



Subset of models shown.



H681x-V Series

Split-Core Current Transformers, Voltage Output

Product Overview

The H681x-V series of 1 volt and 0.333 volt split-core current transformers (CTs) provide secondary AC voltage proportional to the primary (sensed) current. For use with power meters, data loggers, chart recorders, and other instruments, the H681x-V series CTs provide a cost-effective means to transform electrical service amperages to a voltage compatible with monitoring equipment.

Product Identification

⚠️ DANGER

HAZARD OF ELECTRIC SHOCK, EXPLOSION, OR ARC FLASH / RISQUE D'ÉLECTROCUTION, D'EXPLOSION OU D'ARC ÉLECTRIQUE

- Apply appropriate personal protective equipment (PPE) and follow safe electrical work practices. See NFPA 70E in the USA or applicable local standards. / Portez un équipement de protection individuelle (EPI) approprié et observez les règles de sécurité en matière de travaux électriques. Consultez la norme NFPA 70E aux États-Unis ou les normes locales applicables.
- This equipment must only be installed and serviced by qualified electrical personnel. / Cet équipement ne doit être installé et entretenu que par du personnel qualifié.
- Turn off all power supplying equipment before working on or inside the equipment. / Coupez toutes les équipements d'alimentation électrique avant de travailler sur ou dans l'équipement.
- Product may use multiple voltage/power sources. Disconnect ALL sources before servicing. / Le produit est susceptible d'utiliser plusieurs sources de tension, d'alimentation. Déconnectez TOUTES les sources avant toute intervention d'entretien.
- Use a properly rated voltage sensing device to confirm that power is off. DO NOT depend on this product for voltage indication. / Utilisez un dispositif de détection de tension adéquat afin de vérifier que l'alimentation est bien coupée. NE dépendez PAS ce produit comme un indicateur de tension.
- Current transformer secondaries must be shorted or connected to a burden at all times. / Les secondaires de transformateur de courant doivent être en permanence mis en court-circuit ou raccordés à une charge.
- Products rated only for basic insulation must be installed on insulated conductors. / Les produits n'étant conçus que pour une isolation nominale, doivent être installés sur des conducteurs isolés.
- Replace all doors, covers and protective devices before powering the equipment. / Remplacez toutes les portes, tous les capots et dispositifs de protection avant de mettre l'équipement sous tension.
- This product must be installed inside a suitable fire and electrical enclosure. / Cet appareil doit être installé à l'intérieur d'une armoire offrant une protection contre les risques électriques et d'incendie.
- This product is not intended for life or safety applications. / Ce produit n'est pas conçu pour les applications de sécurité.

Failure to follow these instructions will result in death or serious injury. / Le non-respect de ces instructions est susceptible d'entraîner la mort ou des blessures graves.

⚠️ WARNING/AVERTISSEMENT

RISK OF INJURY OR EQUIPMENT DAMAGE/ RISQUE DE BLESSURE OU DE DÉTÉRIORATION DE L'ÉQUIPEMENT

- Do not apply current transducers to circuits having a phase-to-phase voltage greater than their voltage rating unless adequate additional insulation is applied between the primary conductor and the current transducers. / N'utilisez pas ces TC sur des circuits dont la tension entre phases est supérieure à la tension nominale indiquée, sauf si une isolation supplémentaire adéquate a été ajoutée entre le conducteur primaire et les transducteurs de courant.
- To reduce the risk of electric shock, always open or disconnect circuit from power-distribution system (or service) of building before installing of servicing current transformers. / Pour réduire le risque d'électrocution, toujours ouvrir ou déconnecter le circuit du système de distribution électrique (ou du service) du bâtiment avant toute installation ou intervention sur des transformateurs de courant.
- The current transformers may not be installed in equipment where they exceed 75 percent of the wiring space of any cross-sectional area within the equipment. / Les transformateurs de courant ne doivent pas être installés dans un équipement où ils dépasseraient 75 % de l'espace de câblage d'une section de l'équipement.
- Restrict installation of current transformer in an area where it would block ventilation openings. / Éviter l'installation du transformateur de courant dans un emplacement où il bloquerait les ouvertures d'aération.
- Restrict installation of current transformer in area of breaker arc venting. / Éviter l'installation du transformateur de courant dans une zone d'échappement d'arc électrique d'organe de coupure.
- Not suitable for Class 2 wiring methods and Not intended for connection to Class 2 equipment. / Ne convient pas aux méthodes de câblage de Classe 2 et n'est pas destiné au raccordement d'équipements de Classe 2.
- Secure current transformer and route conductors so that they do not directly contact live terminals or bus (optional). / Fixer le transformateur de courant en position et faire passer les conducteurs de sorte qu'ils ne soient pas en contact direct avec les bornes sous tension ni avec le bus (facultatif).

Failure to follow these instructions may result in injury, fire or equipment damage. / Le non-respect de ces instructions peut entraîner un risque de blessure, d'incendie ou de détérioration de l'équipement.

| 0.333 V Models | Description | 1 V Models | Description |
|-----------------------|---|-----------------|--|
| H6810-100A-.3V (R20) | Split-Core CT, Small, 100A:0.333V | H6810-100A-1V | Split-Core CT, Small, 100A:1V |
| H6810-200A-.3V (R20) | Split-Core CT, Small, 200A:0.333V | H6810-200A-1V | Split-Core CT, Small, 200A:1V |
| H6810-300A-.3V (R20) | Split-Core CT, Small, 300A:0.333V | H6810-300A-1V | Split-Core CT, Small, 300A:1V |
| H6811-400A-.3V (R20) | Split-Core CT, Medium, 400A:0.333V | H6811-400A-1V | Split-Core CT, Medium, 400A:1V |
| H6811-600A-.3V (R20) | Split-Core CT, Medium, 600A:0.333V | H6811-600A-1V | Split-Core CT, Medium, 600A:1V |
| H6811-800A-.3V (R20) | Split-Core CT, Medium, 800A:0.333V | H6811-800A-1V | Split-Core CT, Medium, 800A:1V |
| H6812-800A-.3V (R20) | Split-Core CT, Large, 800A:0.333V | H6812-800A-1V | Split-Core CT, Large, 800A:1V |
| H6812-1000A-.3V (R20) | Split-Core CT, Large, 1000A:0.333V | H6812-1000A-1V | Split-Core CT, Large, 1000A:1V |
| H6812-1200A-.3V (R20) | Split-Core CT, Large, 1200A:0.333V | H6812-1200A-1V | Split-Core CT, Large, 1200A:1V |
| H6812-1600A-.3V (R20) | Split-Core CT, Large, 1600A:0.333V | H6812-1600A-1V | Split-Core CT, Large, 1600A:1V |
| H6812-2000A-.3V (R20) | Split-Core CT, Large, 2000A:0.333V | H6812-2000A-1V | Split-Core CT, Large, 2000A:1V |
| H6812-2400A-.3V (R20) | Split-Core CT, Large, 2400A:0.333V | H6812-2400A-1V | Split-Core CT, Large, 2400A:1V |
| H6810-100A-.3VU | Split core CT, Small, .3V, 100A UL2808 | H6810-100A-1VU | Split core CT, Small, 1V, 100A UL2808 |
| H6810-200A-.3VU | Split core CT, Small, .3V, 200A UL2808 | H6810-200A-1VU | Split core CT, Small, 1V, 200A UL2808 |
| H6810-300A-.3VU | Split core CT, Small, .3V, 300A UL2808 | H6810-300A-1VU | Split core CT, Small, 1V, 300A UL2808 |
| H6810-400A-.3VU | Split core CT, Small, .3V, 400A UL2808 | H6810-400A-1VU | Split core CT, Small, 1V, 400A UL2808 |
| H6811-600A-.3VU | Split core CT, Medium, .3V, 600A UL2808 | H6811-600A-1VU | Split core CT, Medium, 1V, 600A UL2808 |
| H6811-800A-.3VU | Split core CT, Medium, .3V, 800A UL2808 | H6811-800A-1VU | Split core CT, Medium, 1V, 800A UL2808 |
| H6812-1000A-.3VU | Split core CT, Large, .3V, 1000A UL2808 | H6812-1000A-1VU | Split core CT, Large, 1V, 1000A UL2808 |
| H6812-1200A-.3VU | Split core CT, Large, .3V, 1200A UL2808 | H6812-1200A-1VU | Split core CT, Large, 1V, 1200A UL2808 |
| H6812-1600A-.3VU | Split core CT, Large, .3V, 1600A UL2808 | H6812-1600A-1VU | Split core CT, Large, 1V, 1600A UL2808 |
| H6812-2000A-.3VU | Split core CT, Large, .3V, 2000A UL2808 | H6812-2000A-1VU | Split core CT, Large, 1V, 2000A UL2808 |
| H6812-2400A-.3VU | Split core CT, Large, .3V, 2400A UL2808 | H6812-2400A-1VU | Split core CT, Large, 1V, 2400A UL2808 |
| H6812-800A-.3VU | Split core CT, Large, .3V, 800A UL2808 | H6812-800A-1VU | Split core CT, Large, 1V, 800A UL2808 |

Note: Do not use the product if it is damaged. Contact a Veris customer service representative for support.

Specifications

Split-Core

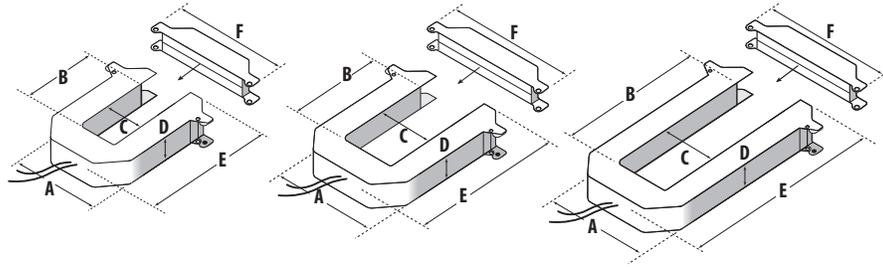
| INPUTS | |
|--------------------------------|---|
| Frequency Range | 50/60 Hz |
| Leads | 6 ft (1.8 m) 20 ft (6 m) |
| ACCURACY | |
| Accuracy | ±1% of reading from 10% to 100% of rated current, specified with the primary conductor(s) centered in the CT window |
| OUTPUTS | |
| Output at Rated Current | 1 V or 0.333 V |
| MECHANICAL | |
| Insulation | 600 Vac |
| ENVIRONMENTAL | |
| Operating Temp Range | 2400 A models only: -15 to 50 °C (5 to 122 °F); All other models: -15 to 60 °C (5 to 140 °F) |
| Storage Temp Range | -40 to 70 °C (-40 to 158 °F) |
| Humidity Range | 0 to 95% non-condensing |
| Altitude of Operation | 3 km max. |
| Mounting Location | Not suitable for wet locations. For indoor use only. |
| WARRANTY | |
| Limited Warranty | 5 years |
| COMPLIANCE INFORMATION | |
| Agency Approvals | UL61010-1, IEC 61010-1, EN 61010-1 |
| Installation Category | Category III, Pollution Degree 2 |

UL2808

| INPUTS | |
|--------------------------------|--|
| Frequency Range | 50/60 Hz |
| Leads | 16 AWG, 8 ft (2.4 m), 20 ft (6 m) |
| ACCURACY | |
| Accuracy | These CTs meet or exceed accuracy requirements specified in IEC 61869-2, Table 201, Class 1. |
| OUTPUTS | |
| Output at Rated Current | 1 V or 0.333 V |
| MECHANICAL | |
| Insulation | 600 Vac |
| ENVIRONMENTAL | |
| Operating Temp Range | -15 to 60 °C (5 to 140 °F) |
| Storage Temp Range | -40 to 70 °C (-40 to 158 °F) |
| Humidity Range | 0 to 95% non-condensing |
| Altitude of Operation | 2 km max. |
| Mounting Location | Not suitable for wet locations. For indoor use only. |
| WARRANTY | |
| Limited Warranty | 5 years |
| COMPLIANCE INFORMATION | |
| Agency Approvals | UL2808 |
| Installation Category | Category III, Pollution Degree 2 |

Dimensions

Split-Core



H6810/Small
100 - 300 Amp

A = 3.8" (97 mm)
B = 1.2" (31 mm)
C = 1.3" (32 mm)
D = 1.2" (31 mm)
E = 4.0" (102 mm)
F = 4.8" (122 mm)

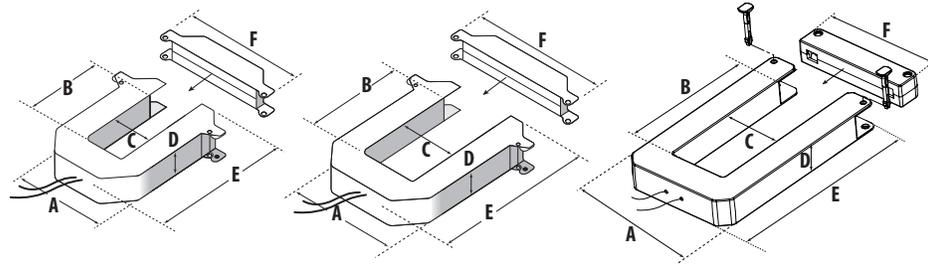
H6811/Medium
400 - 800 Amp

A = 4.9" (125 mm)
B = 2.9" (74 mm)
C = 2.5" (64 mm)
D = 1.2" (31 mm)
E = 5.2" (132 mm)
F = 6.0" (152 mm)

H6812/Large
800 - 2400 Amp

A = 4.9" (125 mm)
B = 5.5" (140 mm)
C = 2.5" (64 mm)
D = 1.2" (31 mm)
E = 7.9" (201 mm)
F = 6.0" (152 mm)

UL2808



H6810/Small UL2808
100 - 400 Amp

A = 3.23" (82 mm)
B = 1.4" (36 mm)
C = 1.4" (36 mm)
D = 1.12" (28 mm)
E = 3.25" (83 mm)
F = 4.12" (105 mm)

H6811/Medium UL2808
600 - 800 Amp

A = 4.95" (126 mm)
B = 2.9" (74 mm)
C = 2.46" (63 mm)
D = 1.2" (31 mm)
E = 5.36" (136 mm)
F = 5.83" (148 mm)

H6812/Large UL2808
1000 - 2400 Amp

A = 4.91" (125 mm)
B = 5.73" (146 mm)
C = 2.47" (63 mm)
D = 1.16" (30 mm)
E = 8.12" (206 mm)
F = 4.91" (125 mm)

Installation

Installation must be performed by a qualified electrician.

Disconnect and lock out power to the electrical panel.

1. Connect the secondary leads to the burden or test switching/shorting bar. The white wire is the x1 lead.
2. Depress the tabs on one end of the CT to open it. Check the core ends on both sections of the CT to ensure there is no rust or debris in the closure areas.
3. Slip the CT over the primary leads. Note labeling on the product indicating "source side."

4. Close and latch the CT, and mount it securely.

|  WARNING/AVERTISSEMENT |
|--|
| RISK OF INJURY OR EQUIPMENT DAMAGE/ RISQUE DE BLESSURE OU DE DÉTÉRIORATION DE L'ÉQUIPEMENT |
| <ul style="list-style-type: none">• Secure the I-bar to U-bar so that it remains in place. Close the CT with a suitable cable tie. / Fixer la barre en I à la barre en U de sorte qu'elle reste fermement en place. Fermer le TC à l'aide d'un serre-câble adapté. |
| Failure to follow these instructions may result in injury, fire or equipment damage. / Le non-respect de ces instructions peut entraîner un risque de blessure, d'incendie ou de détérioration de l'équipement. |

Note: These split-core devices have a detachable I-bar. If the I-bar is removed, re-orient it according to the markings on the core surface, then re-attach it. In any application where fault currents can exceed 20 times the rated current of the CT, use wire ties or similar fasteners to secure both sides of the I-bar to the CT housing.

Note: The CTs except UL2808 require a single cable tie to secure the I-bar. Make sure to use the hole provided for cable tie. The UL2808 100 - 400 A and UL2808 600 - 800 A CTs require a double cable tie. The UL2808 1000 - 2400 A CTs have a push-pin to secure the I-bar and no cable tie is required.

5. Reconnect power to the panel.

Note: An optional mounting kit is available for these devices (Veris part number AH06).

Ratings

These products provide basic insulation to 600 Vac between the sensed conductor and the output leads. For reinforced applications, the installer must provide appropriate insulation. Reinforced insulation is provided for applications to 300 Vac between the sensed conductor and the output leads.