									WEIGHT kg
			kW	HP	A	B	C	D	E	F	H	J	L	
THREE	80	80CVSHU6.75	0.75	1	411	203	313	98	220	183	467	145	125	26
		80CVSHU61.5	1.5	2	411	203	313	98	220	183	519	145	125	35
		80CVSHU62.2	2.2	3	442	328	328	114	235	206	658	160	155	51
		80CVSHU63.7	3.7	5	442	328	328	114	235	206	691	160	155	60



80CVSU, 3 to 5 HP


**Flange (ANSI 125 PSI F.F)**

inch					
$\phi$	e	f	t	n	h
3	6	7 <sup>1</sup> / <sub>2</sub>	<sup>3</sup> / <sub>4</sub>	4	<sup>3</sup> / <sub>4</sub>
mm					
$\phi$	e	f	t	n	h
80	152	191	19	4	19

**Dimensions: inch**

PHASE	SIZE d	MODEL	OUTPUT		PUMP & MOTOR									WEIGHT Lb
			kW	HP	A	B	C	D	E	F	H	J	L	
THREE	3	80CVSU62.2	2.2	3	17 <sup>3</sup> / <sub>8</sub>	12 <sup>15</sup> / <sub>16</sub>	12 <sup>15</sup> / <sub>16</sub>	4 <sup>1</sup> / <sub>2</sub>	9 <sup>1</sup> / <sub>4</sub>	8 <sup>1</sup> / <sub>8</sub>	28 <sup>5</sup> / <sub>8</sub>	6 <sup>5</sup> / <sub>16</sub>	6 <sup>1</sup> / <sub>8</sub>	112
		80CVSU63.7	3.7	5	17 <sup>3</sup> / <sub>8</sub>	12 <sup>15</sup> / <sub>16</sub>	12 <sup>15</sup> / <sub>16</sub>	4 <sup>1</sup> / <sub>2</sub>	9 <sup>1</sup> / <sub>4</sub>	8 <sup>1</sup> / <sub>8</sub>	28 <sup>5</sup> / <sub>8</sub>	6 <sup>5</sup> / <sub>16</sub>	6 <sup>1</sup> / <sub>8</sub>	132

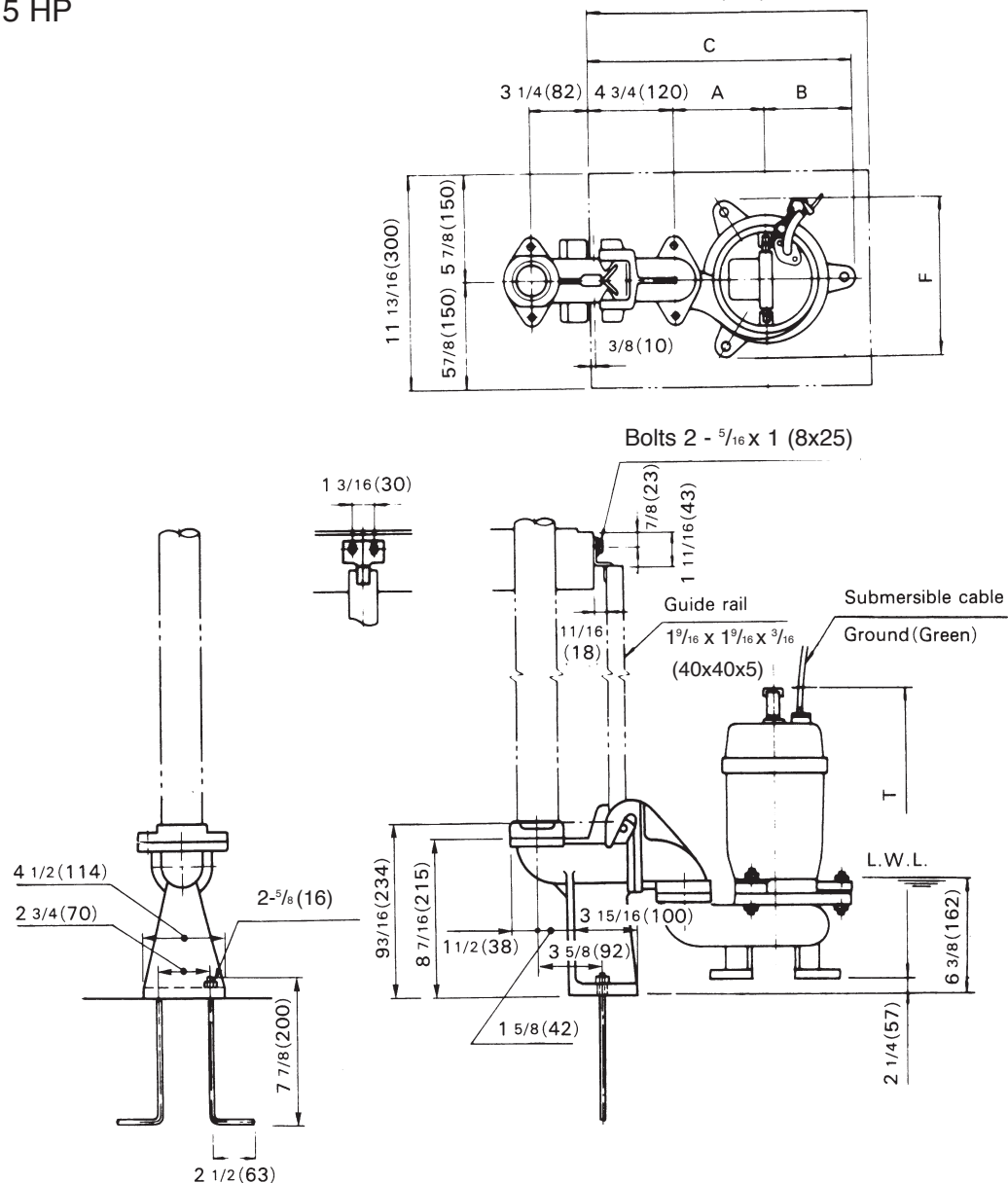
**Dimensions: mm**

PHASE	SIZE d	MODEL	OUTPUT		PUMP & MOTOR									WEIGHT kg
			kW	HP	A	B	C	D	E	F	H	J	L	
THREE	80	80CVSU62.2	2.2	3	442	328	328	114	235	206	727	160	155	51
		80CVSU63.7	3.7	5	442	328	328	114	235	206	727	160	155	60

**Model CVSU**
**EBARA PRO Cast Vortex Sewage Pumps**
**Dimensions**

Hot Water Pumps with Quick Discharge Connector  
50DVSHU, 1/2 to 5 HP

Minimum dimensions of manhole  
15 3/4 (400)


**Dimensions: inch**

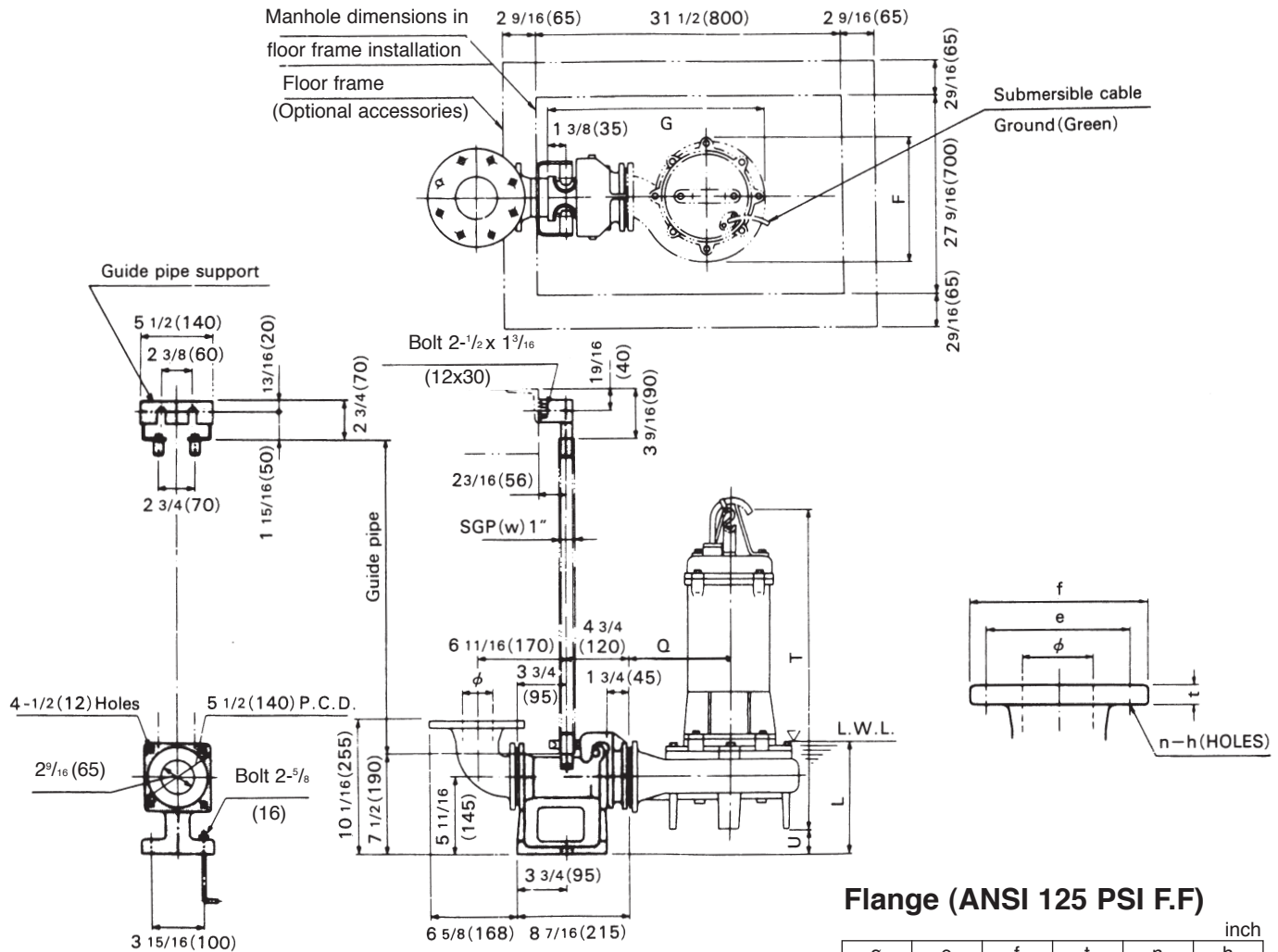
PHASE	SIZE Ø	PUMP MODEL	OUTPUT		Q.D.C. MODEL	PUMP & MOTOR					WEIGHT Lb	
			kW	HP		A	B	C	F	T	PUMP	Q.D.C.
THREE	2	50CVSHU6.4	0.4	1/2	LS50	4 9/16	3 9/16	12 5/8	6 5/16	15 7/16	31	20
		50CVSHU6.75	0.75	1	LS50	4 15/16	3 3/8	13 1/16	6 3/4	15 3/8	42	20
		50CVSHU61.5	1.5	2	LS50	4 15/16	3 3/8	13 1/16	6 3/4	17 5/16	60	20

**Dimensions: mm**

PHASE	SIZE Ø	PUMP MODEL	OUTPUT		Q.D.C. MODEL	PUMP & MOTOR					WEIGHT kg	
			kW	HP		A	B	C	F	T	PUMP	Q.D.C.
THREE	50	50CVSHU6.4	0.4	1/2	LS50	110	91	321	160	392	14	9
		50CVSHU6.75	0.75	1	LS50	125	86	331	171	391	19	9
		50CVSHU61.5	1.5	2	LS50	125	86	331	171	440	27	9

**Model CVSHU**
**EBARA PRO Cast Vortex Sewage Pumps**
**Dimensions**

Hot Water Pumps with Quick Discharge Connector  
80DVSHU, 1 to 5 HP


**Dimensions: inch**

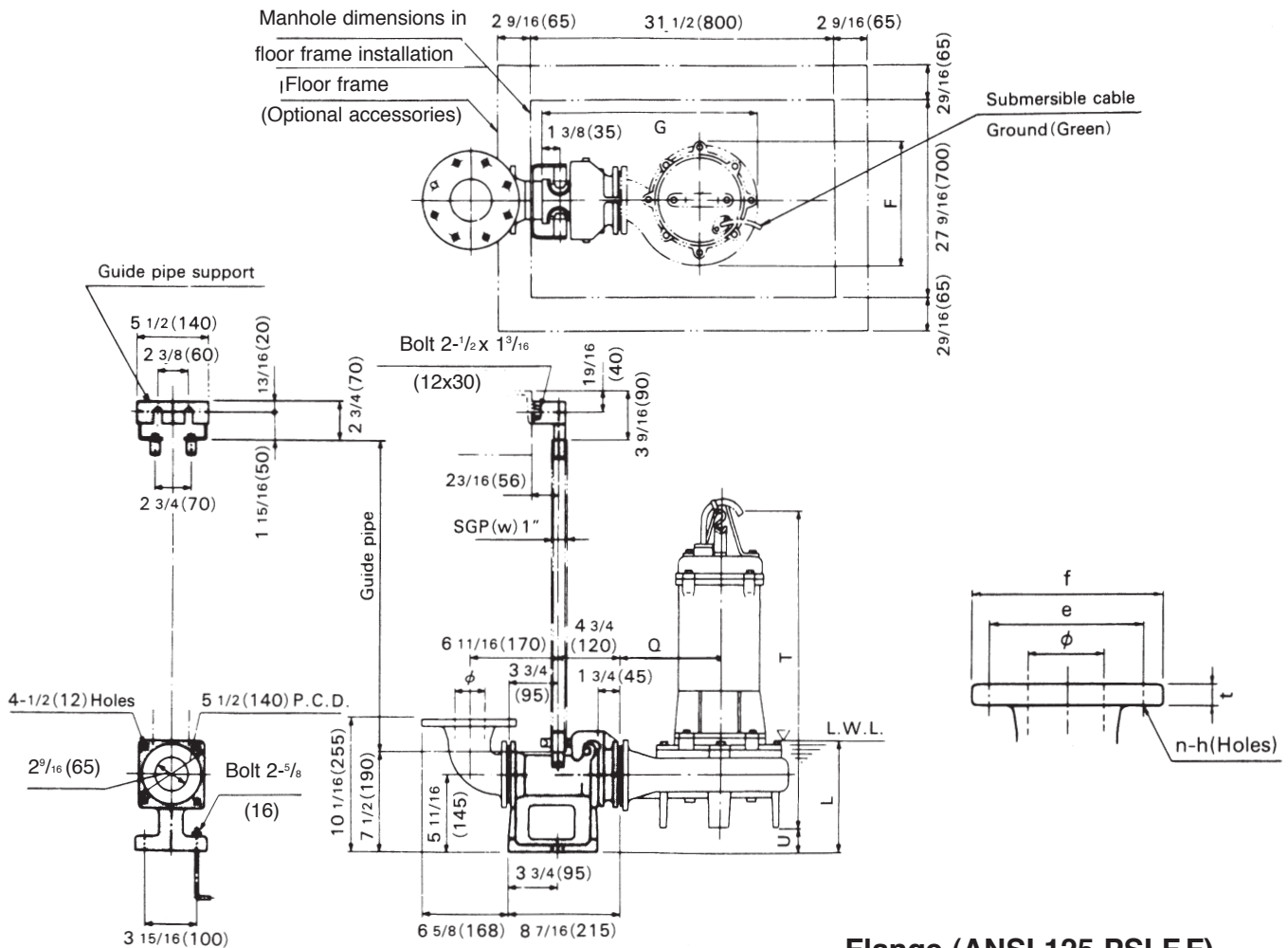
PHASE	SIZE ø	PUMP MODEL	OUTPUT		Q.D.C. MODEL	PUMP & MOTOR						WEIGHT Lb	
			kW	HP		F	G	L	Q	T	U	PUMP	Q.D.C.
THREE	3	80CVSHU6.75	0.75	1	LM65	8	15 <sup>11</sup> / <sub>16</sub>	7 <sup>3</sup> / <sub>4</sub>	5 <sup>11</sup> / <sub>16</sub>	18 <sup>3</sup> / <sub>8</sub>	2 <sup>13</sup> / <sub>16</sub>	57	31
		80CVSHU61.5	1.5	2	LM65	8	15 <sup>11</sup> / <sub>16</sub>	7 <sup>3</sup> / <sub>4</sub>	5 <sup>11</sup> / <sub>16</sub>	20 <sup>7</sup> / <sub>16</sub>	2 <sup>13</sup> / <sub>16</sub>	77	31
		80CVSHU62.2	2.2	3	LM65	12 <sup>15</sup> / <sub>16</sub>	16 <sup>7</sup> / <sub>8</sub>	8 <sup>1</sup> / <sub>16</sub>	6 <sup>5</sup> / <sub>16</sub>	25 <sup>7</sup> / <sub>8</sub>	1 <sup>15</sup> / <sub>16</sub>	112	31
		80CVSHU63.7	3.7	5	LM65	12 <sup>15</sup> / <sub>16</sub>	16 <sup>7</sup> / <sub>8</sub>	8 <sup>1</sup> / <sub>16</sub>	6 <sup>5</sup> / <sub>16</sub>	27 <sup>3</sup> / <sub>16</sub>	1 <sup>15</sup> / <sub>16</sub>	132	31

**Dimensions: mm**

PHASE	SIZE ø	PUMP MODEL	OUTPUT		Q.D.C. MODEL	PUMP & MOTOR						WEIGHT kg	
			kW	HP		F	G	L	Q	T	U	PUMP	Q.D.C.
THREE	80	80CVSHU6.75	0.75	1	LM65	203	398	197	145	467	72	26	14
		80CVSHU61.5	1.5	2	LM65	203	398	197	145	519	72	35	14
		80CVSHU62.2	2.2	3	LM65	328	429	204	160	658	49	51	14
		80CVSHU63.7	3.7	5	LM65	328	429	204	160	691	49	60	14

**Model CVSU**
**EBARA PRO Cast Vortex Sewage Pumps**
**Dimensions**

80CVSU, 3 to 5 HP with Quick Discharge Connector


**Dimensions: inch**

PHASE	SIZE ø	PUMP MODEL	OUTPUT		Q.D.C. MODEL	PUMP & MOTOR					WEIGHT Lb		
			kW	HP		F	G	L	Q	T	U	PUMP	Q.D.C.
THREE	3	80CVSU62.2	2.2	3	LM65	12 <sup>15</sup> / <sub>16</sub>	16 <sup>7</sup> / <sub>8</sub>	8 <sup>1</sup> / <sub>16</sub>	6 <sup>5</sup> / <sub>16</sub>	28 <sup>5</sup> / <sub>8</sub>	1 <sup>15</sup> / <sub>16</sub>	112	31
		80CVSU63.7	3.7	5	LM65	12 <sup>15</sup> / <sub>16</sub>	16 <sup>7</sup> / <sub>8</sub>	8 <sup>1</sup> / <sub>16</sub>	6 <sup>5</sup> / <sub>16</sub>	28 <sup>5</sup> / <sub>8</sub>	1 <sup>15</sup> / <sub>16</sub>	132	31

**Dimensions: mm**

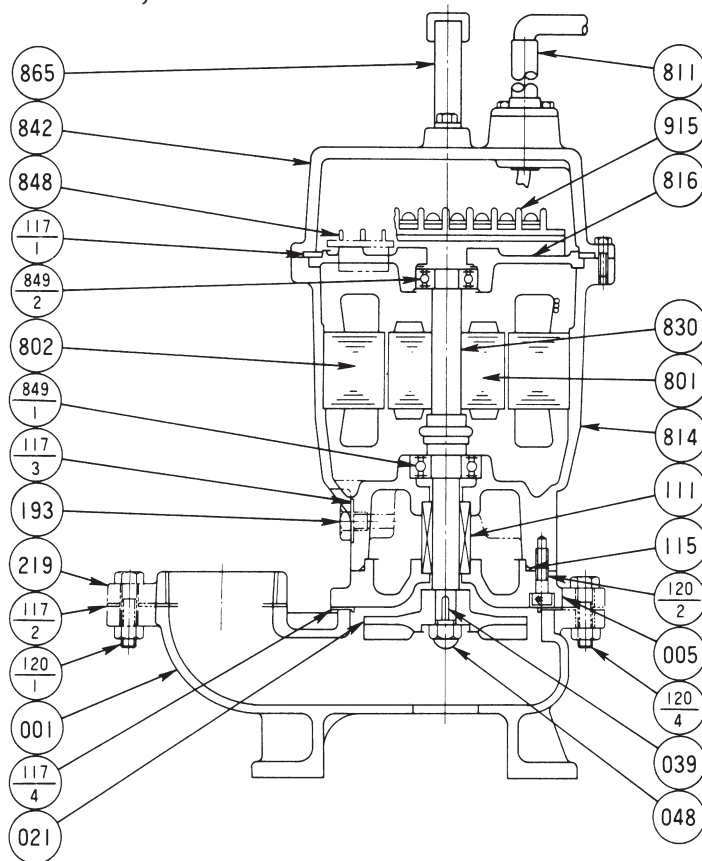
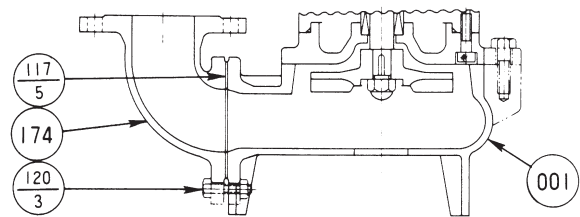
PHASE	SIZE ø	PUMP MODEL	OUTPUT		Q.D.C. MODEL	PUMP & MOTOR					WEIGHT kg		
			kW	HP		F	G	L	Q	T	U	PUMP	Q.D.C.
THREE	80	80CVSU62.2	2.2	3	LM65	328	429	204	160	727	49	51	14
		80CVSU63.7	3.7	5	LM65	328	429	204	160	727	49	60	14



**Model CVSHU**
**EBARA PRO Cast Vortex Sewage Pumps**
**Sectional View**

Hot Water Pumps

1/2 to 5 HP

**50CVSU, CVSHU**

**80CVSU, CVSHU**


PART NO.	PART NAME	MATERIAL	ASTM, AISI CODE	NO. FOR 1 UNIT
001	CASING	CAST IRON	A48 Class 30	1
005	INTERMEDIATE CASING	CAST IRON	A48 Class 30	1
021	IMPELLER	CAST IRON	A48 Class 30	1
039	KEY	420 STAINLESS	AISI420	1
048	IMPELLER NUT	STEEL	A283 Grade D	1
†111	MECHANICAL SEAL	—		1
†115	O-RING	RUBBER (NBR)		1
†117-1	GASKET	RUBBER (NBR)		1
†117-2	GASKET	RUBBER (CR or NBR)		1
†117-3	GASKET			1
†117-4	GASKET	RUBBER (NR)		1
†117-5	GASKET			1
120-1	BOLT	304 STAINLESS	AISI304	2
120-2	BOLT	304 STAINLESS	AISI304	3 or 4
120-3	BOLT	304 STAINLESS	AISI304	4
120-4	BOLT	304 STAINLESS	AISI304	3 or 4

PART NO.	PART NAME	MATERIAL	ASTM, AISI CODE	NO. FOR 1 UNIT
174	DISCHARGE ELBOW	CAST IRON	A48 Class 30	1
193	OIL PLUG	316 STAINLESS	AISI 304	1
219	COMPANION FLANGE	CAST IRON	A48 Class 30	1
801	ROTOR	—		1
802	STATOR	—		1
811	SUBMERSIBLE CABLE	—		1
814	MOTOR FRAME	CAST IRON	A48 Class 30	1
816	BRACKET	CAST IRON	A48 Class 30	1
830	SHAFT	403 STAINLESS	AISI403	1
842	MOTOR COVER	CAST IRON	A48 Class 30	1
848	MOTOR PROTECTOR	—		1
†849-1	BALL BEARING	—		1
†849-2	BALL BEARING	—		1
865	HANDLE	304 STAINLESS	AISI304	1
915	EXTERNAL TERMINAL	—		1

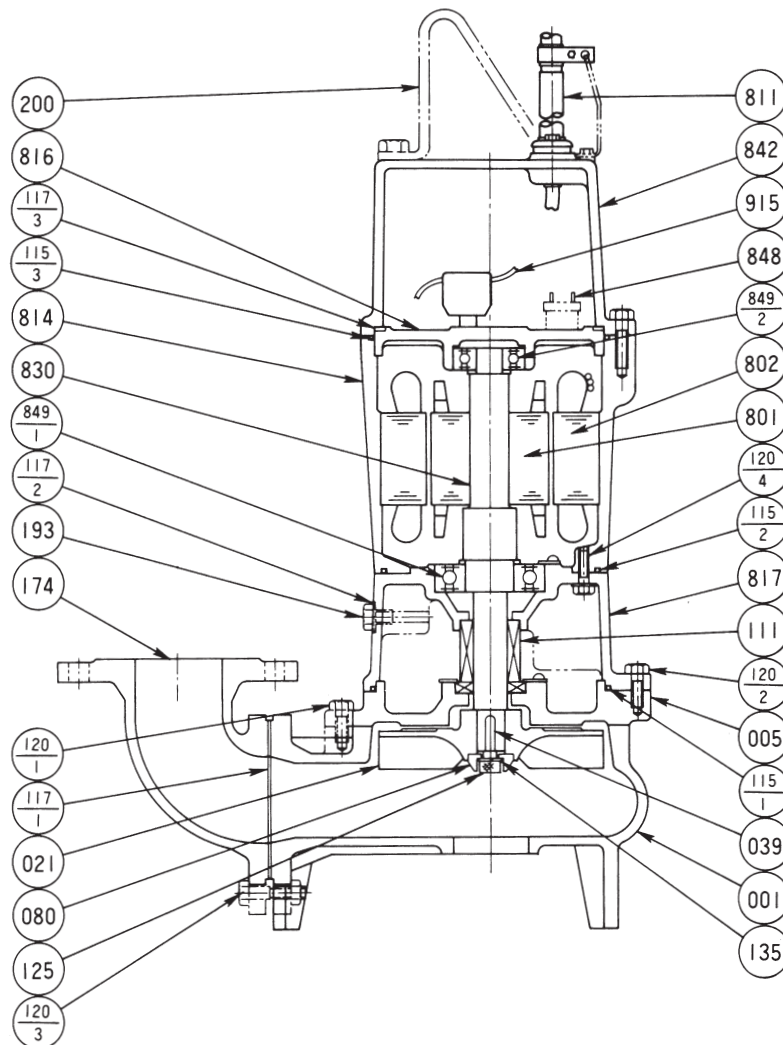
Motors are purchased as a complete unit.

Parts No. 915 is not installed for CVSHU.

†: Recommended spare parts.

**Model CVSU**
**EBARA PRO Cast Vortex Sewage Pumps**
**Sectional View**

Hot Water Pumps  
3 to 5 HP



Motors are purchased as a complete unit.

Parts No. 915 is not installed for CVSHU.

PART NO.	PART NAME	MATERIAL	ASTM, AISI CODE	NO. FOR 1 UNIT	PART NO.	PART NAME	MATERIAL	ASTM, AISI CODE	NO. FOR 1 UNIT
001	CASING	CAST IRON	A48 Class 30	1	135	WASHER	304 STAINLESS	AISI304	1
005	INTERMEDIATE CASING	CAST IRON	A48 Class 30	1	174	DISCHARGE ELBOW	CAST IRON	A48 Class 30	1
021	IMPELLER	CAST IRON	A48 Class 30	1	193	OIL PLUG	316 STAINLESS	AISI316	1
039	KEY	420 STAINLESS	AISI420	1	200	LIFTING HANGER	STEEL	A283 Grade D	1
080	BUSHING	STEEL	A283 Grade D	1	801	ROTOR	—	—	1
†111	MECHANICAL SEAL	—	—	1	802	STATOR	—	—	1
†115-1	O-RING	RUBBER (NBR)	—	1	811	SUBMERSIBLE CABLE	—	—	1
†115-2	O-RING	RUBBER (NBR)	—	1	814	MOTOR FRAME	CAST IRON	A48 Class 30	1
†115-3	O-RING	RUBBER (NBR)	—	2	816	BRACKET	CAST IRON	A48 Class 30	1
†117-1	GASKET	—	—	1	817	BRACKET	CAST IRON	A48 Class 30	1
†117-2	GASKET	—	—	1	830	SHAFT	403 STAINLESS	AISI403	1
†117-3	GASKET	RUBBER (NBR)	—	1	842	MOTOR COVER	CAST IRON	A48 Class 30	1
120-1	BOLT	304 STAINLESS	AISI304	4	848	MOTOR PROTECTOR	—	—	1
120-2	BOLT	304 STAINLESS	AISI304	4	†849-1	BALL BEARING	—	—	1
120-3	BOLT	304 STAINLESS	AISI304	4	†849-2	BALL BEARING	—	—	1
120-4	BOLT	304 STAINLESS	AISI304	4	915	EXTERNAL TERMINAL	—	—	1
125	BOLT	304 STAINLESS	AISI304	1					

†: Recommended spare parts.