

# Estimation of quality of intellectual services of NGN

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**Abstract** - In this paper estimation of quality of intellectual services in NGN are given.

**Keywords** - quality, intellectual services, NGN.

Last years in mutual relations of clients and operators by granting telecommunication services there are significant changes. In the world telecommunication market the tendency when rates of growth of incomes of granting additional services of communication essentially exceed growth of incomes of traditional services (actually maintenance of dialup connections) was brightly showed. Operators in existing economic conditions are compelled to search for sources of new incomes more intensively. Each operator and the provider of services solves a strategic problem of capture of the market in own way. One of ways to raise competitiveness - introduction of new kinds of the services, enjoying the greatest popularity.

The list of the basic intellectual services best-selling was defined. These services are brought in standards ETSI and recommendations ITU-T and are known as CS-1, CS-2, CS-3, CS-4. It is necessary to note, that essentially it is less than actually applied services, than standardized, and, as a matter of fact, their list is limited to the basic services (VPN, FPH, ACC, PRM, VOT, UPN, UPT).

There are two technologies of granting of intellectual services: on the basis of the intellectual network assuming presence of such elements of architecture, as the site of switching of services (SSP), the site of management of services (SCP); on the basis of sites of services (Service Node, SN), the modern computer technologies constructed with use. On the basis of these technologies it is possible to allocate following intellectual services: the Free-of-charge call (service 800, Freephone - FPH), Service with additional payment (Premium Rate - PRM), Televoting (Televoting - VOT), Service telephone maps (CTK).

With the implementation of intelligent services based on units of services, there are two features. First, the size of the investments needed in this case is much lower, which is very important for the operators. Secondly, this method is technically more straightforward to implement, because it enables them to easily scale intelligent platform and to expand their functionality, taking advantage of a well-standardized computer technology.

Criteria for quality of service are defined indicators, which determine the line services to specific requirements of networks NGN. In the management of any organization and the enterprise quality of service is a necessary process that

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must be carried out if not continuously, then quite regularly. This verification - is one of the sources of information about the characteristics of products and the level of the proposed telecommunications services. In accordance with the acquired information can draw conclusions about the shortcomings, omissions, or conversely, the achievements of the production process or service. To organize the assessment requires not only clear criteria of quality, but effective methods of audit. One of the most common methods today are tests of quality. They are designed for each specific telecommunications services. Tests are designed to quality comprehensive analysis of the properties and functioning of NGN.

The assessment is proposed to implement both quantitative and qualitative approaches. For quality control, and its increase is necessary to evaluate the level of quality. Evaluation of the quality of the provision of telecommunications services is the basis for developing the necessary control actions in the quality management system. However formalized quantitative assessment of quality of service meets with great difficulties, which are objective, determined by the characteristics of services. All operations on the allocation of quality criteria can be grouped into 3 stages: preparatory, and final evaluation. In assessing conditioned: What quality indicators should be selected for consideration, what methods and how accurately determine their value, which means it will require, as a process and in what form to submit results of the evaluation.

To date, assessing the quality of intellectual services in NGN networks was conducted. The criteria of quality - is the main task of scientific work, the second task - evaluation of the criteria and the allocation of the integral index of quality of services. In this paper it is offered to use for an estimation of quality of services Parasuraman-model with the certain number of basic innovations. Considering features of intellectual services NGN, it is possible to allocate the following from the list of criteria of quality of service: reliability, availability, safety.

The developed estimation of quality of intellectual services enables to form tariffs for services in networks NGN, to analyze with a high degree of accuracy consumer criteria of quality, and also allows to develop new complexes of services.

## REFERENCES

- [1] V.V.Gubarev, V.M.Zybarev, V.V.Razdrogina, the Distributed systems of intellectual services.
- [2] V.A.Frejnkman, Some words about evolution of intellectual networks.
- [3] V.Gorodetsky, Intellectual services of communication.