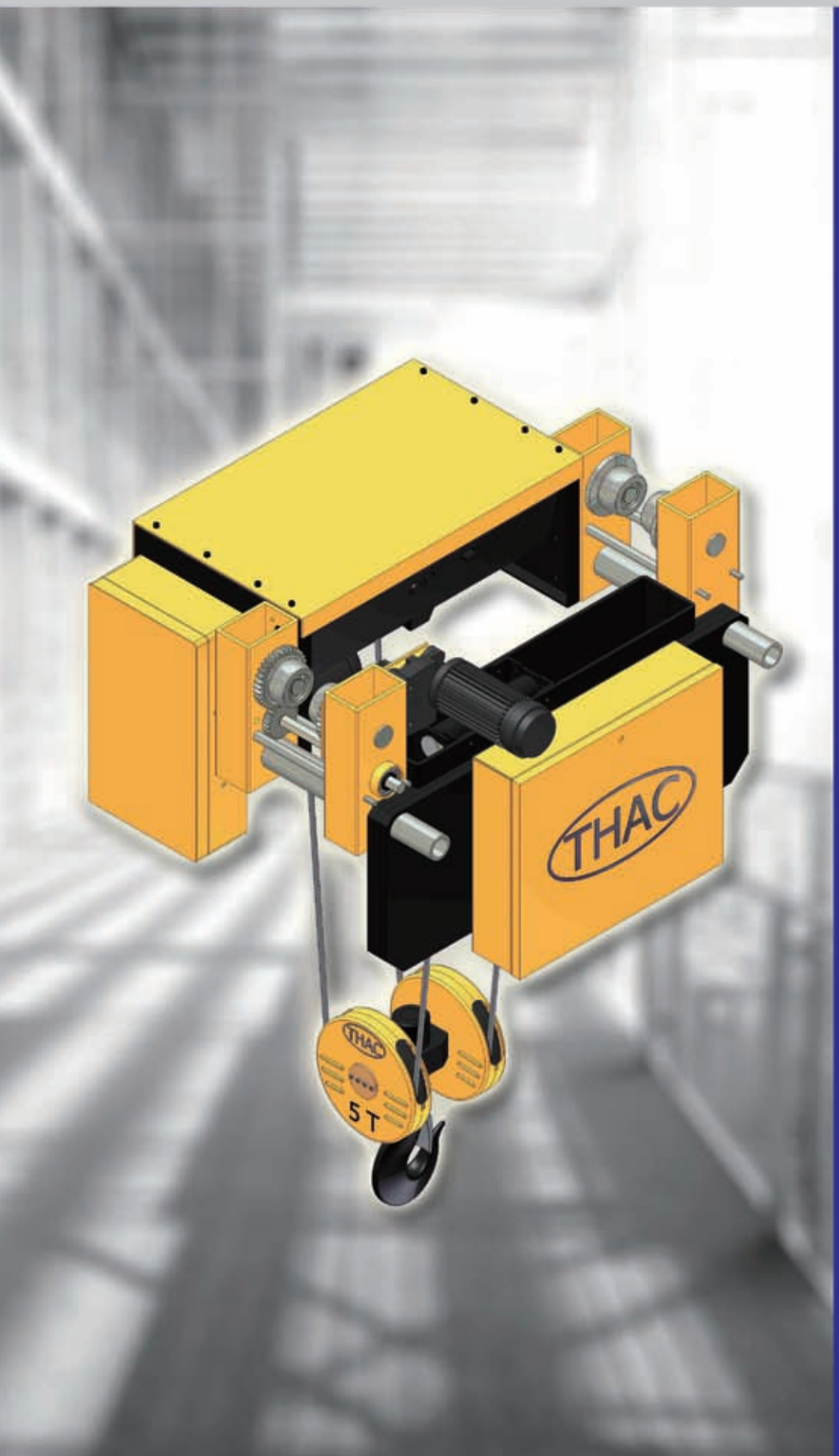
THAC®

ELECTRIC WIRE ROPE HOIST



V SERIES

CONTENTS

V type product code

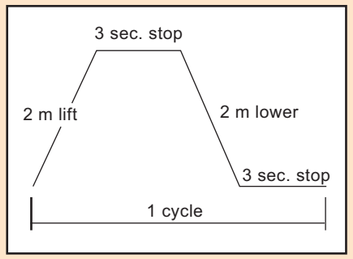
V 03 A 4 A 030 S - V 21 S

- **Load**: 03: 3 Ton, 06: 6.3 Ton, 10: 10 Ton, 1K: 100 Ton
- **Rope Falls Code**: A: 2/1, B: 4/2, C: 4/1, D: 6/1, E: 6/2, F: 8/2, G: 10/2, H: 12/2, I: 16/2, J: 8/1, K: 10/1, L: 20/2
- **Duty Code**: 3:ISO M3, 4:ISO M4, 5:ISO M5, 6:ISO M6
- **Height of Lifting Code**: A: 6M, B: 9M, C: 12M, S: Special Lift
- **Lifting Speed(M/Min)**: 015: 1.5, 020: 2, 100: 10
- **Lifting Speed Rate**: S: Single Speed, I: Inverter Speed
- **Trolley Type**: V: Mono Rail, W: Double Rail
- **Traversing Speed (M/Min)**
- **Traversing Speed Rate**: S: Single Speed, I: Inverter Speed

Lifting motor rating

■ Short time rating ... 30 min

This rating indicates how long the hoist can be operated continuously on the below cycle, assuming continued operation for a short time span.

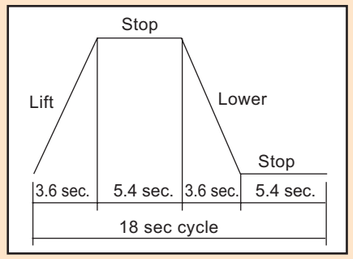


●Specified for WLL.

■ **Intermittent rating ED percent ... 40%**

■ **Max. No. of starts per hour ... 400**

This rating indicates the ED percent (ratio of motor ON-to-OFF time) and max. No. of starts per hour (how many times the motor is started up in one hour) for a hoist operated continuously on the below cycle, assuming continued operation or repeated starting over a long time span.



●Specified for 63% of WLL.

● $ED\% = \frac{\text{Motor ON time } (3.6 \text{ sec.} \times 2)}{1 \text{ cycle } (18 \text{ sec.})} \times 100$

● Max. No. of starts per hour (starts/hr)

$= \frac{1 \text{ hour } (3600 \text{ sec})}{1 \text{ cycle } (18 \text{ sec.})} \times 2$ (lifting & lowering)

If using the hoist on a cycle different from the above, use the below formulas to calculate ED percent and the max. No. of starts per hour.

● $ED\% = \frac{\text{Total Motor ON time in one hour under the busiest conditions of use (min)}}{60 \text{ min.}} \times 100$

● Max. No. of starts per hour (starts/hr) = No. of starts in one hour under the busiest conditions of use

Construction & Features

❶ HOISTING MOTOR

It's optimised motor design for low-vibration and quiet operation. Use the squirrel cage motors with cylindrical rotor for hoisting duty. Type of Protection IP54(IP55 is optional) 40%ED, F Class insulation with thermal contacts to protect against overheating (60%ED is optional).

❷ HOIST GEARING

The geared unit is a 3-stage helical gearbox with high endurance gearing that the material adopts processed alloy steel SCM415 and the heat treated hardness reaches HRC60 degree , solidity, durability and high precision.

❸ FAST ACTING BRAKE

The disk electromagnetic brake features automatic braking in the event of a power failure. Asbestos-free lining can reach 1,000,000 times under a normal application. (2nd Mechanical Brake is optional. Long-service and trouble-free mechanical bake provides dual braking system to ensure operational safety.)

❹ LIMIT SWITCH

Automatic cuts off of the lifting and lowering motions in upper and lower limit positions; prevent mechancial failure from over traveling of the hook.

❺ BOTTOM BLOCK AND HOOK

The 360 swiveling hook is made of high-strength and high resistance forged steel and is fitted swiveling crossbar. The elegant bottom blocks are equipped with protective edging around the rope opening and are provided with an anti-drop safety latch.

❻ ROPE

The rope is made of high fatigue-strength and wear-proof flexible steel. The minimum use coefficient is according to ISO, JIS , CNS & CMAA#70 standard

❼ PROTECTIVE ROPE GUIDE

Made of tough plastic, the rope guide lead-in by means of hardened pressure rollers mounted on anti-friction bearing. The rope guide also reduces wear on the rope and rope drum to enhance the safety and durability.

Push Button Switch (IP65) with EMS

The main line On/Off lets you cut off power by pressing a button close at hand rather than the primary power source. The advanced features of water-proof and dust-prevented improve its flexibility and durability. It is useful for controlling the number of hoists in operation. Emergency stop as our standard specification is the added-on safe device for our valued customers.

❽ OVERLOAD PROTECTION

Mechanical overload protection cuts off the power of motor to prevent object lifting in case of excessive over loading.

❾ FREQUENCY INVERTER CONTROL

A frequency inverter provides variable hoisting speeds for smooth lifting and stop as well as variable cross travel for low-sway travel motions. Fast and exact positioning enhances the performance in overhead material handling. Reducing power consumption to save energy is also the benefit of frequency inverter application.

❿ Panel for electrical connections

Magnet contactor is operated through push button switch or remote controller and electric parts and cable are clearly labeled for easy repair and maintenance. Control box have good water-proof, dust-proof and the enclosure meets IP54 specifications. Standard main voltages are 3Ph/380V/50Hz and 3Ph/415V/50Hz and standard control voltage is 110V. Other main and control voltage are also available by request.

MODEL	Load Cap (t)	Lifting Height (m)	Duty Cycle (ISO)	Lifting Speed (MPM)	Lifting Motor (KW)	Trolley Speed (MPM)	Trolley Motor (KW)	Trolley Type		Wire Rope	
				50HZ	50HZ	50HZ	50HZ	V	W	Fall No.	Dia. (mm)
V01A6A080S-*18S	1.5	6	M6	8	2.2	18	0.25	V	V	2/1	8
V01A6B080S-*18S		9									
V01A6D080S-*18S		12									
V03C5A040S-*18S	3(2.8)	6	M5	4	2.2			V	V	4/1★	8
V03C5B040S-*18S		9									
V03C5D040S-*18S		12									
V03B6A080S-*18S		6	M6	8	4.5					4/2	8
V03B6B080S-*18S		9									
V03B6D080S-*18S		12									
V03A6A080S-*18S		6	M6	8	4.5					2/1	12
V03A6B080S-*18S		9									
V03A6D080S-*18S		12									
V05D4A027S-*15S	5	6	M4	2.7	2.5	15	0.375	V	V	6/1	8
V05D4B027S-*15S		9									
V05D4D027S-*15S		12									
V05C5A040S-*15S		6	M5	4	4.5					4/1★	12
V05C5B040S-*15S		9									
V05C5D040S-*15S		12									
V05B6A060S-*15S		6	M6	6	5.5					4/2	12
V05B6B060S-*15S		9									
V05B6D060S-*15S		12									
V05A6A060S-*15S		6	M6	6	5.5					2/1	14
V05A6B060S-*15S		9									
V05A6D060S-*15S		12									
V06C5A040S-*15S	6.3	6	M5	4	4.5	15	0.75	V	V	4/1★	12
V06C5B040S-*15S		9									
V06C5D040S-*15S		12									
V10D4A027S-*15S	10	6	M4	2.7	5.5			V	V	6/1	12
V10D4B027S-*15S		9									
V10D4D027S-*15S		12									
V10C5A030S-*15S		6	M5	3	5.5					4/1★	14
V10C5B030S-*15S		9									
V10C5D030S-*15S		12									
V10B6A060S-*15S		6	M6	6	11					4/2	14
V10B6B060S-*15S		9									
V10B6D060S-*15S		12									
V10A6A060S-*15S		6	M6	6	11			—		2/1	20
V10A6B060S-*15S		9									
V10A6D060S-*15S		12									
V15D4A020S-W13S	15	6	M4	2	5.5	13	1.1		V	6/1	14
V15D4B020S-W13S		9									
V15D4D020S-W13S		12									
V15C5A030S-W13S		6	M5	3	11					4/1★	18
V15C5B030S-W13S		9									
V15C5D030S-W13S		12									
V20C5A030S-W13S	20	6	M5	3	11		1.5		V	4/1★	20
V20C5B030S-W13S		9									
V20C5D030S-W13S		12									
V20B6A060S-W13S		6	M6	6	22					4/2	20
V20B6B060S-W13S		9									
V20B6D060S-W13S		12									
V25D5A020S-W13S	25	6	M5	2	11				V	6/1	18
V25D5B020S-W13S		9									
V25D5D020S-W13S		12									
V30D4A020S-W11S	30	6	M4	2	11	11	2.2		V	6/1	20
V30D4B020S-W11S		9									
V30D4D020S-W11S		12									
V30E5A040S-W11S		6	M5	4	22					6/2	20
V30E5B040S-W11S		9									
V30E5D040S-W11S		12									
V40J4B015S-W11S	40	9	M4	1.5	11				V	8/1	20
V40J4F015S-W11S		15									
V40J4I015S-W11S		21									
V40F5B030S-W11S		9	M5	3	22					8/2	20
V40F5F030S-W11S		15									
V40F5I030S-W11S		21									
V60H4C020S-W11S	60	10	M4	2	22		2.2*2 Pcs		V	12/2	20
V60H4E020S-W11S		14									
V60H4H020S-W11S		20									
V80I4C015S-W11S	80	10	M4	1.5	22				V	16/2	20
V80I4F015S-W11S		15									
V80I4I015S-W11S		21									
V1KL3D012S-W11S	100	12	M3	1.2	22		3*2 Pcs		V	20/2	20
V1KL3G012S-W11S		16.5									
V1KL3J012S-W11S		22									

Remark:★ means ISO M6 is option.

Trolley Type: V: Mono Rail

W: Double Rail

50HZ **Single Speed**

MODEL	Load Cap (t)	Lifting Height (m)	Duty Cycle (ISO)	Lifting Speed (MPM)	Lifting Motor (KW)	Trolley Speed (MPM)	Trolley Motor (KW)	Trolley Type		Wire Rope	
				50HZ	50HZ	50HZ	50HZ	V	W	Fall No.	Dia. (mm)
V01A6A080I-*18I	1.5	6	M6	1.4->8	2.2	4.5->18	0.25	V	V	2/1	8
V01A6B080I-*18I		9									
V01A6D080I-*18I		12									
V03C5A040I-*18I	3(2.8)	6	M5	0.7->4	2.2			V	V	4/1★	8
V03C5B040I-*18I		9									
V03C5D040I-*18I		12									
V03B6A080I-*18I		6	M6	1.4->8	4.5					4/2	8
V03B6B080I-*18I		9									
V03B6D080I-*18I		12									
V03A6A080I-*18I		6	M6	1.4->8	4.5					2/1	12
V03A6B080I-*18I		9									
V03A6D080I-*18I		12									
V05D4A027I-*15I	5	6	M4	0.5->2.7	2.5	3.75->15	0.375	V	V	6/1	8
V05D4B027I-*15I		9									
V05D4D027I-*15I		12									
V05C5A040I-*15I		6	M5	0.7->4	4.5					4/1★	12
V05C5B040I-*15I		9									
V05C5D040I-*15I		12									
V05B6A060I-*15I		6	M6	1->6	5.5					4/2	12
V05B6B060I-*15I		9									
V05B6D060I-*15I		12									
V05A6A060I-*15I		6	M6	1->6	5.5					2/1	14
V05A6B060I-*15I		9									
V05A6D060I-*15I		12									
V06C5A040I-*15I	6.3	6	M5	0.7->4	4.5	3.75->15	0.75	V	V	4/1★	12
V06C5B040I-*15I		9									
V06C5D040I-*15I		12									
V10D4A027I-*15I	10	6	M4	0.5->2.7	5.5			V	V	6/1	12
V10D4B027I-*15I		9									
V10D4D027I-*15I		12									
V10C5A030I-*15I		6	M5	0.5->3	5.5					4/1★	14
V10C5B030I-*15I		9									
V10C5D030I-*15I		12									
V10B6A060I-*15I		6	M6	1->6	11					4/2	14
V10B6B060I-*15I		9									
V10B6D060I-*15I		12									
V10A6A060I-*15I		6	M6	1->6	11			—		2/1	20
V10A6B060I-*15I		9									
V10A6D060I-*15I		12									
V15D4A020I-W13I	15	6	M4	0.3->2	5.5	3.25->13	1.1		V	6/1	14
V15D4B020I-W13I		9									
V15D4D020I-W13I		12									
V15C5A030I-W13I		6	M5	0.5->3	11					4/1★	18
V15C5B030I-W13I		9									
V15C5D030I-W13I		12									
V20C5A030I-W13I	20	6	M5	0.5->3	11		1.5		V	4/1★	20
V20C5B030I-W13I		9									
V20C5D030I-W13I		12									
V20B6A060I-W13I		6	M6	1->6	22					4/2	20
V20B6B060I-W13I		9									
V20B6D060I-W13I		12									
V25D5A020I-W13I	25	6	M5	0.3->2	11				V	6/1	18
V25D5B020I-W13I		9									
V25D5D020I-W13I		12									
V30D4A020I-W11I	30	6	M4	0.3->2	11	2.75->11	2.2		V	6/1	20
V30D4B020I-W11I		9									
V30D4D020I-W11I		12									
V30E5A040I-W11I		6	M5	0.7->4	22					6/2	20
V30E5B040I-W11I		9									
V30E5D040I-W11I		12									
V40J4B015I-W11I	40	9	M4	0.25->1.5	11				V	8/1	20
V40J4F015I-W11I		15									
V40J4I015I-W11I		21									
V40F5B030I-W11I		9	M5	0.5->3	22					8/2	20
V40F5F030I-W11I		15									
V40F5I030I-W11I		21									
V60H4C020I-W11I	60	10	M4	0.3->2	22		2.2*2 Pcs		V	12/2	20
V60H4E020I-W11I		14									
V60H4H020I-W11I		20									
V80I4C015I-W11I	80	10	M4	0.25->1.5	22				V	16/2	20
V80I4F015I-W11I		15									
V80I4I015I-W11I		21									
V1KL3D012I-W11I	100	12	M3	0.2->1.2	22		3*2 Pcs		V	20/2	20
V1KL3G012I-W11I		16.5									
V1KL3J012I-W11I		22									

Remark:★ means ISO M6 is option.

Trolley Type: V: Mono Rail

W: Double Rail

50HZ **Inverter Speed**

MODEL	Load Cap (t)	Lifting Height (m)	Duty Cycle (ISO)	Lifting Speed (MPM)	Lifting Motor (KW)	Trolley Speed (MPM)	Trolley Motor (KW)	Trolley Type		Wire Rope	
				60HZ	60 HZ	60HZ	60HZ	V	W	Fall No.	Dia. (mm)
V01A6A096S-*21S	1.5	6	M6	9.6	2.5	21	0.25	V	V	2/1	8
V01A6B096S-*21S		9									
V01A6D096S-*21S		12									
V03C5A048S-*21S	3(2.8)	6	M5	4.8	2.5			V	V	4/1★	8
V03C5B048S-*21S		9									
V03C5D048S-*21S		12									
V03B6A096S-*21S		6	M6	9.6	5.5					4/2	8
V03B6B096S-*21S		9									
V03B6D096S-*21S		12									
V03A6A096S-*21S		6	M6	9.6	5.5					2/1	12
V03A6B096S-*21S		9									
V03A6D096S-*21S		12									
V05C5A048S-*18S	5	6	M5	4.8	5.5	18	0.375	V	V	4/1★	12
V05C5B048S-*18S		9									
V05C5D048S-*18S		12									
V05B6A072S-*18S		6	M6	7.2	7.5					4/2	12
V05B6B072S-*18S		9									
V05B6D072S-*18S		12									
V05A6A072S-*18S		6	M6	7.2	7.5					2/1	14
V05A6B072S-*18S		9									
V05A6D072S-*18S		12									
V06C5A048S-*18S	6.3	6	M5	4.8	5.5			V	V	4/1★	12
V06C5B048S-*18S		9									
V06C5D048S-*18S		12									
V10D4A032S-*18S	10	6	M4	3.2	5.5			V	V	6/1	12
V10D4B032S-*18S		9									
V10D4D032S-*18S		12									
V10C5A036S-*18S		6	M5	3.6	7.5					4/1★	14
V10C5B036S-*18S		9									
V10C5D036S-*18S		12									
V10B6A072S-*18S		6	M6	7.2	15					4/2	14
V10B6B072S-*18S		9									
V10B6D072S-*18S		12									
V10A6A072S-*18S		6	M6	7.2	15			—		2/1	20
V10A6B072S-*18S		9									
V10A6D072S-*18S		12									
V15D4A024S-W15S	15	6	M4	2.4	7.5	15	1.1		V	6/1	14
V15D4B024S-W15S		9									
V15D4D024S-W15S		12									
V15C5A036S-W15S		6	M5	3.6	11					4/1★	18
V15C5B036S-W15S		9									
V15C5D036S-W15S		12									
V20C5A036S-W15S	20	6	M5	3.6	15				V	4/1★	20
V20C5B036S-W15S		9									
V20C5D036S-W15S		12									
V20B6A072S-W15S		6	M6	7.2	26.25		1.5			4/2	20
V20B6B072S-W15S		9									
V20B6D072S-W15S		12									
V25D5A024S-W15S	25	6	M5	2.4	15				V	6/1	18
V25D5B024S-W15S		9									
V25D5D024S-W15S		12									
V30D4A024S-W13S	30	6	M4	2.4	15	13	2.2		V	6/1	20
V30D4B024S-W13S		9									
V30D4D024S-W13S		12									
V30E5A048S-W13S		6	M5	4.8	26.25					6/2	20
V30E5B048S-W13S		9									
V30E5D048S-W13S		12									
V40J4B018S-W13S	40	9	M4	1.8	15				V	8/1	20
V40J4F018S-W13S		15									
V40J4I018S-W13S		21									
V40F5B036S-W13S		9	M5	3.6	26.25					8/2	20
V40F5F036S-W13S		15									
V40F5I036S-W13S		21									
V60H4C024S-W13S	60	10	M4	2.4	26.25		2.2*2 Pcs		V	12/2	20
V60H4E024S-W13S		14									
V60H4H024S-W13S		20									
V80I4C018S-W13S	80	10	M4	1.8	26.25				V	16/2	20
V80I4F018S-W13S		15									
V80I4I018S-W13S		21									
V1KL3D014S-W13S	100	12	M3	1.4	26.25		3*2 Pcs		V	20/2	20
V1KL3G014S-W13S		16.5									
V1KL3J014S-W13S		22									

Remark:★ means ISO M6 is option.

Trolley Type: V: Mono Rail

W: Double Rail

60HZ **Single Speed**

MODEL	Load Cap (t)	Lifting Height (m)	Duty Cycle (ISO)	Lifting Speed (MPM)	Lifting Motor (KW)	Trolley Speed (MPM)	Trolley Motor (KW)	Trolley Type		Wire Rope	
				60HZ	60 HZ	60HZ	60HZ	V	W	Fall No.	Dia. (mm)
V01A6A096I-*21I	1.5	6	M6	1.6->9.6	2.5	5.25->21	0.25	V	V	2/1	8
V01A6B096I-*21I		9									
V01A6D096I-*21I		12									
V03C5A048I-*21I	3(2.8)	6	M5	0.8->4.8	2.5			V	V	4/1★	8
V03C5B048I-*21I		9									
V03C5D048I-*21I		12									
V03B6A096I-*21I		6	M6	1.6->9.6	5.5					4/2	8
V03B6B096I-*21I		9									
V03B6D096I-*21I		12									
V03A6A096I-*21I		6	M6	1.6->9.6	5.5					2/1	12
V03A6B096I-*21I		9									
V03A6D096I-*21I		12									
V05C5A048I-*18I	5	6	M5	0.8->4.8	5.5	4.5->18	0.375	V	V	4/1★	12
V05C5B048I-*18I		9									
V05C5D048I-*18I		12									
V05B6A072I-*18I		6	M6	1.2->7.2	7.5					4/2	12
V05B6B072I-*18I		9									
V05B6D072I-*18I		12									
V05A6A072I-*18I		6	M6	1.2->7.2	7.5					2/1	14
V05A6B072I-*18I		9									
V05A6D072I-*18I		12									
V06C5A048I-*18I	6.3	6	M5	0.8->4.8	5.5	4.5->18	0.75	V	V	4/1★	12
V06C5B048I-*18I		9									
V06C5D048I-*18I		12									
V10D4A032I-*18I	10	6	M4	0.6->3.2	5.5			V	V	6/1	12
V10D4B032I-*18I		9									
V10D4D032I-*18I		12									
V10C5A036I-*18I		6	M5	0.6->3.6	7.5					4/1★	14
V10C5B036I-*18I		9									
V10C5D036I-*18I		12									
V10B6A072I-*18I		6	M6	1.2->7.2	15					4/2	14
V10B6B072I-*18I		9									
V10B6D072I-*18I		12									
V10A6A072I-*18I		6	M6	1.2->7.2	15			—		2/1	20
V10A6B072I-*18I		9									
V10A6D072I-*18I		12									
V15D4A024I-W15I	15	6	M4	0.4->2.4	7.5	3.75->15	1.1		V	6/1	14
V15D4B024I-W15I		9									
V15D4D024I-W15I		12									
V15C5A036I-W15I		6	M5	0.6->3.6	11					4/1★	18
V15C5B036I-W15I		9									
V15C5D036I-W15I		12									
V20C5A036I-W15I	20	6	M5	0.6->3.6	15		1.5		V	4/1★	20
V20C5B036I-W15I		9									
V20C5D036I-W15I		12									
V20B6A072I-W15I		6	M6	1.2->7.2	26.25					4/2	20
V20B6B072I-W15I		9									
V20B6D072I-W15I		12									
V25D5A024I-W15I	25	6	M5	0.4->2.4	15				V	6/1	18
V25D5B024I-W15I		9									
V25D5D024I-W15I		12									
V30D4A024I-W13I	30	6	M4	0.4->2.4	15	3.25->13	2.2		V	6/1	20
V30D4B024I-W13I		9									
V30D4D024I-W13I		12									
V30E5A048I-W13I		6	M5	0.6->4.8	26.25					6/2	20
V30E5B048I-W13I		9									
V30E5D048I-W13I		12									
V40J4B018I-W13I	40	9	M4	0.3->1.8	15				V	8/1	20
V40J4F018I-W13I		15									
V40J4I018I-W13I		21									
V40F5B036I-W13I		9	M5	0.6->3.6	26.25					8/2	20
V40F5F036I-W13I		15									
V40F5I036I-W13I		21									
V60H4C024I-W13I	60	10	M4	0.4->2.4	26.25		2.2*2 Pcs		V	12/2	20
V60H4E024I-W13I		14									
V60H4H024I-W13I		20									
V80I4C018I-W13I	80	10	M4	0.3->1.8	26.25				V	16/2	20
V80I4F018I-W13I		15									
V80I4I018I-W13I		21									
V1KL3D014I-W13I	100	12	M3	0.3->1.4	26.25		3*2 Pcs		V	20/2	20
V1KL3G014I-W13I		16.5									
V1KL3J014I-W13I		22									

Remark:★ means ISO M6 is option.

Trolley Type: V: Mono Rail

W: Double Rail

60HZ **Inverter Speed**