



# Frontier Electronics Corp.

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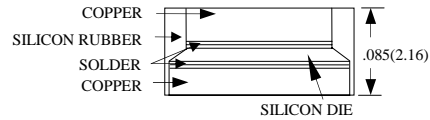
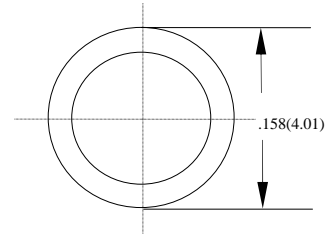
Web: <http://www.frontierusa.com>

## 3A SILICON RECTIFIER CELL

### SC30-005 THRU SC30-10

#### FEATURES

- IDEAL FOR HYBRID CIRCUITS
  - SOLDER MOUNTING SURFACES
  - TYPICAL  $I_R$  LESS THAN  $1\mu A$
  - DIFFUSED JUNCTION
  - HIGH SURGE CAPABILITY
  - MOUNTING POSITION: ANY
  - PR4 PACKAGE DIMENSIONS IN INCHES AND (MILLIMETERS)
- CELL DESIGNATION: A SUFFIX LETTER IS ADDED TO THE PRIMARY CELL DESIGNATION TO INDICATES THE CELL VOLTAGE



MAXIMUM RATINGS AND ELECTRICAL CHARACTERISTICS RATINGS AT 25°C AMBIENT TEMPERATURE UNLESS OTHERWISE SPECIFIED SINGLE PHASE, HALF WAVE, 60 HZ, RESISTIVE OR INDUCTIVE LOAD. FOR CAPACITIVE LOAD, DERATE CURRENT BY 20%

RATINGS	SYMBOL	SC30-005	SC30-01	SC30-02	SC30-04	SC30-06	SC30-08	SC30-10	UNITS
MAXIMUM RECURRENT PEAK REVERSE VOLTAGE	$V_{RRM}$	50	100	200	400	600	800	1000	V
MAXIMUM RMS VOLTAGE	$V_{RMS}$	35	70	140	280	420	560	700	V
MAXIMUM DC BLOCKING VOLTAGE	$V_{DC}$	50	100	200	400	600	800	1000	V
MAXIMUM AVERAGE FORWARD RECTIFIER CURRENT @ TC 100°C	$I_O$	3.0							A
PEAK FORWARD SURGE CURRENT 8.3m SINGLE HALF SINE-WAVE SUPERIMPOSED ON RATED LOAD JEDEC METHOD	$I_{FSM}$	150							A
STORAGE TEMPERATURE RANGE	$T_{STG}$	- 55 TO + 150							°C
OPERATING TEMPERATURE RANGE	$T_{OP}$	- 55 TO + 150							°C

#### ELECTRICAL CHARACTERISTICS (@ $T_A = 25^\circ C$ UNLESS OTHERWISE NOTED)

CHARACTERISTICS	SYMBOL	SC30-005	SC30-01	SC30-02	SC30-04	SC30-06	SC30-08	SC30-10	UNITS
MAXIMUM FORWARD VOLTAGE AT SPECIFIED CURRENT SC30 @ IF 3.0A	$V_F$	1.2							V
MAXIMUM REVERSE LEAKAGE CURRENT AT RATED DC BLOCKING VOLTAGE	$I_R$	10							$\mu A$