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Packaged transformer substations 100, 160, 250, 400, 1000, 1250, 1600, 2000 and 3150 kVA are designed for power receipt, conversion and distribution of three-phase alternating current with a frequency of 50 Hz and are used for electric power supply of industrial companies, oil and gas industries. If mentioned in the order, PTS can be equipped with automatic transfer switch, which is based on industrial microprocessor controller with a remote measuring, a remote control over inputs and line circuit breakers. It can be manufactured optionally on the basis of microprocessor terminals of both domestic and imported production (General Electric, Siemens). Specifications of a digital channel with automatic control and power management systems are stipulated in the order.

PTS of this voltage class are also manufactured in accordance with the Technical Regulations TU 27.11.4-001-54088882-2017, as well as with GOST 14695-80, GOST R 51321.1-2007, GOST IEC 51439-1-2013 in terms of requirements for LVSWG, GOST 14693-90 in terms of requirements to HV devices.

High-voltage device panels can be implemented:

- using air or SF6 circuit breakers with surge arresters and fuses;
- using vacuum breakers with transformer protections.

All the necessary mechanical and electrical interlocks are organized inside the HV incomer cabinets for proper operation of electrical equipment and the safety of service personnel. Type and manufacturer of three phase two winding power transformers of packaged transformer substations are stipulated in the design.

CHETA uses circuit breakers of global and Russian leading manufacturers.

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Recommendations for the design of PTS and some standard solutions are given in the technical information KTP.140.001-18. Standard designs and recommendations for placement of PTS inside E-houses are shown in the technical information KSHPE.140.014-17. All enclosures and metal structures of LLC CHETA are produced at its own production facilities, which allows to implement any necessary technical requirements in terms of the dimensions of PTS cabinets. Depending on the technical requirements, PTS with withdrawable circuit breakers can be performed with different form of separation (up to 4b).

LLC CHETA can produce switchboards with withdrawable units which combines functions of distribution boards and MCC panels with the ability to connect them directly to power transformers. This technical solution has tremendous advantages in comparison with the traditional scheme (distribution board is powered by power transformers and the load control panels with stationary units are powered by this distribution board):

- reduction of electrical premises area;
- savings on cable lines;
- minimization of loss in case of process shutdown;
- safety of operating personnel.

This version of PTS design is applicable, for example, for the needs of electric power industry (auxiliary packaged transformer substations) of power plants in the design of panels with withdrawable units of unilateral/bilateral service. PTS on the basis of panels with withdrawable units has a form of separation not lower than 3b in accordance with GOST R 51321 -2007. Input circuit breakers (and bus-tie breakers if available) and feeder breakers above 630A are withdrawable, outgoing line circuit breakers for current up to 630 A and control modules of electric motors up to 250 kVA are installed on a withdrawable cassette in the case of using stationary apparatus. Withdrawable units and circuit breakers have four modes:

- operating;
- test;
- withdrawn;
- removed.

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