


# Distributed Gate Thyristors

IXYS UK Westcode Ltd is recognised as the Worldwide leader in distributed gate technology. These devices are available with blocking voltages to 4.5kV and average current to 4kA, with  $t_q$  from 10 to 300 $\mu$ s. The unique distributed gate design and lifetime control features give these devices both high di/dt capability and fast, low recovery turn-off, while maintaining a low on-state voltage drop. Ideally suited to application including: induction power supplies, high frequency inverters/converters, UPS and pulse power.

## Capsule Types

Type Part No.	$V_{DRM}$ V	$V_{RRM}$ V	$I_{TAV}$ A $T_K = 55^\circ C$	$I_{TSM}$ A	$I^2t$ 10 ms 1/2 sine $V_R \leq 60\% V_{RRM}$ A <sup>2</sup> s	$t_q$ @ 200 V/ $\mu$ s $\mu$ s	Typ. Reverse Recovery Charge			$V_{TO}$ V	$r_T$ @ $T_{JM}$ m $\Omega$	$R_{thJK}$ 180° Sine K/W	Fig. No.	Package style Outlines on pages O-01...O-29
							$Q_{rr}$ $\mu$ C	@ $T_{JM}$ A	@ -di/dt A/ $\mu$ s					
R0472YS12E	1200	1200	472	4300	92.5 x 10 <sup>3</sup>	25	155	550	40	1.648	1.125	0.050	W9	
R0472YS12F	1200	1200	472	4300	92.5 x 10 <sup>3</sup>	30	155	550	40	1.648	1.125	0.050	W9	
R0472YS16E	1600	1600	472	4300	92.5 x 10 <sup>3</sup>	25	155	550	40	1.648	1.125	0.050	W9	
R0472YS16F	1600	1600	472	4300	92.5 x 10 <sup>3</sup>	30	155	550	40	1.648	1.125	0.050	W9	
R0487YS12D	1200	1200	487	4300	92.5 x 10 <sup>3</sup>	20	90	550	40	1.738	0.943	0.0500	W9	
R0487YS12E	1200	1200	487	4300	92.5 x 10 <sup>3</sup>	25	90	550	40	1.738	0.943	0.0500	W9	
R0487YS14D	1400	1400	487	4300	92.5 x 10 <sup>3</sup>	20	90	550	40	1.738	0.943	0.0500	W9	
R0487YS14E	1400	1400	487	4300	92.5 x 10 <sup>3</sup>	25	90	550	40	1.738	0.943	0.0500	W9	
R0577YS12C	1200	1200	577	6000	180 x 10 <sup>3</sup>	15	150	550	40	1.510	0.640	0.0500	W9	
R0577YS12D	1200	1200	577	6000	180 x 10 <sup>3</sup>	20	150	550	40	1.510	0.640	0.0500	W9	
R0577YS12E	1200	1200	577	6000	180 x 10 <sup>3</sup>	25	150	550	40	1.510	0.640	0.0500	W9	
R0633YS12D	1200	1200	633	6300	200 x 10 <sup>3</sup>	20	125	550	40	1.250	0.614	0.0500	W9	
R0633YS12E	1200	1200	633	6300	200 x 10 <sup>3</sup>	25	125	550	40	1.250	0.614	0.0500	W9	
R0633YS12F	1200	1200	633	6300	200 x 10 <sup>3</sup>	30	125	550	40	1.250	0.614	0.0500	W9	
R0717LC14G	1400	1400	717	7050	248.5 x 10 <sup>3</sup>	35	425	1000	60	1.752	0.732	0.0320	W10	
R0717LC18G	1800	1800	717	7050	248.5 x 10 <sup>3</sup>	35	425	1000	60	1.752	0.732	0.0320	W10	
R0736LC20J	2000	2000	736	6800	231 x 10 <sup>3</sup>	50	640	1000	60	1.842	0.619	0.0320	W10	
R0736LC20K	2000	2000	736	6800	231 x 10 <sup>3</sup>	60	640	1000	60	1.842	0.619	0.0320	W10	
R0736LC22J	2200	2200	736	6800	231 x 10 <sup>3</sup>	50	640	1000	60	1.842	0.619	0.0320	W10	
R0736LC22K	2200	2200	736	6800	231 x 10 <sup>3</sup>	60	640	1000	60	1.842	0.619	0.0320	W10	
R0736LC25J	2500	2500	736	6800	231 x 10 <sup>3</sup>	50	640	1000	60	1.842	0.619	0.0320	W10	
R0736LC25K	2500	2500	736	6800	231 x 10 <sup>3</sup>	60	640	1000	60	1.842	0.619	0.0320	W10	
R0736LC25L	2500	2500	736	6800	231 x 10 <sup>3</sup>	65	640	1000	60	1.842	0.619	0.0320	W10	
R0736LC25M	2500	2500	736	6800	231 x 10 <sup>3</sup>	70	640	1000	60	1.842	0.619	0.0320	W10	
R0809LC10A	1000	1000	809	8000	320 x 10 <sup>3</sup>	10	120	1000	60	2.100	0.300	0.0320	W10	
R0809LC10B	1000	1000	809	8000	320 x 10 <sup>3</sup>	12	120	1000	60	2.100	0.300	0.0320	W10	
R0830LC12C	1200	1200	830	8500	361 x 10 <sup>3</sup>	15	285	1000	60	1.900	0.357	0.0320	W10	
R0830LC12D	1200	1200	830	8500	361 x 10 <sup>3</sup>	20	285	1000	60	1.900	0.357	0.0320	W10	
R0830LC12E	1200	1200	830	8500	361 x 10 <sup>3</sup>	25	285	1000	60	1.900	0.357	0.0320	W10	
R0830LC12F	1200	1200	830	8500	361 x 10 <sup>3</sup>	30	285	1000	60	1.900	0.357	0.0320	W10	
R0830LC14C	1400	1400	830	8500	361 x 10 <sup>3</sup>	15	285	1000	60	1.900	0.357	0.0320	W10	
R0830LC14D	1400	1400	830	8500	361 x 10 <sup>3</sup>	20	285	1000	60	1.900	0.357	0.0320	W10	
R0830LC14E	1400	1400	830	8500	361 x 10 <sup>3</sup>	25	285	1000	60	1.900	0.357	0.0320	W10	
R0830LC14F	1400	1400	830	8500	361 x 10 <sup>3</sup>	30	285	1000	60	1.900	0.357	0.0320	W10	
R0878LC18K	1800	1800	878	7500	281 x 10 <sup>3</sup>	60	720	1000	60	1.447	0.480	0.0320	W10	
R0878LC18L	1800	1800	878	7500	281 x 10 <sup>3</sup>	65	720	1000	60	1.447	0.480	0.0320	W10	
R0878LC18M	1800	1800	878	7500	281 x 10 <sup>3</sup>	70	720	1000	60	1.447	0.480	0.0320	W10	
R0878LC20K	2000	1800	878	7500	281 x 10 <sup>3</sup>	60	720	1000	60	1.447	0.480	0.0320	W10	
R0878LC20L	2000	1800	878	7500	281 x 10 <sup>3</sup>	65	720	1000	60	1.447	0.480	0.0320	W10	
R0878LC20M	2000	1800	878	7500	281 x 10 <sup>3</sup>	70	720	1000	60	1.447	0.480	0.0320	W10	
R0878LC21K	2100	1800	878	7500	281 x 10 <sup>3</sup>	60	720	1000	60	1.447	0.480	0.0320	W10	
R0878LC21L	2100	1800	878	7500	281 x 10 <sup>3</sup>	65	720	1000	60	1.447	0.480	0.0320	W10	
R0878LC21M	2100	1800	878	7500	281 x 10 <sup>3</sup>	70	720	1000	60	1.447	0.480	0.0320	W10	
R0929LC10A	1000	1000	929	9000	405 x 10 <sup>3</sup>	10	150	1000	60	1.549	0.350	0.0320	W10	
R0929LC10B	1000	1000	929	9000	405 x 10 <sup>3</sup>	12	150	1000	60	1.549	0.350	0.0320	W10	
R0929LC10C	1000	1000	929	9000	405 x 10 <sup>3</sup>	15	150	1000	60	1.549	0.350	0.0320	W10	
R0929LC12A	1200	1200	929	9000	405 x 10 <sup>3</sup>	10	150	1000	60	1.549	0.350	0.0320	W10	
R0929LC12B	1200	1200	929	9000	405 x 10 <sup>3</sup>	12	150	1000	60	1.549	0.350	0.0320	W10	
R0929LC12C	1200	1200	929	9000	405 x 10 <sup>3</sup>	15	150	1000	60	1.549	0.350	0.0320	W10	
R0929LC12D	1200	1200	929	9000	405 x 10 <sup>3</sup>	20	150	1000	60	1.549	0.350	0.0320	W10	
R0929LC12E	1200	1200	929	9000	405 x 10 <sup>3</sup>	25	150	1000	60	1.549	0.350	0.0320	W10	
R0964LC10C	1000	1000	964	9400	442 x 10 <sup>3</sup>	15	170	1000	60	1.530	0.309	0.0320	W10	
R0964LC10D	1000	1000	964	9400	442 x 10 <sup>3</sup>	20	170	1000	60	1.530	0.309	0.0320	W10	
R0964LC10E	1000	1000	964	9400	442 x 10 <sup>3</sup>	25	170	1000	60	1.530	0.309	0.0320	W10	
R0964LC12C	1200	1200	964	9400	442 x 10 <sup>3</sup>	15	170	1000	60	1.530	0.309	0.0320	W10	



W9 Weight 90 g



W10 Weight 340 g



W11 Weight 510 g