

Q20B

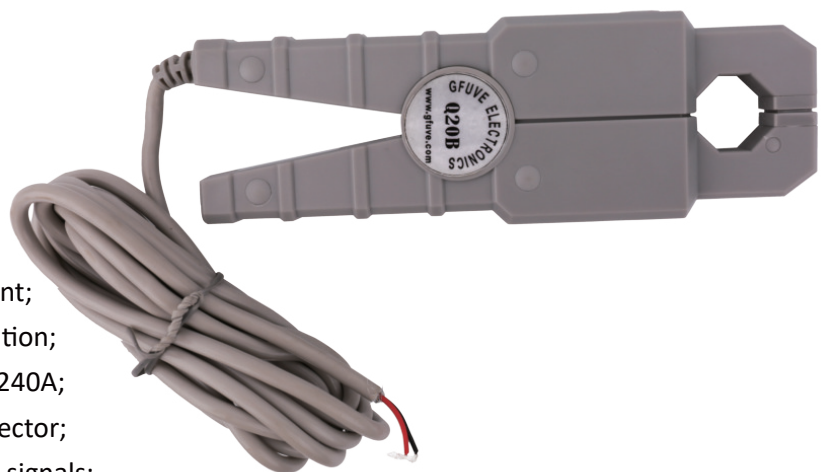
EUROPE STANDARD HIGH ACCURACY CHEAP 100A/200A AC CURRENT CLAMP ON CTS

The model Q20B 100A/200A clamp on CTs are cheap & best-in-class devices for use with power meters, power analyzers and high performance oscilloscopes. Its primary current range is 0-200A AC and secondary current range is 0-200mA, 0-200mV, 0-333mV, 0-2V or 0-2V AC. Adopts Permalloy core and CT double-layer shielding technology, These clamp on CTs deliver high-accuracy, high-sensitivity, versatility, and low phase shift. These qualities make these clamps an excellent choice for use in a wide range of power measurement applications including load surveys and demand metering. With high anti-interference ability, suitable for complex interference environment. Wide bandwidth 2M Hz, high precision 0.1%, according to EN 61010-1, EN 61010-2-032, IEC60044-1/IEC61869-2 Standard. is specifically designed to offer broad utility in a compact shape. Clamp on Current Transformers are the one-handed operating solution for temporary energy audits or long-term energy studies..

This model Q20B clamp on cts are strictly in conformity with IEC/EN61010-2-032, IEC/EN 61010-2-031, IEC60044-1, IEC 61869-2, ANSI/IEEE C57.13, GB1208-2006, GB/T 20840.1-2010, GB/T 20840.2-2014, GB/T 22071.1-2018 etc.

Features

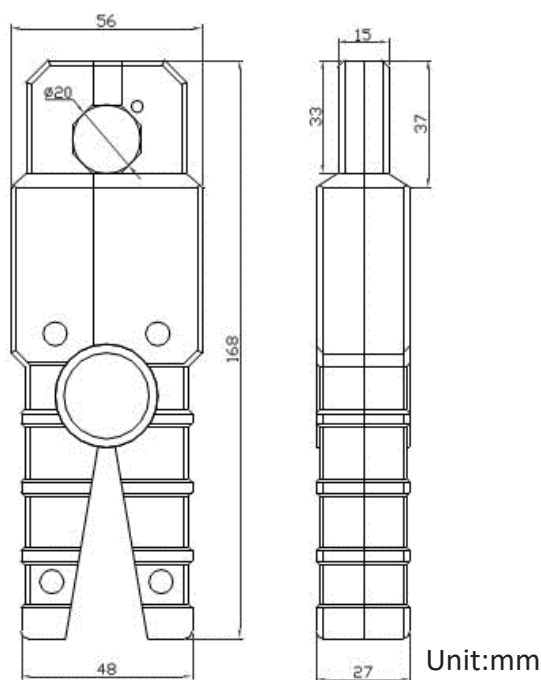
1. UL, CE, CNAS mark;
2. Small, compact size;
3. 10Hz to 2MHz response;
4. With load capacity $\leq 20\Omega$;
5. With harmonic measurement;
6. Installation: clamp type design;
7. Holding wire diameter: $\phi 20\text{mm}$;
8. As a high accuracy clamp on CTs;
9. Low phase shift for power measurement;
10. High content nickel metal permalloy core;
11. High precision 0.1% for current measurement;
12. Improved ergonomic design and easy operation;
13. Measurement range of 1mA to 120A AC or 240A;
14. Can be customized 4mm banana/BNC connector;
15. 1mV/A AC, 10mV/A AC or 1mA/A AC output signals;
16. Conforms to EN 61010-2-032, 600V CAT III safety standard;
17. IEC/EN61010-2-032, IEC/EN 61010-2-031, IEC 61869-2 etc standard;
18. Suitable for 5A, 10A, 20A, 50A, 100A, 200A cable online measurement;
19. Designed for DMMs, PQA, recorders power and harmonic meters and oscilloscopes;



Applications

- | | | |
|-------------------------------------|-------------------------------------|----------------------------------|
| 1. Ammeter; | 2. Power meter; | 3. Digital Multimeter; |
| 4. Phase angle meter; | 5. Oscilloscopes meter; | 6. Leakage current meter; |
| 7. Data logging/recording; | 8. Data logging/recording; | 9. Power load monitoring; |
| 10. Electricity energy meter; | 11. Power quality monitoring; | 12. Multi-function energy meter; |
| 13. Power quality analyzer(PQA); | 14. Energy meter field calibrator; | 15. Power and harmonic meters; |
| 16. CT secondary current detection; | 17. Measuring around cable bundles; | |

Outline Drawing



Parameters

Technical parameters

Ratio	1000:1, 2000:1, 2500:1 (customized)
Accuracy Class	0.1%, 0.2%, 0.5%
Primary current	0-5A, 0-10A, 0-20A, 0-100A , 0-200A AC
Signal output	1mA/A, 1mV/A, 5mV/A, 10mV/A, 100mV/A
Secondary voltage	0 - 50mV, 0-100mV, 0-200mV, 0-1V, 0-5V AC (customized)
Secondary current	0-5mA, 0-10mA, 0-100mA, 0-200mA AC (customized)
Max. Cont. Input current	120A or 240A
Load capacity	≤20Ω, standard 4Ω

Technical parameters - continued

Over voltage category	CAT III 600V
Frequency range	10Hz-2MHz
Dielectric strength	3KV 50Hz/60Hz at 1minute
Temperature range	-20°C to +55°C
Output	2.5 meter cable with D01 or BNC connector
Max. voltage not insulated conductors	720 V
Standard	EN 61010-1, EN 61010-2-032, EN 61010-2-031 IEC60044-1, & IEC61869-2, 600V CAT III
Installation	Clamp type
Range	5A, 10A, 20A, 100A , 200A optional
Output mode	Lead output(2.5m, 5m, 10m or customized)
Output signal	333mV, 50mV, 1V, 2V, 5V AC at nominal input current
Connector	BNC, 4mm banana, signal cable(2 cores), Audio plug, customized
Accuracy (100A/200A Range)	
0-200mA	≤0.5%
200mA-20A	≤0.2%
20A-240A	≤0.1%
Phase Shift(100A/200A Range)	
0-200mA	≤0.5°
200mA-20A	≤0.2°
20A-240A	≤0.1°
Mechanical parameters	
Dimensions (L x W x H) (mm)	56 x 168 x 27
Weight (g)	350
Holding wire diameter (mm)	φ20
Max. jaw opening (mm)	20
Jaw color	Gray
Material	PC+ABS+Polycarbonate, UL94 V0

Selection Guide

Model	Rate Current	Max Current	Secondary Current	Coil Ratio	Burden Resistance	Accuracy
Q20B-10-1	10A	12A	10mA	1000:1	customized	0.1%
Q20B-10-2	10A	12A	5mA	2000:1	customized	0.1%
Q20B-10-3	10A	12A	4mA	2500:1	customized	0.1%
Q20B-20-1	20A	24A	20mA	1000:1	customized	0.1%
Q20B-20-2	20A	24A	10mA	2000:1	customized	0.1%
Q20B-20-3	20A	24A	8mA	2500:1	customized	0.1%
Q20B-100-1	100A	120A	100mA	1000:1	customized	0.1%
Q20B-100-2	100A	120A	50mA	2000:1	customized	0.1%
Q20B-100-3	100A	120A	40mA	2500:1	customized	0.1%
Q20B-200-1	200A	240A	200mA	1000:1	customized	0.1%
Q20B-200-2	200A	240A	100mA	2000:1	customized	0.1%
Q20B-200-3	200A	240A	80mA	2500:1	customized	0.1%
Q20B-V10-1	10A	50A	100mV	1000:1	customized	0.1%
Q20B-V10-2	10A	12A	1V	1000:1	customized	0.1%
Q20B-V10-3	10A	12A	5V	1000:1	customized	0.1%
Q20B-V20-1	20A	50A	200mV	1000:1	customized	0.1%
Q20B-V20-2	20A	24A	2V	1000:1	customized	0.1%
Q20B-V20-3	20A	24A	5V	1000:1	customized	0.1%
Q20B-V100-1	100A	120A	100mV	1000:1	customized	0.1%
Q20B-V100-2	100A	120A	1V	1000:1	customized	0.1%
Q20B-V100-3	100A	120A	5V	1000:1	customized	0.1%
Q20B-V200-1	200A	240A	200mV	1000:1	customized	0.1%
Q20B-V200-2	200A	240A	2V	1000:1	customized	0.1%

Model	Rate Current	Max Current	Secondary Current	Coil Ratio	Burden Resistance	Accuracy
Q20B-V200-3	200A	240A	5V	1000:1	customized	0.1%
Q20B-5-12	5A	6A	5mA	1000:1	customized	0.2%
Q20B-5-22	5A	6A	2.5mA	2000:1	customized	0.2%
Q20B-5-32	5A	6A	2mA	2500:1	customized	0.2%
Q20B-10-12	10A	12A	10mA	1000:1	customized	0.2%
Q20B-10-22	10A	12A	5mA	2000:1	customized	0.2%
Q20B-10-32	10A	12A	4mA	2500:1	customized	0.2%
Q20B-20-12	20A	24A	20mA	1000:1	customized	0.2%
Q20B-20-22	20A	24A	10mA	2000:1	customized	0.2%
Q20B-20-23	20A	24A	8mA	2500:1	customized	0.2%
Q20B-100-12	100A	120A	100mA	1000:1	customized	0.2%
Q20B-100-22	100A	120A	50mA	2000:1	customized	0.2%
Q20B-100-32	100A	120A	40mA	2500:1	customized	0.2%
Q20B-V5-12	5A	50A	50mV	1000:1	customized	0.2%
Q20B-V5-22	5A	6A	500mV	1000:1	customized	0.2%
Q20B-V5-32	5A	6A	1V	1000:1	customized	0.2%
Q20B-V10-12	10A	50A	100mV	1000:1	customized	0.2%
Q20B-V10-22	10A	12A	1V	1000:1	customized	0.2%
Q20B-V10-32	10A	12A	5V	1000:1	customized	0.2%
Q20B-V20-12	20A	50A	200mV	1000:1	customized	0.2%
Q20B-V20-22	20A	24A	2V	1000:1	customized	0.2%
Q20B-V20-32	20A	24A	5V	1000:1	customized	0.2%
Q20B-V100-12	100A	120A	100mV	1000:1	customized	0.2%
Q20B-V100-22	100A	120A	1V	1000:1	customized	0.2%
Q20B-V100-32	100A	120A	5V	1000:1	customized	0.2%
Q20B-V200-12	200A	240A	200mV	1000:1	customized	0.2%
Q20B-V200-22	200A	240A	2V	1000:1	customized	0.2%
Q20B-V200-32	200A	240A	5V	1000:1	customized	0.2%

Notes: Can be customized clamp on current transformers according to user requirements!

Clamp On Current Transformer Selection Model

Model	Current Range	Max Current	Secondary Output Signal	Ratio	Resistance	Accuracy
S50	0-1200A	1200A	250mA, 500mA, 1A, 5A, 333mV, 1V, 2V , 5V, 10V etc	1000:1, 2000:1,4000:1 etc	2.5VA, 1VA, 4Ω, 10Ω, 20Ω etc	0.1%, 0.2%, 0.5%
S120	0-3000A	3600A	250mA, 500mA, 1A, 2A, 5A, 333mV, 1V, 2V , 5V, 10V etc	600:1, 1000:1, 2000:1,4000:1 etc	2.5VA, 1VA, 4Ω, 10Ω, 20Ω etc	0.1%, 0.2%, 0.5%
P8	0-10A	20A	2mA, 2.5mA, 5mA, 10mA, 20mA, 333mV, 1V, 2V , 5V etc	1000:1,2000:1, 2500:1, 4000:1 etc	4Ω, 10Ω, 20Ω etc	0.1%, 0.2%, 0.5%
P18	0-200A	240A	2mA, 2.5mA, 5mA, 10mA, 20mA, 333mV, 1V, 2V , 5V etc	1000:1,2000:1, 2500:1, 4000:1 etc	4Ω, 10Ω, 20Ω etc	0.1%, 0.2%, 0.5%
P50	0-1000A	1200A	250mA, 500mA, 1A, 5A, 333mV, 1V, 2V , 5V, 10V etc	1000:1,2000:1, 2500:1,4000:1 etc	2.5VA, 1VA, 4Ω, 10Ω, 20Ω etc	0.1%, 0.2%, 0.5%
P110	0-1500A	1500A	250mA, 500mA, 1A, 2A, 5A, 333mV, 1V, 2V , 5V, 10V etc	200:1, 600:1, 1000:1, 2000:1 etc	2.5VA, 1VA, 4Ω, 10Ω, 20Ω etc	0.1%, 0.2%, 0.5%
Q8A1	20A	20A	2mA, 2.5mA, 5mA, 10mA, 20mA, 333mV, 1V, 2V , 5V etc	1000:1,2000:1, 2500:1,4000:1 etc	4Ω, 10Ω, 20Ω etc	0.1%, 0.2%, 0.5%
Q8A2	20A	20A	2mA, 2.5mA, 5mA, 10mA, 20mA, 333mV, 1V, 2V , 5V etc	1000:1,2000:1, 2500:1,4000:1 etc	4Ω, 10Ω, 20Ω etc	0.1%, 0.2%, 0.5%
Q13	100A	120A	2mA, 2.5mA, 5mA, 10mA, 20mA, 333mV, 1V, 2V , 5V etc	1000:1,2000:1, 2500:1,4000:1 etc	4Ω, 10Ω, 20Ω etc	0.1%, 0.2%, 0.5%
Q20A	200A	240A	2mA, 2.5mA, 5mA, 10mA, 20mA, 333mV, 1V, 2V , 5V etc	1000:1,2000:1, 2500:1,4000:1 etc	4Ω, 10Ω, 20Ω etc	0.1%, 0.2%, 0.5%
Q20B	200A	240A	2mA, 2.5mA, 5mA, 10mA, 20mA, 333mV, 1V, 2V , 5V etc	1000:1,2000:1, 2500:1,4000:1 etc	4Ω, 10Ω, 20Ω etc	0.1%, 0.2%, 0.5%
Q40	500A	600A	200mA, 250mA, 500mA, 333mV, 1V, 2V , 5V, 10V etc	1000:1,2000:1, 2500:1,4000:1 etc	4Ω, 10Ω, 20Ω etc	0.1%, 0.2%, 0.5%
Q50A	1000A	1000A	250mA, 500mA, 1A, 5A, 333mV, 1V, 2V , 5V, 10V etc	1000:1,2000:1, 2500:1,4000:1 etc	2.5VA, 1VA, 4Ω, 10Ω, 20Ω etc	0.1%, 0.2%, 0.5%
Q70	1000A	1200A	250mA, 500mA, 1A, 5A, 333mV, 1V, 2V , 5V, 10V etc	200:1, 600:1, 1000:1, 2000:1 etc	2.5VA, 1VA, 4Ω, 10Ω, 20Ω etc	0.1%, 0.2%, 0.5%
Q110	1500A	1500A	250mA, 500mA, 1A, 5A, 333mV, 1V, 2V , 5V, 10V etc	200:1, 600:1, 1000:1, 2000:1 etc	2.5VA, 1VA, 4Ω, 10Ω, 20Ω etc	0.1%, 0.2%, 0.5%
Q125	2000A	2400A	500mA, 1A, 5A, 333mV, 1V, 2V , 5V, 10V etc	200:1, 600:1, 1000:1, 2000:1 etc	2.5VA, 1VA, 4Ω, 10Ω, 20Ω etc	0.2%, 0.5%
Q125B	3000A	3600A	250mA, 500mA, 1A, 5A, 333mV, 1V, 2V , 5V, 10V etc	600:1, 1000:1, 2000:1,4000:1 etc	2.5VA, 1VA, 4Ω, 10Ω, 20Ω etc	0.2%, 0.5%
Q150	3000A	3600A	500mA, 1A, 5A, 333mV, 1V, 2V , 5V, 10V etc	600:1, 1000:1, 2000:1,4000:1 etc	2.5VA, 1VA, 4Ω, 10Ω, 20Ω etc	0.2%, 0.5%
XQ13	100A	120A	2mA, 2.5mA, 5mA, 10mA, 20mA, 333mV, 1V, 2V , 5V etc	1000:1,2000:1, 2500:1,4000:1 etc	4Ω, 10Ω, 20Ω etc	0.1%, 0.2%, 0.5%
XQ20	200A	240A	2mA, 2.5mA, 5mA, 10mA,20mA, 333mV, 1V, 2V , 5V, 10V etc	1000:1,2000:1, 2500:1,4000:1 etc	4Ω, 10Ω, 20Ω etc	0.1%, 0.2%, 0.5%
HQ15	100A	120A	2mA, 2.5mA, 5mA, 10mA, 20mA, 333mV, 1V, 2V , 5V etc	1000:1,2000:1, 2500:1,4000:1 etc	4Ω, 10Ω, 20Ω etc	0.1%, 0.2%, 0.5%