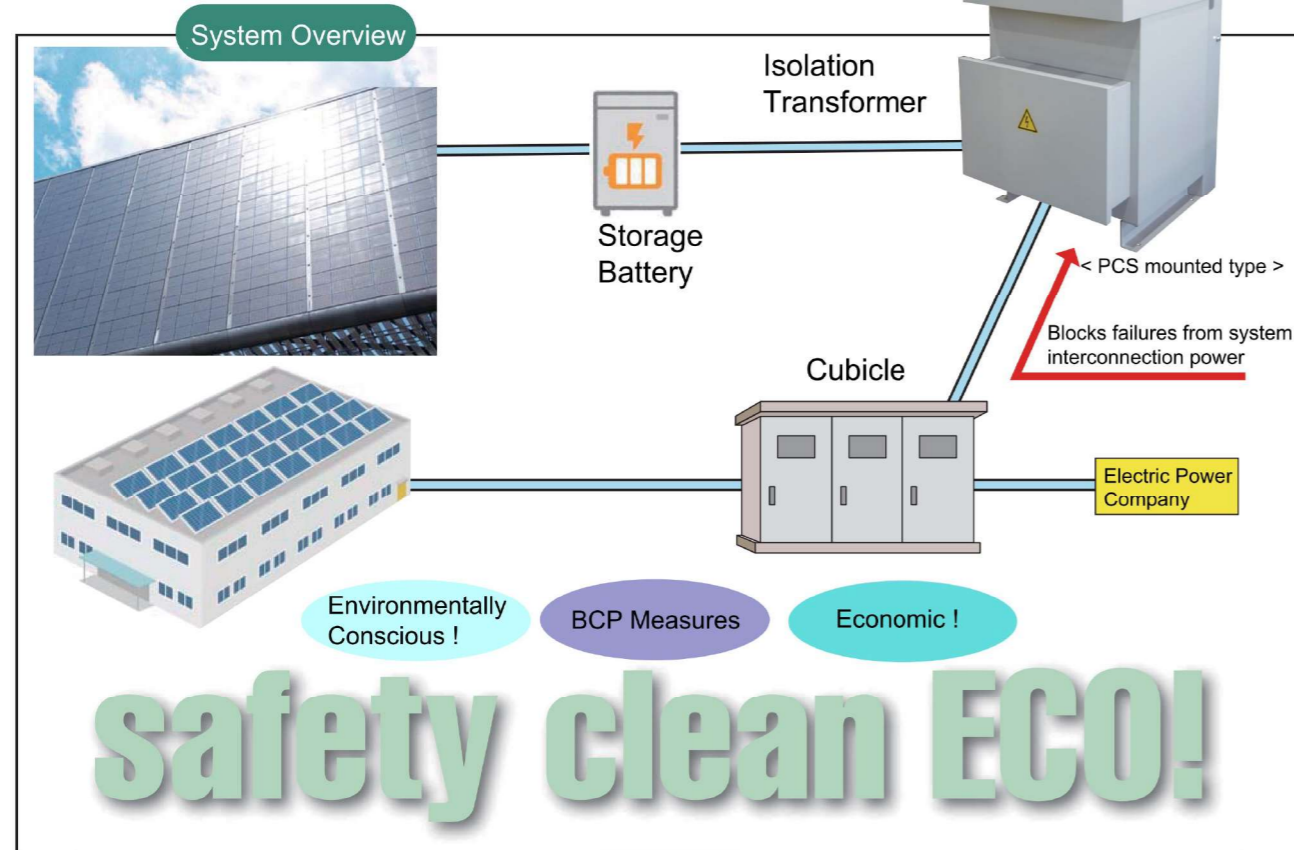


Dry Transformer for self-consumption photovoltaic energy

TYM/TYA series



Transformer Features

Choose from two types of transformers depending on your usage situation

- Silicon steel plate transformer with low initial cost
- Amorphous dry-type transformer with low running costs

Isolates the power system from the power generation system and blocks disturbances

- By completely isolating the power system from the photovoltaic system, it protects the photovoltaic system from interference from the power system and contributes to a stable supply of electricity.

Protects power generation equipment from induced lightning surges entering from the power system

- This function protects power generation equipment from induced lightning surges (common mode) that cannot be prevented by transformer insulation alone.

Improved ease of use

- Wiring work for input/output circuits is consolidated in a terminal box
- Space-saving by using PCS mounting parts (optional)

Long-term warranty for peace of mind

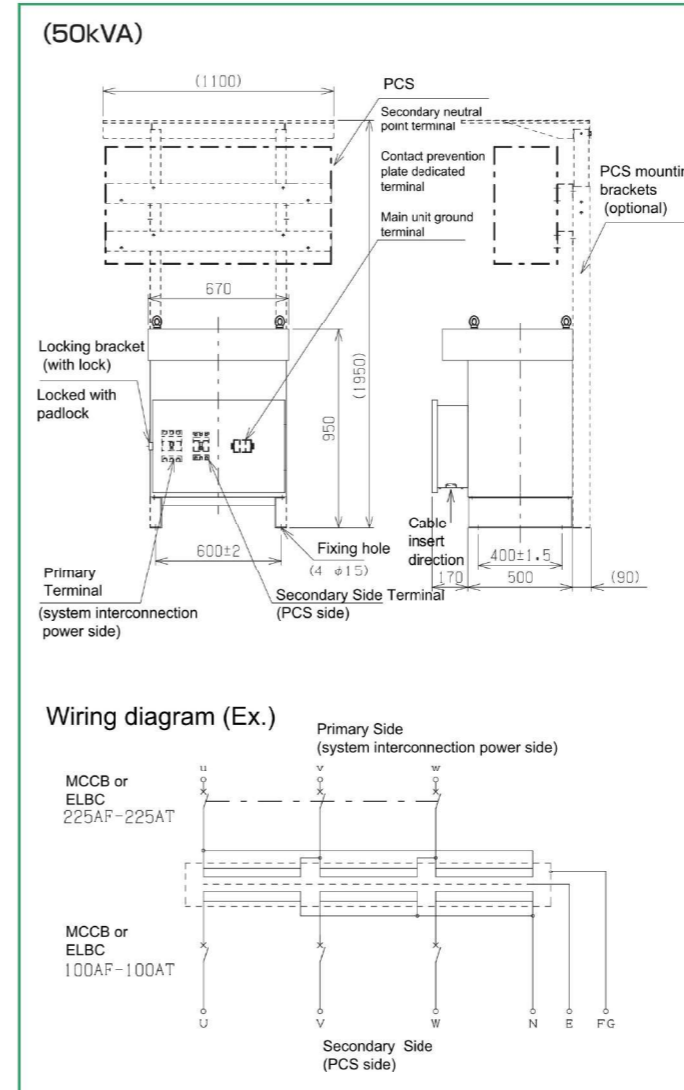
- A 10-year warranty is available for the transformer itself (excluding cables, breakers, and other accessories) for a fee. *Paid warranty registration is required.

Please contact us for details.

Basic Specification

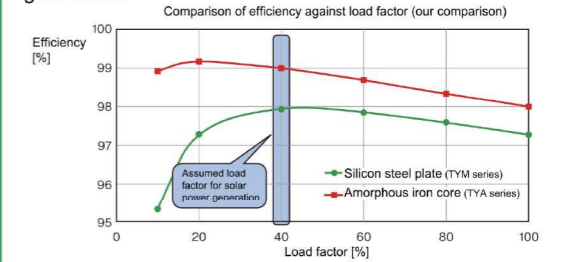
項目	仕様
Model See "Model Descriptions" for models	Silicon steel plate transformer TYM Series Amorphous dry-type transformer TYA Series
Applicable Standards	JEC-2200-2014 JEM 1310:2001
Number of phases	Three-phases
Frequency	50/60Hz
Rated capacity	50kVA
Primary voltage (system interconnection power side)	200, 210V
Secondary voltage (PCS side)	380, 420, 440V
Connection	Primary side (system interconnection (Δ) power side) — Secondary side (γ with neutral point) (PCS side)
Insulation class	H
Rated	Continuous used
Surge transfer rate	-50dB or less (Common mode)
Ingress Protection (Box body)	IP34
Circuit breaker standard specifications	Primary side (system interconnection power side) : 225AF-225AT Secondary side (PCS side) : 100AF-100AT
Connection terminal	Primary side (system interconnection power side) : M8 Max. 60mm ² Secondary side (PCS side) : M8 Max. 60mm ² Secondary side (Neutral point and ground) : M8 Max. 60mm ²

※ Other specifications than those listed above are available. Please contact us for details.



Energy Saving Effects

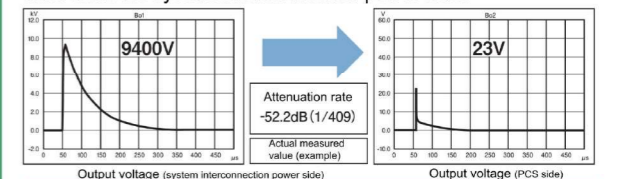
Amorphous transformers reduce no-load losses and improve energy savings. Large energy-saving effects can be expected in areas where the assumed load factor is low, such as solar power generation.



Lightning surge attenuation performance

Induced lightning surges can cause damage over a wide area because they can enter through power lines even at a distance from the point of lightning strike.

The lightning surge countermeasure technology we have developed over many years as a top SIT manufacturer protects power generation systems from induced lightning surges that enter from the system interconnection power side.



Improved ease of use

The breakers for the primary (system interconnection power side) and secondary (PCS side) circuits are integrated in a steel plate terminal box with a door on the front for easy cable connection, breaker operation, and inspection work.



Model Descriptions

TY-50-□-□-□

- Transformer type
 - M Silicon steel plate transformer
 - A Amorphous dry-type transformer
- Transformer capacity (unit [kVA])
- Voltage code symbol (see attached table)
 - (例) A Primary 210V — Secondary 440V
- Option
 - (例) 1 Primary (MCCB)—Secondary (MCCB)
 - P PCS mounted type

Code symbol	Primary voltage[V]	Secondary voltage[V] (PCS side)
A	210	440
B	210	420
C	210	380
D	200	440
E	200	420
F	200	380
G	Other	

Code number	Primary voltage[V]	Secondary voltage[V] (PCS side)
1	MCCB	MCCB
2	MCCB	ELCB
3	MCCB	None
4	ELCB	MCCB
5	ELCB	ELCB
6	ELCB	None
7	None	MCCB
8	None	ELCB
9	None	None

SIT can also be produced

SIT type with even higher lightning surge suppression function

- Insulation strength
 - Between Primary side - secondary side (PCS side) / earth AC 10kV
- Lightning impulse withstand voltage
 - Between Primary side - secondary side (PCS side) / earth 30kV (1.2/50us)
- Surge transfer rate
 - 60 dB or less (1/1000 or less)

A full range of options

Well-developed circuit configuration

- The circuit breakers on the system interconnection power side and PCS sides can be changed to earth leakage circuit breakers (ELCB) in addition to the standard wiring circuit breakers (MCCB). (Refer to "Model Descriptions" for the combination.)
- PCS mounting parts
- Optimal salt-resistant treatment is available for coastal areas.