



**Horizontal Stainless Steel  
Centrifugal Pumps**

# THM/THMS TSM/TSMS



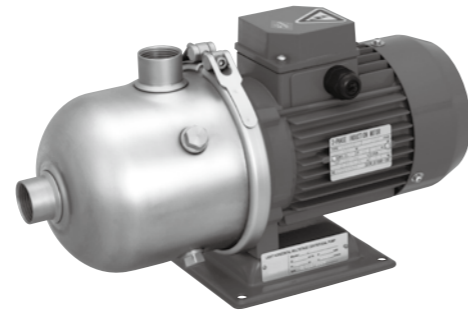
# THM/THMS-series

## Horizontal Stainless Steel Multistage Centrifugal Pump

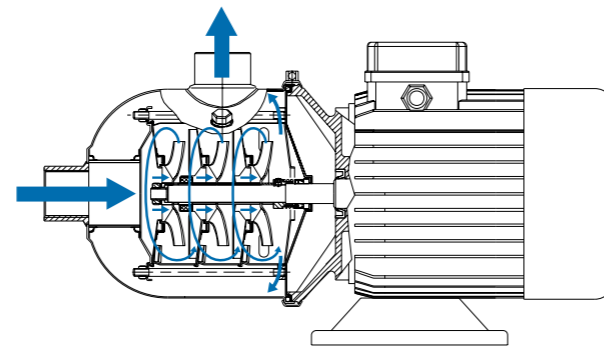
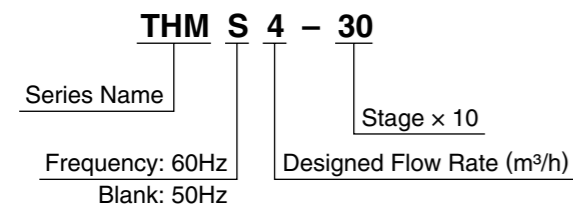
Tsurumi THM/THMS-series is a horizontal multistage centrifugal pump designed for handling freshwater. Major pump components are made of 304 stainless steel, which make it lightweight and enable to protect the pumped liquid from contamination caused by rust.

### Applications

- Irrigating Agricultural Farm
- Supplying and Distributing Industrial Water
- Circulating Cold and Warm Water



### Model Number Designation



Water flow in the main unit

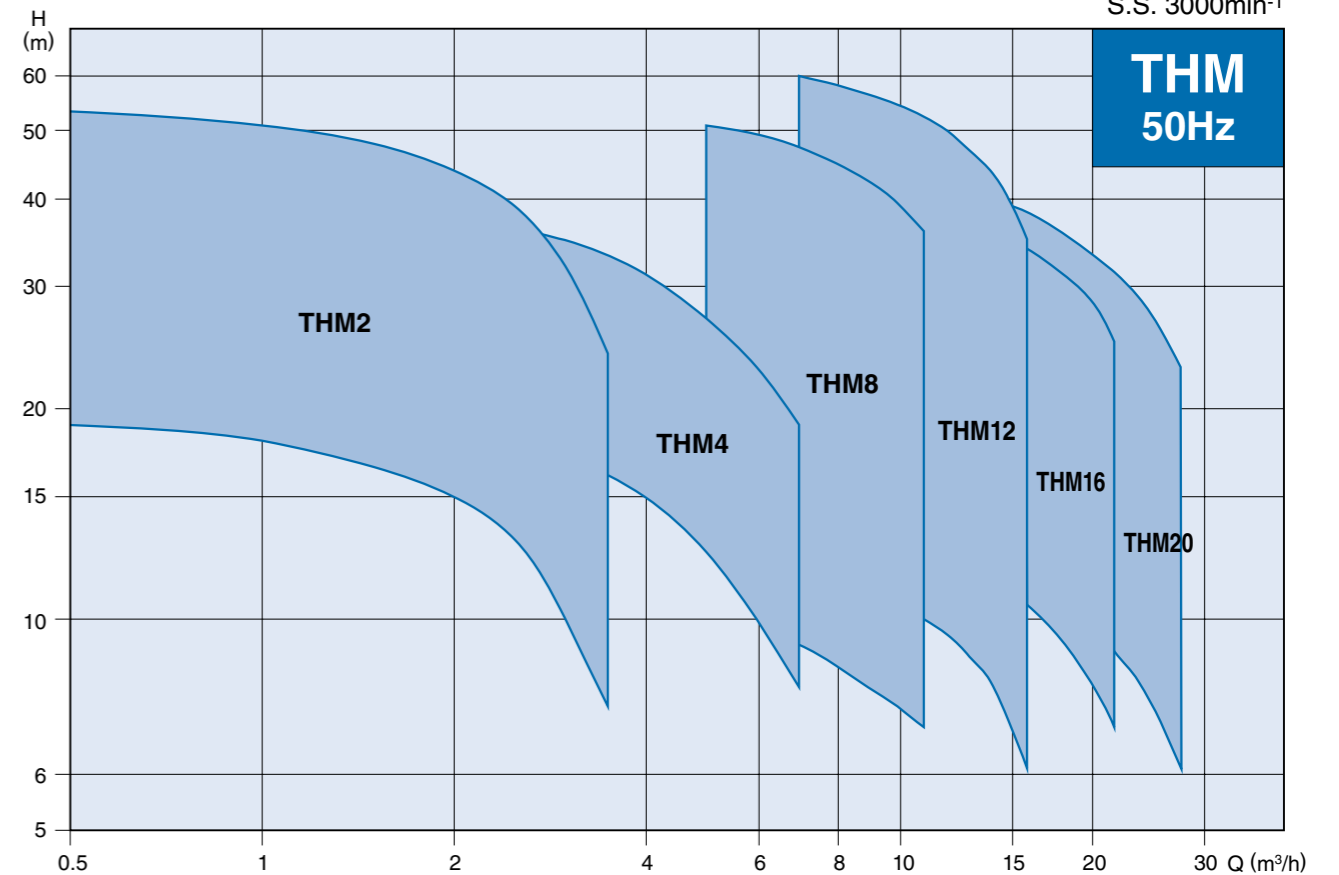
### Major Standard Specifications

Inlet x Outlet Bore		mm	25 x 25	32 x 25	50 x 50
Liquid	Type	Freshwater			
	Temperature	-15 to 70°C			
Pump	Structure	Impeller	Closed		
		Shaft Seal	Mechanical Seal		
	Materials	Impeller	304 Stainless Steel		
		Casing	304 Stainless Steel		
	Shaft Seal	Silicon Carbide			
Motor	Type, Pole		TEFC, 2-pole		
	Motor Enclosure		IP55		
	Insulation		Class F		
	Phase		Single-phase (up to 2.4kW) Three-phase		
	Starting Method	Single-phase	Capacitor Start (0.55kW and below) Capacitor Start + Capacitor Run		
		Three-phase	D.O.L.		
	Materials	Frame	Aluminium Alloy Die-casting		
Shaft		304 Stainless Steel			
Inlet & Outlet Connection		Screw			

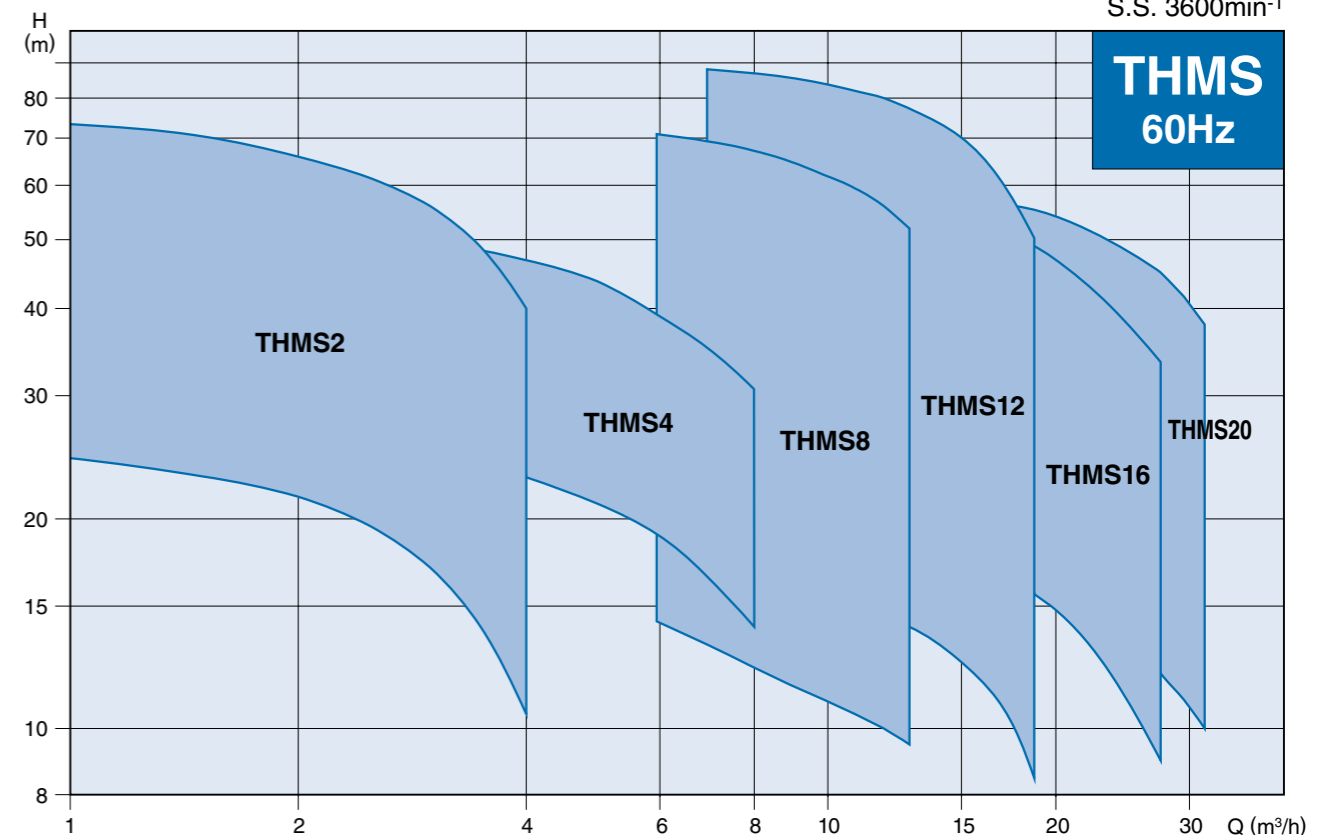
## Performance Range

ISO9906 Annex A

S.S. 3000min<sup>-1</sup>

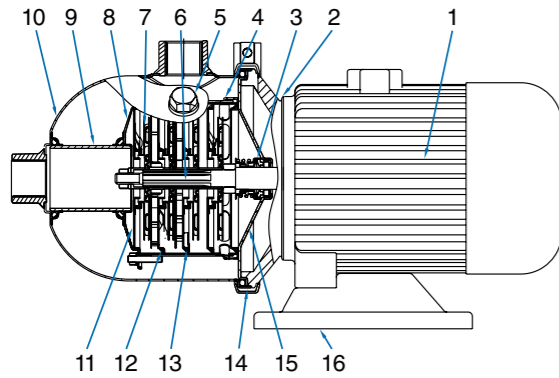


S.S. 3600min<sup>-1</sup>

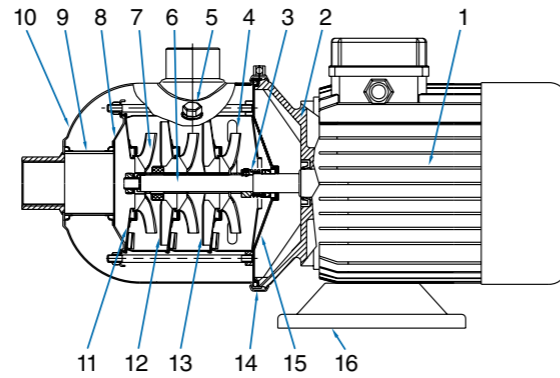


# Cross-Section

THM / THMS 2 · 4



THM / THMS 8 · 12 · 16 · 20

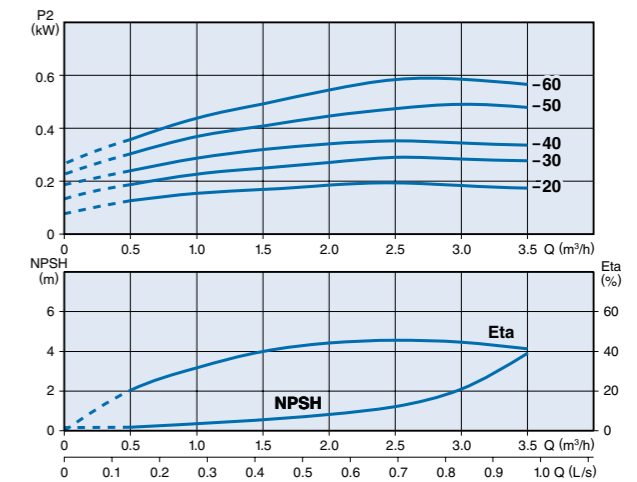
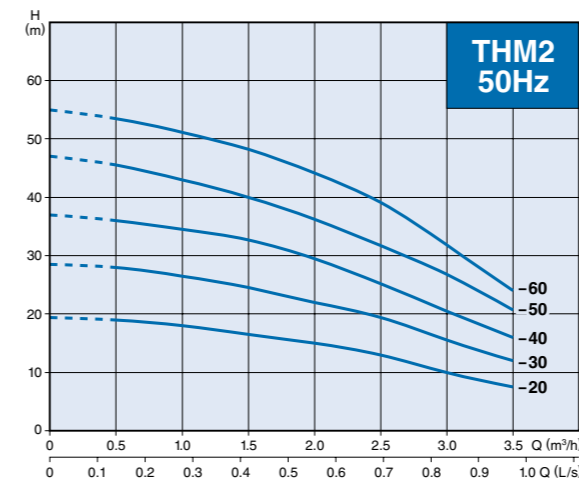


No.	Description	Material
1	Motor	
2	Motor End Cover	Aluminium Alloy Die-casting
3	Mechanical Seal	Silicon Carbide
4	Discharge Diffuser	304 Stainless Steel
5	Air Bent Plug	304 Stainless Steel
6	Shaft	304 Stainless Steel
7	Impeller	304 Stainless Steel
8	Clamp Plate	304 Stainless Steel
9	Connection Pipe	304 Stainless Steel
10	Inlet & Outlet Chamber	304 Stainless Steel
11	Inducer	304 Stainless Steel
12	Support Diffuser	304 Stainless Steel
13	Diffuser	304 Stainless Steel
14	Span Band	304 Stainless Steel
15	Seal Plate	304 Stainless Steel
16	Base Plate	Carbon Steel

## Performance Data

# THM2

### Performance Curves



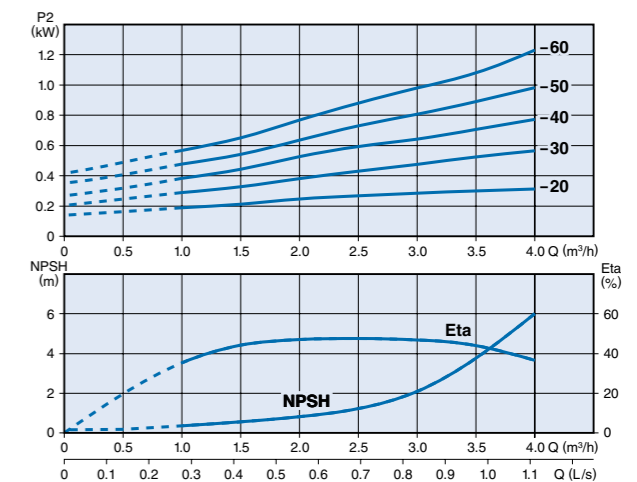
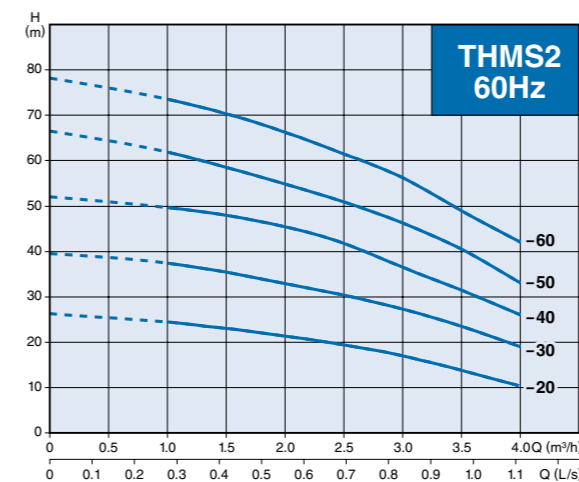
### Performance Table

Model	Inlet x Outlet Bore (mm)	Motor Output (kW)	Q (m³/h)	0.5	1.0	1.5	2.0	2.5	3.0	3.5
THM2-20	25 x 25	0.37	H (m)	19	18	16.5	15	13	10	7.5
THM2-30	25 x 25	0.55		28	26.5	24.5	22	19	15.5	12
THM2-40	25 x 25	0.55		36	34.5	33	29	25	20.5	16
THM2-50	25 x 25	0.55		45.5	43	40	36	31.5	26.5	20.5
THM2-60	25 x 25	0.75		53.5	51	48	44	39	32	24

## Performance Data

# THMS2

### Performance Curves

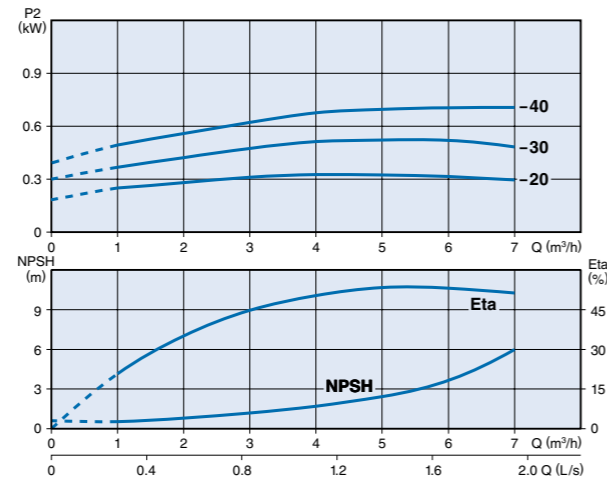
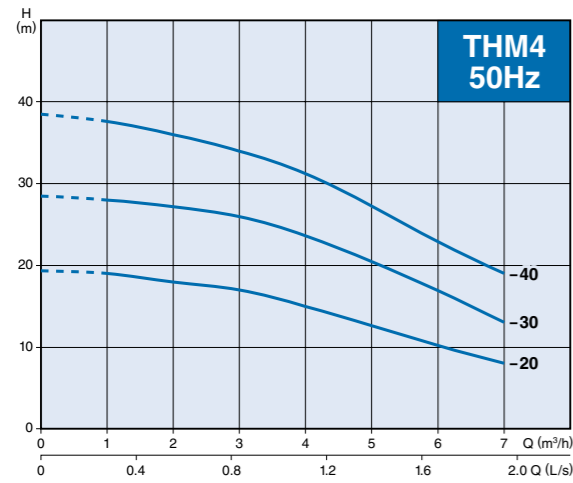


### Performance Table

Model	Inlet x Outlet Bore (mm)	Motor Output (kW)	Q (m³/h)	1.0	1.5	2.0	2.5	3.0	3.5	4.0
THMS2-20	25 x 25	0.55	H (m)	24.5	23	21.5	19.5	17	14	10.5
THMS2-30	25 x 25	0.75		37.5	35.5	33	30.5	27.5	23.5	19
THMS2-40	25 x 25	1.1		49.5	48	45.5	42	36	32	26
THMS2-50	25 x 25	1.1		62	58.5	55	51	46	40.5	33
THMS2-60	25 x 25	1.5		73.5	70.5	66	61.5	56	49	40

# THM4

## Performance Curves

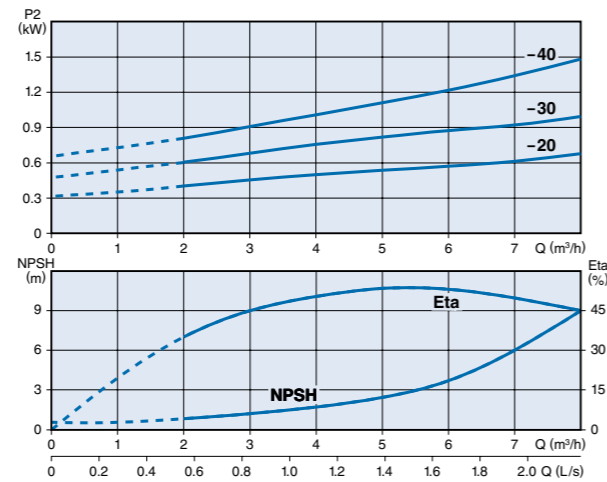
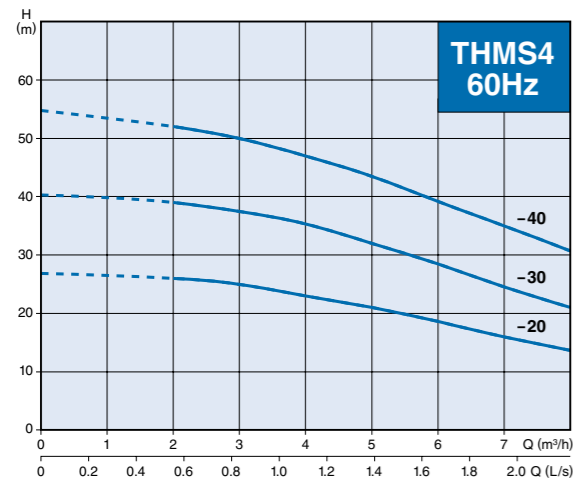


## Performance Table

Model	Inlet x Outlet Bore (mm)	Motor Output (kW)	Q (m³/h)	1	2	3	4	5	6	7
THM4-20	32 x 25	0.55	H (m)	19	18	17	15	12.5	10	8
THM4-30	32 x 25	0.75		28	27	26	23.5	20.5	17	13
THM4-40	32 x 25	0.75		37.5	36	34	31	27	23	19

# THMS4

## Performance Curves

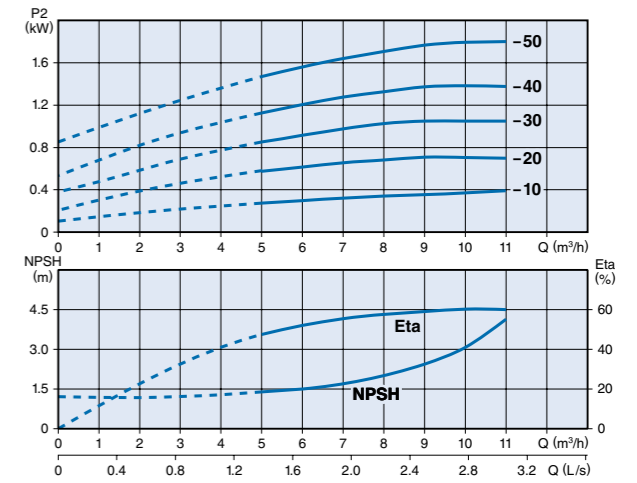
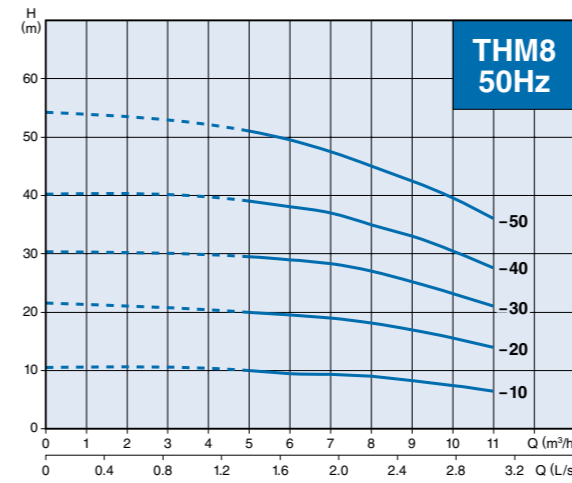


## Performance Table

Model	Inlet x Outlet Bore (mm)	Motor Output (kW)	Q (m³/h)	2	3	4	5	6	7	8
THMS4-20	32 x 25	0.75	H (m)	26	25	23	21	19	16	14
THMS4-30	32 x 25	1.1		39	37.5	36	32	28	24	21
THMS4-40	32 x 25	1.5		52	50	47	43.5	38.5	35	31

# THM8

## Performance Curves

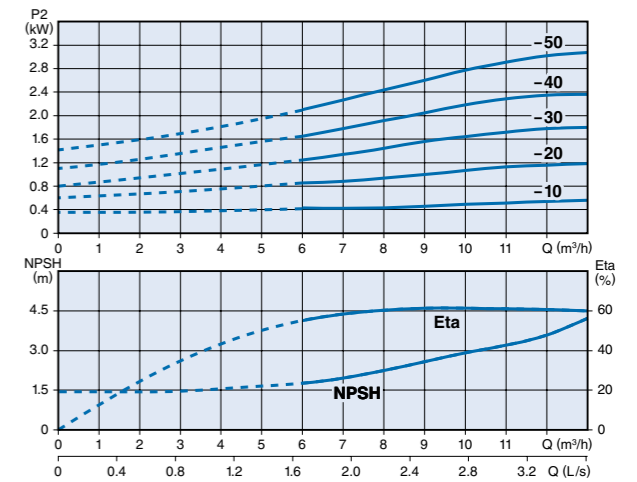
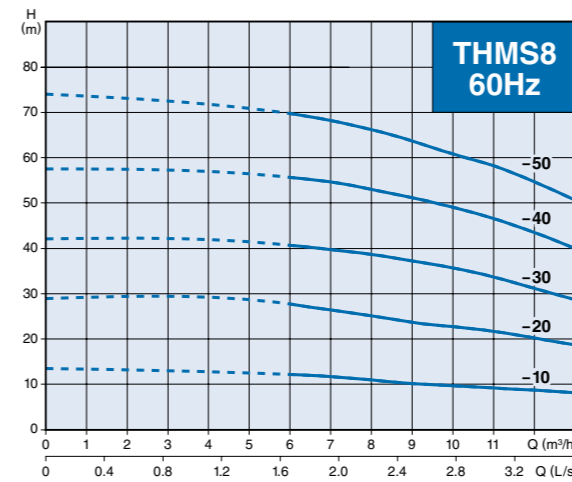


## Performance Table

Model	Inlet x Outlet Bore (mm)	Motor Output (kW)	Q (m³/h)	5	6	7	8	9	10	11
THM8-10	50 x 50	0.75	H (m)	10	9.5	9.3	9	8	7.5	7
THM8-20	50 x 50	0.75		20	19.5	19	18	17	15.5	14
THM8-30	50 x 50	1.1		29.5	29	28	27	25	23	21
THM8-40	50 x 50	1.5		39	38	37	35	33	30.5	27.5
THM8-50	50 x 50	2.2		51	49.5	47.5	45	42.5	39.5	36

# THMS8

## Performance Curves

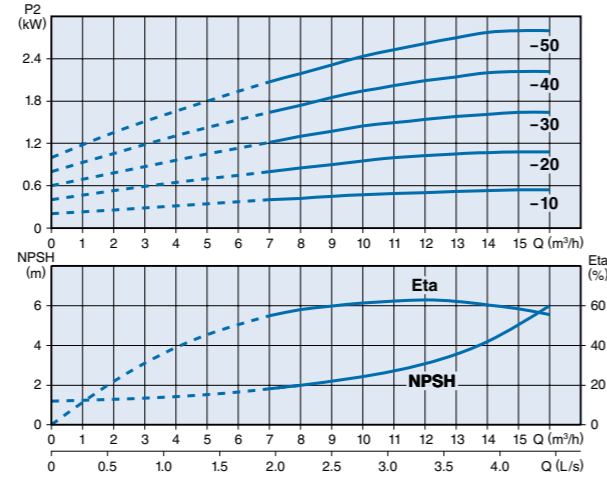
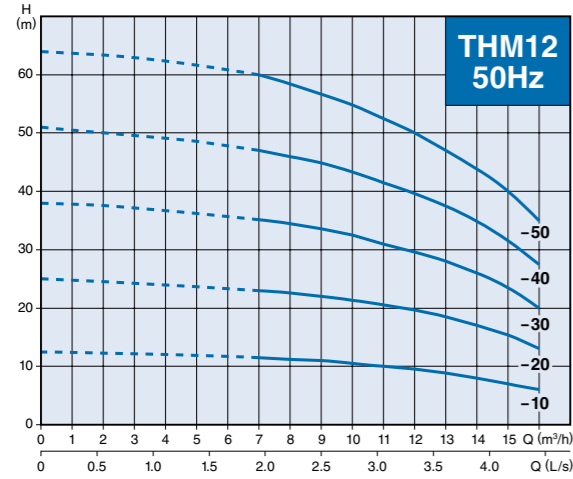


## Performance Table

Model	Inlet x Outlet Bore (mm)	Motor Output (kW)	Q (m³/h)	6	7	8	9	10	11	12	13
THMS8-10	50 x 50	0.75	H (m)	14.5	13	12	11.5	11	10.5	10	9.5
THMS8-20	50 x 50	1.5		29	27	26	25	24	23	21.5	20
THMS8-30	50 x 50	2.2		42	41	40	39	37	35	33	30
THMS8-40	50 x 50	3		55.5	54.5	53	51	49	46.5	43.5	40
THMS8-50	50 x 50	3		71	69.5	67.5	65	63	59	56	52

# THM12

## Performance Curves

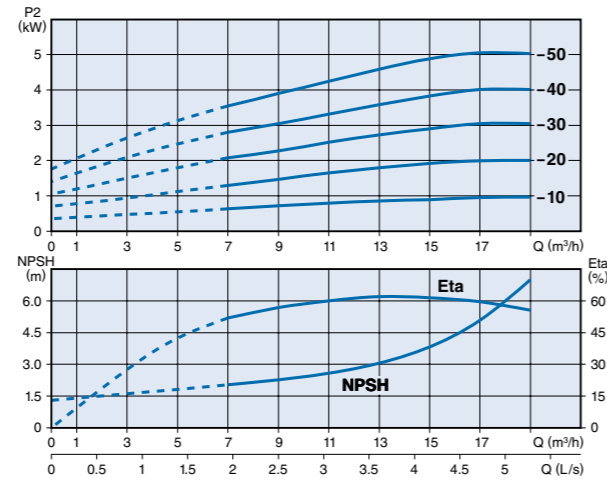
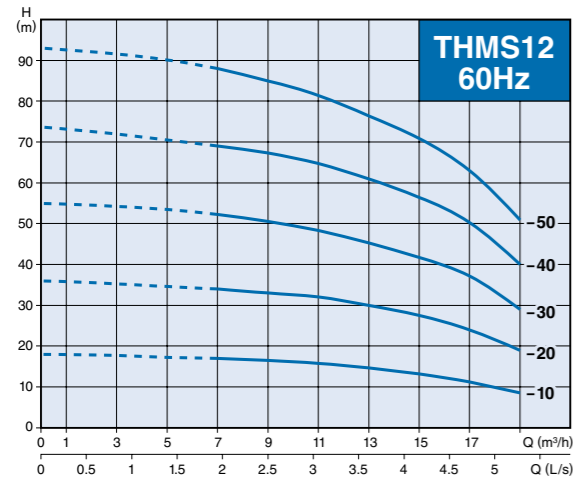


## Performance Table

Model	Inlet x Outlet Bore (mm)	Motor Output (kW)	Q (m³/h)	7	8	9	10	11	12	13	14	15	16
THM12-10	50 x 50	0.75	H (m)	11.5	11.2	11	10.5	10	9.5	9	8	7	6
THM12-20	50 x 50	1.2		23	22.5	22	21.5	20.5	19.5	18.5	17	15.5	13
THM12-30	50 x 50	1.8		35	34.5	33.5	32.5	31	29.5	28	26	23.5	20
THM12-40	50 x 50	2.4		47	46	45	43.5	41.5	39.5	37.5	35	31.5	27.5
THM12-50	50 x 50	3		60	58	56.5	55	52.5	50	47	44	40	35

# THMS12

## Performance Curves

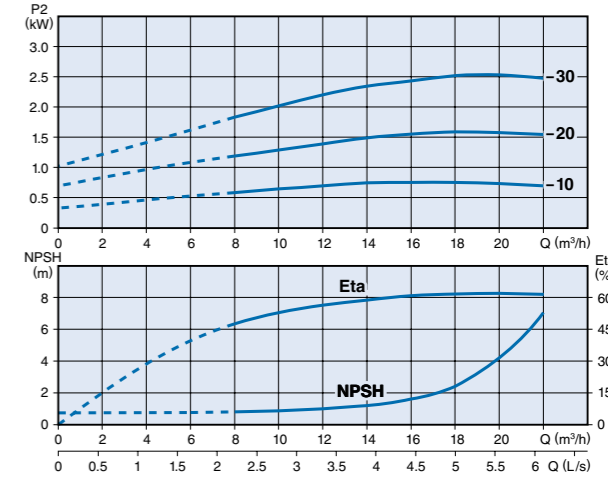
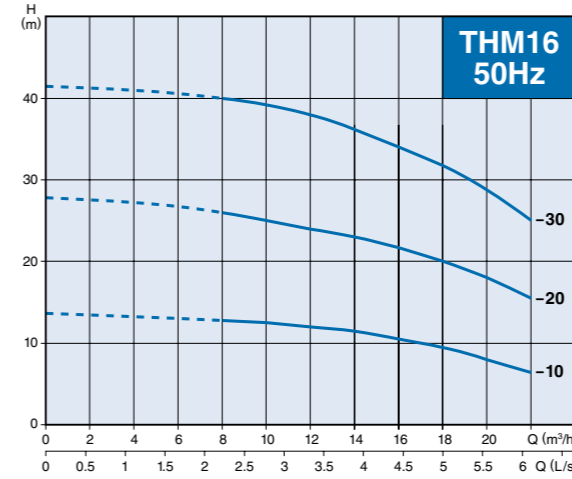


## Performance Table

Model	Inlet x Outlet Bore (mm)	Motor Output (kW)	Q (m³/h)	7	9	11	12	13	15	17	19
THMS12-10	50 x 50	1.1	H (m)	17	16	15	14.5	14	12.5	11	8.5
THMS12-20	50 x 50	2.2		34	33	32	31	30	27	24.5	19
THMS12-30	50 x 50	3		52.5	50	48.5	47	45	41.5	37.5	29
THMS12-40	50 x 50	4		69	67.5	65	63	60.5	55	49.5	40
THMS12-50	50 x 50	5.5		88	85	82	80	76	70	62	50.5

# THM16

## Performance Curves

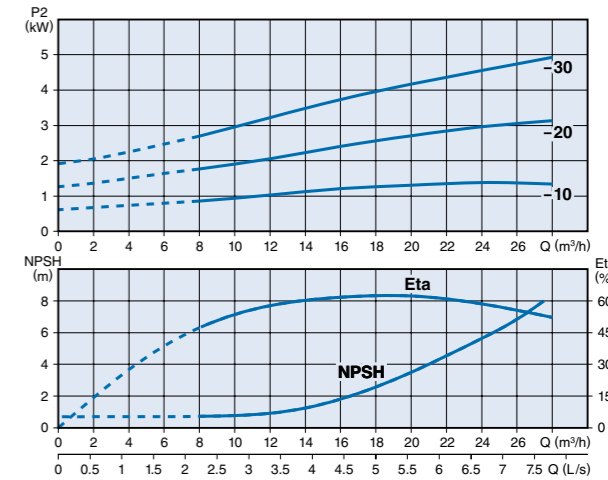
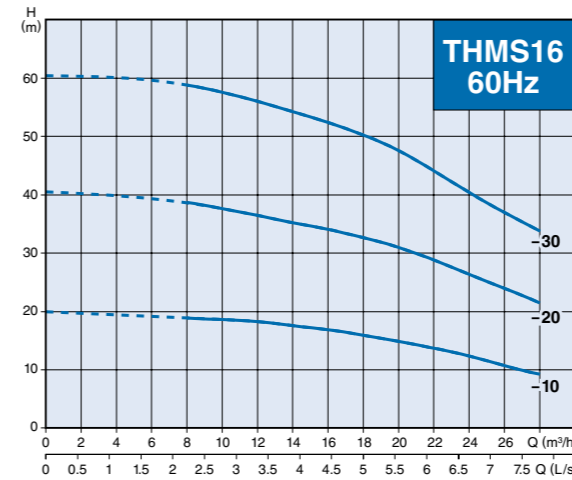


## Performance Table

Model	Inlet x Outlet Bore (mm)	Motor Output (kW)	Q (m³/h)	8	10	12	14	16	18	20	22
THM16-10	50 x 50	1.1	H (m)	12.8	12.5	12	11.5	10.5	9.5	8	7
THM16-20	50 x 50	2.2		26	25	24	23	21.7	20	18	15.5
THM16-30	50 x 50	3		40	39	38	36	34	31.5	29	25

# THMS16

## Performance Curves



## Performance Table

Model	Inlet x Outlet Bore (mm)	Motor Output (kW)	Q (m³/h)	8	12	16	20	24	28
THMS16-10	50 x 50	2.2	H (m)	19	18	17	15	12	9
THMS16-20	50 x 50	4		38.5	36.5	34	31	26	21.5
THMS16-30	50 x 50	5.5		59	56	53.5	47.5	40.3	33.5



# TSM/TSMS-series

## Horizontal Stainless Steel Single-stage Centrifugal Pump

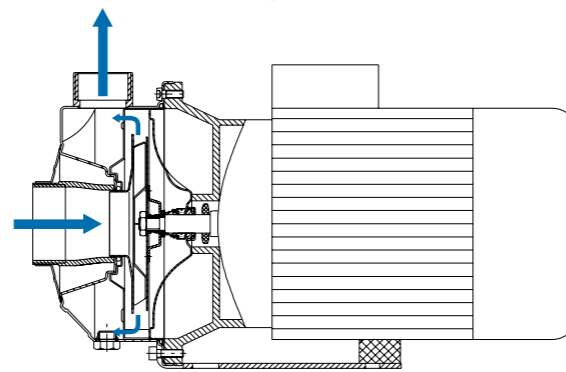
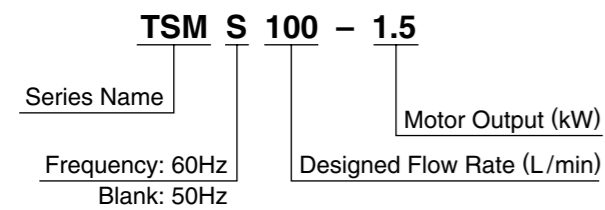
Tsurumi TSM/TSMS-series is a horizontal single-stage centrifugal pump designed for handling freshwater. Major pump components are made of 304 stainless steel, which make it lightweight and enable to protect the pumped liquid from contamination caused by rust. Screwed inlet and outlet ports provide convenient connections.

### Applications

- Irrigating Agricultural Farm
- Supplying and Distributing Industrial Water
- Circulating Cold and Warm Water



### Model Number Designation



Water flow in the main unit

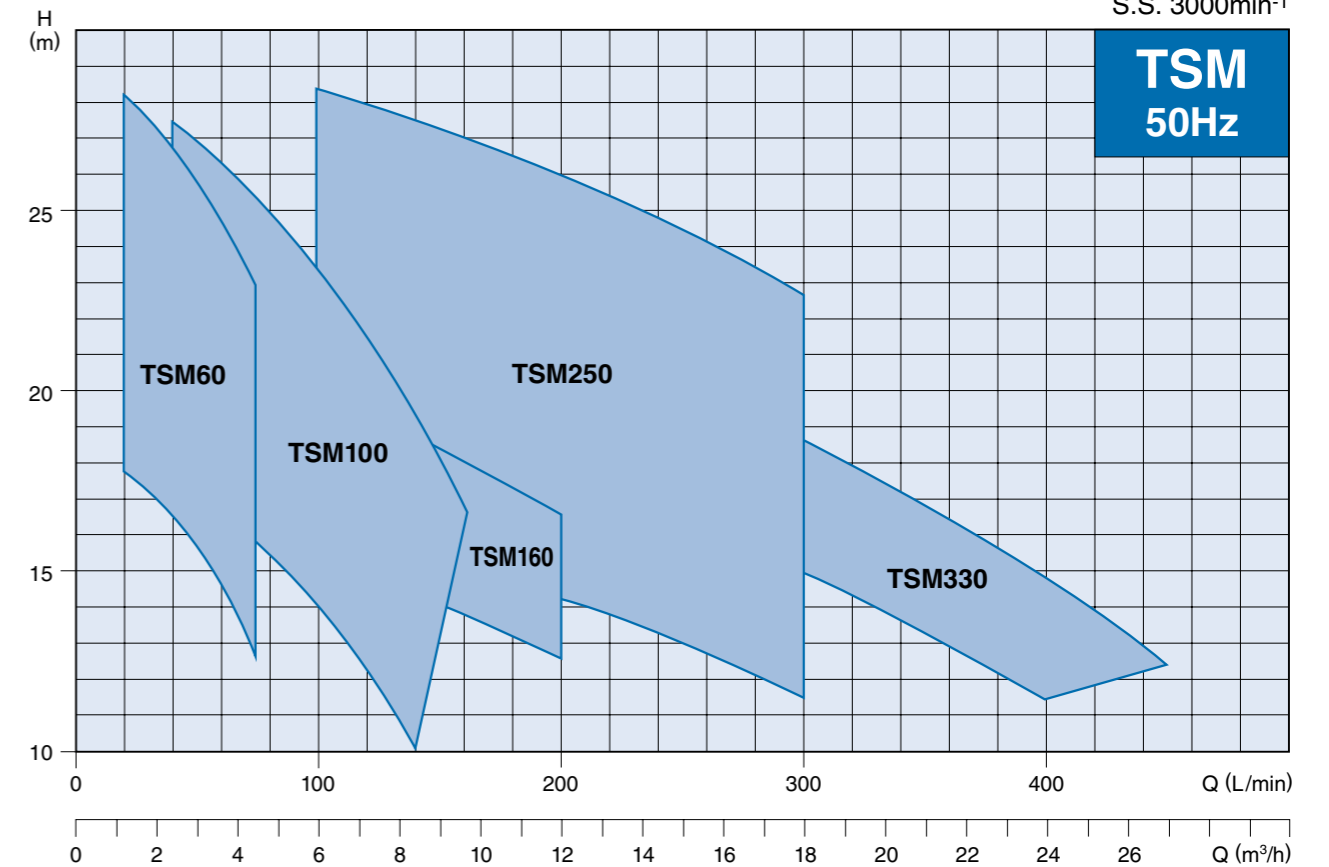
### Major Standard Specifications

Inlet x Outlet Bore		mm	32 x 25	40 x 32	50 x 32
Liquid	Type	Freshwater			
	Temperature	-10 to 85°C			
Pump	Structure	Impeller	Closed		
		Shaft Seal	Mechanical Seal		
	Materials	Impeller	304 Stainless Steel		
		Casing	304 Stainless Steel		
Shaft Seal	Silicon Carbide				
Motor	Type, Pole	TEFC, 2-pole			
	Motor Enclosure	IP55			
	Insulation	Class F			
	Phase	Single-phase			
		Three-phase			
	Starting Method	Single-phase	Capacitor Start (0.55kW and below) Capacitor Start + Capacitor Run		
Three-phase		D.O.L.			
Materials	Frame	Aluminium Alloy Die-casting			
	Shaft	304 Stainless Steel			
Inlet & Outlet Connection		Screw			

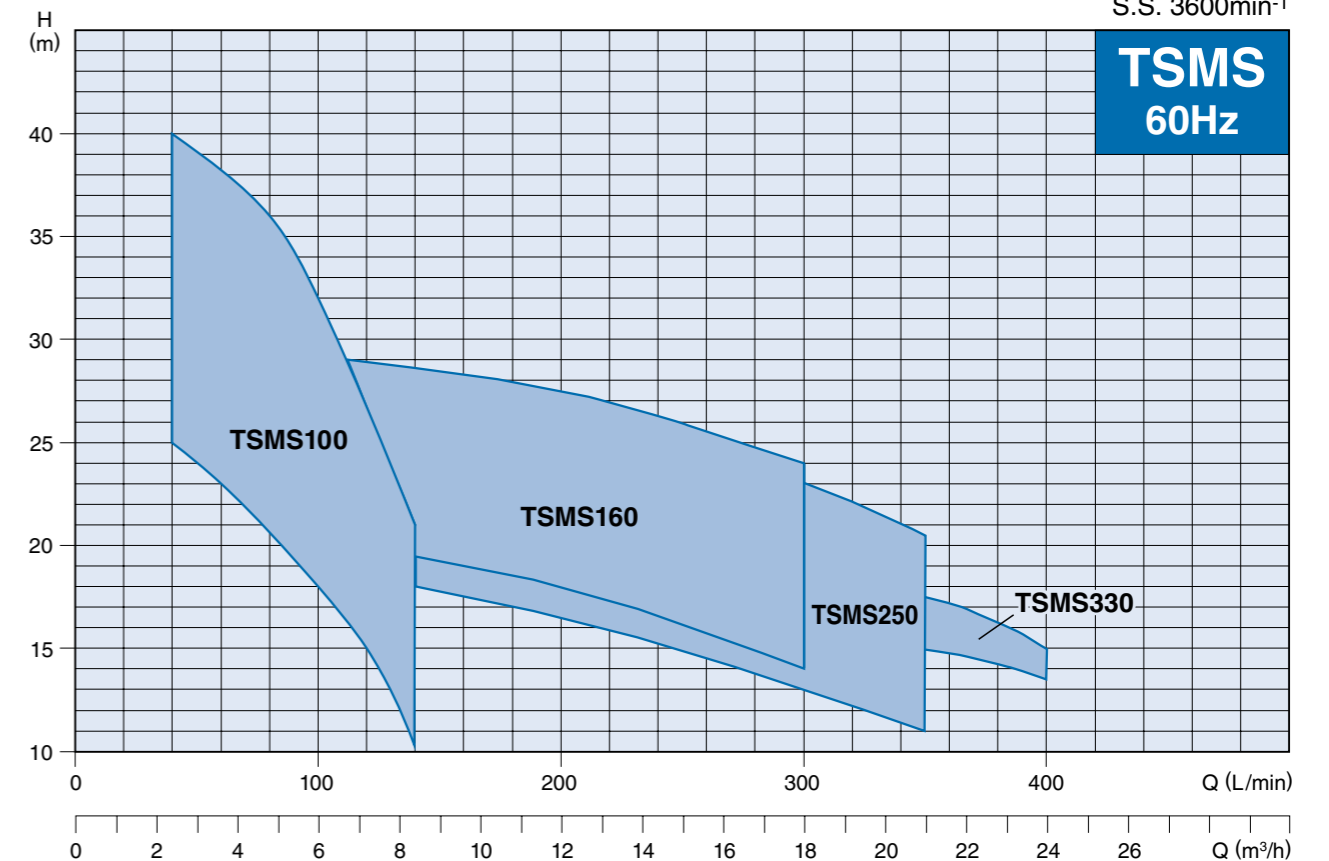
## Performance Range

ISO9906 Annex A

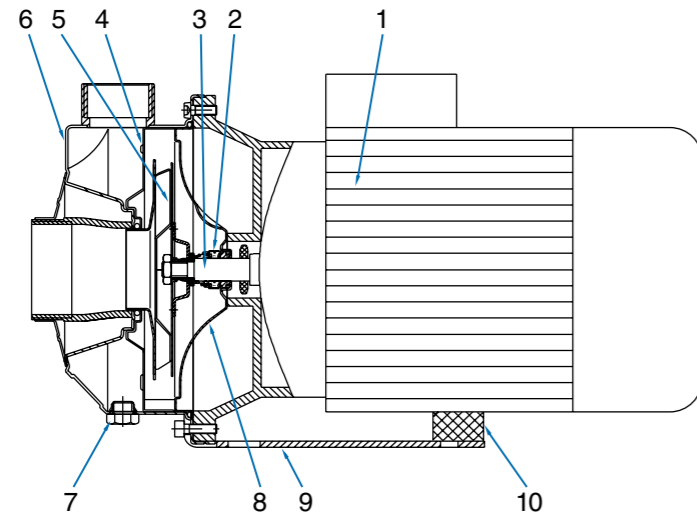
S.S. 3000min<sup>-1</sup>



S.S. 3600min<sup>-1</sup>



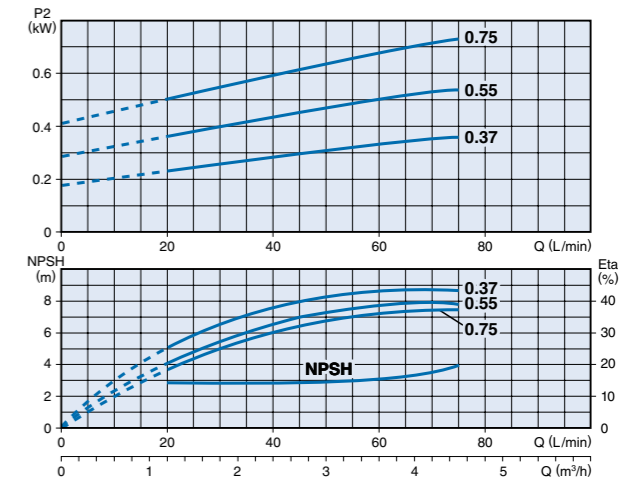
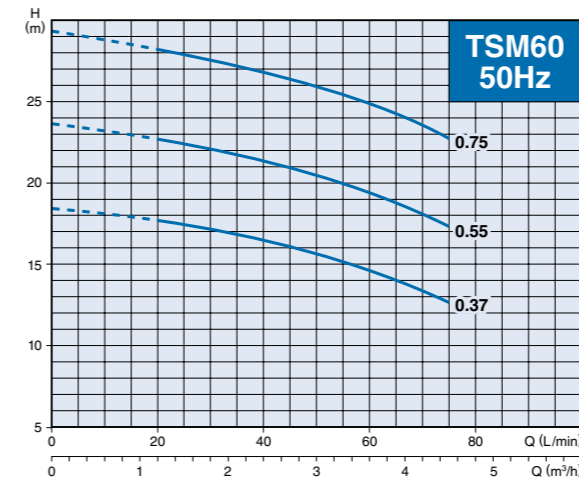
# Cross-Section



No.	Description	Material
1	Motor	
2	Mechanical Seal	Silicon Carbide
3	Shaft	304 Stainless Steel
4	Diffuser	304 Stainless Steel
5	Impeller	304 Stainless Steel
6	Inlet & Outlet Chamber	304 Stainless Steel
7	Drain Plug	304 Stainless Steel
8	Seal Plate	304 Stainless Steel
9	Base Plate	Carbon Steel
10	Support Foot	NBR

# Performance Data TSM60

## Performance Curves



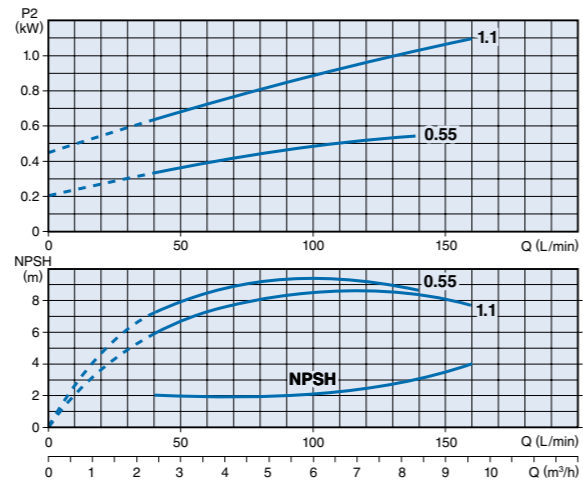
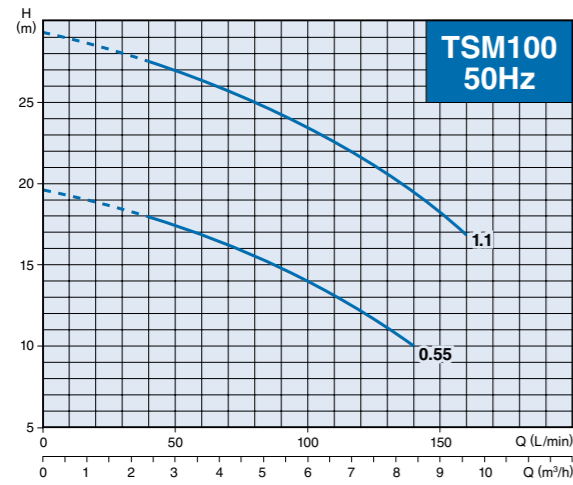
## Performance Table

Model	Inlet x Outlet Bore (mm)	Motor Output (kW)	Q (L/min) Q (m³/h)	20	40	60	75
				H (m)			
TSM60-0.37	32 x 25	0.37		17.7	16.4	14.6	12.7
TSM60-0.55	32 x 25	0.55		22.7	21.3	19.5	17.3
TSM60-0.75	32 x 25	0.75		28.2	26.8	25	22.8



# TSM100

## Performance Curves

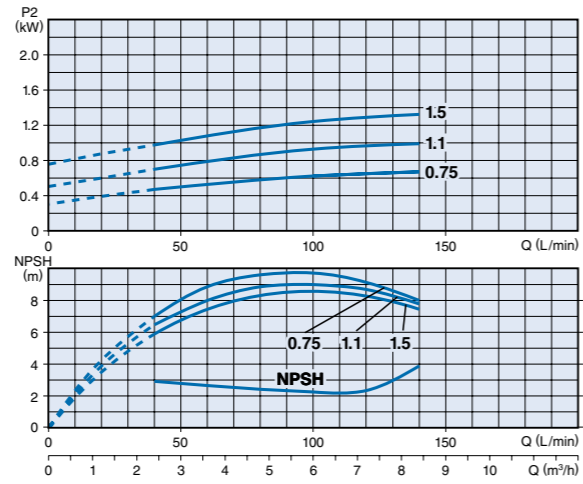
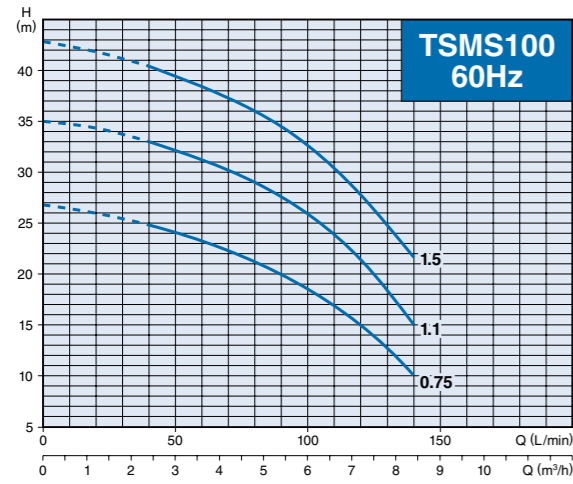


## Performance Table

Model	Inlet x Outlet Bore (mm)	Motor Output (kW)	Q (L/min) Q (m³/h)	40	60	80	100	120	140	160
				2.4	3.6	4.8	6.0	7.2	8.4	9.6
TSM100-0.55	32 x 25	0.55	H	17.8	16.7	15.4	14	12.2	9.9	—
TSM100-1.1	32 x 25	1.1	(m)	27.4	26.3	25	23.4	21.5	19.5	16.7

# TSMS100

## Performance Curves

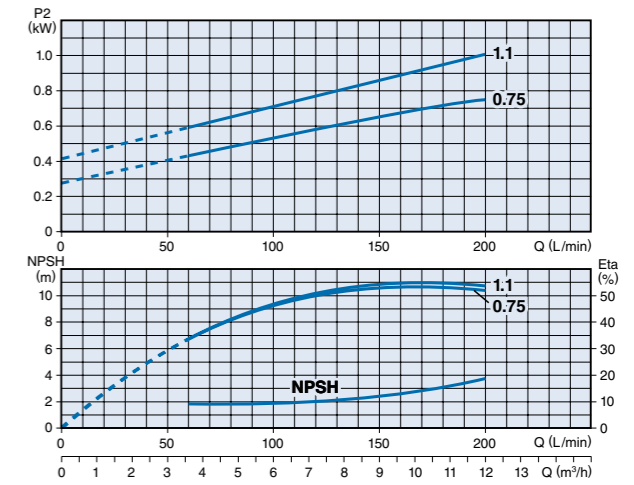
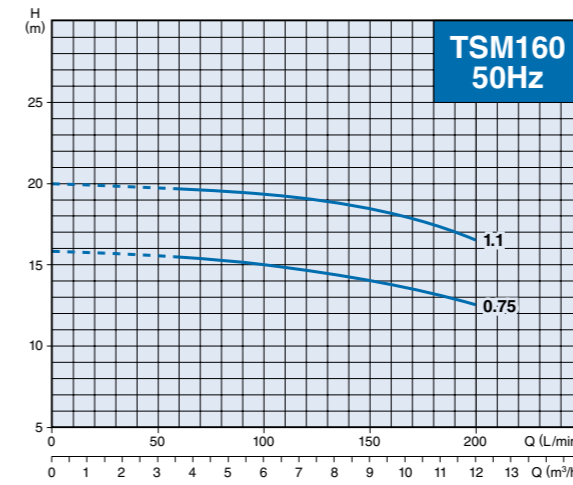


## Performance Table

Model	Inlet x Outlet Bore (mm)	Motor Output (kW)	Q (L/min) Q (m³/h)	40	60	80	100	120	140
				2.4	3.6	4.8	6.0	7.2	8.4
TSMS100-0.75	32 x 25	0.75	H (m)	25	23	21	17	15	10
TSMS100-1.1	32 x 25	1.1		33	31	29	25	21	15
TSMS100-1.5	32 x 25	1.5		40	38	36	32	27	22

# TSM160

## Performance Curves

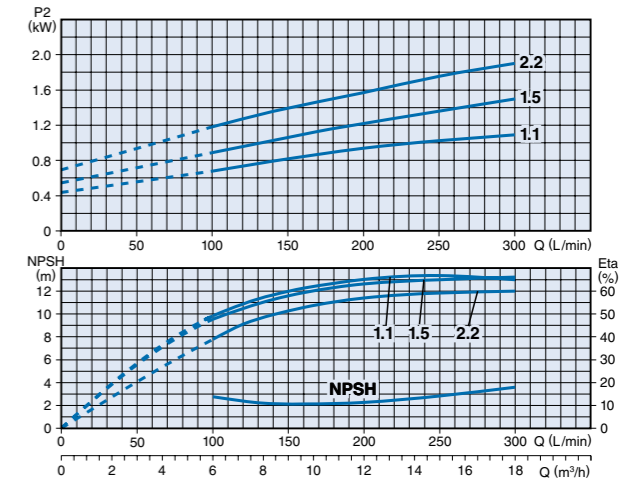
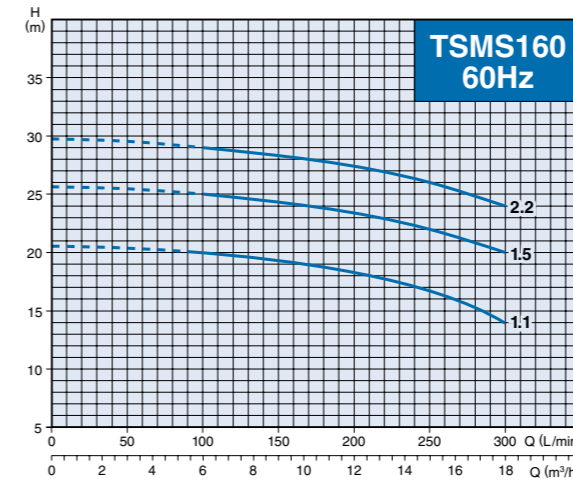


## Performance Table

Model	Inlet x Outlet Bore (mm)	Motor Output (kW)	Q (L/min) Q (m³/h)	60	80	100	120	140	160	200
				3.6	4.8	6.0	7.2	8.4	9.6	12
TSM160-0.75	40 x 32	0.75	H	15.5	15.3	15	14.8	14.3	13.8	12.5
TSM160-1.1	40 x 32	1.1	(m)	19.7	19.5	19.3	19.1	18.7	18.2	16.5

# TSMS160

## Performance Curves

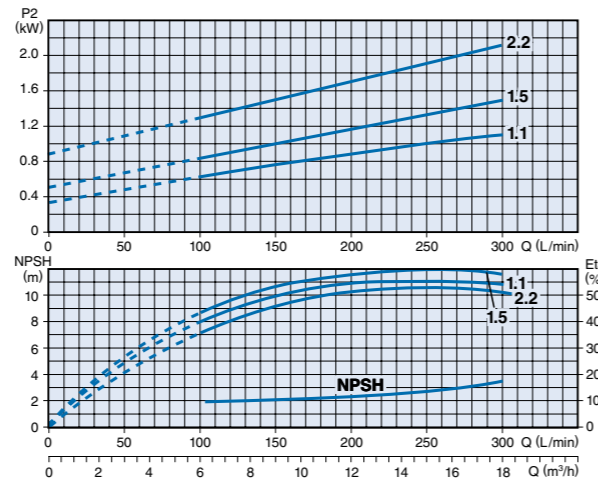
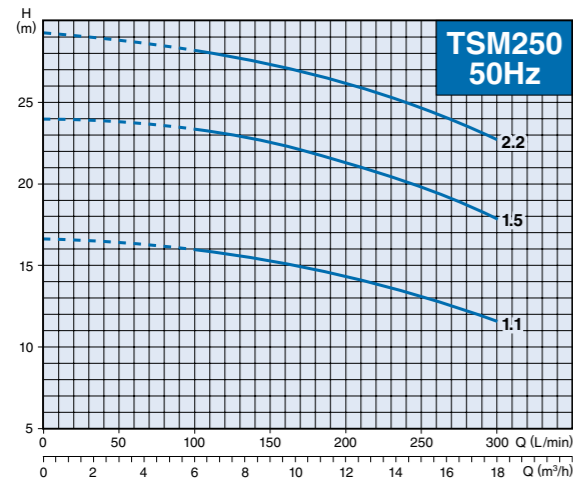


## Performance Table

Model	Inlet x Outlet Bore (mm)	Motor Output (kW)	Q (L/min) Q (m³/h)	100	120	140	160	200	250	300
				6.0	7.2	8.4	9.6	12	15	18
TSMS160-1.1	40 x 32	1.1	H (m)	20.5	20	19.5	19	18	17	14
TSMS160-1.5	40 x 32	1.5		25.5	25	24.5	24	23	22	20
TSMS160-2.2	40 x 32	2.2		29	28.8	28.5	28	27.5	26	24

# TSM250

## Performance Curves

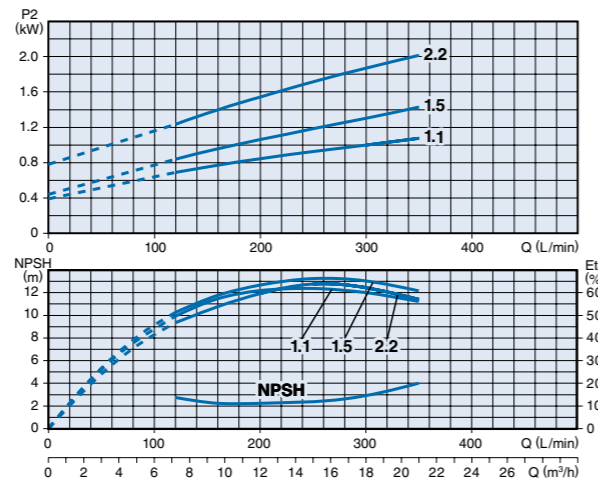
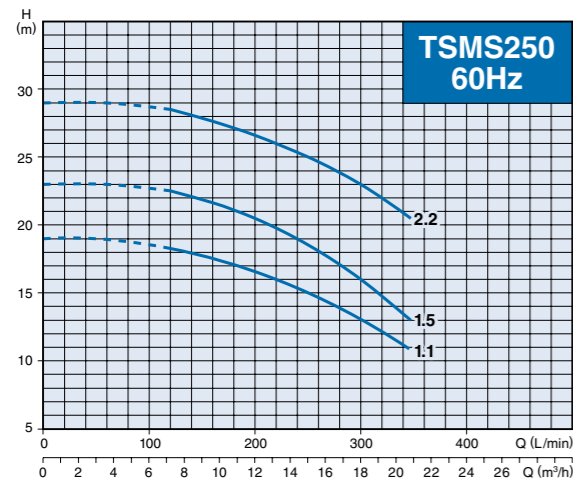


## Performance Table

Model	Inlet x Outlet Bore (mm)	Motor Output (kW)	Q (L/min) Q (m³/h)	100	120	140	160	200	250	300
				H (m)	6.0	7.2	8.4	9.6	12	15
TSM250-1.1	40 x 32	1.1	H (m)	15.8	15.6	15.4	15	14.3	13	11.5
TSM250-1.5	40 x 32	1.5		23.2	23	22.7	22.2	21.4	19.8	17.7
TSM250-2.2	40 x 32	2.2		28.2	27.8	27.5	27	26.2	24.6	22.6

# TSMS250

## Performance Curves

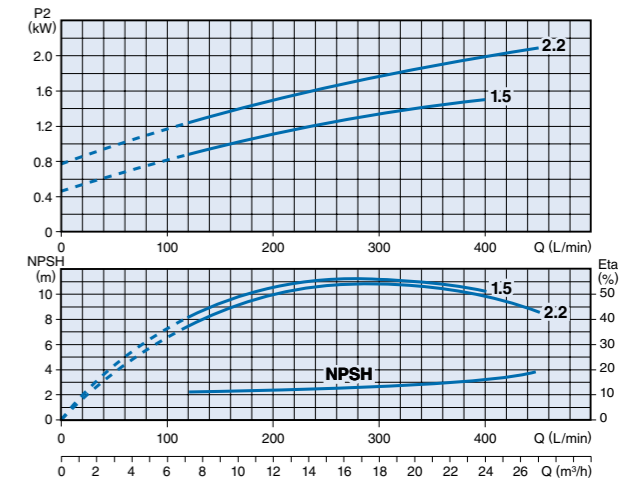
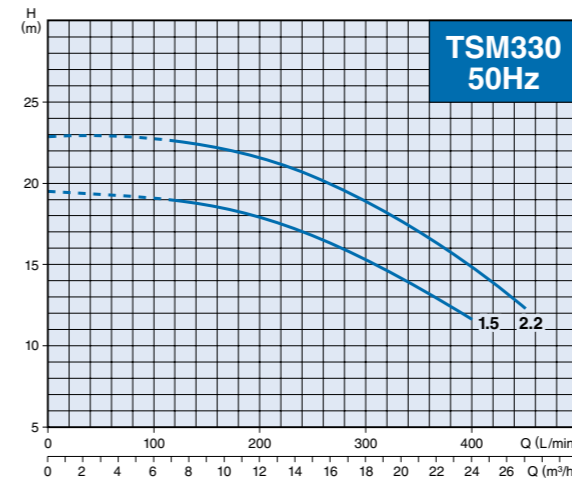


## Performance Table

Model	Inlet x Outlet Bore (mm)	Motor Output (kW)	Q (L/min) Q (m³/h)	120	140	160	200	250	300	330	350
				H (m)	7.2	8.4	9.6	12	15	18	20
TSMS250-1.1	40 x 32	1.1	H (m)	18.5	18	17.5	16.5	15	13	12	11
TSMS250-1.5	40 x 32	1.5		22.5	22	21.5	20.5	18.5	16	14	13
TSMS250-2.2	40 x 32	2.2		28.5	28	27.5	26.5	25	23	21.5	20.5

# TSM330

## Performance Curves

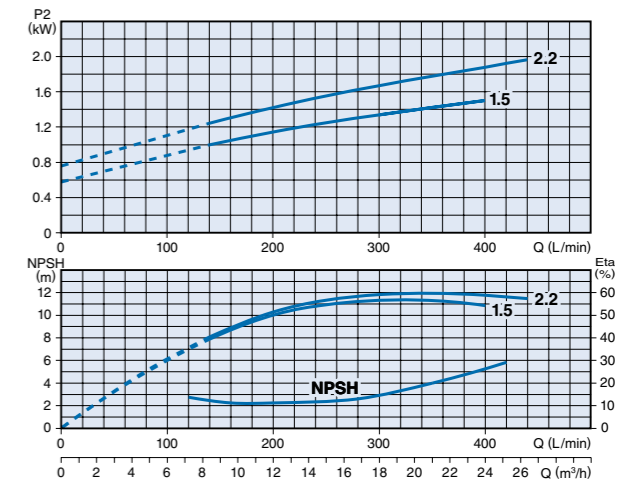
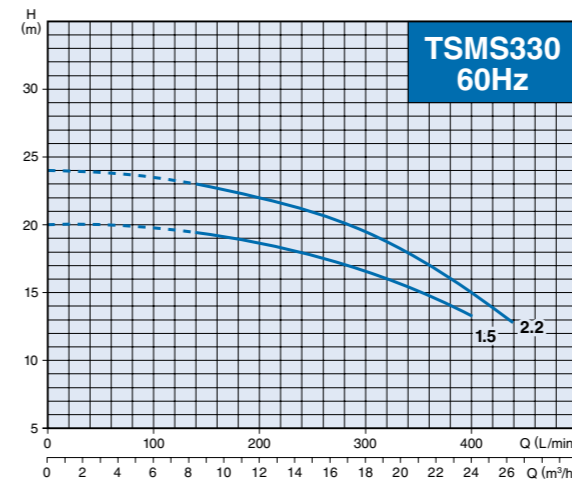


## Performance Table

Model	Inlet x Outlet Bore (mm)	Motor Output (kW)	Q (L/min) Q (m³/h)	120	140	160	200	250	300	330	350	400	450
				H (m)	7.2	8.4	9.6	12	15	18	20	21	24
TSM330-1.5	50 x 32	1.5	H (m)	18.8	18.7	18.5	17.8	16.7	15	14	13.5	11.6	—
TSM330-2.2	50 x 32	2.2		22.5	22.2	22	21.5	20.3	18.7	17.5	16.8	14.8	12.3

# TSMS330

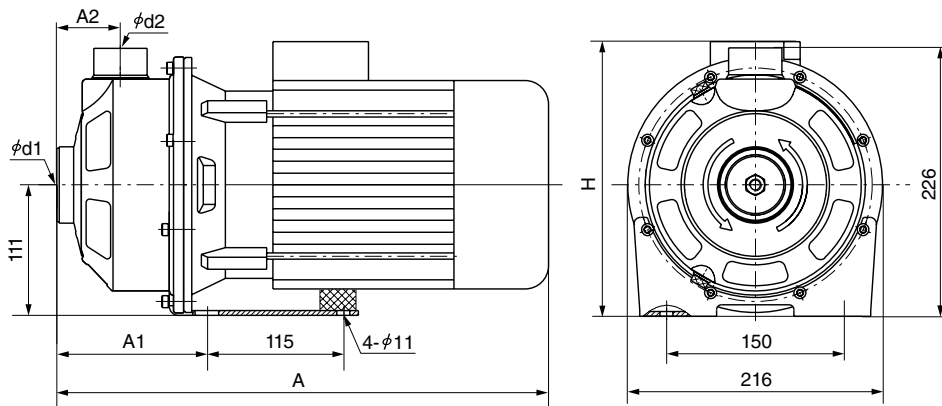
## Performance Curves



## Performance Table

Model	Inlet x Outlet Bore (mm)	Motor Output (kW)	Q (L/min) Q (m³/h)	140	160	200	250	300	330	350	400	440
				H (m)	8.4	9.6	12	15	18	20	21	24
TSMS330-1.5	50 x 32	1.5	H (m)	19.5	19	18.5	18	16.5	16	15	13.5	—
TSMS330-2.2	50 x 32	2.2		23	22.5	22	20.5	19.5	18.5	17.5	15	12.8

# Dimensions



Unit: mm

Model	d1	d2	A	A1	A2	H		Dry Weight (kg)
						Phase		
						Single	Three	
TSM60-0.37	32	25	328	113	51	230	216	10
TSM60-0.55	32	25	328	113	51	230	216	12
TSM60-0.75	32	25	361	113	51	245	223	14
TSM100-0.55	32	25	328	113	51	230	216	12
TSM100-1.1	32	25	361	113	51	245	223	16
TSM160-0.75	40	32	375	127	54	245	223	14
TSM160-1.1	40	32	375	127	54	245	223	16
TSM250-1.1	40	32	375	127	54	245	223	16
TSM250-1.5	40	32	415	127	54	253	232	20
TSM250-2.2	40	32	415	127	54	253	232	23
TSM330-1.5	50	32	415	127	54	253	232	20
TSM330-2.2	50	32	415	127	54	253	232	23
TSMS100-0.75	32	25	361	113	51	245	223	14
TSMS100-1.1	32	25	361	113	51	245	223	14
TSMS100-1.5	32	25	401	113	51	253	232	20
TSMS160-1.1	40	32	375	127	54	245	223	16
TSMS160-1.5	40	32	415	127	54	253	232	20
TSMS160-2.2	40	32	415	127	54	253	232	23
TSMS250-1.1	40	32	375	127	54	245	223	16
TSMS250-1.5	40	32	415	127	54	253	232	20
TSMS250-2.2	40	32	415	127	54	253	232	23
TSMS330-1.5	50	32	415	127	54	253	232	20
TSMS330-2.2	50	32	415	127	54	253	232	23

We reserve the right to change the specifications and designs for improvement without prior notice.

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