ELECTRICITY METER READINGS COLLECTION SYSTEM

Russian Federation

Tambov State University named after G.R. Derzhavin

Design Bureau "Telecommunication Systems"

The network system is a local network of electricity metering devices, to which an interface converter is connected via RS-485 interfaces or an infrared channel, which sends the measured data to the system database via a Wi-Fi access point.

Statistical processing of data, their presentation and storage in the form required for electricity metering is carried out at an automated workstation with specialized software.

Electricity meter readings collection system provides:

– processing and storing information in the system database

– reading the parameters of electricity consumption from metering devices every 4 minutes and transferring information via Wi-Fi to the database

– displaying data in the required form, including graphical, automatic display of data in Excel spreadsheets

Relevance

In enterprises with geographically distributed buildings, it is important to use an electricity consumption control system with the functions of analyzing total consumption and monitoring parameters, which make it possible to exclude overload and inefficient use of electricity at various facilities.

Uniqueness

- the system has a database and application software for processing measurement data at the facilities
- the interface converter is connected to the metering device via the following interfaces: RS-485; IRDA

Controllable parameters

– power factor (coefficient)

– accumulated electricity, active and reactive

– current value of power consumption, total and for each phase

– Meter serial number and date of manufacture

Contact Information

Pasechnikov Ivan Ivanovich

+7(960)668-40-74

pasechnikov_ivan@mail.ru

Belkova Anna Evgenievna

+7(915)873-06-74

belkova@tsutmb.ru