

## Specifications 技术参数

### High speed fuses

#### Ratings & Features Applications

##### 电气参数/功能应用领域:

- ✧ Volts电压: 1500Vdc;
- ✧ Amps电流: 1400-3000A;
- ✧ Interrupting Capacity分断:
  - 250kA@1500Vdc; (L/R≤4ms)
  - 100kA@1500Vdc; (L/R≤15ms)
- ✧ Design For Dc Applications 直流应用设计;
- ✧ Excellent Dc Performance 卓越的直流分断能力;
- ✧ Superior cycling capability 可循环利用率高



#### Standards / Approvals

##### 认证/标准:

- ✧ Refer To UL 248-13;
- ✧ 性能参考UL 248-13;
- ✧ Reach Declaration Available Upon Request;
  - 可根据要求提供REACH声明;
- ✧ CE;
- ✧ RoHS Compliant.
  - 符合RoHS。

#### Work/Storage condition

##### 工作及储存条件:

Work within the temperature -40°C to +100°C range.

工作温度范围: -40°C~100°C;

Fuses should be stored in their original boxes under typical warehouse conditions for electromechanical products (free from any dirt and dust).Storage conditions should be no more than 70 percent relative humidity and in the -40°C to +85°C range.

熔断器应保存在机电产品的典型仓库条件下(无任何污垢和灰尘)的原箱中。储存条件应不超过70%的相对湿度,在-40°C至+85°C范围内。

#### Product Model

##### 产品型号说明:

**HC**
**HV**
**I**
**1500**
**=**
**3000**
**A**
**=**
**159E**

HC: Company Code

PV: Photovoltaic

HV: High Speed

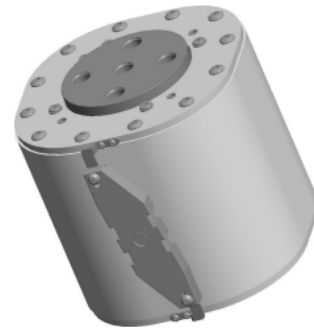
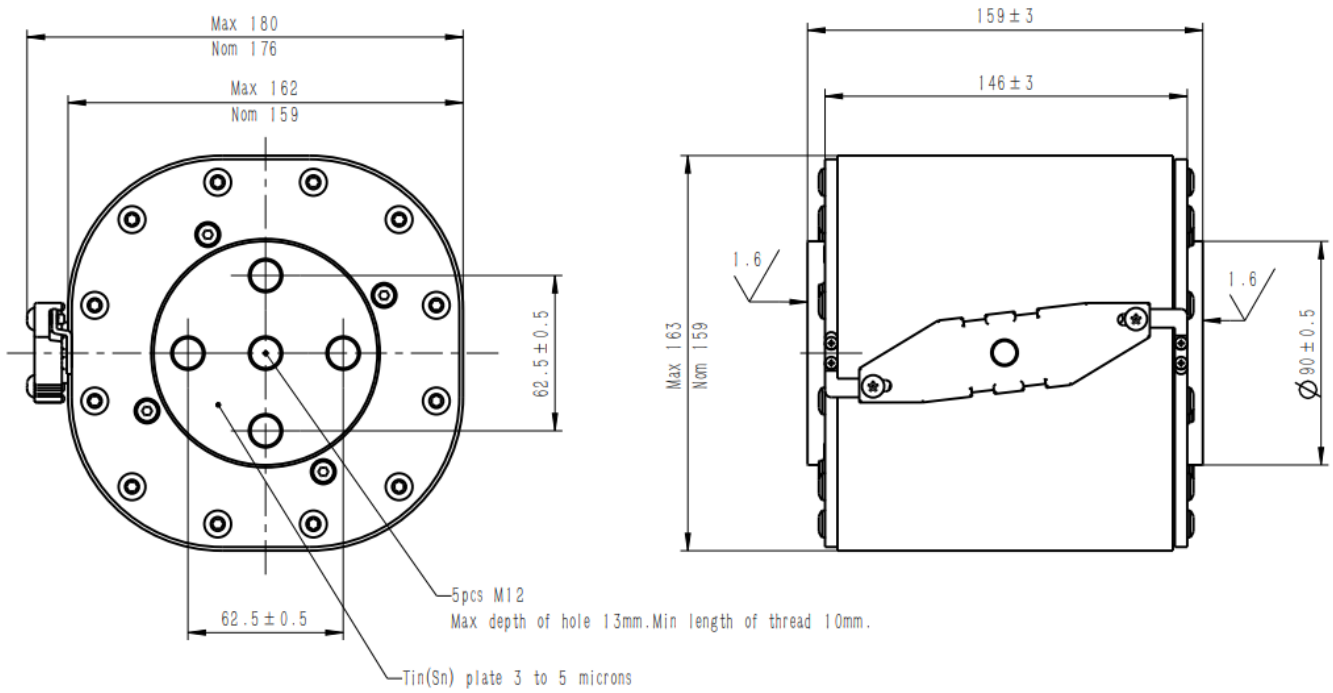
F: Fiberglass T: Ceramics

Rated Voltage: 1500: 1500V

Rated Current: 3000: 3000A

x: Connect: A B

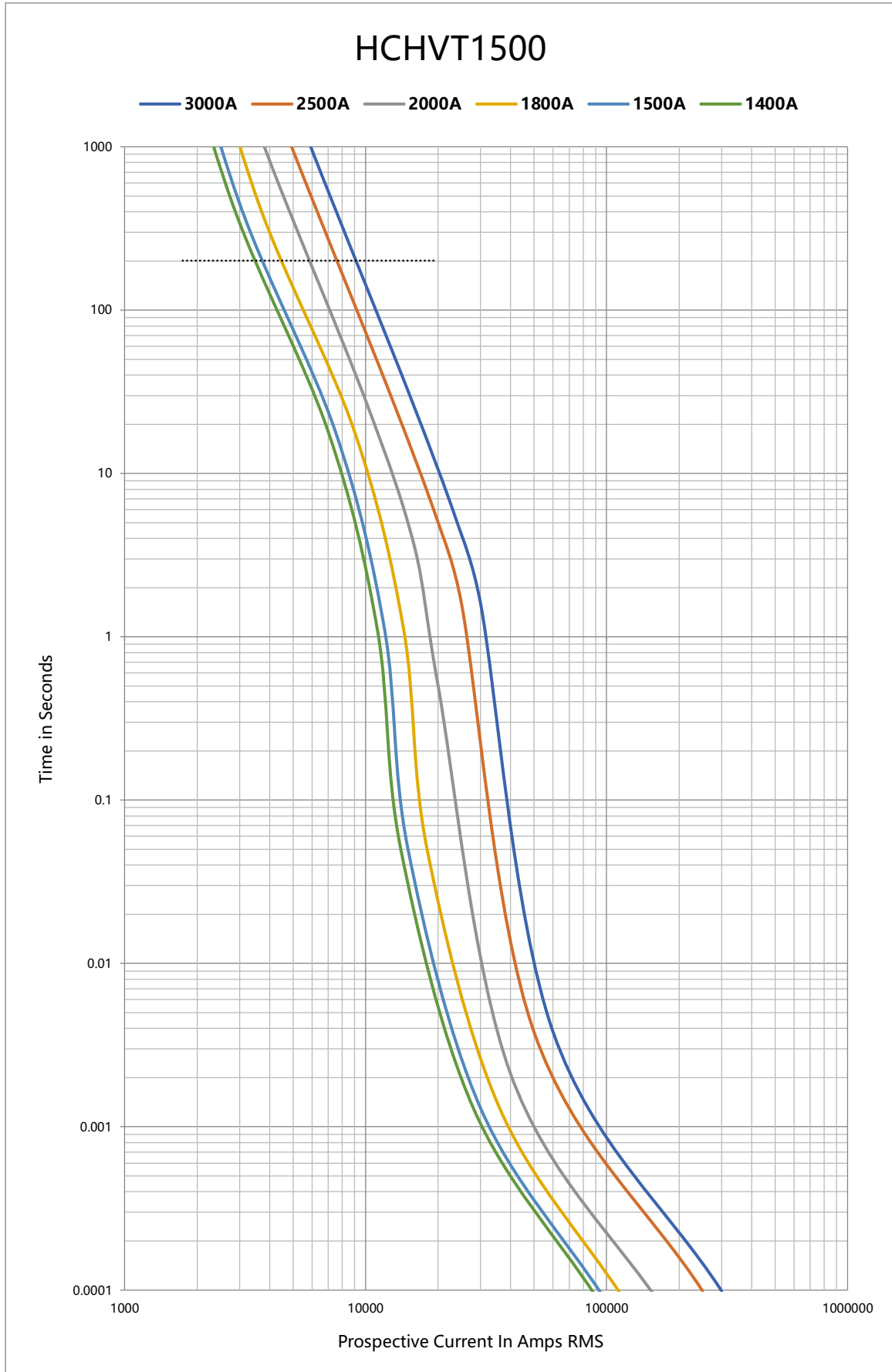
Type Series Code: 159E

**Dimensions (mm)**
**尺寸**

**Fuse Ratings**
**额定参数**

Part No.	Fuse Amps	Average 250KA@1500Vdc		Power Loss	Approvals
		Pre-Arcing I <sup>2</sup> t (A <sup>2</sup> s)	Max Operating I <sup>2</sup> t (A <sup>2</sup> s)	(W)	UL
HCHVT1500-1400A-159E	<u>1400A</u>	833,250	3,024,000	350	○ Pending
HCHVT1500-1500A-159E	<u>1500A</u>	1,078,000	3,759,500	370	○ Pending
HCHVT1500-1800A-159E	<u>1800A</u>	1,980,000	5,750,000	460	○ Pending
HCHVT1500-2000A-159E	<u>2000A</u>	2,530,000	7,910,000	475	○ Pending
HCHVT1500-2500A-159E	<u>2500A</u>	4,696,500	14,294,000	520	○ Pending
HCHVT1500-3000A-159E	<u>3000A</u>	8,505,000	25,029,000	590	○ Pending

Time-Current Curve

时间电流曲线图



## Operating conditions

### 使用条件

- ◇ Package storage Temperature:  $-40^{\circ}\text{C} \sim 85^{\circ}\text{C}$ ; < 70%RH;  
包装存储温度:  $-40^{\circ}\text{C} \sim 85^{\circ}\text{C}$ ; 湿度 < 70%RH
  - ◇ Operating temperature:  $-5^{\circ}\text{C} \sim 40^{\circ}\text{C}$ ;  
正常使用条件:  $-5^{\circ}\text{C} \sim 40^{\circ}\text{C}$ ;
  - ◇ Allowable operating temperature:  $-40^{\circ}\text{C} \sim 100^{\circ}\text{C}$ ;  
允许使用条件:  $-40^{\circ}\text{C} \sim 100^{\circ}\text{C}$ ;
  - ◇ Regular current flow should  $\leq 75\%$  of recommended rated current;  
推荐长期通流的电流值不大于额定电流的75%;
  
  - ◇ Installation conditions: The fuse should be mounted to busbar with 5pcs M12 socket set screws at each side, the screws according to ISO4026/DN913 or ISO4029/DIN916 are recommended. The studs must be tightened carefully applying a torque of 5-8 N.m, recommended nut tightening torques is  $35 \pm 4\%$  N.m.  
应正确安装在母线上, 两侧各有5个M12内六角螺钉。建议使用符合ISO4026/DN913或ISO4029/DIN916标准的螺钉。施加5-8 N.m的扭矩, 推荐的螺母拧紧扭矩为 $35 \pm 4\%$ N.m。
  - ◇ Replacing fuses if damaging facilities;  
对有机损伤的熔断器必须进行更换;
  
  - ◇ Temperature correction factors: when below  $-5^{\circ}\text{C}$  ( $23^{\circ}\text{F}$ ), low overload (L.O.) pre-arcing time will slightly extend, rated current will slightly increase;  
周围空气温度变化的参数修正: 在低于 $-5^{\circ}\text{C}$ 下工作, 熔断器的低倍过载电流的弧前时间略有延长, 额定电流略有增大, 但是除非 $-5^{\circ}\text{C}$ 以上不是工作范围, 一般不参考增加熔断器额定电流;
  - ◇ If operating above  $40^{\circ}\text{C}$  ( $104^{\circ}\text{F}$ ), rated current need extra corrections, factors:  $-Kt$ ①。  
熔断器在 $40^{\circ}\text{C}$ 以上工作, 额定电流需要额外的修正, 修正系数为 $-Kt$ 。
- \*Note①: Kt value has already considered the safety current allowance under regular operating scenarios.  
\*注1: Kt的取值已考虑熔断器在正常工作条件下的额定电流安全余量的影响。

