

Motor Start Capacitor

110~330VAC EIA RS-463

MCS Series

MERITEK

FEATURES

- Operating Temperature: -40°C ~ +65°C
- Phenolic Plastic Case, Moisture And Oil Resistant
- Conforms to EIA RS-463 Standard for Type 1 and 2 Performance
- Compliant with ANSI/UL 810 standard
- UL Safety Approved: Certification No: E500704



PART NUMBERING SYSTEM

MCS 1 330 270 A 8 xx
 (1) (2) (3) (4) (5) (6) (7)



No	Items	Digit	Description	
(1)	Meritek Series	MCS	Motor Start Capacitor Series, Phenolic Plastic Case, Moisture And Oil Resistant	
(2)	EIA Standard	1	1: EIA RS-463 type 1 (heavy-duty)	2: EIA RS-463 type 2 (standard-duty)
(3)	Rated Voltage	330	330: 3300VAC	110/125/165/220/250/330VAC
(4)	Capacitance	270	270: 270~324 μF	Rated Capacitance, at 50/60Hz, 25°C
(5)	Terminal Type	A	A: Dual ¼" quick connect	See the terminal code below
(6)	Case Code	8	8: 2.562x4.365in (DxL)	See the dimension table below
(7)	Internal Code	xx	Internal Control Code	Internal control or Project reference

TERMINAL CODE

Terminal Type						
Code	A	R	X	C	Z	W
Description	Dual ¼" quick connect	Dual ¼" quick connect with resistor	Dual ¼" quick connect resistor and lug	Single ¼" quick connect	Single ¼" quick connect with angle	18AWG Insulated Wires

SEPCIFICATION

Item	Characteristic
Operating Temperature	-40°C ~ +65°C
Capacitance	21μF~ 1280μF
Rated Voltage	110VAC, 125VAC, 165VAC, 220VAC, 250VAC, 330VAC
Operating Frequency	50Hz / 60Hz
Dissipation Factor	Shall not exceed 0.1 or 10% at 50/60Hz, 25°C
Power Factor	80% ~ 90%
Leaking Current	5mA ~ 8mA
Withstand Voltage- Between Terminals	140% of Rated Voltage for 1 seconds
Withstand Voltage- Between Terminals and Case	2000VAC 5 seconds
EIA RS-463 Standard	Type 1 (Heavy-duty) and Type 2 (Standard duty)

Motor Start Capacitor

110~330VAC EIA RS-463

MCS Series

MERITEK

ELECTRICAL RATING – 110VAC

Part No.	EIA RS-431 Type	Voltage (VAC)	Capacitance		Case Size-Type 1		Case Size-Type 2	
			Min (μF)	Max (μF)	Code	DxL (in)	Code	DxL (in)
MCS□11021#	1, 2	110	21	25	1	1.437x2.750	1	1.437x2.750
MCS□11025#	1, 2	110	25	30	1	1.437x2.750	1	1.437x2.750
MCS□11030#	1, 2	110	30	36	1	1.437x2.750	1	1.437x2.750
MCS□11036#	1, 2	110	36	43	1	1.437x2.750	1	1.437x2.750
MCS□11043#	1, 2	110	43	52	1	1.437x2.750	1	1.437x2.750
MCS□11047#	1, 2	110	47	56	1	1.437x2.750	1	1.437x2.750
MCS□11053#	1, 2	110	53	64	1	1.437x2.750	1	1.437x2.750
MCS□11064#	1, 2	110	64	77	1	1.437x2.750	1	1.437x2.750
MCS□11072#	1, 2	110	72	86	1	1.437x2.750	1	1.437x2.750
MCS□11088#	1, 2	110	88	106	1	1.437x2.750	1	1.437x2.750
MCS□110108#	1, 2	110	108	130	1	1.437x2.750	1	1.437x2.750
MCS□110124#	1, 2	110	124	149	1	1.437x2.750	1	1.437x2.750
MCS□110130#	1, 2	110	130	156	1	1.437x2.750	1	1.437x2.750
MCS□110145#	1, 2	110	145	174	1	1.437x2.750	1	1.437x2.750
MCS□110161#	1, 2	110	161	193	1	1.437x2.750	1	1.437x2.750
MCS□110189#	1, 2	110	189	227	2	1.437x3.365	1	1.437x2.750
MCS□110216#	1, 2	110	216	259	2	1.437x3.365	2	1.437x3.365
MCS□110233#	1, 2	110	233	280	2	1.437x3.365	2	1.437x3.365
MCS□110243#	1, 2	110	243	292	4	1.812x3.365	2	1.437x3.365
MCS□110270#	1, 2	110	270	324	4	1.812x3.365	2	1.437x3.365
MCS□110324#	1, 2	110	324	389	4	1.812x4.365	4	1.812x3.365
MCS□110340#	1, 2	110	340	408	4	1.812x4.365	4	1.812x3.365
MCS□110378#	1, 2	110	378	454	4	1.812x4.365	4	1.812x3.365
MCS□110400#	1, 2	110	400	480	4	1.812x4.365	4	1.812x3.365
MCS□110430#	1, 2	110	430	516	4	1.812x4.365	4	1.812x3.365
MCS□110460#	1, 2	110	460	552	4	1.812x4.365	4	1.812x3.365
MCS□110540#	1, 2	110	540	648	4	1.812x4.365	5	1.812x4.365
MCS□110590#	1, 2	110	590	708	4	1.812x4.365	5	1.812x4.365
MCS□110645#	1, 2	110	645	774	7	2.062x4.365	7	2.062x4.365
MCS□110708#	1, 2	110	708	850	7	2.062x4.365	7	2.062x4.365
MCS□110720#	1, 2	110	720	864	7	2.062x4.365	7	2.062x4.365
MCS□110800#	1, 2	110	800	960	8	2.562x4.365	7	2.062x4.365
MCS□110815#	1, 2	110	815	978	8	2.562x4.365	7	2.062x4.365
MCS□110829#	2	110	829	995	--	--	7	2.062x4.365
MCS□110850#	2	110	850	1020	--	--	8	2.562x4.365
MCS□1101000#	2	110	1000	1200	--	--	8	2.562x4.365
MCS□1101020#	2	110	1020	1224	--	--	8	2.562x4.365
MCS□1101175#	2	110	1175	1410	--	--	8	2.562x4.365
MCS□1101280#	2	110	1280	1536	--	--	8	2.562x4.365

Note: "□" denoted to EIA RS-431 Type, "#" denoted to the terminal, case and internal code, Contact Meritek for complete part number.

Motor Start Capacitor

110~330VAC EIA RS-463

MCS Series

MERITEK

ELECTRICAL RATING – 125VAC

Part No.	EIA RS-431 Type	Voltage (VAC)	Capacitance		Case Size-Type 1		Case Size-Type 2	
			Min (µF)	Max (µF)	Code	DxL (in)	Code	DxL (in)
MCS□12521#	1, 2	125	21	25	1	1.437x2.750	1	1.437x2.750
MCS□12525#	1, 2	125	25	30	1	1.437x2.750	1	1.437x2.750
MCS□12530#	1, 2	125	30	36	1	1.437x2.750	1	1.437x2.750
MCS□12536#	1, 2	125	36	43	1	1.437x2.750	1	1.437x2.750
MCS□12543#	1, 2	125	43	52	1	1.437x2.750	1	1.437x2.750
MCS□12547#	1, 2	125	47	56	1	1.437x2.750	1	1.437x2.750
MCS□12553#	1, 2	125	53	64	1	1.437x2.750	1	1.437x2.750
MCS□12564#	1, 2	125	64	77	1	1.437x2.750	1	1.437x2.750
MCS□12572#	1, 2	125	72	86	1	1.437x2.750	1	1.437x2.750
MCS□12588#	1, 2	125	88	106	1	1.437x2.750	1	1.437x2.750
MCS□125108#	1, 2	125	108	130	1	1.437x2.750	1	1.437x2.750
MCS□125124#	1, 2	125	124	149	1	1.437x2.750	1	1.437x2.750
MCS□125130#	1, 2	125	130	156	2	1.437x3.365	1	1.437x2.750
MCS□125145#	1, 2	125	145	174	2	1.437x3.365	1	1.437x2.750
MCS□125161#	1, 2	125	161	193	2	1.437x3.365	1	1.437x2.750
MCS□125189#	1, 2	125	189	227	4	1.812x3.365	2	1.437x3.365
MCS□125216#	1, 2	125	216	259	4	1.812x3.365	2	1.437x3.365
MCS□125233#	1, 2	125	233	280	4	1.812x3.365	2	1.437x3.365
MCS□125243#	1, 2	125	243	292	4	1.812x3.365	2	1.437x3.365
MCS□125270#	1, 2	125	270	324	4	1.812x3.365	2	1.437x3.365
MCS□125324#	1, 2	125	324	389	5	1.812x4.365	4	1.812x3.365
MCS□125340#	1, 2	125	340	408	5	1.812x4.365	4	1.812x3.365
MCS□125378#	1, 2	125	378	454	5	1.812x4.365	4	1.812x3.365
MCS□125400#	1, 2	125	400	480	5	1.812x4.365	4	1.812x3.365
MCS□125430#	1, 2	125	430	516	5	1.812x4.365	4	1.812x3.365
MCS□125460#	1, 2	125	460	552	7	2.062x4.365	4	1.812x3.365
MCS□125540#	1, 2	125	540	648	7	2.062x4.365	5	1.812x4.365
MCS□125590#	1, 2	125	590	708	8	2.562x4.365	7	2.062x4.365
MCS□125645#	1, 2	125	645	774	8	2.562x4.365	7	2.062x4.365
MCS□125708#	2	125	708	850	--	--	7	2.062x4.365
MCS□125720#	2	125	720	864	--	--	7	2.062x4.365
MCS□125800#	2	125	800	960	--	--	7	2.062x4.365
MCS□125815#	2	125	815	978	--	--	7	2.062x4.365
MCS□125829#	2	125	829	995	--	--	8	2.562x4.365
MCS□125850#	2	125	850	1020	--	--	8	2.562x4.365
MCS□1251000#	2	125	1000	1200	--	--	8	2.562x4.365
MCS□1251020#	2	125	1020	1224	--	--	8	2.562x4.365
MCS□1251175#	2	125	1175	1410	--	--	8	2.562x4.365

Note: "□" denoted to EIA RS-431 Type, "#" denoted to the terminal, case and internal code, Contact Meritek for complete part number.

Motor Start Capacitor

110~330VAC EIA RS-463

MCS Series

MERITEK

ELECTRICAL RATING – 165VAC

Part No.	EIA RS-431 Type	Voltage	Capacitance		Case Size-Type 1		Case Size-Type 2	
		(VAC)	Min (µF)	Max (µF)	Code	DxL (in)	Code	DxL (in)
MCS□16521#	1, 2	165	21	25	1	1.437x2.750	1	1.437x2.750
MCS□16525#	1, 2	165	25	30	1	1.437x2.750	1	1.437x2.750
MCS□16530#	1, 2	165	30	36	1	1.437x2.750	1	1.437x2.750
MCS□16536#	1, 2	165	36	43	1	1.437x2.750	1	1.437x2.750
MCS□16543#	1, 2	165	43	52	1	1.437x2.750	1	1.437x2.750
MCS□16547#	1, 2	165	47	56	1	1.437x2.750	1	1.437x2.750
MCS□16553#	1, 2	165	53	64	1	1.437x2.750	1	1.437x2.750
MCS□16564#	1, 2	165	64	77	1	1.437x2.750	1	1.437x2.750
MCS□16572#	1, 2	165	72	86	1	1.437x2.750	1	1.437x2.750
MCS□16588#	1, 2	165	88	106	2	1.437x3.365	1	1.437x2.750
MCS□165108#	1, 2	165	108	130	2	1.437x3.365	1	1.437x2.750
MCS□165124#	1, 2	165	124	149	4	1.812x3.365	1	1.437x2.750
MCS□165130#	1, 2	165	130	156	4	1.812x3.365	1	1.437x2.750
MCS□165145#	1, 2	165	145	174	4	1.812x3.365	1	1.437x2.750
MCS□165161#	1, 2	165	161	193	4	1.812x3.365	1	1.437x2.750
MCS□165189#	1, 2	165	189	227	4	1.812x3.365	1	1.437x3.365
MCS□165216#	1, 2	165	216	259	5	1.812x4.365	2	1.437x3.365
MCS□165233#	1, 2	165	233	280	5	1.812x4.365	2	1.437x3.365
MCS□165243#	1, 2	165	243	292	5	1.812x4.365	2	1.437x3.365
MCS□165270#	1, 2	165	270	324	5	1.812x4.365	2	1.437x3.365
MCS□165324#	1, 2	165	324	389	5	1.812x4.365	4	1.812x3.365
MCS□165340#	1, 2	165	340	408	7	2.062x4.365	4	1.812x3.365
MCS□165378#	1, 2	165	378	454	8	2.562x4.365	4	1.812x3.365
MCS□165400#	1, 2	165	400	480	8	2.562x4.365	4	1.812x3.365
MCS□165430#	2	165	430	516	--	--	4	1.812x3.365
MCS□165460#	2	165	460	552	--	--	4	1.812x3.365
MCS□165540#	2	165	540	648	--	--	5	1.812x4.365
MCS□165590#	2	165	590	708	--	--	5	1.812x4.365
MCS□165645#	2	165	645	774	--	--	7	2.062x4.365
MCS□165708#	2	165	708	850	--	--	7	2.062x4.365
MCS□165720#	2	165	720	864	--	--	7	2.062x4.365
MCS□165800#	2	165	800	960	--	--	7	2.062x4.365
MCS□165815#	2	165	815	978	--	--	7	2.062x4.365
MCS□165829#	2	165	829	995	--	--	7	2.062x4.365
MCS□165850#	2	165	850	1020	--	--	8	2.562x4.365

Note: "□" denoted to EIA RS-431 Type, "#" denoted to the terminal, case and internal code, Contact Meritek for complete part number.

Motor Start Capacitor

110~330VAC EIA RS-463

MCS Series

MERITEK

ELECTRICAL RATING – 220VAC

Part No.	EIA RS-431 Type	Voltage	Capacitance		Case Size-Type 1		Case Size-Type 2	
		(VAC)	Min (μF)	Max (μF)	Code	DxL (in)	Code	DxL (in)
MCS□22021#	1, 2	220	21	25	1	1.437x2.750	1	1.437x2.750
MCS□22025#	1, 2	220	25	30	1	1.437x2.750	1	1.437x2.750
MCS□22030#	1, 2	220	30	36	1	1.437x2.750	1	1.437x2.750
MCS□22036#	1, 2	220	36	43	2	1.437x3.365	1	1.437x2.750
MCS□22043#	1, 2	220	43	52	2	1.437x3.365	2	1.437x3.365
MCS□22047#	1, 2	220	47	56	2	1.437x3.365	2	1.437x3.365
MCS□22053#	1, 2	220	53	64	4	1.812x3.365	2	1.437x3.365
MCS□22064#	1, 2	220	64	77	4	1.812x3.365	4	1.812x3.365
MCS□22072#	1, 2	220	72	86	4	1.812x3.365	4	1.812x3.365
MCS□22088#	1, 2	220	88	106	4	1.812x3.365	4	1.812x3.365
MCS□220108#	1, 2	220	108	130	5	1.812x4.365	4	1.812x3.365
MCS□220124#	1, 2	220	124	149	5	1.812x4.365	5	1.812x4.365
MCS□220130#	1, 2	220	130	156	5	1.812x4.365	5	1.812x4.365
MCS□220145#	1, 2	220	145	174	7	2.062x4.365	7	2.062x4.365
MCS□220161#	1, 2	220	161	193	8	2.562x4.365	7	2.062x4.365
MCS□220189#	1, 2	220	189	227	8	2.562x4.365	7	2.062x4.365
MCS□220216#	1, 2	220	216	259	8	2.562x4.365	8	2.562x4.365
MCS□220233#	1, 2	220	233	280	8	2.562x4.365	8	2.562x4.365
MCS□220243#	1, 2	220	243	292	8	2.562x4.365	8	2.562x4.365
MCS□220270#	1, 2	220	270	324	8	2.562x4.365	8	2.562x4.365
MCS□220324#	2	220	324	389	--	1.812x4.365	8	2.562x4.365
MCS□220340#	2	220	340	408	--	1.812x4.365	8	2.562x4.365
MCS□220378#	2	220	378	454	--	1.812x4.365	8	2.562x4.365
MCS□220400#	2	220	400	480	--	1.812x4.365	8	2.562x4.365
MCS□220430#	2	220	430	516	--	1.812x4.365	8	2.562x4.365

Note: "□" denoted to EIA RS-431 Type, "#" denoted to the terminal, case and internal code, Contact Meritek for complete part number.

Motor Start Capacitor

110~330VAC EIA RS-463

MCS Series

MERITEK

ELECTRICAL RATING – 250VAC

Part No.	EIA RS-431 Type	Voltage	Capacitance		Case Size-Type 1		Case Size-Type 2	
		(VAC)	Min (µF)	Max (µF)	Code	DxL (in)	Code	DxL (in)
MCS□25021#	1, 2	250	21	25	1	1.437x2.750	1	1.437x2.750
MCS□25025#	1, 2	250	25	30	1	1.437x2.750	1	1.437x2.750
MCS□25030#	1, 2	250	30	36	2	1.437x3.365	2	1.437x3.365
MCS□25036#	1, 2	250	36	43	2	1.437x3.365	2	1.437x3.365
MCS□25043#	1, 2	250	43	52	4	1.812x3.365	2	1.437x3.365
MCS□25047#	1, 2	250	47	56	4	1.812x3.365	2	1.437x3.365
MCS□25053#	1, 2	250	53	64	4	1.812x3.365	4	1.812x3.365
MCS□25064#	1, 2	250	64	77	4	1.812x3.365	4	1.812x3.365
MCS□25072#	1, 2	250	72	86	4	1.812x3.365	4	1.812x3.365
MCS□25088#	1, 2	250	88	106	5	1.812x4.365	5	1.812x4.365
MCS□250108#	1, 2	250	108	130	5	1.812x4.365	5	1.812x4.365
MCS□250124#	1, 2	250	124	149	7	2.062x4.365	5	1.812x4.365
MCS□250130#	1, 2	250	130	156	8	2.562x4.365	5	1.812x4.365
MCS□250145#	1, 2	250	145	174	8	2.562x4.365	7	2.062x4.365
MCS□250161#	1, 2	250	161	193	8	2.562x4.365	7	2.062x4.365
MCS□250189#	1, 2	250	189	227	8	2.562x4.365	8	2.562x4.365
MCS□250216#	1, 2	250	216	259	8	2.562x4.365	8	2.562x4.365
MCS□250233#	1, 2	250	233	280	8	2.562x4.365	8	2.562x4.365
MCS□250243#	1, 2	250	243	292	8	2.562x4.365	8	2.562x4.365
MCS□250270#	1, 2	250	270	324	8	2.562x4.365	8	2.562x4.365
MCS□250324#	2	250	324	389	--	--	8	2.562x4.365
MCS□250340#	2	250	340	408	--	--	8	2.562x4.365
MCS□250378#	2	250	378	454	--	--	8	2.562x4.365
MCS□250400#	2	250	400	480	--	--	8	2.562x4.365
MCS□250430#	2	250	430	516	--	--	8	2.562x4.365

Note: "□" denoted to EIA RS-431 Type, "#" denoted to the terminal, case and internal code, Contact Meritek for complete part number.

ELECTRICAL RATING – 330VAC

Part No.	EIA RS-431 Type	Voltage	Capacitance		Case Size-Type 1		Case Size-Type 2	
		(VAC)	Min (µF)	Max (µF)	Code	DxL (in)	Code	DxL (in)
MCS□2125#	330	1, 2	21	25	2	1.437x3.365	1	1.437x2.750
MCS□2530#	330	1, 2	25	30	2	1.437x3.365	1	1.437x2.750
MCS□3036#	330	1, 2	30	36	4	1.812x3.365	2	1.437x3.365
MCS□3643#	330	1, 2	36	43	4	1.812x3.365	2	1.437x3.365
MCS□4352#	330	1, 2	43	52	4	1.812x3.365	2	1.437x3.365
MCS□4756#	330	1, 2	47	56	4	1.812x3.365	2	1.437x3.365
MCS□5364#	330	1, 2	53	64	5	1.812x4.365	4	1.812x3.365
MCS□6477#	330	1, 2	64	77	5	1.812x4.365	4	1.812x3.365
MCS□7286#	330	1, 2	72	86	5	1.812x4.365	4	1.812x3.365
MCS□88106#	330	1, 2	88	106	7	2.062x4.365	5	1.812x4.365
MCS□108130#	330	1, 2	108	130	8	2.562x4.365	5	1.812x4.365
MCS□124149#	330	1, 2	124	149	8	2.562x4.365	5	1.812x4.365
MCS□130156#	330	1, 2	130	156	8	2.562x4.365	5	1.812x4.365
MCS□145174#	330	1, 2	145	174	8	2.562x4.365	7	2.062x4.365
MCS□161193#	330	1, 2	161	193	8	2.562x4.365	7	2.062x4.365
MCS□189227#	330	1, 2	189	227	8	2.562x4.365	8	2.562x4.365
MCS□216259#	330	2	216	259	--	--	8	2.562x4.365
MCS□233280#	330	2	233	280	--	--	8	2.562x4.365
MCS□243292#	330	2	243	292	--	--	8	2.562x4.365
MCS□270324#	330	2	270	324	--	--	8	2.562x4.365

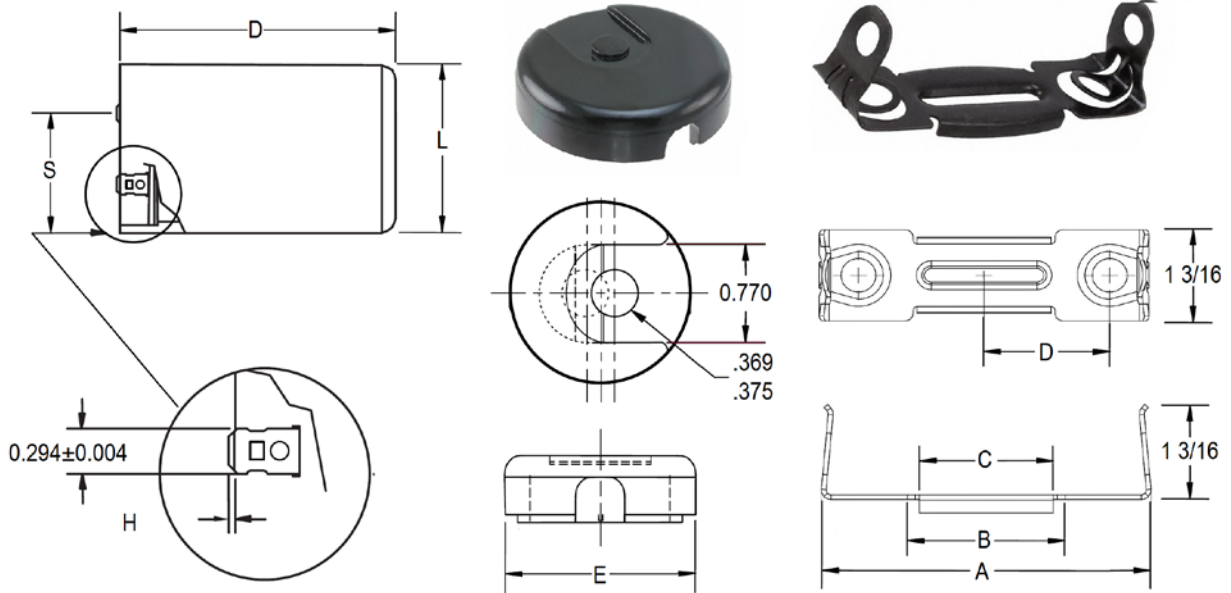
Note: "□" denoted to EIA RS-431 Type, "#" denoted to the terminal, case and internal code, Contact Meritek for complete part number.

Motor Start Capacitor 110~330VAC EIA RS-463

MCS Series

MERITEK

OPTIONAL ACCESSORIES



Unit: in

Size Code	Capacitor Dimension				End Cap	Bracket			
	D±0.020	L±0.020	S Nom	H Max	E Nom	A±0.015	B±0.015	C±0.015	D±0.015
1	1.437	2.750	0.500	0.025	1 ⁷ / ₁₆	3.375	1.171	1.062	1.258
2	1.437	3.365	0.500	0.025	1 ⁷ / ₁₆	4.050	1.812	1.703	1.575
3	1.437	4.365	0.500	0.025	1 ⁷ / ₁₆	5.050	2.718	2.000	2.075
4	1.812	3.365	0.625	0.025	1 ¹³ / ₁₆	4.050	1.812	1.703	1.575
5	1.812	4.365	0.625	0.025	1 ¹³ / ₁₆	5.050	2.718	2.000	2.075
6	2.062	3.365	0.875	0.025	2 ¹ / ₁₆	4.050	1.812	1.703	1.575
7	2.062	4.365	0.875	0.025	2 ¹ / ₁₆	5.050	2.718	2.000	2.075
8	2.562	4.365	0.875	0.025	2 ⁹ / ₁₆	5.050	2.718	2.000	2.075

*Specifications subject to change without notice.