

# SW-E ELECTRIC WIRE ROPE WINCHES



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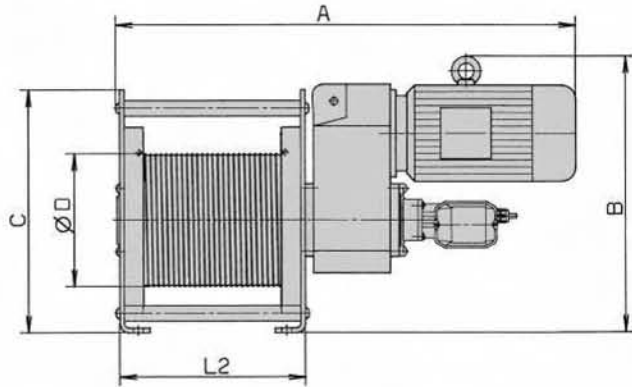
CM offers a diverse range of electric wire rope winches for lifting, lowering, pulling, and positioning loads to meet your specific needs. These winches stand out due to their first-class quality, reliable and durable drive motors. The gearwheels of the maintenance-free spur gear run in an oil-bath. The spiral gearing of the gear wheel guarantees very smooth running. The strong three-phase motors allow running with flexible supply voltage from 380 up to 420 V/50 Hz. or 440 up to 460 V/60 Hz. - motor protection class IP 54. Proper winch operation is ensured by a separated contactor control (42 V/50 Hz.) with integrated "Up-Down/Emergency Stop" buttons as well as the master

switch. Winches with a lifting capacity of 2,200 lbs. have electronic overload protection as standard. CM electric wire rope winches have been developed for diverse applications within the entertainment industry and are designed for a service-life of 400 (1Bm), 800 (1Am) up to 1600 (2m) operating hours when fully loaded. All winches can be operated within temperature ranges of -4°F up to 104°F without special oil filling. Our wire rope winches are equipped with grooved drums with each one wire fastening at the flanged wheels. Upon request, we can deliver drums with special grooves and several wires for special applications.

# SW-E ELECTRIC WIRE ROPE WINCHES

## SW-E STANDARD ELECTRIC WIRE ROPE WINCH

The SW-E winches are subdivided into 5 sizes (Size 1-5). Due to combination of motor capacity and gear transmission, tension loads of 220 lbs. up to 8.25 ton at rope speeds up to 98.4 ft./min can be supplied from the building block system. All winches can be delivered with numerous options, including A.C. motors.



Model No.	Size	Lifting capacity 1 <sup>st</sup> layer lbs	Drive group FEM	Rope speed 1 <sup>st</sup> layer ft/min	Motor Power hp	Recomm. Rope Nom. strength lbs/in <sup>2</sup>	Rec. Rope diameter* mm	Rope capacity		Weight lbs	Dimensions in inches				
								1 <sup>st</sup> layer ft	total ft		A	B	C	ØD	L2
031148012V	1	551	2m	34.8	0.56	256,717	5	53' 2"	255' 3"	136	27 3/8	13 1/8	12 13/16	6 7/8	10 3/8
031148018V	1	551	2m	50.5	0.80	256,717	5	53' 2"	255' 3"	139	28 3/16	13 1/8	12 13/16	6 7/8	10 3/8
031148024V	1	551	2m	77.2	1.25	256,717	5	53' 2"	255' 3"	141	28 9/16	13 1/8	12 13/16	6 7/8	10 3/8
031148007V	1	705	2m	20.5	0.43	284,274	5	53' 2"	255' 3"	138	27 15/16	13 1/8	12 13/16	6 7/8	10 3/8
031148013V	1	705	2m	35.1	0.72	284,274	5	53' 2"	255' 3"	139	28 3/16	13 1/2	12 13/16	6 7/8	10 3/8
031148019V	1	705	2m	50.5	1.03	284,274	5	53' 2"	255' 3"	141	28 9/16	13 1/2	12 13/16	6 7/8	10 3/8
031148025V	1	705	2m	78.0	1.59	284,274	5	53' 2"	255' 3"	148	30 1/16	13 7/8	12 13/16	6 7/8	10 3/8
031148077V	1	1102	1 Am	31.1	1.01	284,274	6	27' 7"	191' 11"	141	28 3/16	13 1/2	12 13/16	4 1/4	10 3/8
031148208V	2	1102	2m	37.7	1.22	256,717	8	56' 1"	280' 6"	229	35 1/16	19 9/16	17 1/2	9 1/2	13 5/16
031148209V	2	1389	2m	37.7	1.53	256,717	8	56' 1"	280' 6"	229	35 1/16	19 9/16	17 1/2	9 1/2	13 5/16
031148219V	2	1389	2m	74.3	3.02	256,717	8	56' 1"	280' 6"	244	37	19 9/16	17 1/2	9 1/2	13 5/16
031148205V	2	1764	2m	17.6	0.90	284,274	8	56' 1"	280' 6"	222	33 3/16	19 9/16	17 1/2	9 1/2	13 5/16
031148210V	2	1764	2m	37.7	1.94	284,274	8	56' 1"	280' 6"	229	35 1/16	19 9/16	17 1/2	9 1/2	13 5/16
031148220V	2	1764	2m	75.0	3.85	284,274	8	56' 1"	280' 6"	250	37	19 9/16	17 1/2	9 1/2	13 5/16
031148259V	2	2161	1 Am	27.5	1.72	284,274	9	36' 1"	253' 11"	229	35 1/16	19 9/16	17 1/2	6 7/8	13 5/16
031148403V	3	2756	2m	19.0	1.54	256,717	12	53' 6"	201' 1"	363	39 15/16	24 3/16	21 9/16	11 5/8	16
031148406V	3	2756	2m	40.3	3.23	256,717	12	53' 6"	201' 1"	384	41 15/16	24 3/16	21 9/16	11 5/8	16
031148441V	3	3527	1 Am	29.6	3.06	284,274	12	39' 8"	287' 9"	384	41 15/16	24 3/16	21 9/16	8 9/16	16
031148444V	3	3527	1 Am	45.8	4.69	284,274	12	39' 8"	287' 9"	381	40 15/16	24 3/16	21 9/16	8 9/16	16
031148504V	3,5	4409	2m	27.8	3.56	256,717	14	45' 3"	176' 10"	487	42 15/16	26 15/16	21 9/16	11 5/8	16
031148507V	3,5	4409	2m	40.6	5.21	256,717	14	45' 3"	176' 10"	515	45 3/16	26 15/16	21 9/16	11 5/8	16
031148510V	3,5	4409	2m	59.7	7.66	256,717	14	45' 3"	176' 10"	543	49 3/16	26 15/16	21 9/16	11 5/8	16
031148505V	3,5	5512	2m	27.8	4.49	256,717	14	45' 3"	176' 10"	494	42 15/16	26 15/16	21 9/16	11 5/8	16
031148502V	3,5	5512	2m	20.1	3.22	256,717	14	45' 3"	176' 10"	487	42 15/16	26 15/16	21 9/16	11 5/8	16
031148511V	3,5	5512	2m	59.7	9.58	256,717	14	45' 3"	176' 10"	543	49 3/16	26 15/16	21 9/16	11 5/8	16
031148530V	3,5	7055	1 Am	16.5	3.38	313,282	14	37' 5"	211' 7"	487	42 15/16	26 15/16	21 9/16	9 1/2	16
031148536V	3,5	7055	1 Am	33.3	6.83	313,282	14	37' 5"	211' 7"	515	45 3/16	26 15/16	21 9/16	9 1/2	16
031148620V	4	7055	2m	79.4	16.33	256,717	18	51' 2"	203' 5"	1108	55 7/16	32 1/2	27 1/16	14 3/16	18 7/8
031148644V	4	8818	1 Am	22.7	5.87	284,274	18	41' 8"	322' 6"	958	49 13/16	32 1/2	27 1/16	11 5/8	18 7/8
031148652V	4	8818	1 Am	41.0	10.52	284,274	18	41' 8"	322' 6"	1033	54 1/8	32 1/2	27 1/16	11 5/8	18 7/8
031148802V	5	11023	2m	15.4	4.90	284,274	20	66' 7"	259' 10"	2309	61	41 9/16	33 1/4	17 3/4	22 3/8
031148804V	5	11023	2m	31.5	10.16	284,274	20	66' 7"	259' 10"	2247	61	41 9/16	33 1/4	17 1/2	22 3/8
031148823V	5	13889	1 Am	12.4	4.98	313,282	20	53' 10"	306' 5"	2309	61	41 9/16	33 1/4	14 5/16	22 3/8
031148825V	5	13889	1 Am	25.6	10.33	313,282	20	53' 10"	306' 5"	2247	61	41 9/16	33 1/4	14 5/16	22 3/8
031148840V	5	16535	1 Bm	20.9	9.97	313,282	20	44'	343' 10"	2247	61	41 9/16	33 1/4	11 5/8	22 3/8
031148842V	5	16535	1 Bm	37.3	18.04	313,282	20	44'	343' 10"	2420	63 1/16	41 9/16	33 1/4	11 5/8	22 3/8

\* recommended steel rope DIN 3069 SE-znk-1960, non-rotating

METEOR WINCH LINE

## MODEL RPE ELECTRIC WIRE ROPE WINCH

### MODEL RPE ELECTRIC WIRE ROPE WINCH

RPE winches are designed explicitly for performance, efficiency, and security, and offer many advantages and options. The unit's extremely compact, practical cube design and universal rope lead-offs allow individual applications in almost any position and make these winches powerful aids for lifting and pulling loads.

The winches are designed to DIN 15020, classification 1 Bm, safety regulation BGV D8 (winch, lift and pull equipment) and the EC machinery directives.

#### Features

- Compact dimensions due to internal brake motor.
- Standard: Euro-voltage 400 V/230 V, 3-phase, 50 Hz, protected to IP 54, insulation class F.
- Adjustable slip clutch to protect the winch from overloading standard for Model RPE 10-6.
- Spur gear transmission with helical first gear ensures smooth motion. Lubricated by grease and can, therefore, be used in any position.
- Plain rope drum standard.
- Spring pressure disc brake incorporated in the motor holds the load secure even in the event of a power failure.
- The rope is secured to the drum in a recess so that the rope can be wound onto the drum in several layers without damage.
- The standard version comes with direct control.
- Integrated emergency stop.

#### Options

- Different drum designs, e.g. extended to accommodate longer rope, machined grooves for exact reeling, with separation web and second rope outlet for working with two ropes.
- Geared limit switches to limit rope motion in both directions.
- Single-phase A.C. motor 230 V, 50 Hz, for mobile application of the winch. Control by means of pendant control including control switch with emergency stop and 2 m long control cable.
- Contactor control with 42V control voltage.
- Slack rope switch to automatically stop the winch when rope tension eases e.g. when the load touches down (only in combination with low voltage control).
- Frequency converter for stepless speed control.
- Adjustable slip clutch to protect the winch from overloading for models RPE 2-13, RPE 5-6 and RPE 5-12.
- Special design according to BGV C1 for theater stage applications available.

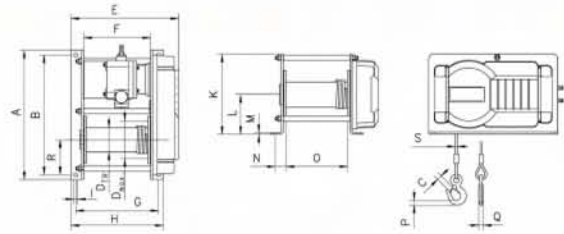


# RPE型電動鋼索捲揚機

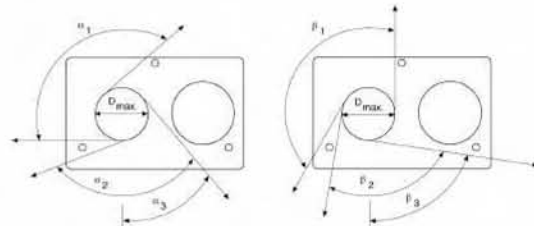
## MODEL RPE ELECTRIC WIRE ROPE WINCH



MODEL RPE



Rope lead-offs for electric rope winch RPE



Technical Data Model RPE

Model	EAN-No. 4025092*	Pulling force*	Lifting speed*	Rope diameter	Motor	ED at 120 c/h	Useable rope length in the 1st layer ft	Useable rope length in the 2nd layer ft	Useable rope length in the 3rd layer ft	Useable rope length in the 4th layer ft	Weight without rope
		lbf	ft/min	mm	hp	%					lbs
RPE 2-13B	*071796	562.02	47.6	4	0.737	40	36' 9"	80' 1"	127' 4"	178' 10"	70
RPE 5-6B	*071857	1124.04	23.8	6	0.737	40	23'	53' 10"	88' 7"	127' 4"	72
RPE 5-12B	*071918	1124.04	43.9	6	1.474	40	36' 1"	81' 8"	130' 3"	181' 9"	90
RPE 9-6B	*071956	2225.61	22.0	8	1.474	40	33' 6"	75' 6"	122' 8"	-	168
RPE 10-6B**	*072014	2248.09	22.0	8	1.474	40	33' 6"	75' 6"	122' 8"	-	170

lbf = lb. force \* In the top rope layer \*\* With slip clutch

Grooved Drum (recommended for single layer operation)

Model	Pulling force in top layer lbf	Drum Size	Rope length 1st layer ft	Max rope length ft
RPE 2-13 RB	562.02	1	28 ft., 10 in.	141 ft., 1 in.
RPE 5-6 RB	1124.04	1	20 ft., 4 in.	108 ft., 3 in.
RPE 9-6/10-6 RB	2225.61 / 2248.09	1	26 ft., 11 in.	98 ft., 5 in.
RPE 2-13 LRB	562.02	2	43 ft., 8 in.	210 ft.
RPE 5-6 LRB	1124.04	2	31 ft., 2 in.	160 ft., 9 in.
RPE 5-12 LRB	1124.04	2	31 ft., 2 in.	160 ft., 9 in.
RPE 9-6/10-6 LRB	2225.61 / 2248.09	2	42 ft., 4 in.	154 ft., 2 in.
RPE 2-13 XLRB	562.02	3	115 ft., 10 in.	541 ft., 4 in.
RPE 5-6 XLRB	1124.04	3	84 ft., 4 in.	419 ft., 11 in.
RPE 5-12 XLRB	1124.04	3	84 ft., 4 in.	419 ft., 11 in.
RPE 9-6/10-6 XLRB	2225.6 / 2248.09	3	82 ft., 8 in.	292 ft.

Plain Drum (longer useable rope length)

Model	Pulling force in top layer lbf	Drum Size	Max rope length ft
RPE 2-13 LB	562.02	2	262 ft., 6 in.
RPE 5-6 LB	1124.04	2	190 ft., 3 in.
RPE 9-6/10-6 LB	2225.61 / 2248.09	2	183 ft., 9 in.
RPE 2-13 XLB	562.02	3	656 ft., 2 in.
RPE 5-6 XLB	1124.04	3	459 ft., 4 in.
RPE 5-12 XLB	1124.04	3	459 ft., 4 in.
RPE 9-6/10-6 XLB	2225.61 / 2248.09	3	328 ft., 1 in.

lbf = lb. force

Dimensions Model RPE

Model	RPE 2-13B	RPE 5-6B	RPE 5-12B	RPE 9-6B	RPE 10-6B
A, in	15 15/16	15 15/16	15 15/16	20 11/16	20 11/16
B, in	14 3/4	14 3/4	14 3/4	19 1/8	19 1/8
C, in	1 1/16	1 1/16	1 1/16	1	1
DTR, in	3	3	3	4 1/4	4 1/4
Dmax, in	4 1/8	4 9/16	4 9/16	5 13/16	5 13/16
A, in	5 7/8	5 7/8	5 7/8	7 1/16	7 1/16
E, in	13 1/4	13 1/4	16 3/4	18 9/16	18 9/16
F, in	8 3/4	8 3/4	11 13/16	10 9/16	10 9/16
G, in	10 1/4	10 1/4	13 3/4	13 9/16	13 9/16
H, in	11 7/16	11 7/16	14 15/16	14 15/16	14 15/16
I, in	7/16	7/16	7/16	1/2	1/2
K, in	9 13/16	9 13/16	9 13/16	13 3/8	13 3/8
L, in	4 15/16	4 15/16	4 15/16	6 11/16	6 11/16
M, in	1/4	1/4	1/4	9/16	9/16
N, in	1 3/16	1 3/16	1 3/16	1 7/8	1 7/8
O, in	7 5/8	7 5/8	11 3/16	9 13/16	9 13/16
P, in	3/4	3/4	3/4	15/16	15/16
Q, in	1/2	1/2	1/2	3/4	3/4
R, in	4 15/16	4 15/16	4 15/16	6 11/16	6 11/16
S, in	3/16	1/4	1/4	9/16	9/16
β 1, °	130	130	130	145	145
β 2, °	110	110	110	125	125
β 3, °	40	40	40	50	50
β 1, °	150	150	150	155	155
β 2, °	90	90	90	100	100
β 3, °	80	80	80	83	83

完整產品線附有動力的表演

# A COMPLETE PRODUCT LINE WITH THE POWER TO PERFORM



Meteor winches are just one important part of the diverse offering from Columbus McKinnon Entertainment Technology (CM-et). For decades, riggers have trusted the black **Lodestar** or “motor” for lifting and positioning of lighting grids, speakers, trusses, and related items needed for a show-stopping performance. From large venues like the Olympics and national conventions to local theater production companies, the Lodestar means unsurpassed reliability with maximum versatility. Featuring a lifetime warranty, the Lodestar’s adjustable limit switch prevents load from over travel. Additionally, its finger-safe wiring configuration with quick-change plugs allow for voltages from 208 through 480. The popular Lodestar fits in standard flight cases for easy transport, and it meets or exceeds world standards.

A number of manual hoisting and positioning tools are also available from CM-et. **Mini-hoists** fit in standard toolboxes and can handle loads weighing up to 1100 lbs. Perfect for tight quarters, these units may be operated using one hand, and feature a Weston style load brake that requires no lubrication.

For easy attachment of rigging products to standard beams, CM-et offers a wide range of clamps and trolleys. **Beam clamps** are suitable for use with powered hoists and chain blocks and can be installed in a matter of minutes. The popular “**V-bar**” **close radius trolley** is ideal for low headroom applications. Integral dust covers shield and protect the units’ permanently lubricated bearings, and the exclusive Dial-Fit collar allows the trolley to be used on a wide range of beams.

A number of **rigging accessories** are readily available including shackles, wire rope clips, shoulder eyebolts, turnbuckles, thimbles, and links. Additionally, Special Theatrical Alloy Chain (STAC) is ideal for use where the ability to adjust the bridle is a must.

In addition to the diverse product offering, **training classes** are conducted by factory representatives and by distributors on a regular basis. These sessions focus on proper maintenance of hoists, best practices in lifting, and troubleshooting techniques for use onsite.

To satisfy all of your lifting needs in the entertainment market, rely on the company with a rich 130-year heritage – Columbus McKinnon. For additional details, visit [www.cm-et.com](http://www.cm-et.com) or call us at 716.689.5400



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