

**REPUBLIC OF MOLDOVA  
NATIONAL REGULATORY AGENCY IN TELECOMMUNICATIONS  
AND INFORMATICS**

**A N N U A L R E P O R T  
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*CHISINAU, 2006*

# **National Regulatory Agency in Telecommunications and Informatics**

## **REPORT**

**On Activity of National Regulatory Agency in  
Telecommunications and Informatics and Development of  
Telecommunications and Informatics Market in the  
Republic of Moldova in 2005**

Chisinau 2006

CZU 338.47(478)

CIP Description of National Book Chamber  
REPORT on Activity of National Regulatory Agency in Telecommunications and Informatics  
and Development of Telecommunications and Informatics Market in the Republic of Moldova in  
2005 / National Regulatory Agency in Telecommunications and Informatics. Ch.: Pontos, 2006,  
64 p.  
ISBN 9975-926-76-2  
600 c.  
  
338.47(478)

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Publishing Company "Pontos"  
180 Stefan cel Mare Bd.  
MD-2004, Chisinau  
Republic of Moldova

NRATI, 2006

ISBN 9975-926-76-2

# **C O N T E N T S**

## **Foreword**

### **I. NRATI Activity in 2005**

- 1.1 Economic Regulation**
- 1.2 Technical Regulation**
  - 2.2.1 License Issuance**
  - 2.2.2 Administration of Numbering Resources**
- 1.3 Monitoring and Control**
- 1.4 Dispute Resolution**
- 1.5 Final User Protection**
- 1.6 Relation with mass-media**
- 1.7 International Relations**

### **II. Evolution on Telecommunications and Informatics Market**

- 2.1 Market General Overview**
- 2.2 Investments in Market Sectors**
- 2.3 Fixed Telephony Sector**
  - 2.3.1 General Overview**
  - 2.3.2 Subscribers, Penetration**
  - 2.3.3 Traffic**
  - 2.3.4 Tariffs**
  - 2.3.5 International IP-Telephony Services**
- 2.4 Mobile Telephony Sector**
  - 2.4.1 General Overview**
  - 2.4.2 Subscribers, Penetration**
  - 2.4.3 Traffic**
  - 2.4.4 Tariffs**
- 2.5 Sector of Data Transport and Access to Internet Services**
  - 2.5.1 General Overview**

- 2.5.2 Broadband Access to INTERNET**
- 2.5.3 Narrowband Access to INTERNET**
- 2.5.4 Leased Line Service**
- 2.6 Cable/Air TV Service Sector**
  - 2.6.1 General Overview**
  - 2.6.2 Users and Tariffs**

## FOREWORD

It has become tradition for the National Regulatory Agency in Telecommunications and Informatics (NRATI) to present to all those interested comprehensive information about the situation and tendencies of development of communications and information technologies and about NRATI activity in the previous year by issuing an Annual Report. We believe this Report will serve as source of information for both analyzing the implementation of the National Strategy and “Electronic Moldova” Action Plan, approved by the Government in March 2005, and for those who intend to make investments in this sector of great importance for society.

For NRATI and for all telecommunications and informatics market players, 2005 was a special stage in the process of total market liberalization, which started on January 1, 2004. The market extended, became more dynamic, but, at the same time, exposed a series of problems dealing with competition environment and anti-competitive behavior.

In many aspects, the results of 2005 in most indicators were impressing: investments, sales, traffic, subscribers, and penetration. The value of the market grew 37% reaching 3,64 billion lei, which is 10,5% of GDP. The highest development was registered in mobile telephony and INTERNET access sectors. The number of mobile telephony service subscribers outran the number of fixed telephony subscribers, exceeding one million. In mobile telephony and INTERNET access service sectors the share of services based on advanced technologies increased several times. Operators launched provision of fixed telephony services with radio access to the local loop (WLL) based on CDMA2000 technology.

This and other relevant information provided in the Report herein show that in the Republic of Moldova there is a considerable potential for the development of telecommunications and informatics service market and NRATI has always contributed to building up this potential. As it is a central public authority entitled to regulate the telecommunications and informatics market and to implement the strategy of development in this very important sector of national economy, NRATI in its activity focused on improvement of existing normative framework and development of new regulations for a more efficient market, on creating optimal conditions not only for the activity of the existing operators, but also for new network and service providers.

The reduction of fees for numbering resources, of the access deficit tariff for access to the public fixed telephony network of JSC MOLDTELECOM, the approval of The Regulation on Public Tender Procedure for Awarding Individual Licenses in Telecommunications and Informatics Regulation on Administration and Management of National Numbering Plan, modification of the Regulation on Fixed Telephony Service Provision and Regulation on Domain Name Administration in the Top-level Domain .md are but a few elements of all activity performed in 2005 with the view of improving the business environment and enhancing competition in telecommunications and informatics sector.

To our regret, not all the objective set for 2005 were gained. In the absence of a corresponding legal framework (the Law on Electronic Communications, an issue of repeated discussions, was not adopted in 2005), NRATI was not able to approve, as planned in 2004, regulatory documents meant to counteract abuses and remove barriers to the development of fair competition on all market segments. The regulatory documents mentioned above are the Regulation on Defining Relevant Markets in Telecommunications and Informatics and the Regulation on Designation of Operators with Significant Market Power, which would allow imposing specific obligations oriented to prevention and elimination of anti-competitive actions.

We are certain that the adoption, in 2006, of the Law on Electronic Communications, harmonized with the new EU regulatory framework, will substantially improve NRATI

possibilities to promote and support fair competition on all market segments, to prevent and remove abuses of significant market power, admitted in 2005. Such a Law will entitle NRATI to finalize the regulatory framework necessary for fair and efficient competition.

In the timeframe under report NRATI was involved not only in drawing up new regulations, but also in modifying some documents for market economic and technical regulation. The work agenda included aspects related to current situation on different market segments, processing of documents presented by applicants for licenses and numbering resources, settlement of many disputes between operators, between final users and operators, monitoring and control of service providers and offering assistance to new market entrants. The following pages cover detailed information about these activities. We hope it will help all those interested to learn about both the evolution of the telecommunications and informatics service market and the concerns and plans for the future of our institution. .

### **NRATI Administrative Board**

## **Economic Regulation**

Economic regulation is one of NRATI's key-leverages for reaching the goal of competition promotion on the fully liberalized telecommunications and informatics services market. In 2005 the Agency performed market economic regulation activity under the guidance of the legislation in force pertaining both the industry and competition protection.

In this process the main efforts were focused on ensuring more favorable conditions for all service and network providers, in particular new entrants, to run their activity.

In this respect, NRATI Administrative Board, by Decision no. 05 of 09.02.2005, enacted a 22%-reduction of the access deficit tariff, IP-telephony service providers pay JSC MOLDTELECOM for one minute-telephone call, made by final users of JSC MOLDTELECOM to the technical facilities of IP-telephony providers. The decision was based on the analysis of results of Stage II tariff rebalancing for basic public telecommunications services provided by JSC MOLDTELECOM and their impact on the deficit access tariff. Taking into account the results of tariff rebalancing, their impact on the deficit access tariff and the growth of revenues generated by the local tariff, NRATI Administrative Board resolved to reduce the tariff from 0,50 lei to 0,39 lei.

NRATI consider that both IP-telephony operators and their users benefit from the decision to reduce the tariff. The operators are able to collect additional funds to be invested afterwards, while the final users, benefit from lower tariffs as a result of competition between service providers and a reduction of the costs they incur. So, in 2005, the tariffs for international VoIP telephone calls were on average, for mobile networks - 30% lower, and for fixed networks – half lower than the tariffs for traditional international telephony, depending on the country of destination and type of network the call is directed to.

Preliminary estimations made by NRATI show that the access deficit tariff, set in 2005, will be relevant throughout Stage II tariff rebalancing for basic public telecommunications services provided by JSC MOLDTELECOM. Further it will be re-calculated and reduced again. At the end of the tariff-rebalancing process it will be voided.

By paying the access deficit tariff, IP-telephony operators connected to the network of JSC MOLDTELECOM subsidize the deficit of revenue, necessary for recovering the costs the company incurs for maintenance of its local infrastructure and caused by applying under-cost tariffs to fixed local telephony. The access deficit tariff has been applied since the beginning of 2001 - 2,48 lei, VAT-free, for one-minute international telephone via IP-telephony. Later, depending on market development, diversification of the range of services and increase of tariffs for local calls as a result of implementation of two tariff rebalancing stage, the Agency considerably reduced the access deficit tariff to 1,34 lei in 2001, to 0,98 lei in 2002 –, to 0,50 lei in 2004 and to 0,39 lei in 2005.

With the view of improving the business environment for license holders in telecommunications and informatics, NRATI Administrative Board issued Decision no.16, 10.10.2005 enacting an average 20-40 % reduction in fees for numbering resources assigned by NRATI to license holders and service providers requesting these resources. This reduction was implemented after the service market had been thoroughly analyzed and the majority of operators consulted. It aims at enhancing competition on this market segment.

According to the above-mentioned decision, the annual fee for numbers requested by fixed and mobile telephony services was reduced from 0,32 to 0, 20 lei per one number, while the fee for access codes to IP-telephony services and data transport (INTERNET) services – from 5



thousand to 4 thousand lei. According to the same decision, short numbers for emergency services: 901 – fire brigade, 902 – police, 903 – urgent medical assistance, 904 – gas services, numbers used throughout the entire territory of Moldova, are assigned for free. In order to promote non-telecommunications services, the fees for short numbers from 1400-1499 number range for Chisinau municipality were reduced 33,33%. The decision also provides for a substantial reduction of fees for short numbers from 1400-1499 number range requested by auto transportation service providers and other service providers from Balti municipality and district centers of the country. Medical assistance service providers and natural gas service providers requesting short numbers from 1400-1499 and 1500-1539 number ranges have to pay 50 % of the fees set for numbering resources.

Within the reporting timeframe, NRATI took actions aimed at continuing the process of total liberalization of the telecommunications and informatics market. One of these actions pertains to finalization of tariff-rebalancing process for basic public telecommunications services provided by JSC MOLDTELECOM, which aims at the elimination of cross-subsidization of services provided by the above-mentioned operator. For this purpose, the Agency, at the beginning of 2005, performed a detailed estimation of Stage II of tariff-rebalancing and new tariffs proposed by JSC MOLDTELECOM for the following tariff-rebalancing stage. The estimation shows that due to Stage II of tariff-rebalancing the operator was able to accrue more viable funds and to diminish dependence on international telephony services. Based on this analysis, NRATI set the tariffs for the following tariff-rebalancing stage and submitted them to the Government for consultations in March 2005, as provided by Art.9 of the Law on Telecommunications.

Note, that the tariff-rebalancing plan was approved by NRATI, as a result of consultations with the Government, in December 2002. The first two stages of this process started on February 2003 and February 2004, accordingly.

In 2005, NRATI, in compliance with Government Decree no. 707 of 14.07.2000, enacting approval of tariffs for services provided by State Company Radio Communications, examined the draft tariffs proposed by this company. The drafts were thoroughly analyzed and modified depending on the real costs incurred in service provision, using the Method of Cost and Tariffs Calculation for services provided by State Company Radio Communications. In consultations with the Government on tariffs it was decided to increase tariffs gradually, in order to alleviate the possible negative effects on the economic and financial activity of companies to which State Company Radio Communications provides services. The new tariffs were approved by NRATI Administrative Board Decision no. 03, March 27, 2006 and were enforced on March 31, 2006 as the given Decision was published in the Official Monitor of Moldova.

In the period under report, NRATI also began to modify the practice of performing the analysis of telecommunications and informatics market development. For the first time, in 2005 the practice of submitting quarterly statistical reports by market-active operators was applied, which fact enabled the Agency to perform efficient analysis of development tendencies on all market segments and inform all operators and public in this respect.

Concerning the regulation of interconnection with the public fixed telephony network of JSC MOLDTELECOM is concerned, it is worth mentioning that the Agency took efforts to convince the incumbent to withdraw the discriminatory conditions proposed in its Reference Interconnection Offer (RIO) for 2006, but failed to do so in many particular cases, in spite of a number of consultations with decision-makers of this company. NRATI had no legal grounds to take a binding decision in this respect for the reason that the given company was excluded from the list of economic entities with dominant position on the telecommunications and informatics market. The ground for exclusion was Government Decree no.1030 of 03.10.2005 Regarding Register of Official Acts on Entrepreneurial Activity Regulation which abrogated the Decision of the Ministry of Economy no. 1 of 20.01.1994 Regarding Inclusion of Economic Entities in

State Register of Monopoly Economic Entities, Acting of the Market of Moldova, as a result of implementation of Law no.424 of 16.12.2004 on Revising and Optimizing Normative Regulatory Framework of Entrepreneurial Activity. According to the existing normative framework, the incumbent JSC MOLDTELECOM is not subject to special provisions for dominant operators, as stipulated by the Regulation on Interconnection. For these reasons, and for the reason that the draft RIO included unequal and ungrounded conditions from the economic point of view, NRATI refused to approve RIO for 2006.

In 2003 NRATI included the provisions, requiring the dominant operators to draw up RIO, to submit it for approval to NRATI and subsequently to make it public, by modifying Regulation on Interconnection. The modifications also provide that, by the end of the every year the RIO for the following year should be approved, by setting a mechanism of consultations with operators and other interested parties.

In 2005, for the purpose of on-going full market liberalization process and creation of most efficient conditions for the development of fair competition, NRATI draw up the draft Regulation on Accounting Separation within the internal cost accounting of JSC MOLDTELECOM, the procedures of defining relevant markets in telecommunications and informatics and designating operators with significant market power on these markets. These procedures were based on the provisions of European Union normative framework in electronic communications and competition protection. These draft normative acts, absolutely necessary for the regulation of relations between players on a free market, are to be discussed and approved in 2006, after the Parliament adopts the new Law on Electronic Communications. The implementation of the next stage of tariff rebalancing for basic public telecommunications services provided by JSC MOLDTELECOM is still an issue of priority for NRATI in 2006.

## **1.2 Technical Regulation**

NRATI activity in terms of technical regulation was aimed at amending and improving the existing normative framework and working out new regulations for the telecommunications and informatics service market to work efficiently under full liberalization.

One of the most important technical regulations of 2005 was the Regulation on Administration and Management of the National Numbering Plan (NNP), a normative act included in the National Program for Implementation of Moldova – European Union Action Plan. The Regulation aims at ensuring efficient management of numbering resources, based on the principles of objectivity, proportionality, transparency and non-discriminatory access to these resources.

The new Regulation sets forth the rules of numbering resources administration, the procedures of assignment, reservation, withdrawal and renewal of numbering resources, as well as control on their use in compliance with the provisions of this act. According to the Regulation, the Agency assigns numbering resources, at the request of telecommunications and informatics license holders, in 15 calendar days. In the event that several operators apply for the same numbering resources, the Agency may take the decision to assign the resources the resources under dispute by drawing lots.

Numbering resources, assigned by NRATI, can be used for own purposes or/and re-assigned to their subscribers. The Regulation stipulates that the fixed and mobile telephony service operators may refuse to assign numbering resources to their subscribers only on condition that no technical possibilities are available.

The Regulation on Tender Procedure for Awarding Individual Licenses in Telecommunications and Informatics approved by NRATI Administrative Board Decision no. 09, April 14 2005, is another important document issued in 2005. The regulation establishes the tender procedures for

individual license issuance and aims at selecting, under maximal transparency conditions, the bidders that won the right to be granted an individual license for type of activity.

In order to exclude the use of local fixed telephone networks with fixed radio access to the local loop (WLL), based on CDMA technology, as mobile telephony networks, NRATI issued a Decision, imposing some conditions in order to restrict the mobility of terminal equipment, to eliminate the automatic call transfer regime between base stations and sectors, installation of stationary CDMA equipment, etc. Thus, NRATI decision requires that license holders, providing local fixed telephony services, using CDMA technology for networks with fixed radio access to the local loop (WLL), limit the mobility of terminal equipment connected to a terminal point of the network within the radius of action of a sector determined by the opening angle of the antenna - 90/120 of the base station coverage area. They are also bound to eliminate the automatic call transfer regime between base stations and sectors and install stationary CDMA terminal equipment to their subscribers, without a RUIM card.

The above-mentioned regulations pertain, first of all, to JSC MOLDTELECOM that launched in December 2005, a local fixed telephony network with fixed radio access to the local loop (WLL) based on CDMA technology. The Government Decree of 10.11.2004 On Approving the Program for Nationwide Telephone Installation for 2005-2010 designated JSC MOLDTELECOM as the main executor of this Program and granted it the right to use the radio access to the local loop (WLL) based on CDMA technology in 450 MHz frequency band.

In the timeframe under report, NRATI approved the sample Agreement for fixed telephony service provision via fixed radio access (WLL) based on CDMA technology and required that the operators, providing such services, inform their subscribers about the conditions of service provision and sign agreements in accordance with the sample Agreement.

At the same time NRATI approved the proposed modifications to the Regulation on Fixed Telephony Service Provision, thus setting new rules for operators in providing information about subscribers' telephone numbers. Thus, according to the new provisions, the fixed telephony operator provides information about his subscribers' telephone numbers for free only on condition that the requestor presents complete information about the subscriber, the name of the central (local) public administration authority, medical institutions and pharmacies. Otherwise, this information is provided for a fee, in compliance with the tariffs in force.

According to the modifications, the complete information about the subscriber should comprise the following data for I category subscribers: name of other authorities, of organizations and enterprises and their addresses (street, house/block number). In rural localities, where the address of the authority, organization or enterprise cannot be presented, their names will suffice. Data about II category subscribers include name, surname and home address (street, block/house number, and apartment number, if any). In rural localities where the home address cannot be presented, the requestor provides the subscriber's name and surname. The above-mentioned provisions were also included in the sample agreements for fixed, ISDN (2B+D) and radio access (WLL) based on CDMA telephony service provision, which are part of the Regulation on Fixed Telephony Service Provision.

In 2005 NRATI also modified the Regulation on Administration of Names in the Top-Level Domain .md by which granted additional rights to the national registrar of names in this domain. Thus, according to the modifications, the registrar has the right determine premium-names sub-domains and organize open electronic auctions for sub-domain names sale. The document stipulates that any registrant, legally holding a sub-domain name may participate to such auctions. Premium sub-domain names can be sold at a higher price than the established fees.

The modifications mentioned above establish new, simplified rules for the procedures of registration, extension, modification and erasure of sub-domain names. So, in order to register or

extend the registration of a sub-domain, the applicant fills in the application form, available on the Web at [www.molddata.md](http://www.molddata.md) and [www.register.md](http://www.register.md), sends it to one of these addresses to be processed and pays the bill for the services, received from the Registrar. The data about a sub-domain, can also be modified via e-mail or fax. Sub-domain names can be registered and extended for at least one year.

The new provisions of the Regulation forbid registration for blackmail purposes or for seizing trademarks or intellectual property. They stipulate that trademarks are to be registered with the requestor only provided that he presents a certificate confirming the right to a trademark. The Registrant is personally responsible under law for fraudulent registration of a trademark or intellectual property.

These modifications were operated for the purpose of both conforming the Regulation to the norms and recommendations of the international authorities in the field - ICANN (Internet Corporation for Assigned Names and Numbers) and WIPO (World Intellectual Property Organization), and promoting more actively the top/level domain assigned to Moldova in accordance with the international standard ISO-3166.

### **1.2.1 Licensing**

The high rate of growth in the number of license applicants requesting to be authorized for different types of activity in telecommunications and informatics persisted in 2005, as in 2003-2004,

In this timeframe the Agency issued 335 licenses, granting the right to provide telecommunications and informatics services, including:

- 30 – for telecommunications service provision;
- 226 – for informatics service provision,
- 7 – for construction, maintenance, operation, and creation of air television stations;
- 58 – for construction, maintenance, operation, and creation of cable television stations;
- 13 – for construction, maintenance, operation, and creation of air radio stations;
- 1 – for construction, maintenance, operation, and creation of cable radio stations.

In 2005, licenses for informatics service provision were at highest request. This range of licenses included: data transport service provision - 76 licenses, IP – telephony – 65, design and implementation of software – 110, informatics services in public places - 131. Out of 131 license holders, 68 – run their activity in district centers and rural places. By January 1, 2006, the number of companies providing informatics services increased to 400, 117 of which operated outside Chisinau, which only confirms the tendency of growing demand for Internet services in all areas of the country. The same tendency persists on the market of radio and television programs re-transmission. In 2005, the Agency authorized 79 companies to provide services of creation and operation of cable and/or air radio and television stations, of which 64 provide such services in 77 rural places and district centers. The NRATI Licensing Commission also modified 20 technical licenses, thus granting those license holders an additional right to build, maintain and operate cable and/or air radio and television stations in other 33 rural places and districts of Moldova.

The table below provides detailed information on licenses NRATI issued in the timeframe 2004-2005.

### **Licenses issued in 2004 –2005**

#### **Table no. 1**

No.	Type of activity / name of service	Number of licenses 2004	Number of licenses 2005
	<b>Total:</b>	265	335
1.	<b>Telecommunications services</b>	43	30
1.1	Fixed local telephony service provision	9	10
1.2	Value-added services	17	13
1.3	Services of installation, construction, and assembly of telecommunications equipment and networks	27	20
1.4	Technical service (maintenance) of telecommunications equipment and networks	20	20
1.5	Re-sale of public telephony services	11	7
2.	<b>Informatics services</b>	154	226
2.1	Services of data transport via terrestrial networks and/or via VSAT.	42	76
2.2	Services of installation, construction, and assembly of data transport networks	39	82
2.3	Services of drafting of public data-transport networks projects	30	79
2.5	Services of IP- telephony	26	65
2.6	Services of technical servicing (maintenance) of public data transport networks	29	77
2.7	Services of design, maintenance and implementation of programs, equipment and informatics systems	57	110
2.8	Services of informatics services in public places	88	131
2.9	Services of design, elaboration and implementation of informatics systems of state interest, and services to ensure their functionality	30	80
2.10	Services of creation of informatics resources services of state interest, and their use (creation of databases, their operation and information service provision).	24	80
2.11	Resale of data transport services via terrestrial or VSAT networks	32	68
	<b>Technical licenses</b>	68	79
3.	Construction, maintenance, operation, and creation of air television stations	15	7
4.	Construction, maintenance, operation, and creation of cable television stations	38	58
5.	Construction, maintenance, operation, and creation of air radio stations	15	13
6.	Construction, maintenance, operation, and creation of cable radio stations	0	1

**Remark:** *The information above comprises data about companies providing more than one service, which are the subject of a license for one type of activity, or hold several licenses for different types of activities, including more than one service.*

In 2005, NRATI also examined 510 applications for license issuance, updating, withdrawal and modification. The lead-time for the applications lasted on average 4,8 business days. In this timeframe NRATI updated 69 licenses, withdraw – 4, at the license holders' request, while 6 licenses were withdrawn, for the reason that the license holders failed to pay the license fee and to take out the licenses.

## 1.2.2 Administration of Numbering Resources

Out of the range of activities NRATI carried out in 2005 regarding the administration and management of numbering resources from the National Numbering Plan (NNP), the following deserves attention: development and approval of the Regulation on Administration and Management of the National Numbering Plan, implementation of the access to numbering resources from range 1 of numbers on the entire territory of Moldova, regulation of the process of assignment and use of short numbers 9X and 9XX from the old numbering plan, establishing the blocks of numbers assigned to local fixed telephony networks using fixed radio access to the local loop (WLL) based on CDMA technology etc.

Ensuring in 2005 the access to numbering resources from range 1 of numbers on the entire territory of Moldova, NRATI generally finalized the implementation of the new NNP, approved by Order no.72, 08.04.2003 of the Ministry of Transport and Communications. So, on November 1, 2005 JSC MOLDTELECOM concluded the implementation of access to short codes and numbers from range 1, as provided by the NNP, in its fixed telephony networks from the districts of Moldova. In this process short numbers of 9X and 9XX format, previously used by the incumbent, were removed, except emergency numbers „91, „92, „93 and „94.

For example, numbers 99 and 909, previously used by JSC MOLDTELECOM for information services in the districts of the country, were replaced with a single number – 1188, which for the same purpose has been used in Chisinau municipality since February 1, 2004. The numbers 117 and 119 replaced the previously used numbers for customer support service 97 and 907 and the numbers for telephone repair services 98 and 908 accordingly. The previously used numbers for ordering operator-intermediated long-distance and international calls 013 and 019, as well as the numbers 96 and 906 for telegram reception were replaced with 1688 and 1699 accordingly.

These modifications were necessary to ensure the implementation of access to short codes and numbers from range 1 in all the districts of the country and to bring the numbering system into line with the new National Numbering Plan. Stage I of this plan started on November 1, 2003, Stage II – on February 1, 2004. During this stage the access to short codes and numbers from range 1 was implemented in Chisinau municipality. According to the NNP, short numbers for emergency services 901 – fire brigade, 902 – police, 903 – urgent medical assistance, 904 – gas services, are to be used until the National Emergency Service 112 is implemented.

In 2005 NRATI processed about 90 applications for numbering resources assignment, the majority of which were accepted. The numbers used in fixed and mobile telephone networks and the numbers for Premium Rate service were at highest request. So, 164 160 numbers were assigned for traditional fixed telephony, including 25 000 – to new entrants, and 85 200 numbers – for local fixed telephone networks via radio access (WLL) based on CDMA technology. But, in 2005 the number of applications filed to NRATI for assignment of access codes to telecommunications and informatics services and short numbers for non-telecommunications services fell.

For comparison, see the table below, showing the numbering resources NRATI assigned in 2004-2005.

### Numbering resources assigned in 2004-2005

Table no. 2

No.	Telecommunications networks and services	Block of numbers	Numbers and codes assigned in 2004	Numbers and codes assigned in 2005
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1	Access codes to telecommunications operators	1010 - 1099	1	-
2	Access codes to operators' information services	118X(X)	1	2
3	Access codes to IP-telephony services	1600 - 1039	17	6
4	Access codes to long-distance/international services	1680 - 1699	2	-
5	Access codes to data transport operators	1900 - 1949	14	4
6	Technological codes for network testing	1800 - 1899	26	-
7	Short numbers for services	1400 - 1499	29	7
8	Short numbers for services	1500 - 1539	-	2
9	Fixed telephony networks			
	JSC MOLDELECOM	2XXXXXXX	78965	164160
10	Fixed telephony networks WLL	2XXXXXXX	-	85200
	SC Railway of Moldova	—	5100	6100
	New market entrants	—	4000	25000
11	GSM mobile telephony networks			
	JSC VOXTEL	69X XXXXX	200 000	300 000
	JSC MOLDCCELL	79X XXXXX	300 000	290 000
12	Freephone service	800 XXXXX	15	12
13	Access to INTERNET services	821XXXXX	20	2
14	Premium rate service	900 XXXXX	8	53

In 2006, as regards the administration and management of numbering resources, NRATI places the emphasis on enhancing free competition on the market of telecommunications and informatics services and providing sufficient numbering for market development. As well, the Agency will consider the possibilities to implement number portability both in cell mobile and fixed telephony networks.

### 1.3 Monitoring and Control

The main objective of the monitoring and control aspect of NRATI activity is to contribute to ensuring and promoting fair competition between market players, to the protection of users interests and rights, under transparent, impartial and objective conditions.

The monitoring activity is constantly under way, with the view of fulfilling NRATI's functions, objectives and tasks, as established by Law, such as supervision over compliance with policies and regulations in force, with license conditions, prevention of administrative contraventions, as well as drawing up reports, studies and analyses meant to evaluate the necessity and developing new regulations in line with current and subsequent market needs. This activity comprises analysis of information, evidence of infringements of legislation and normative acts, committed by providers of telecommunications and informatics services, with no intervention in their activity. Where such evidence proves to be veridical, NRATI subjects the given economic entity to control.

The activity of control includes actions meant to verify the license holders' observance of legislation, normative acts and regulations in force, their compliance with license conditions, as well as quality of their services and ways of meeting the needs of their users. The Monitoring and Control Division (MCD) is responsible for this activity, which is performed according to the Annual Control Plan. Like in previous years, in 2005, MCD specialists, mandated for this purpose by NRATI Director through control mandates, carried out all actions of control.

The table below shows comparative data regarding the results of NRATI monitoring and control activity throughout 2005, as compared with 2004.

### Monitoring and Control Activities NRATI carried out in 2004 and 2005

**Table no.3**

Type of activity	2004	2005
<b>CONTROL ACTIONS</b>		
<b>Total number of control actions:</b>	272	290
a) Planned:	239	249
- operators of public fixed telephony networks and/or providers of local fixed telephony services	71	83
- operators of GSM networks and providers of GSM cell mobile telephone services	1	0
- operators of public data transport networks and/or providers of informatics services	102	97
- operators of cable television networks	42	47
- operators of radio broadcasting and/or television stations/networks	23	22
b) Unplanned:	6	2
- operators of public fixed telephony networks and/or providers of local fixed telephony services	4	0
- providers of value-added services via public fixed telephone networks	0	1
- operators of GSM networks and providers of GSM cell mobile telephone services	0	0
- operators of public data transport networks and/or providers of informatics services	2	0
- operators of cable television networks	0	1
- operators of radio broadcasting and/or television stations/networks	0	0
c) control meant to verify the readiness of the operator to launch the services:	27	39
- local fixed telephone services	2	3
- value-added services via public fixed telephone networks	4	3
- data transport services (access to Internet)	13	20
- IP- telephony services	8	13

### REPORTS ON ADMINISTRATIVE CONTRAVENTIONS

Reports:	5	37
a) operators of public fixed telephony networks and/or providers of local fixed telephony services	2	8
- activity without a license	0	0
- breach of license conditions	2	8
b) operators of public data transport networks and/or providers of informatics services	1	16
- activity without a license	0	0
- breach of license conditions	1	16
c) operators of cable television networks	0	6
- activity without a license	0	6



	- breach of license conditions	0	0
d)	operators of radio broadcasting and/or television stations/networks	2	7
	- activity without a license	0	5
	- breach of license conditions	2	2

Out of the 290 actions of control fulfilled in 2005, 249 were planned, 39 – focused to verify the degree of technical and organizational preparedness in order to launch public telecommunications and informatics services, and 2 – unplanned. The latter were fulfilled as a result of complaints coming to the Agency. As for the rest of control actions, NRATI specialists detected, in most cases, breaches connected with non-compliance with license conditions, such as exceeding the deadline for license update and renewal, failure to submit statistical reports to the target date, use of uncertified and unmarked equipment, lack of complaint registers.

The control procedures performed in 2005 intended to draw the attention of new license holders to the parameters of service quality, to the necessity to comply with license conditions, to their obligations regarding final users' rights and interests. During these actions NRATI specialists offered license holders the assistance necessary to keep them informed and have them comply with the legislation, normative acts and regulations pertaining the sector.

In 2005, compared to 2004, the Division performed 10 more planned control procedures, 12 more verifications of preparedness, but reduced the number of unplanned control procedures three times. This reduction is explained, on the one hand, by the small number of complaints received by NRATI, as well as by NRATI strict compliance with the principles of this type of control: the unplanned control is performed provided that veridical data are available regarding administrative contraventions. On the other hand, the reductions occurred due to the compliance with the principles of performing such control: the network operator and the service provider is subject to planned control only once a year. Where the control results does not reveal any breaches of law or license conditions, especially in terms of quality of services and relations with the final users the control is performed once in two years.

As a result of control activity in 2005, NRATI specialists draw up 37 reports ascertaining administrative contraventions admitted by network operators and service providers. Out of the total number of reports 26 attested serious breaches of license conditions and 11 – cases of exceeding the deadlines for license renewal and running the activity after the license expiry date. For these breaches the chiefs of 34 companies were sanctioned, in accordance with the provisions of the Code of Administrative Contraventions, one company had its license revoked and another company received a warning.

#### **1. 4 Dispute Resolution**

NRATI examines the disputes arising between players of the telecommunications and informatics market in absolute compliance with the provisions of the Law on Telecommunications and the Regulation on Dispute Resolution between Operators, and between Operators and Users. In case the service provider infringes upon the user's rights and the two parties failed to settle the dispute amiably, the user may file a complaint with the Agency or Court. Generally, NRATI processes complaints within one month. As for complaints requiring additional investigation - in 15 days as of the date the complaint was registered. NRATI Administrative Board examines the disputes, for the settlement of which public hearings are necessary, so that the parties can provide explanations and proofs. The Board may take decisions to settle the dispute in favor of the complainant, in case his claims are well grounded.

Throughout 2005, NRATI examined 12 notifications from operators, requesting that NRATI intervene in order to settle the disputes, arising in most cases between these operators and JSC

MOLDTELECOM, for the reason that the former rejected, for unfounded reasons, the requests of quite a few operators for interconnection and collocation (installation of equipment and cables, lease of space for this purpose) and imposed unfavorable conditions for interconnection. As a result of the public hearings held by NRATI Administrative Board and its recommendations, the above-mentioned disputes were settled.

The same procedures were followed regarding the notifications from a few local fixed telephony operators – new entrants, who accused mobile telephony operators JSC VOXTEL and JSC MOLDCELL of having refused or delayed the signing of interconnection agreements. In the end, due to NRATI mediation, JSC VOXTEL and JSC MOLDCELL signed interconnection agreements with the operators mentioned above.

In the reporting timeframe, NRATI examined the notification from JSC VOXTEL regarding dishonest advertisements run by JSC MOLDCELL, about the latter's geographic and population coverage rates. In order to settle this dispute, the specialists of NRATI and State Communications Inspection, by common efforts, performed measurements and verifications locally, for two months. Subsequently a working group worked out the integrated principles and criteria for mobile coverage rates calculation. The new method was approved by NRATI Administrative Board Decision no.27, 30.12.05 On Determining Rates of Geographical and Population Coverage, Number of Subscribers in GSM Cell Mobile Telephone Networks and Modifying NRATI Administrative Board Decision no.02/1, of 04.02.2004.

The investigation made by NRATI shows that one of the main reasons for disputes between telecommunications and informatics service providers lies in the anti-competitive behavior of powerful operators attempting to impose discriminatory and unfavorable conditions on new entrants. It will be possible to overcome this phenomenon only on condition that a new legal framework is adopted, which will legalize NRATI's right to determine relevant markets, to designate operators with significant market power and to require that the latter comply with the principles of fair competition.

In 2005, NRATI also examined 85 disputes between service providers and their users. Unsatisfactory service quality and incorrect billing caused the absolute majority of these disputes. 65 of them were settled amiably, while 20 – through administrative orders issued by NRATI.

For the reasons given above, 6 users took the action to court claiming moral damages. NRATI representatives took part in these court hearings as experts in the field or as intervening party.

## **1.5 User Protection**

Protection of telecommunications and informatics service users is one of NRATI's main functions, enforced through the mechanisms stipulated in the effective legislation. Pursuant to the Law on Telecommunications, NRATI issues and approves regulations in order to prevent and counteract practices affecting users rights.

Administrative Board Decision no.02 of January 20, 2005 Regarding the Regulation of Information Transmitted by the Telephone Exchange Answering Machines and Voice Mail was one of the most important decisions NRATI took with reference to user protection. The idea for this decision came during the examination of several complaints from users claiming that some telephony operators charge for answering machine messages as for telephone calls, levy fees for deactivation of Voice Mail. The draft document was initially subject to public consultations on NRATI Web page, subsequently it was the issue of public debates with the representatives of telephony operators.

Through this Decision, telephone operators are prohibited to charge for the messages read by answering machines in their telephone exchanges, that replace the tones identifying the called line condition (calling tone, busy tone, disconnected, outside coverage area, etc), unless the called subscriber is connected to Voice Mail service. This Decision also stipulates that, where the called subscriber is connected to the Voice Mail service, telephone operators shall limit the duration of the standard greeting to 6-8 seconds. Operators had to withdraw charges for deactivation of Voice Mail service requested by final users of their own networks.

As a result of this Decision, JSC VOXTEL increased the time interval anticipating the Voice Mail message from 20 to 30 seconds, reduced the duration of standard greeting messages from 27 to 6-8 seconds. The fee for Voice Mail registration for „Tempo” users was reduced three times, while Voice Mail deactivation, including deactivation by calling given operator’s service, is free.

For the same purpose – protection of users rights and interests – in particular the right to be informed by the operators about the conditions and tariffs for value-added service provision – NRATI imposed, in February 2005, additional obligations on license holders authorized to provide such services, especially televoting – distance voting as part of contests organized by authorized television stations. Pursuant to NRATI Decision operators providing such a service are to inform the audience, during contests or other programs, in subtitles, about the tariffs for one call originated in the fixed telephone network and/or for a short message (SMS) originated in mobile networks, by means of which distance voting is performed.

By the above-mentioned Decision NRATI added provisions to license conditions to be pursued by operators providing televoting, which, like other value-added services, are to be provided under special charging and payment conditions.

INTERMOBCOM was the first operator imposed by NRATI to comply with the new obligations. It is a license holder designated by company TELERADIO – MOLDOVA to organize distance voting during national pre-selection for EUROVISION 2005.

Pursuant to the legislation in force, service providers must offer their final users comprehensive and veridical information, so that the latter have a reasonable choice according to their interests. For these reasons, in the activity of monitoring and control over compliance with license conditions NRATI specialists verify lawfulness of contracts signed with the final users, availability of comprehensive, correct and precise information in the contract regarding the provided services, including clauses about quality, warranty conditions, exact price or tariff for the services covered by the contract. Where the conditions of service provision, tariffs and charging methods are modified, NRATI verifies the operators compliance with the obligation to inform users not later than 15 days in advance about the coming modifications.

Examining users petitions is also a factor to ensure users protection. NRATI promptly responds to all petitions, in particular to the ones claiming that users rights have been infringed upon. Such facts are thoroughly investigated and remedies are provided to restore the users ultimate rights. In 2005, NRATI processed 111 such petitions. They refer, mainly, to operators’ non-compliance with license conditions and service provision contracts, erroneous billing, refusal to provide itemized billing for calls etc. About half of these petitions accuse the incumbent - fixed telephone operator JSC MOLDELECOM, in particular, of erroneous billing. Signers of about 20 petitions expressed discontent about mobile operators JSC VOXTEL and JSC MOLDCCELL, and the rest – about data transport and cable TV service providers. Having thoroughly verified the facts contained in petitions, NRATI settled most of the disputes in favor of end users.

## **1. 6 Relations with the Public and Mass Media**

Like in the previous years of its activity, in 2005, NRATI pursued the policy of openness to dialogue and cooperation with all market participants, including service users and mass-media representatives. Being aware that the development of reasonable and efficient normative acts largely depends on operators' active participation in this process, the Agency continued the practice of the previous years: subjected all draft decisions with potential impact on the market to public consultations on NRATI Web site, subsequently consulting them additionally with the operators during public hearings, and in the end, approving them in NRATI Board open sessions.

Thus, within the reporting timeframe, the Agency held 25 public meetings, bringing up for discussion a number of draft regulatory documents, disputes between operators, user protection issues. NRATI Administrative Board examined and generalized all the suggestions and proposals the participants made, including the e-mailed ones. Part of them was accepted in order to be included in the draft documents.

NRATI makes practice of different ways of communication with the public, such as reception of citizens, offering consultations to both new telecommunications and informatics operators and final users requesting them. During reception hours, Administrative Board members and Directors of Divisions examined 310 notifications, most of which referred to issues of licensing procedure and administrative responsibility for breach of norms and legislation in force.

The communication activity of NRATI was also focused on another priority – to inform both market players and public about the new regulations issued by NRATI and modification of the existing ones, about their impact on the market and final users and evolution of all market segments. For the first time in the mentioned timeframe the Agency provided quarterly detailed comparative information about the evolution on the fixed and mobile telephony market, INTERNET access market. This was possible due to the fact that starting with January the 1, 2005, the above-mentioned service providers, have presented quarterly statistical reports, pursuant to NRATI Administrative Board Decision no.01 January 6, 2005 a NRATI, which are subsequently processed by the Market Economic Regulation Division.

Generally, the public is informed by NRATI press service and the Web page. This service, active for three years already, issues press-releases on problems of public interest, that are subsequently made public by central mass-media, especially by such economic publications as „ECO” and „Экономическое обозрение (The Economic review). NRATI Web page contains all the information issued by the press service. This page, available in three languages – Romanian, Russian and English – can be called a bridge connecting the Agency with all service market players, including users of these services.

The Web page contains all relevant information about NRATI activity, Administrative board Decisions, decisions on licensing and numbering resources assignment, excerpts from proceedings of Licensing Commission sessions, lists of license and numbering resource holders. The page also displays reception hours of NRATI Administrative Board members, contact information of administrative staff of the Agency.

In its relationship with mass media, NRATI did its utmost to become a credible partner for the press. The priority in this relationship has always been the provision of objective and continual information to mass media representatives, in particular the ones dealing with economic issues, about the new regulations and changes on the market as a result of its full liberalization.

In 2005, NRATI continued promoting the open door policy for the press. The press representatives were invited to public meetings of NRATI Administrative Board and Licensing Commission, to consultations with telecommunications operators regarding issues of public interest. NRATI staff in charge responded to all requests from the press – written or electronic – with reference to interviews or information of public interest.

In its communication activity envisaged for 2006, NRATI emphasizes the promotion and protection of final users rights and interests. For this purpose, the Agency takes actions to strengthen its relations with consumer protection associations and to enhance activity of informing the users about their rights and the service providers' obligations in relation to their customers. In this respect, the Agency decided to involve representatives of consumer protection associations in developing and discussing drafts of regulatory documents and modifications to the regulations in force with reference to final users' rights and interests. Currently, the Agency intends to have a free telephone hotline for telecommunications and informatics users. The agency also considers changing the structure of its INTERNET page in order to add a new compartment „Service User's Page”, envisaged to become an interactive communication link between users and administrative personnel at NRATI. This will allow users to ask questions, to request the necessary information both over the phone and over the INTERNET. The above-mentioned actions pursue a common goal: to ensure transparent activity of NRATI and to contribute to protection of telecommunications and informatics users' rights and interests.

## **1. 7 International Relations**

In the reporting period, NRATI worked in collaboration with similar authorities in European Community States, EU candidate and CIS countries. NRATI delegated its representatives to conferences, workshops, symposiums organized by International Telecommunications Union (ITU) and other international organizations in the field, in which the Agency staff learned about the expertise of regulators in other countries. They attended meetings of European Conference of Postal and Telecommunications Administrations (CEPT) in Romania, the country that in 2005 held Presidency office in CEPT, workshops within ITU, Group of Franco-phone Regulators (FRATEL), CIS Regional Telecommunications Community and WTDC (World Telecommunication Development Conference)-06 Regional Preparatory Meeting, held on April 18-20, 2005 in Bucharest, Romania.

On November 12-18, 2005 NRATI delegates attended the Global Symposium for Regulators (GSR) and the second phase of World Summit on the Information Society, held under the auspices of UN, a world-significant event, which set an Action Plan intended to build the Information Society for all. The delegates of Moldova took part in different side events within the Summit, dedicated to most relevant issues, such as extension of free access to information, implementation of e-governance projects, offering a wider choice of services.

Throughout 2005 NRATI held many discussions on opportunities of joining the Independent Regulators Group (IRG) as observers and subsequently as full-right member, but regretfully, failed to succeed. Negotiations are still under way and, NRATI believes, in 2006, this issue will be favorably settled, given the Action Plan Republic of Moldova – European Union. Taking part in IRG plenary meetings and working groups will allow NRATI to benefit from the experience of IRG member countries concerning relevant issues of the sector, such as interconnection, setting tariffs for services, implementation of Universal Service, and other matters of major importance for the regulation and development of telecommunications and informatics market. NRATI is especially interested in the expertise of IRG countries in matters regarding implementation of EU Directives on electronic communications at national level and practices of regulating their markets.

In the reporting period, NRATI delegates also attended a series of seminars within the program Implementation of the Action Plan Moldova – European Union, the meeting of Cooperating Committee Republic of Moldova – European Union, on November 29, 2005. These events brought to discussion issues connected to the implementation of the Acquis Communautaire, in particular EU regulatory framework in electronic communications. NRATI leadership discussed with the representatives of the World Bank and International Monetary Fund similar subjects, including the ones dealing with the adoption of a comprehensive regulatory framework in

accordance with EU requirements, making the market liberalization process more efficient, promotion of fair competition, ensuring independence, increase of NRATI powers, including powers to enforce its decisions, as well as more efficient regulatory activity.

Cooperation with international authorities in the field and regulatory bodies in European countries is one of the priorities for NRATI in 2006. The Action Plan in this respect includes a number of steps directed to the implementation of the European regulatory framework in electronic communications, building Information Society, enhancing competition, promotion of both public and final users interests. In 2006 NRATI will continue to pay due attention to staff training, having them take part in international conferences, seminars, debates and courses, as well visit regulators in EU countries in order to develop, promote and implement specific regulatory actions according to EU Directives and best European practices in the sector. In June 2006, with ITU support, Chisinau will host a Seminar on Liberalization of Electronic Communications Market, Challenges and Opportunities for CEE, CIS and Baltic States.

## II. Evolution of Telecommunications and Informatics Market

### 2.1 General Overview

In 2005 – the second year of full telecommunications and informatics market liberalization – a tendency of growth shaped out in all market sectors. As compared to 2004<sup>1</sup>, in 2005, the value of the market grew about 36,83% amounting to 3,64 billion lei. This growth occurred mainly due to the increase of investments in all sectors of the industry, implementation of broadband technologies in Internet access service provision, in particular ADSL technology, application of advanced technologies in GSM mobile networks, reduction of tariffs for mobile services and improvement of service quality.

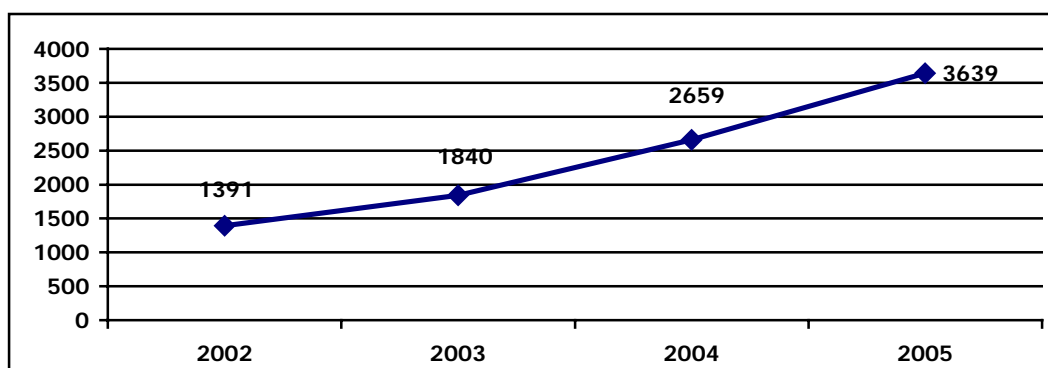
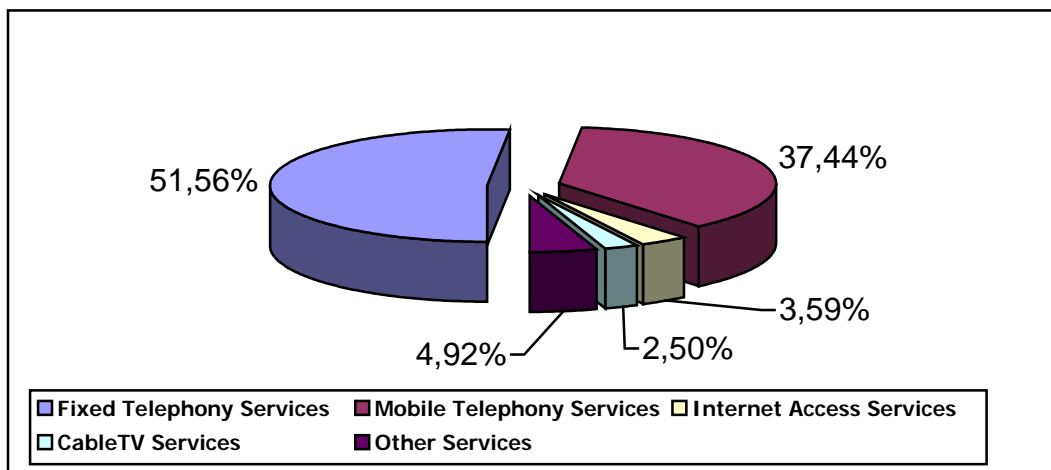


Fig. 2.1 Volume of Telecommunications and Informatics Service Market (million lei)  
Source: NRATI

In terms of market structure, fixed telephony has the highest market share - 51,56%, followed by mobile telephony - 37,44 %, INTERNET access services - 3,59 %, cable and air TV and radio services - 2,50%, other services - 4,92%.

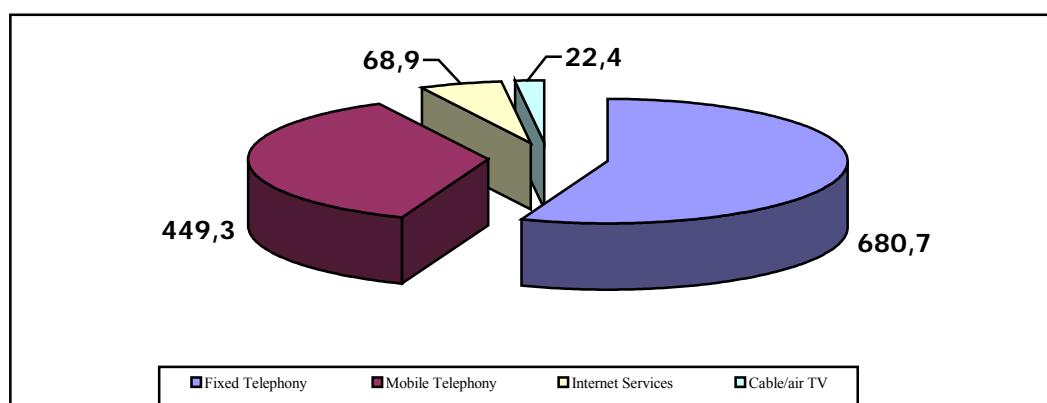
<sup>1</sup> The Report herein contains statistical data for 2004, updated by NRATI in accordance with the modifications filled in by license holders in 2005.



**Fig. 2.2 Structure of Telecommunications and Informatics Market by Revenues, in 2005**  
Source: NRATI

## 2.2 Investments in Market Sectors

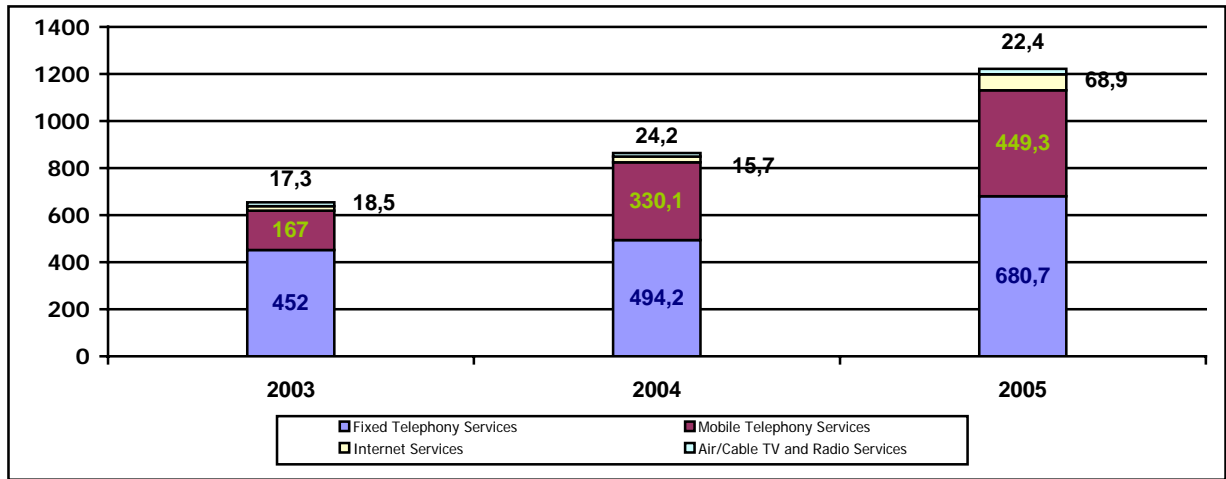
The total investments made in telecommunications and informatics market grew in 2005 by 41,33%, compared to 2004 or by 357,1 million lei, reaching 1 billion 221,3 million lei (96,93 million USD)<sup>2</sup>. The most important investments were made in fixed telephony sector - 680,7 million lei or 55,74% of the total investment, in mobile telephony - 449,3 million lei or 36,79%, in data transport service sector and INTERNET - 68,9 million lei or 5,64%, and 22,4 million lei or 1,83% - in cable/air TV and radio sector.



**Fig. 2.3 Structure of Investments in Telecommunications and Informatics Market in 2005 (million lei)**  
Source: NRATI

Compared with 2004, the investments in fixed telephony grew, in 2005, 37,74%, in mobile telephony -36,11%. The INTERNET access service sector registered highest growth of investments: from 24,2 million lei, in 2004, to 68,9 million, in 2005, or 185,2%. 11,5 million lei was invested in cable and/or air TV services and 10,9 million lei or 2,7 million lei (32,6% more than in 2004) was invested in radio communications.

<sup>2</sup> Calculations were made based on annual average exchange rate 12,6003 lei for US \$ 1. Source: National Bank of Moldova [http://www.bnm.md/romanian/index\\_ro.html](http://www.bnm.md/romanian/index_ro.html)



**Fig. 2.4 Evolution of Investments in Telecommunications and Informatics (million lei)**  
**Source: NRATI**

The analysis of investments in 2003-2005 shows that in 2006, their volume is expected to surpass the investments made in 2005. NRATI experts consider that this growth will occur mainly due to investments in the development of the fixed telephone with radio access to the local loop (WLL) based on CDMA2000 technology, in the development of infrastructure and new technologies in the GSM mobile telephony network, in extension and improvement of INTERNET access services, provided by broadband operators. By the evolution of investments and other tendencies occurring in the recent years NRATI specialists envisage for 2006 a constant growth on all market segments and a considerable increase of mobile telephony and INTERNET access services share on this market.

## 2.3 Fixed Telephony Sector

### 2.3.1 General Overview

In 2005, the fixed telephony sector registered a steady growth. The value of this market amounted to 1,876 billion lei, reaching 27,31 % compared with 2004. This evolution was caused mainly by implementation of advanced technologies, promotion of new services, increase in the number of subscribers, total volume of traffic and a higher purchasing capacity of the population.

The share of fixed telephony on the telecommunications and informatics market was 51,56%, 3,86 % lower than in 2004. The decline was caused by the growth registered in mobile telephony and data transport, as well as by the fact that the calculations comprised shares of other sectors, such as cable and air TV services, radio communications, etc., which are authorized by NRATI.

By January 1 2006, NRATI had registered 28 license holders authorized to provide public local fixed telephony services, but in 2005 only five provided services. JSC MOLDELECOM that had 99,58 % of the market value in 2005 keeps on its position of the main player on the fixed telephony market, while alternative operators State Company Calea ferată a Moldovei (Moldova Railway), JSCs RISCO, ARAX-IMPEX and LLC SICRES held the rest.

**Structure of Fixed Telephony Service Market Related to Revenues**  
**Table no.4**



Operator	Market share according to revenues, in %
JSC Moldtelecom	99,5813
SC Calea Ferata din Moldova	0,0511
JSC Riscom	0,0180
JSC Arax-Impex	0,3453
LLC Sicres	0,0043

Source: NRATI

In 2005, the incumbent's revenue generated by fixed telephony service provision grew 26,77% compared with 2004, reaching 1868,2 million lei. This indicator includes revenues from local, long-distance and international service provision, traffic to other networks and revenues from interconnection with other networks.

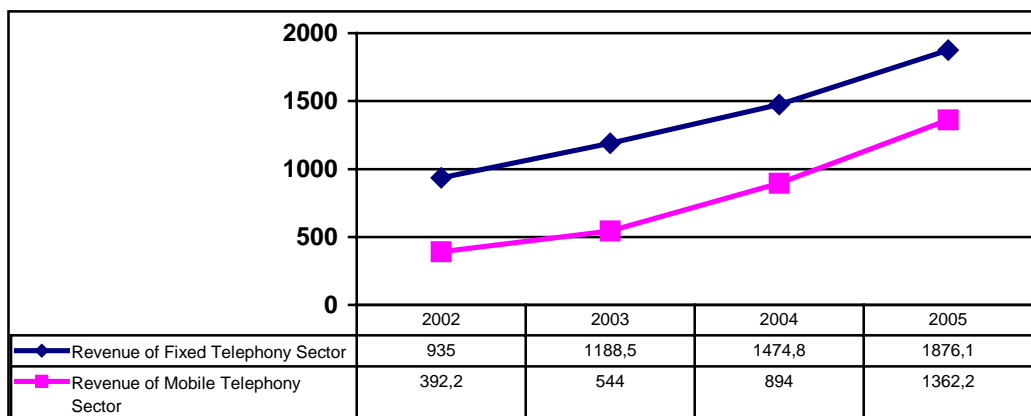


Fig. 2.5 Revenue of Fixed Telephony Sector Compared to Mobile (million lei)

Source: NRATI

The revenue obtained from international call services continued to prevail in the revenue structure. In 2005 these services made 45,4% of the revenues of fixed telephony. But the revenues generated by local fixed telephony service provision made 20% of the total revenue, registering a 2.8 % decline compared with 2004.

Generally in this sector, in 2005 the average revenue per subscriber (ARPU) grew 19% compared with 2004 – showing 175,20 lei.

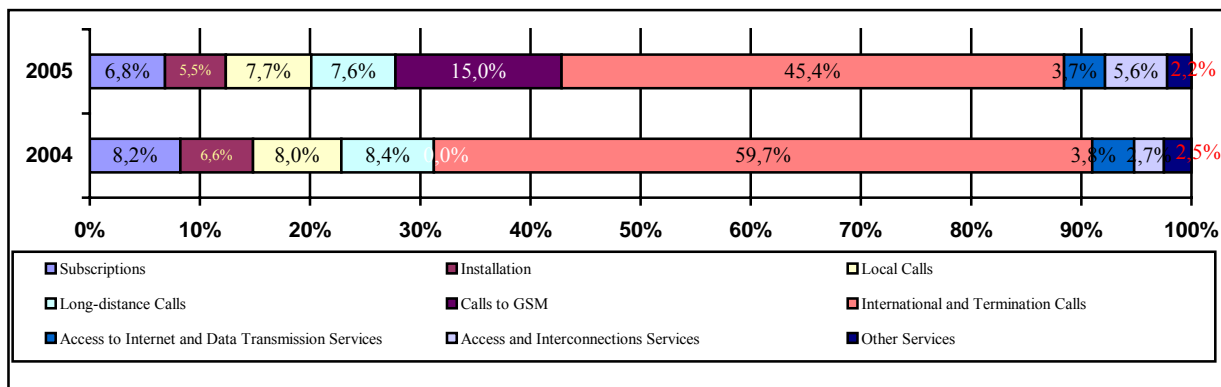


Fig. 2.6 Structure of Revenue Generated by Fixed Telephony Service Provision in 2004-2005

Source: NRATI

In the reporting timeframe 680,7 million lei (\$54,04 million) was invested in the fixed telephony sector, of which 677,7 million lei (\$53,78 million), 99,53% - in the incumbent JSC MOLDTELECOM. 286 million lei (\$22,7 million) of the total was directed to the deployment of fixed telephony network with radio access to the local loop (WLL) based on CDMA2000 (450MHz) technology. In relation to the number of subscribers, the incumbent invested 733,5 lei per subscriber.

In the same period of time, JSC RISCUM invested 1,81 million lei, JSC ARAX-IMPEX – 0,5 million lei, JSC SICRES – 0,75 million lei.

As a result of the investments in this sector, in 2005 the degree of fixed networks digitalization grew, which fact is a benefit for the users in terms of more various services and better service quality. By the end of 2005 the degree of digitalization of networks in urban areas was 59,7%, in rural areas - 73,3%, in Chisinau municipality - 67%. Still, at the end of 2005 analog switching systems of (step-by-step type, 10,3- thousand number capacity), were still operated in Moldova.

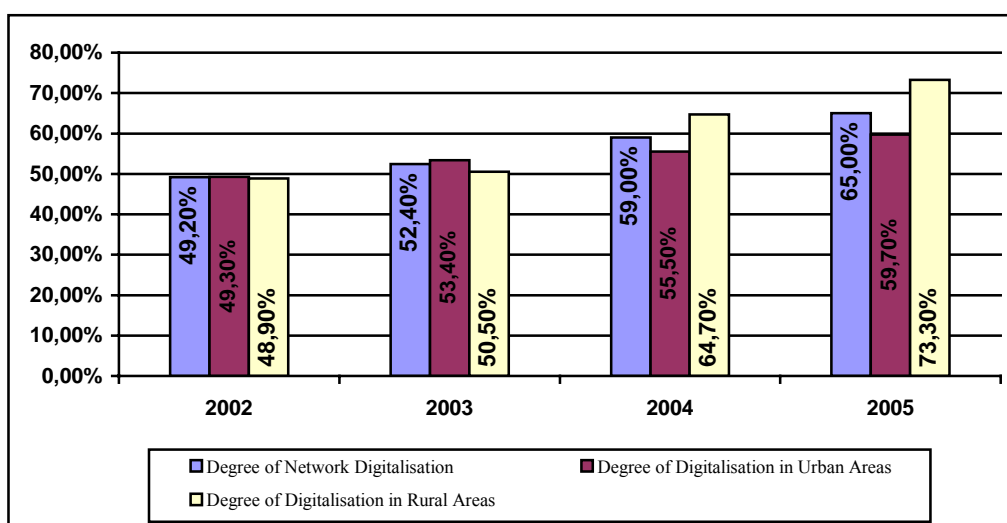


Fig. 2. 7 Degree of Network Digitalization in 2002-2005

Source: NRATI

### 2. 3. 2 Subscribers, penetration

In 2005, the number of fixed telephony subscribers grew 74,5 thousand or 8,7% to 929,4 thousand<sup>3</sup>, JSC MOLDTELECOM leading with the share of 99,4% of the total of fixed telephony subscribers.

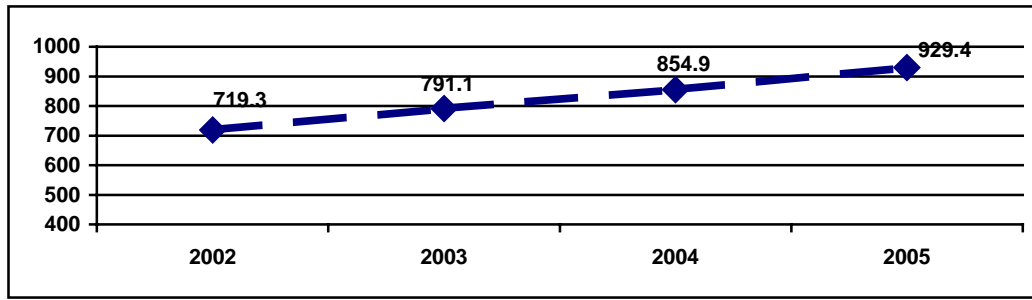
#### Structure of Fixed Telephony Service Market Depending on Number of Subscribers

Table no.5

Operator	Market share depending on the number of subscribers, in%
JSC MOLDTELECOM	99,414
SC Calea Ferata din Moldova	0,57
JSC RISCUM	0,009
JSC ARAX-IMPEX	0,005
LLC SICRES	0,002

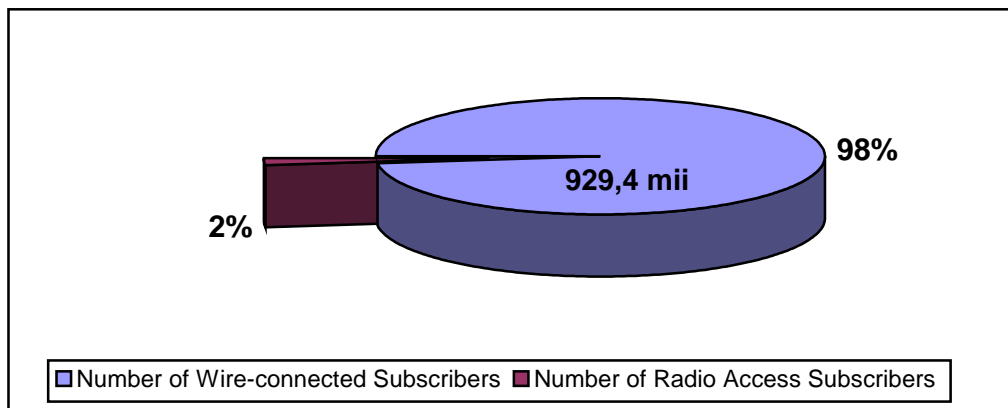
Source: NRATI

<sup>3</sup>As JSC MOLDTELECOM specified the number of subscribers in 2004, the indicator 863,4 thousand, as presented in the Annual Report of 2004, was replaced with 854,9 thousand.



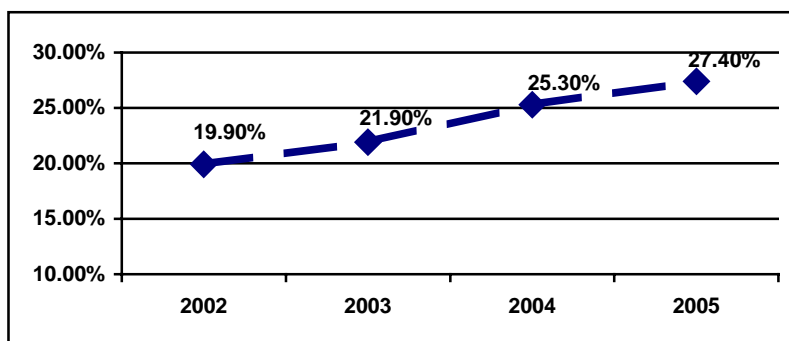
**Fig. 2. 8 Evolution of the Number of Fixed Telephone Subscribers 2002-2005 (thousand)**  
 Source: NRATI

In 2005, as JSC MOLDTELECOM launched the network with fixed radio access to the local loop (WLL), based on CDMA technology, it registered the first fixed telephony subscribers connected through radio technology. The use of wireless technologies is desirable in situations involving high costs for rollout and maintenance of cable infrastructure in remote areas or where connection must be provided in the shortest possible time. The number of these subscribers by the end of 2005 was 21,6 thousand.

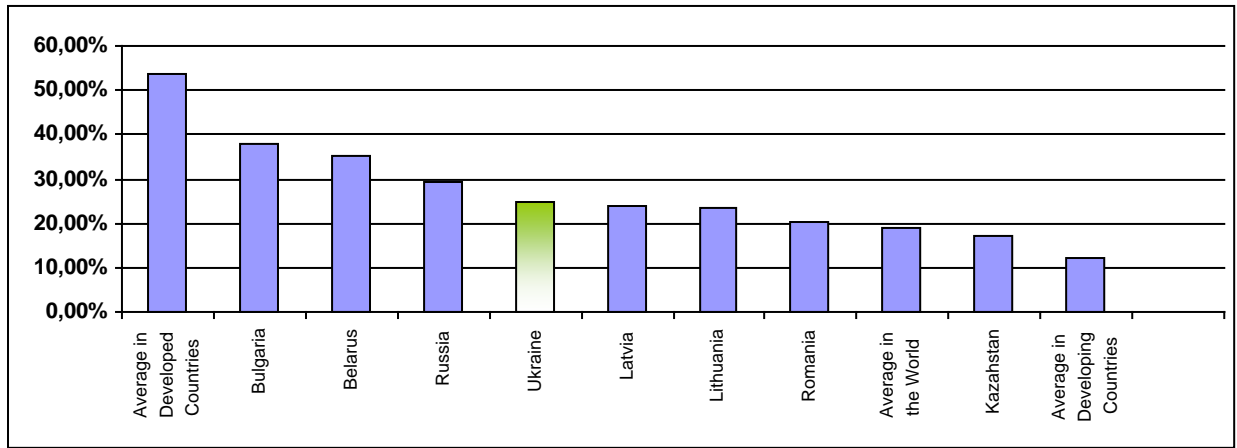


**Fig. 2. 9 Structure of Subscriber Base by Access Type in 2005**  
 Source: NRATI

In 2005, due to the increase in the number of subscribers, the fixed telephony penetration rate per 100 residents grew, compared with 2004, 2,1% and came up to 27,4%. Thus the objective of 25% fixed telephony penetration rate, according to the Program for Nationwide Telephone Installation for 2005-2010, approved by Government Decree no. 1234, 10.11.2004 surpassed by 2,4 %.



**Fig. 2.10 Average Fixed Telephony Penetration Rates in 2002-2005**  
 Source: NRATI



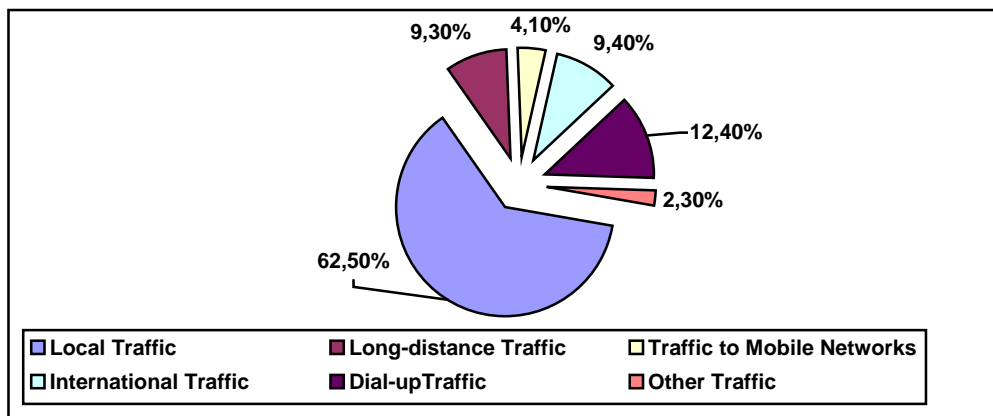
**Fig. 2.11 Fixed Telephony Penetration Rates in Moldova and in Other Countries**  
Source: NRATI

In the following 3-4 years, in spite of tendencies of fixed telephony standstill in EU countries NRATI expects a steady growth of this sector in Moldova.

The NRATI specialists explain their expectations by the fact that the fixed telephony market in Moldova has not yet reached the saturation point. In their view, this stage will start, when the number of fixed telephony subscribers reaches 1,2 – 1,4 million. In 2006, NRATI expects a significant growth in the number of subscribers connected via radio access, in particular in rural areas, where the deployment of cable infrastructure is difficult or often unreasonable.

### 2. 3. 3 Traffic

In 2005, the local traffic continued to prevail in the fixed telephony traffic structure - 62,5%. It generated 7,7% revenue. The Share of narrowband INTERNET access traffic (Dial-Up) was rather high - 12,4%, of which Dial-Up at local level - 99,5%.



**Fig. 2.12 Fixed Networks Traffic Structure, in 2005**  
Source: NRATI

In 2005 the total volume of traffic in fixed networks was 4556,5 million minutes, increasing 15,3 % compared with 2004. As for average call duration, the Figure below shows that in 2005 this indicator was higher than in 2004, almost for all call destinations, except calls to fixed networks and in fixed networks at local level.

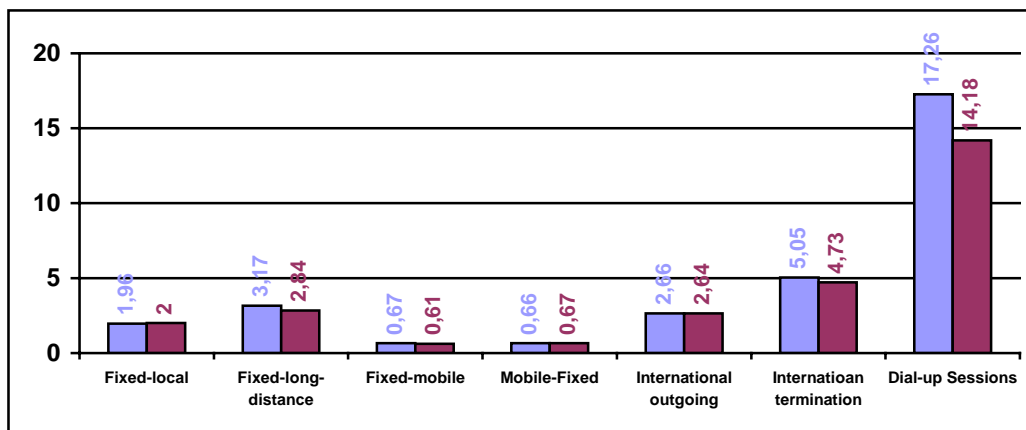


Fig. 2.13 Average Call Duration, in 2004-2005 (min.)  
Source: NRATI

### 2.3. 4 Tariffs

In the timeframe under consideration, the incumbent JSC MOLDTELECOM provided fixed telephony services at the same tariffs as in 2004.

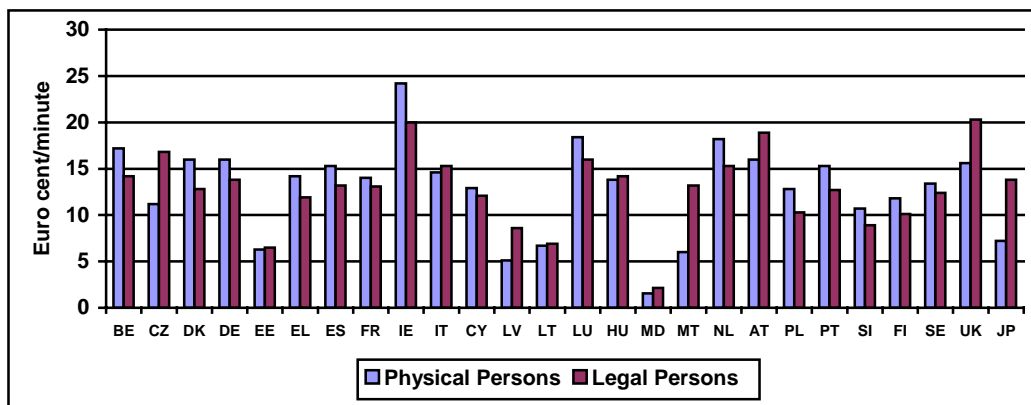
**Packages Offered by JSC MOLDTELECOM to Physical Persons, VAT included**  
**Table no.5**

Package	Minutes included	Monthly fee (lei)	Tariffs for extra-package minutes (lei/min)	
			8.00:22.00 Business days	22.00:8.00 Week-ends and official holidays
<b>Standard</b>	300,00	24,00	0,10	0,08
<b>Econom</b>	200,00	6,00	0,24	0,14
<b>Social</b>	400,00	6,00	0,17	0,12

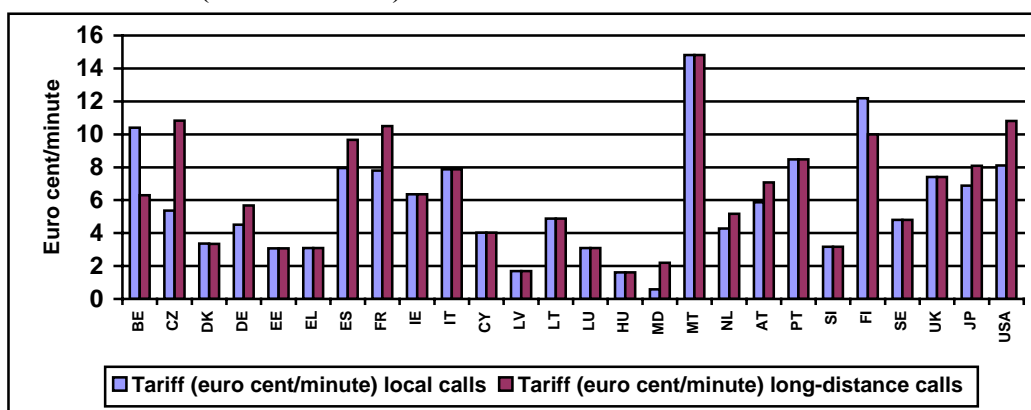
**Packages Offered by JSC MOLDTELECOM to Legal Persons, VAT included**  
**Table no.6**

Package	Minutes included	Monthly fee (lei)	Tariff per minute, lei	
			08:00-22:00 Business days	22:00-08:00 Week-ends and official holidays
Standard	0	42	0,204	0,101
Econom	0	30	0,240	0,144

Analysis of monthly fees in EU countries, USA, Japan and UK show that in Moldova the tariffs applied for local and long-distance fixed telephone services are comparatively low. This is caused by the fact that tariff re-balancing for fixed telephone services provided by the incumbent has not been finalized, by difficult social and economic situation in the country and by reduced purchasing capacity of citizens.



**Fig. 2.14 Average Monthly Fee for Fixed Telephone Services in Moldova and Other Countries**  
Source: NRATI and EUROPEAN ELECTRONIC COMMUNICATIONS REGULATION AND MARKETS 2005 (11TH REPORT)



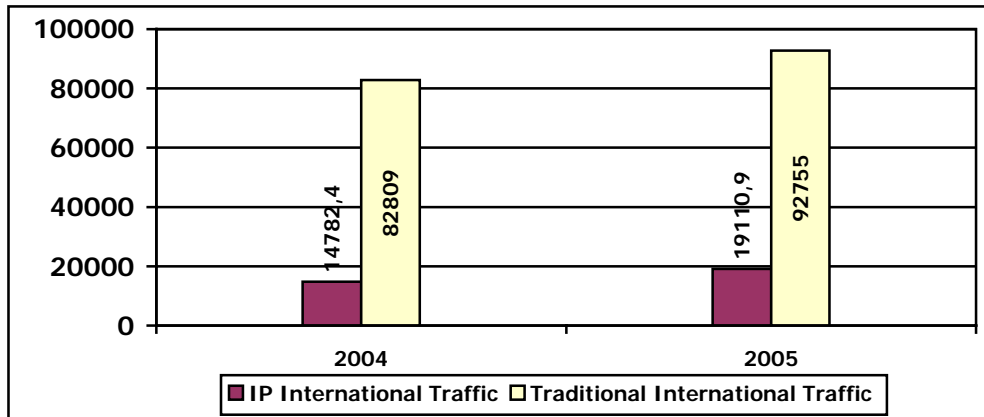
**Fig. 2.15 Minimal Tariff for Local and Long-distance Calls in Moldova and Other Countries**  
Source: NRATI and EUROPEAN ELECTRONIC COMMUNICATIONS REGULATION AND MARKETS 2005 (11TH REPORT)

### 2. 3. 5 IP-Protocol International Telephone Service

In 2005, out of the 127 license holders authorized by NRATI to provide IP-telephony services, 17 provided such services.

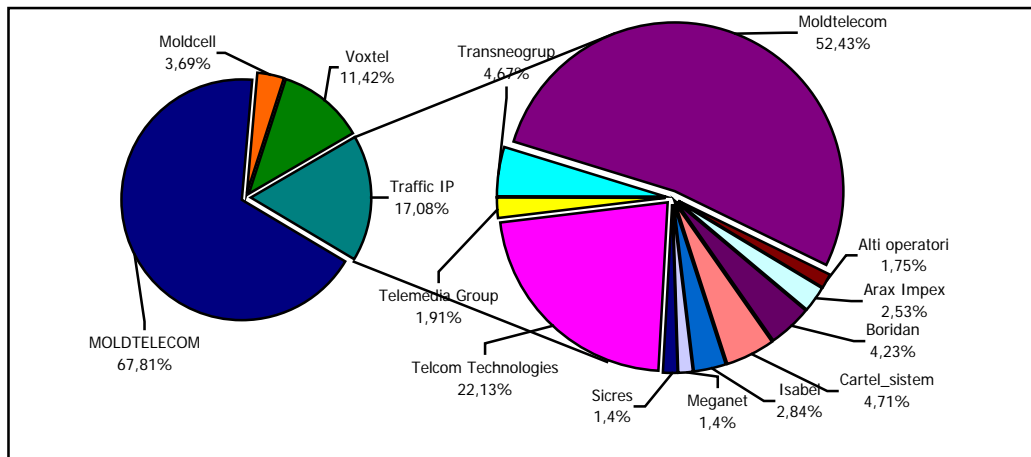
The technology of IP-service provision, which allows voice transmission via data transport networks and fixed or mobile-switched networks, has been applied in Moldova since 2000. The implementation of this technology was determined by the extension of data transport networks and the necessity to use them for both for access to INTERNET and telephone calls. IP-telephony operators in Moldova offer, as a rule, international telephone services. It is an alternative for traditional international telephony services, provided over public fixed networks, which allows lower tariffs and usually lower service quality.

In the reporting timeframe, as previously in 2003-2004, the pace of growth for international voice traffic based on IP protocol significantly exceeded the one for traditional international calls. In 2005, the volume of the latter grew 12%, compared with 2004, while the international IP traffic - 29,2%. The total volume of outgoing international voice registered in 2005 by the incumbent and by the 17 IP-telephony operators grew 14% compared with 14%, exceeding 111 million minutes.



**Fig. 2.16 Evolution of International Voice Traffic via IP-telephony (thousand minutes), in 2004-2005**  
**Source: NRATI**

International voice traffic via IP-telephony had a 17,08% share in the total volume of international voice traffic. The IP traffic generated by alternative operators grew 20% compared with 2004 reaching 9048,4 thousand minutes. So, the market share of the 17 alternative IP-telephony operators, calculated in relation to the number of minutes registered, made 47,57%, while the share of the incumbent - 52,43%.



**Fig. 2.17 Structure of International Voice Traffic in 2005**  
**Source: NRATI**

NRATI experts consider that the rapid growth of international IP-based voice traffic was caused by the fact that the operators promoted more attractive and more accessible services in terms of prices for final users. The tariffs for these services, depending on the destination country and type of network in which the telephone call is made, are, on average, 30% lower in mobile networks and half the existing tariffs for traditional international telephony.

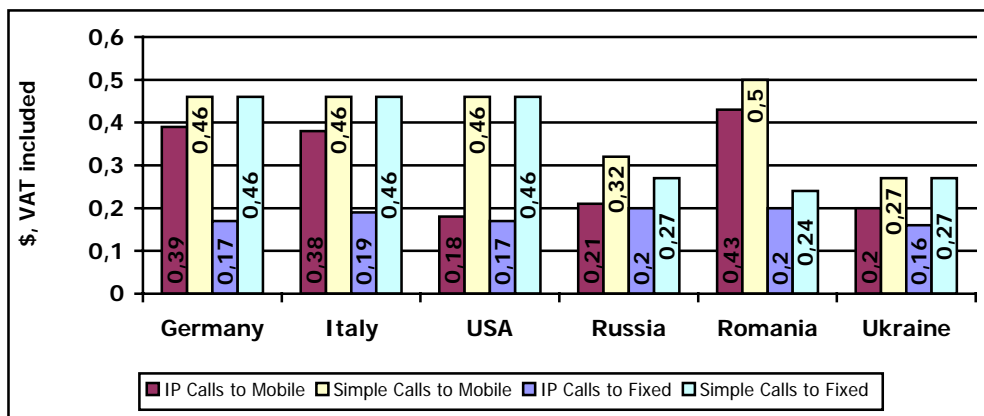


Fig. 2. 18 Tariffs for International Calls via IP-Protocol Depending on Call Destination and Type of Networks (in USD)

Source: NRATI

Lower tariffs for IP-telephony services are possible due to lower costs than costs for traditional international telephony. Besides the quality of IP calls is normally higher. In this case, final users have the possibility to choose price and quality. In the recent two years IP-telephony technology has undergone active upgrade and currently offers a high quality of international calls competitive with the traditional telephony.

## 2. 4 Mobile Telephony Sector

### 2.4.1 General Overview

In 2005 the two GSM cell mobile telephony operators JSC VOXTEL and JSC MOLDCCELL continued running their activity.

JSC VOXTEL launched in 1998 the first GSM network in Moldova. On January 1, 2006 JSC VOXTEL network covered 94,35% of the territory of Moldova and 96,87% of population accordingly. At the beginning of 2006 the shareholders of JSC VOXTEL were represented by France Telecom Mobiles (FTM) - 61%, Moldavian Mobile Telephone Bis - 30%, International Financial Corporation (CFI) - 5% and Orange Romania - 4%.

JSC MOLDCCELL started its operational activity in Moldova in April 2000. On January 1, 2006 its GSM network covered 87,51% of the territory and 88,82% of the population. The company shareholders as of January 2006 were represented by international company Fintur Holdings BV - 99%, and MolFintur LLC - 1%.

JSC VOXTEL was the first company in Moldova to start providing classical mobile telephony services by pre-paid card and by contracts, while JSC MOLDCCELL was the first operator to offer its subscribers Short Message (SMS) services, roaming for pre-paid Alocard services and charging per second, WAP/Internet Access, GPRS and EDGE. At the beginning of 2006 the two operators provided practically the same range of services.

In 2005, the revenue of mobile telephone operators grew 52,4% compared with 2004: from 894 million lei to 1 billion 362,2 million lei. As a result of this growth, in 2005, market share of mobile telephony in the structure of the telecommunications and informatics market was 37,44%, 3,82 % higher than in 2004.

The increase of the aggregate turnover obtained from mobile telephony service provision was 73,6% determined by the increase of JSC VOXTEL revenue (+344,4 million lei) and 26,4% - by the increase of JSC MOLDCCELL revenue (+123,8 million lei).



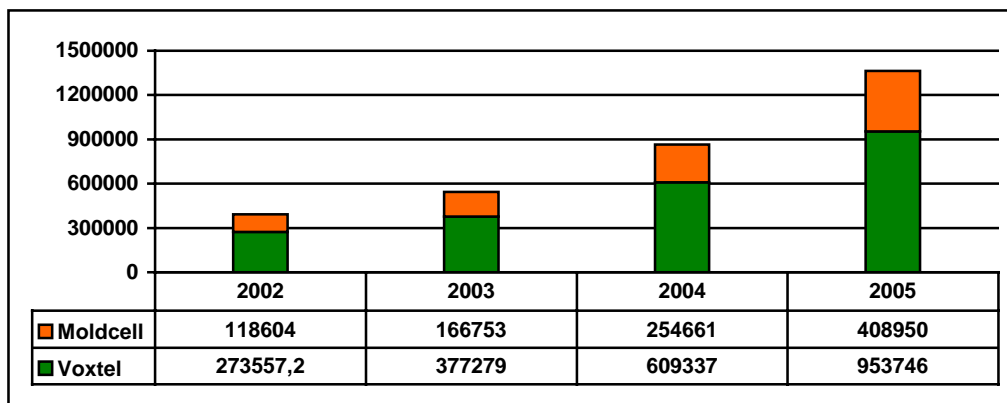


Fig. 2.19 Evolution of Mobile Telephony Market according to Turnover, thousand lei  
Source: NRATI

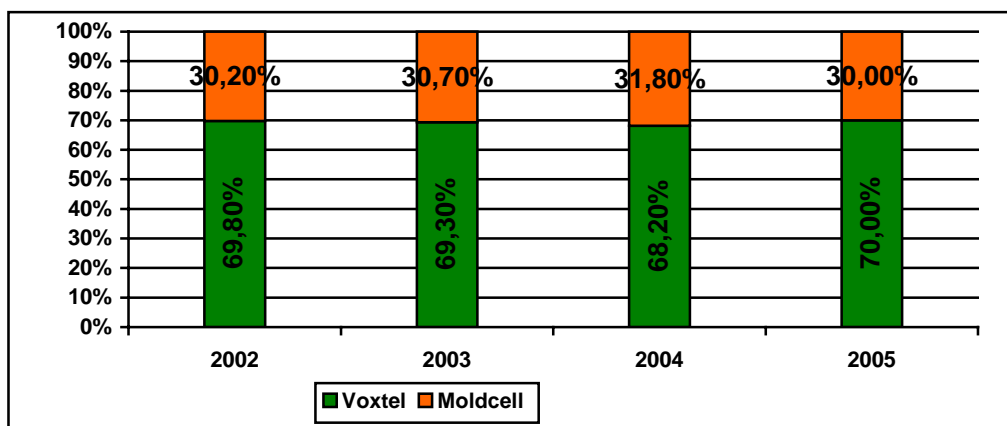


Fig. 2.20 Structure of Mobile Telephony Market depending on Revenue, in%  
Source: NRATI

During 2005 JSC VOXTEL strengthened 1,9% its market position in terms of revenue.

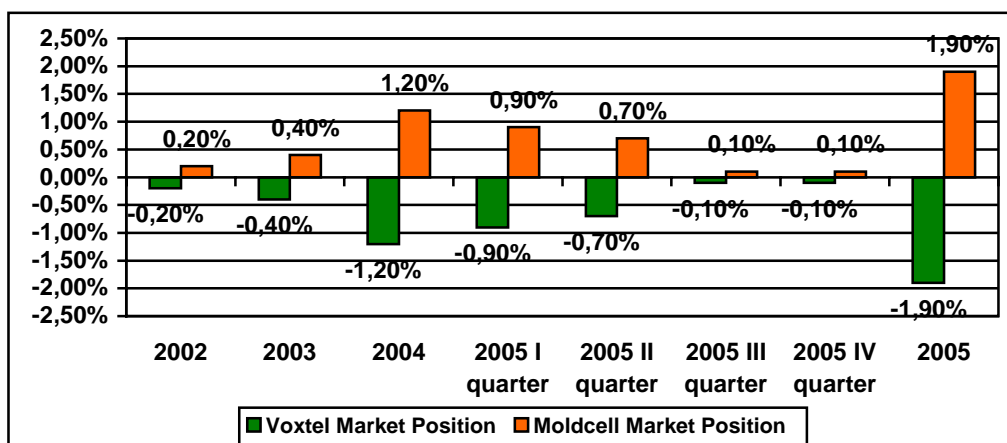


Fig. 2.21 Evolution of Operators Market Position in terms of Revenue, in%  
Source: NRATI

The Average Monthly Revenue per user (ARPU), including pre-paid users was 121 lei or US \$9,6, which is 2,4 lei (+2,5%) higher compared with 2004. This indicator is 54,2 lei or 30,94% lower than the one registered in fixed telephony. JSC VOXTEL obtained 17,55% ARPU higher than the calculated average, i.e. - 5% growth compared with 2004, while JSC MOLDCELL - 25,85% ARPU lower than the calculated average, i.e. - a 4,2% reduction, compared with 2004.

In 2005, 449,3 million lei or 36,79% of the total investments in telecommunications and informatics was invested in mobile telephony sector, 36,11% more than in 2004. Out of the total

of investments, JSC VOXTEL invested 274,2 million lei or 61%, while JSC MOLDCCELL - 175,1 million lei or 39%. 72,66% of the total investments in mobile telephony was used for network equipment: 59,69% - JSC VOXTEL and 40,31% - JSC MOLDCCELL.

Most of investment budgets were directed to the extension of coverage area and improvement of the signal on covered areas. So, JSC VOXTEL managed to increase territorial coverage<sup>4</sup> de la 86,16% la 94,35% and population coverage from 92,37% to 96,87%. JSC MOLDCCELL a increased the same indicators accordingly from 86,14% to 87,51% and from 87,4% to 88,82%. The Call Blocking Rate in mobile networks was 1%-1,1%, related to the accepted maximal rate of 2%. The Call Interruption Rate was 0,04-0,26%.

#### 2.4.2 Subscribers, Penetration

The number of mobile users grew in 2005 by 302,8 thousand or 38,5%: form 786,9 thousand to 1 million 089,8 thousand. This growth was 66,3%-determined by net connections of JSC VOXTEL (+200,8 thousand subscribers) and 33,7% - by net connections of JSC MOLDCCELL (+102 thousand subscribers).

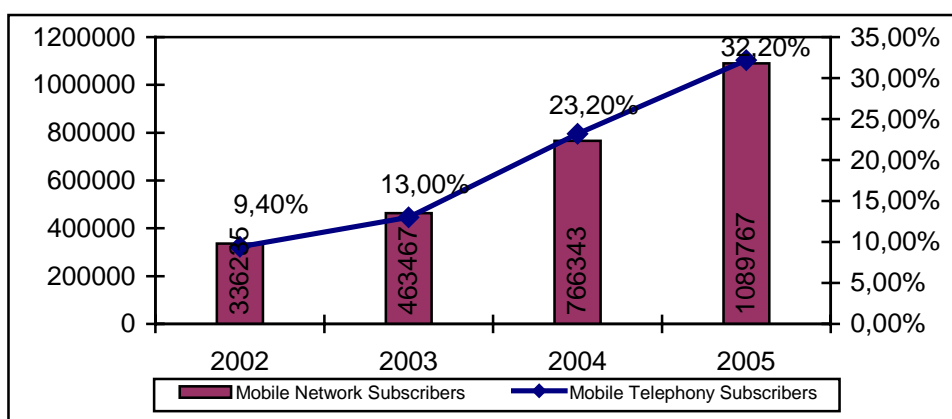


Fig. 2.22 Development of Mobile Communications in 2002-2005

Source: NRATI

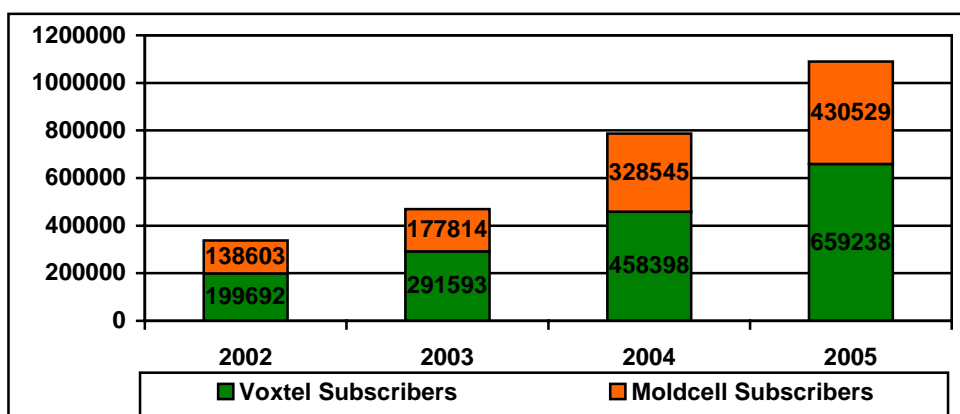
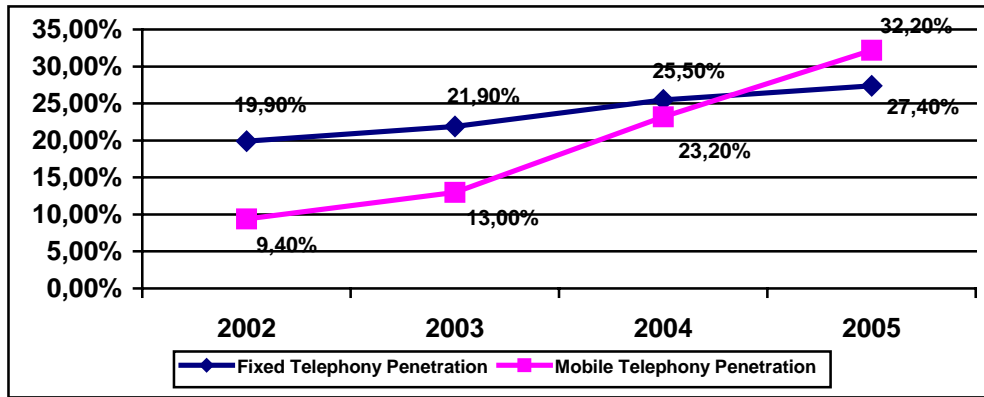


Fig. 2.23 Evolution of the Number of Mobile Subscribers in 2002-2005

Source: NRATI

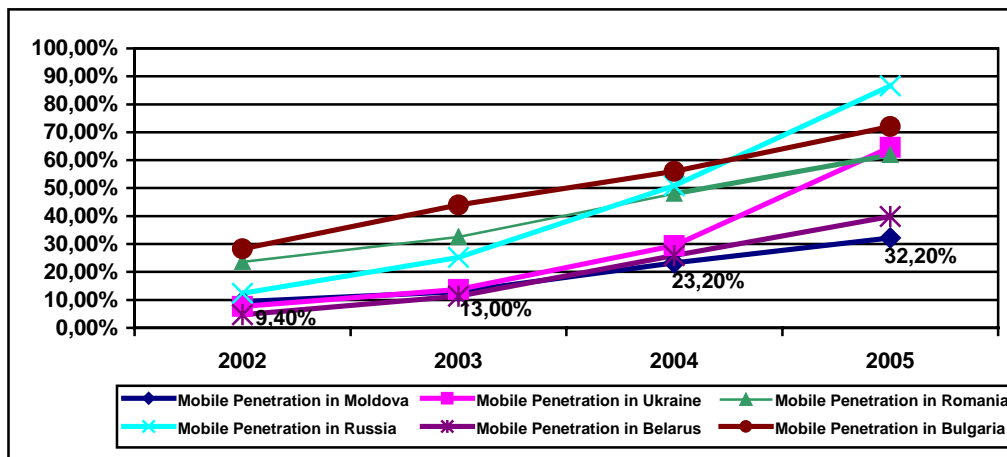
The predictions NRATI made regarding mobile telephony penetration at the beginning of 2005 proved to be correct: the number of mobile subscribers surpassed the number of fixed telephony, and mobile penetration per 100 residents grew from 23,2 to 32,2%.

<sup>4</sup> The operator calculates the degree of geographic and population coverage using mathematical formulas. The de facto coverage can be influenced by factors beyond such formulas



**Fig. 2.24 Evolution of Mobile and Fixed Penetration Rates**  
Source: NRATI

In 2002-2005 the mobile telephone in Moldova developed more rapidly than fixed telephony. In 2005, the mobile penetration rate exceeded 4,8% the fixed penetration rate. Still, compared with similar markets in Romania, Ukraine, Russia, Belarus and Bulgaria, the mobile telephony sector in Moldova falls behind. The analysis of mobile penetration rates, registered in 2005 in the above-mentioned countries show that Moldova needs 1-3 years to overtake these countries.



**Fig. 2.25 Evolution of Mobile Penetration Rates in Neighboring Countries in 2002-2005**  
Source: NRATI and statistical data published by Administrations in the sector

Pre-paid card TEMPO and ALOCARD subscribers still prevail in the structure of mobile subscriber base. On December 31, 2005, their number made 85,2% of the total number of subscribers. Still, the share of contract subscribers continued to grow. In 2005, their number outrun by 1,4 % the number registered in 2004. January through September 2005 the post-paid share of subscribers grew 1,6 %, but at the end of the year – reduced 0,1%, which fact is explained by the growth in the number of pre-paid subscribers resulting from winter promotional campaigns performed by the operators.

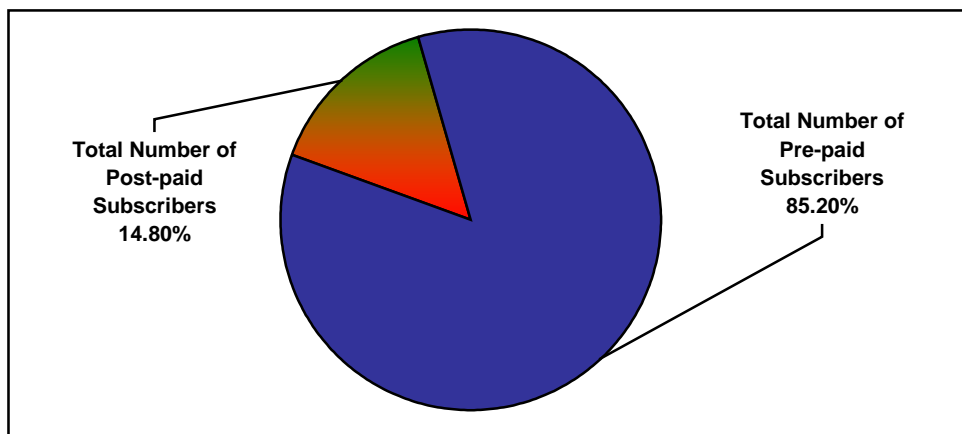


Fig. 2.26 Structure of Mobile Telephony Market depending on User Categories in 2005  
Source: NRATI

The structure of mobile telephony market in terms number of subscribers, just like the market structure in terms of revenue shows a consolidation of the position of JSC VOXTEL on the market. . The market share of this company registered a 2% gradual growth in 2005.

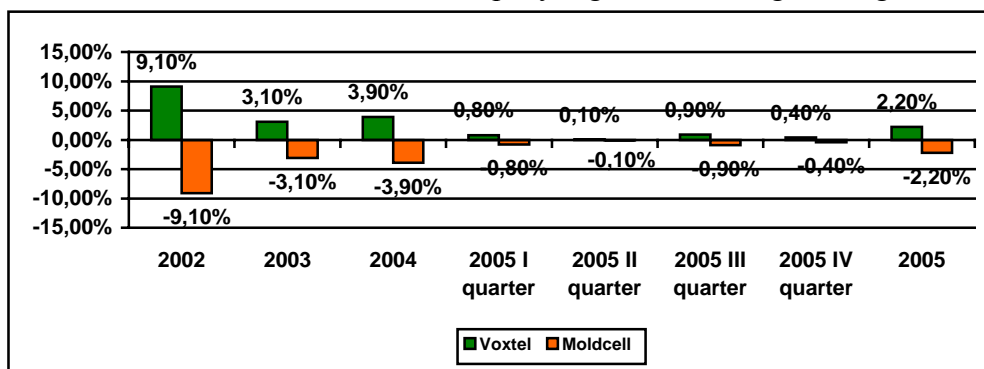


Fig. 2.27 Evolution of Market Share of Operators depending on Number of Subscribers in%  
Source: NRATI

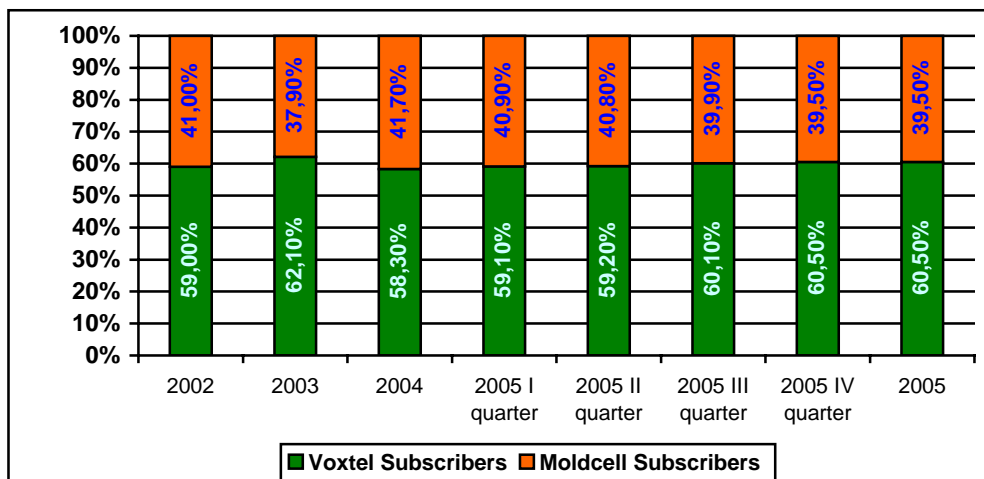
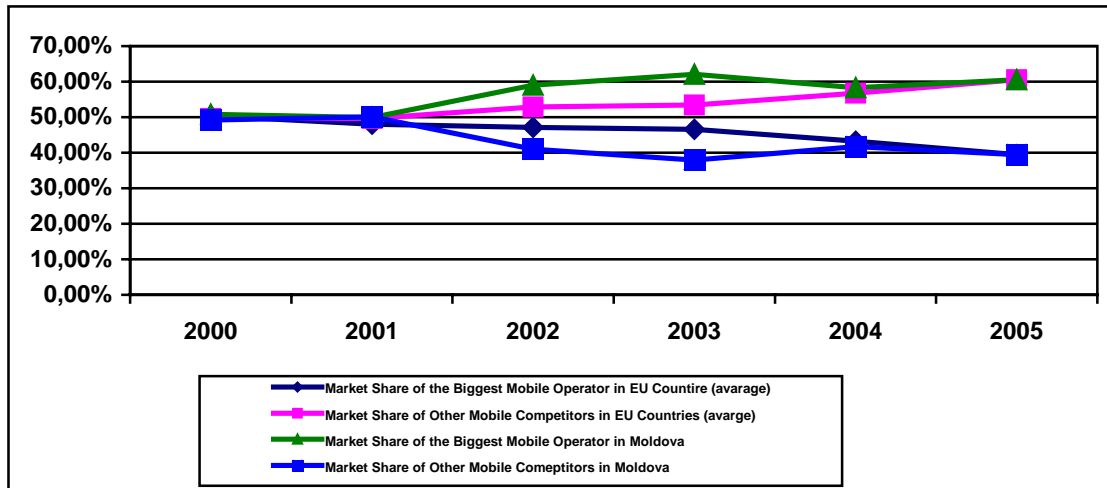


Fig. 2.28 Market share of Operators in terms of Number of  
Source: NRATI

According to EUROPEAN ELECTRONIC COMMUNICATIONS REGULATION AND MARKETS 2005 (11TH REPORT), diversification of mobile communications on European Union Markets, the increase of competition brings about a continual reduction of market shares of big operators.



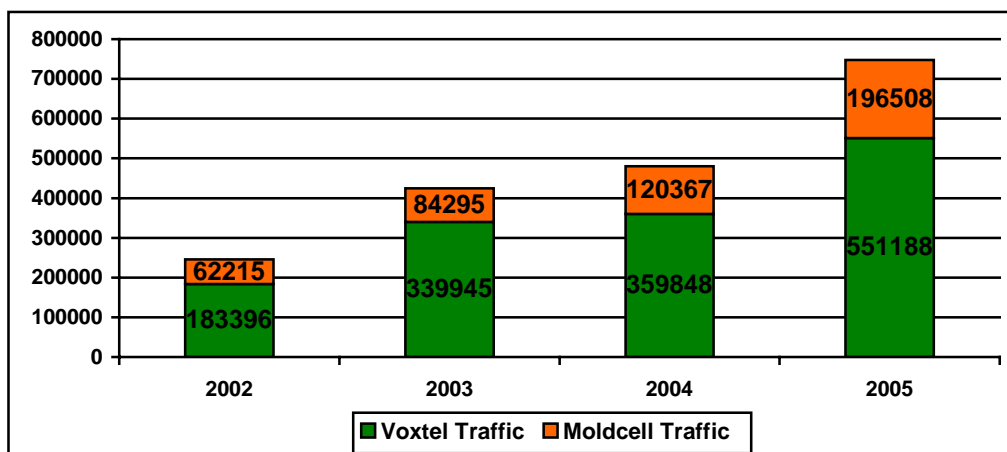
**Fig. 2.29 Market Shares according to Number of Subscribers and Level of Competition in EU Countries and Moldova**

Source: NRATI and EUROPEAN ELECTRONIC COMMUNICATIONS REGULATION AND MARKETS 2005 (11TH REPORT)

Unlike in EU countries, the national mobile telephony market displays a high degree of concentration. The share of the biggest market player is 50% higher than the average in EU, while the share of the competitor - by about 34% lower. The increase of the former operator's market share has been a steady tendency in the recent 5 years, except 2004, when competition slowed this increase down.

### 2.3.3 Traffic

The structure of traffic in mobile networks shows that the users of these services prefer making mobile-to-mobile calls, either in the same or to another network. Hence, more than half of the mobile traffic was generated by in-network calls or mutual calls. Traffic with fixed networks was one third of the total traffic, comprising both mobile-fixed and fixed-mobile calls. The international termination traffic (calls from subscribers outside the country to mobile subscribers in Moldova) is relevant for the results of both mobile operators: its share was in 2005 more than 13% of the total mobile traffic.



**Fig. 2.30 Evolution of Traffic in Mobile Networks (thousand minutes)**

Source: NRATI

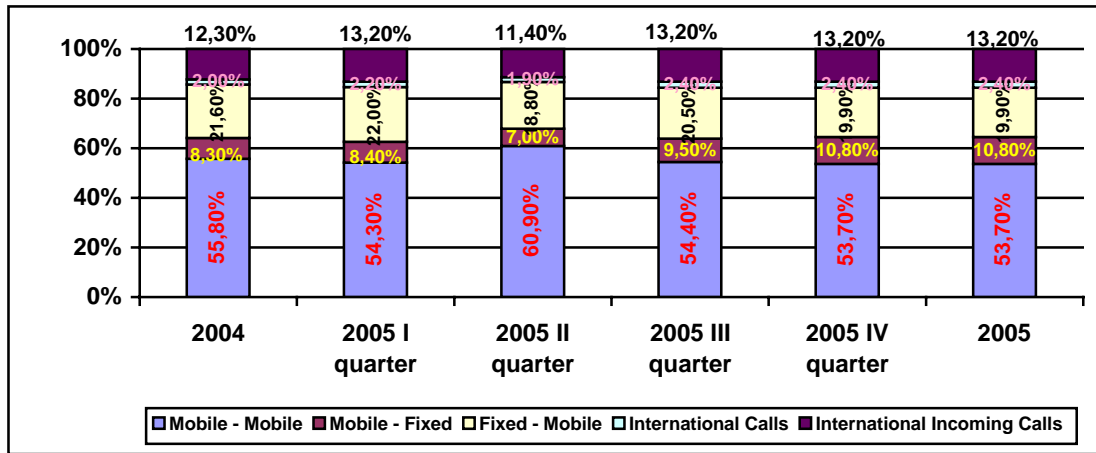


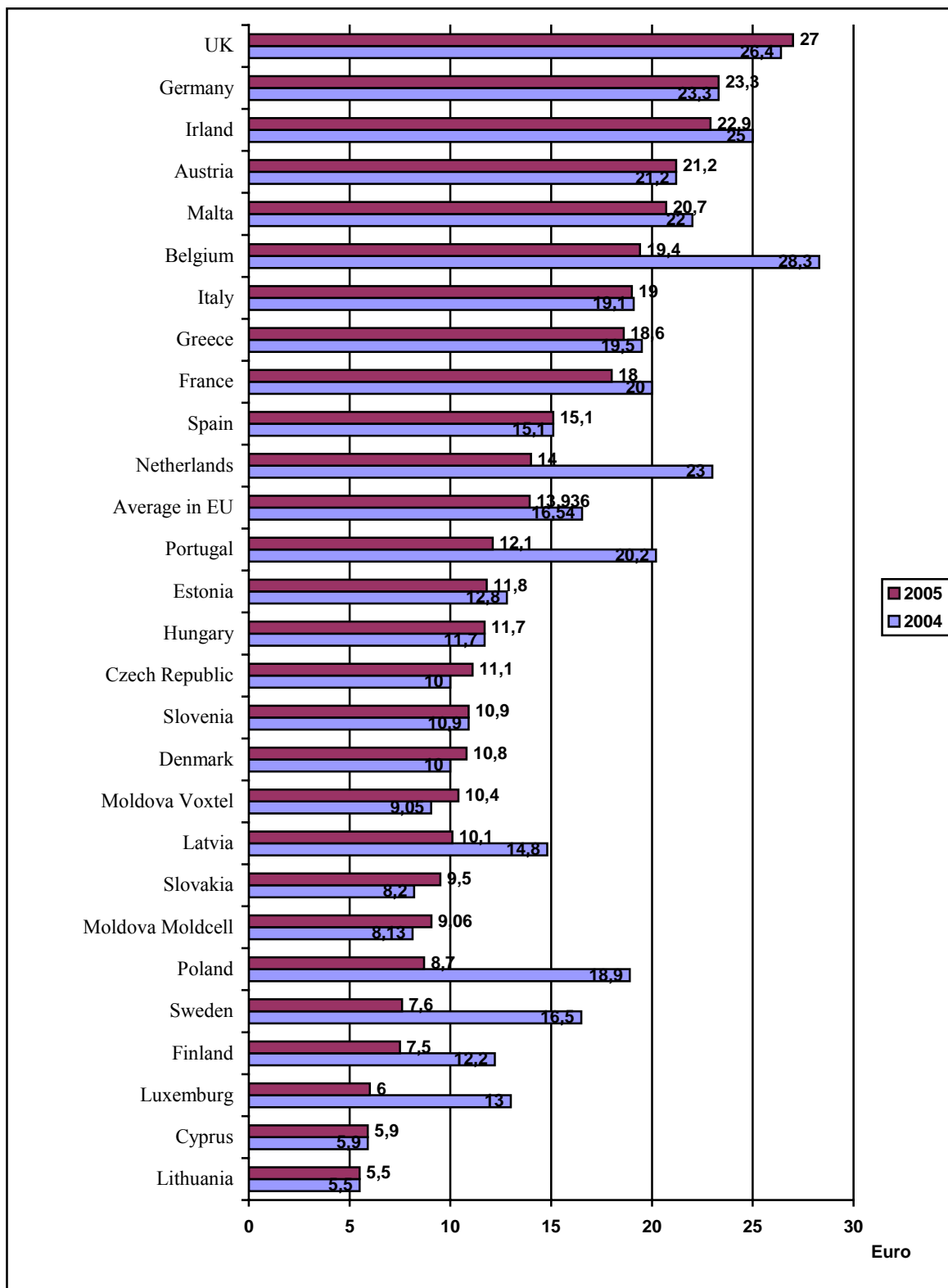
Fig. 2.31 Structure of Traffic in GSM Mobile Networks in 2004-2005  
Source: NRATI

### 2.3.4 Tariffs

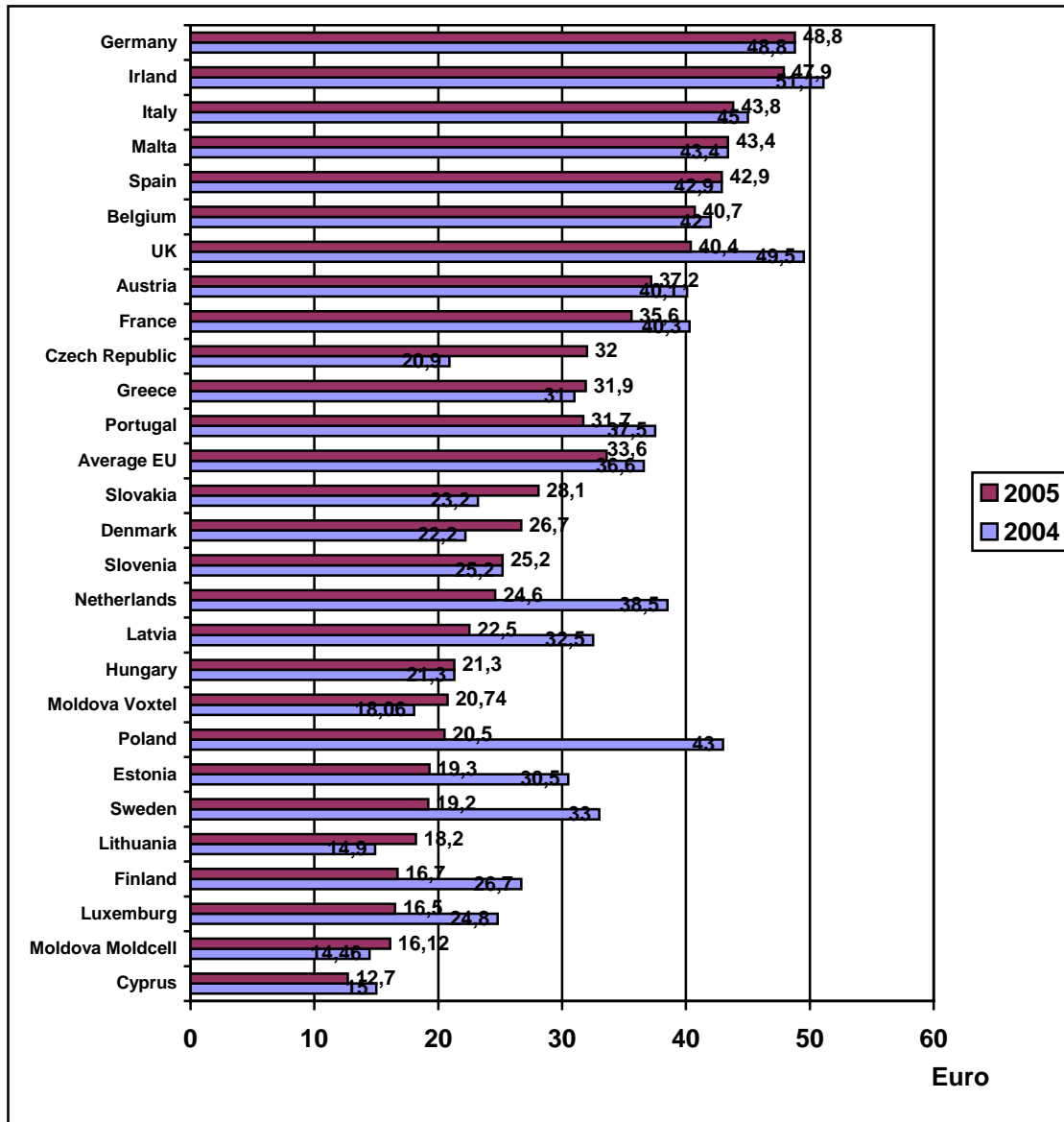
The comparative analysis below shows the tariffs applied by mobile operators in Moldova and he tariffs in EU countries.

It is to be mentioned that the tariffs applied by the national operators (shown in diagrams in EURO) grew insignificantly in 2005, due to 13,2% EURO to US Dollar depreciation. The tariffs, whether in lei or dollars, were slightly unstable in 2005.

Post-paid tariff plans (monthly contract) were based on the analysis presented below:

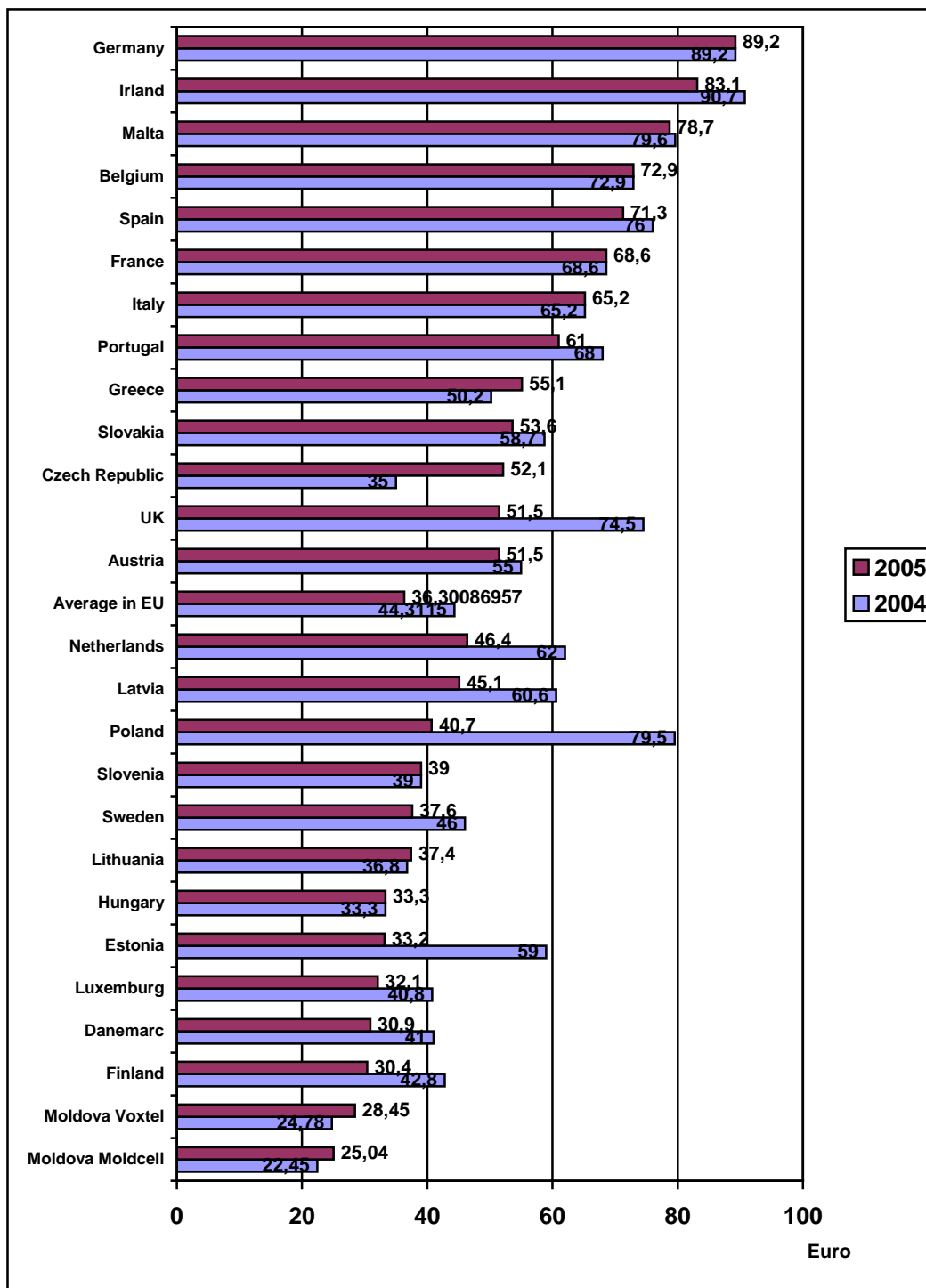


**Fig. 2.32 Low – user Mobile Basket in Moldova and Some European Countries**  
**Source: NRATI and EUROPEAN ELECTRONIC COMMUNICATIONS REGULATION AND MARKETS 2005 (11TH REPORT)**

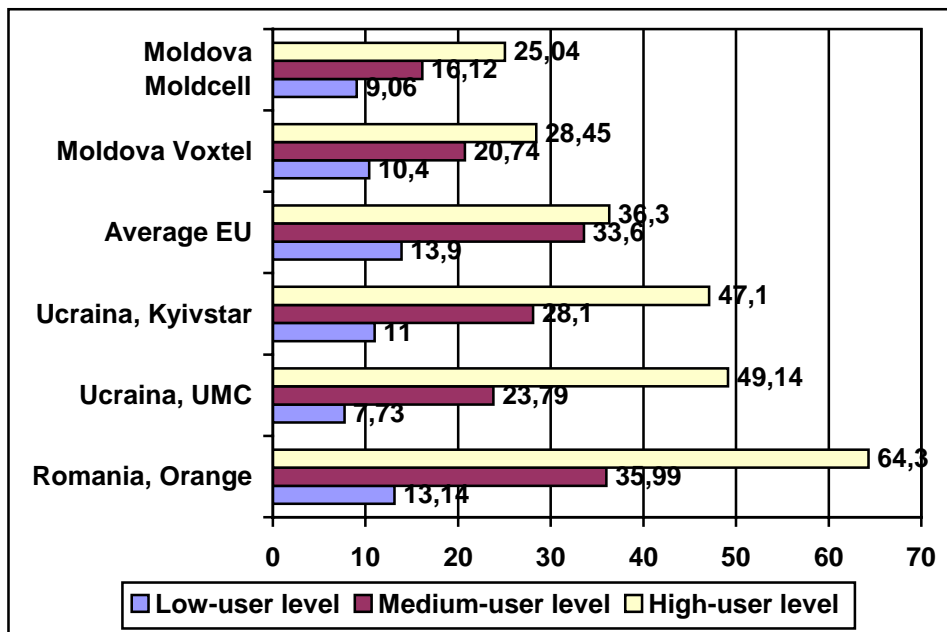


**Fig. 2.33 Medium-user Mobile Basket in Moldova and Some European Countries**  
**Source: NRATI and EUROPEAN ELECTRONIC COMMUNICATIONS REGULATION AND MARKETS 2005 (11TH REPORT)**





**Fig. 2.34 High-user Mobile Basket in Moldova and Some European Countries**  
**Source: NRATI and EUROPEAN ELECTRONIC COMMUNICATIONS REGULATION AND MARKETS 2005 (11TH REPORT)**



**Fig. 2. 35 Mobile Baskets in Moldova and Neighboring Countries**  
Source: NRATI and EUROPEAN ELECTRONIC COMMUNICATIONS REGULATION AND MARKETS 2005 (11TH REPORT)

**REMARK:** the level of tariffs applied by national operators and operators in the neighboring countries were determined through the OECD method of calculating mobile baskets, used in EUROPEAN ELECTRONIC COMMUNICATIONS REGULATION AND MARKETS 2005 (11TH REPORT). According to OECD method, the following peculiarities of usage are taken into account for mobile basket calculation:

Low-user: Monthly usage 25 calls and 30 written messages,

Medium – user: Monthly usage 75 calls and written messages,

High – user: Monthly usage 150 calls and 42 written messages.

Call Duration 1,4-1,6 minutes for Low-user depending on call direction and 2 – 2,2 minutes for High – depending on call direction.

The terms low-user, medium-user and high-user were conventionally used in Moldova in order to be able to adequately compare with the same indicators in other countries. The peculiarities of usage in Moldova may differ from the ones accepted by OECD method, especially in terms of reference call duration.

For European countries the calculation took into account tariffs applied by the operators that provided the cheapest options in their countries for the services included in the service basket.

## 2.4 INTERNET Access and Leased Lines Services Sector

### 2.4.1 General Overview

In 2005, the value of data transport service market, INTERNET access and leased lines grew 35,23 % compared with 2004 totaling 130,5 million lei. The share of this sector was 3,59 % of the telecommunications and informatics market.

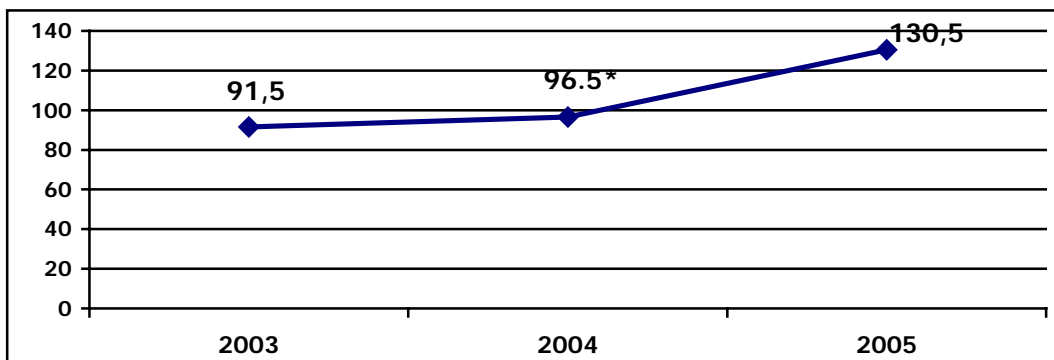


Fig. 2.36 Evolution of INTERNET Access and Leased Lines Market Value (million. lei)  
Source: NRATI

The investments in this sector registered a more substantial growth: from 24,2 million lei in 2004 to 68,9 million lei in 2005, or by 2,8.

Out of the total number of operators registered with NRATI by the end of 2005, 25 operators provided services of data transport via terrestrial and/or VSAT networks. On the retail market these operators provided INTERNET access, VoIP, VPN services, etc. Depending on the technology used, the situation was as follows:

- dial-up access - 13 providers;
- coaxial cable access - 2 providers;
- radio access - 6 providers;
- xDSL access - 14 providers;
- other types of access - 5 providers.

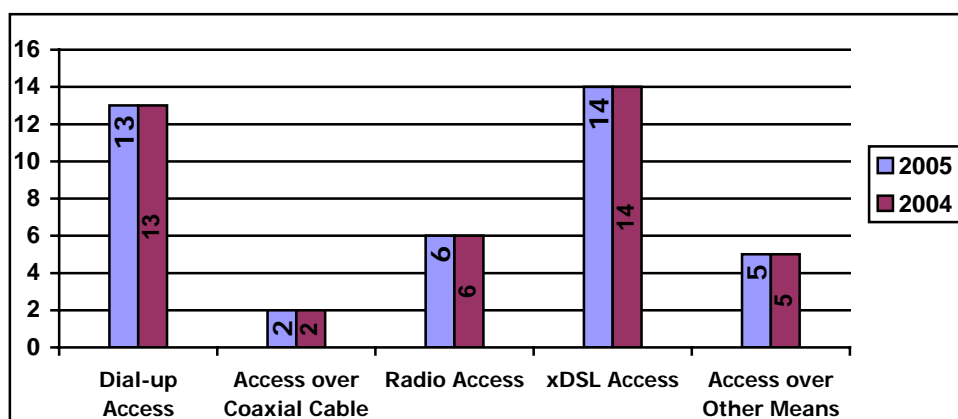
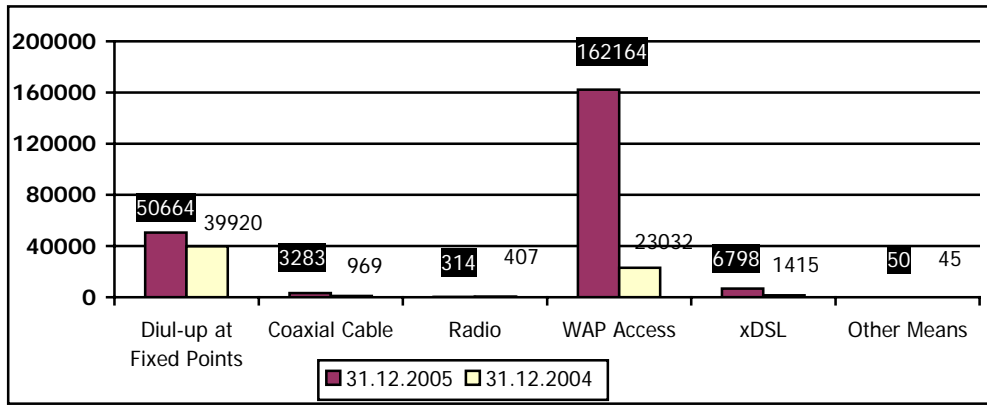


Fig. 2. 37 Access to INTERNET Service Providers Depending on Technology used  
Source: NRATI

In 2005 the number of access to INTERNET connections with final users registered a record growth - 3,4 times, 223,2 thousand on December 31, 2005 compared with 65,7 thousand at the end of 2004. The total number of INTERNET access connections includes the connections offered to mobile subscribers by means of GPRS, EDGE etc.

\* As some of the operators specified the volume of sale in 2004, the indicator 178,5 million lei, presented in Annual Report 2004, was corrected to 96,5 million lei.



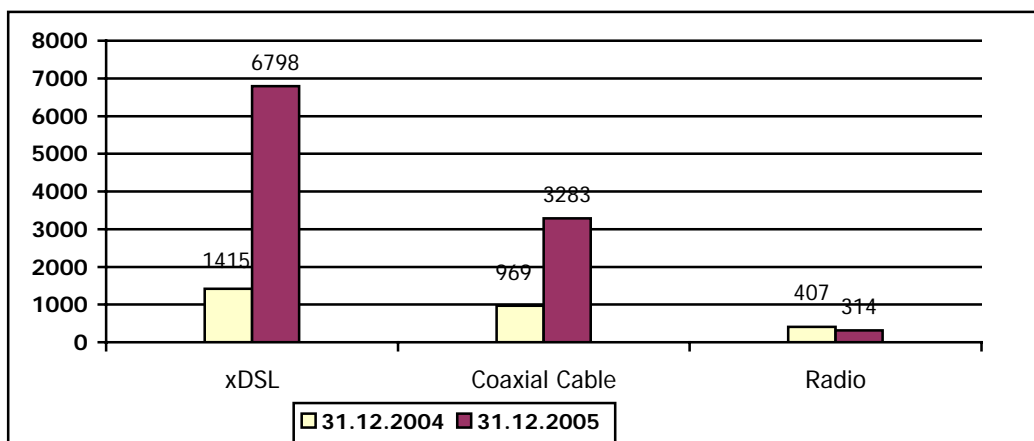
**Fig. 2. 38 Evolution of INTERNET Access Connections depending on Technology Used.**  
Source: NRATI

### 2.4.1 Broadband Internet Access

Broadband connections to INTERNET (data rate 128 Kbps or higher) registered the highest growth in 2005: from 2 791 in 2004, to 10 395 in 2005. It occurred due to a considerable increase – by 4,8 times - in the number of ADSL (Asymmetric Digital Subscriber Line) connections, allowing access to INTERNET over telephone lines with the possibility of making simultaneous phone calls, and due to a 3,4 increase in the number of connections over cable television networks.

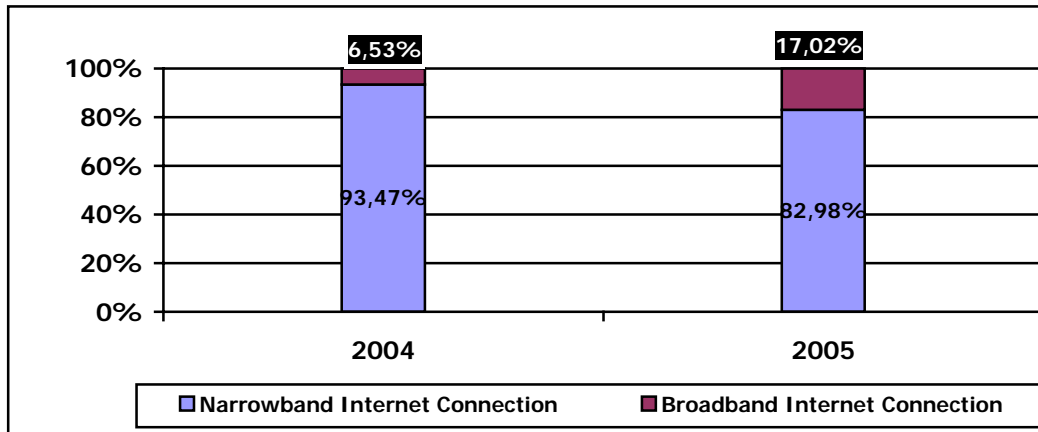
The number of ADSL connections grew from 1415, in 2004, to 6798, in 2005, and TV cable connections - from 969 to 3283. The number of radio access INTERNET connections reduced by 23%: de la 407, in 2004, la 314, in 2005.

NRATI specialists consider this evolution to be a result of a more efficient competition on this market, diversification and attractiveness of offers and ADSL services. In 2005 these providers offered data transfer rates from 128 to 1024 Kbps, reduced connection tariffs from US \$60 to US \$20-30, and monthly fees on average from US \$37 USD to US \$24 (for 256 Kbps data transfer rate).



**Fig. 2. 39 Evolution of Broadband INTERNET Access Connections depending on Technology**  
Source: NRATI

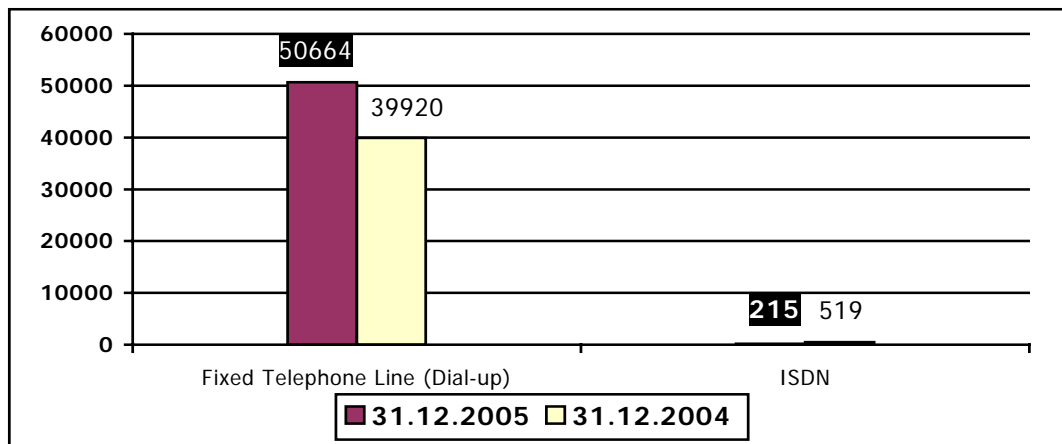
Broadband INTERNET access connection, by the end of 2005, made 17,02% of the total number of connections, which is a 10,4% growth compared with 2004. Narrowband INTERNET access connections made the rest 82,98%.



**Fig. 2.40 Share of Broadband Connections in the Total INTERNET Connections**  
Source: NRATI

#### 2.4.2 Narrowband INTERNET Access

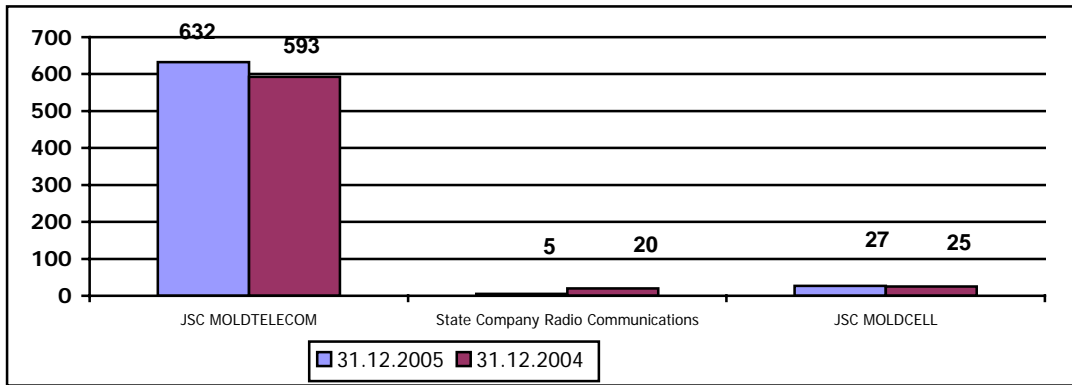
In the reporting period, the number of INTERNET access service users (accessing INTERNET once a month) by means of Dial-up (telephone line), grew 26,9%: from 39 920, in 2004, to 50 664, in 2005, due to a wider use of Dial-Up INTERNET access services in rural places, extension of alternative operators' presence in district centers, as well as decrease of tariff for this service from 0,42 lei/minute, in 2004, to 0,8,4 lei/minute, in 2005. As a result of competition intensification on this market segment, the paid access to INTERNET, offered in subscriptions (unlimited access, pre-paid cards, partial access subscriptions, limited subscriptions etc.) was replaced with free access, which is more attractive for users.



**Fig. 2. 41 Evolution of Dial-Up Connections**  
Source: NRATI

#### 2.4.3 Leased Lines Services

Though three operators holding own access networks for leased line service provision ran their activity throughout the reporting period of time, the number of lines they offered was quite low. The most relevant operator in this type of services has been JSC MOLDTELECOM. The number of leased lines offered by this company grew 6,5%: from 593 to 632. According to the number of lines leased to other operators the share of JSC MOLDTELECOM on this market was in 2004, 92,9%, in 2005, 95,1%.

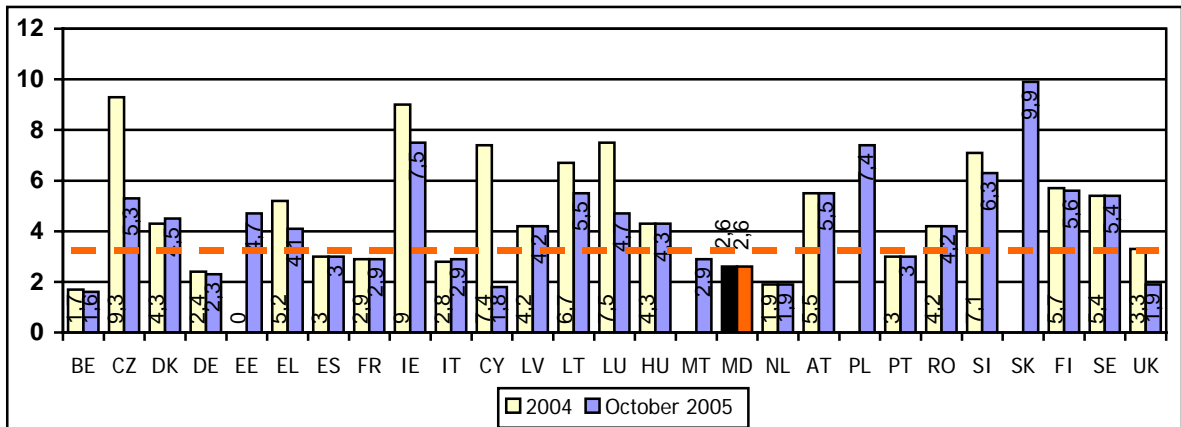


**Fig. 2.42 Evolution in the Number of Leased Lines in 2004-2005**  
Source: NRATI

One of NRATI priorities for 2006 is regulation of unbundled access to the local loop of the incumbent JSC MOLDTELECOM. The regulation of access to the local loop is an important step to the development of data transport and INTERNET access that will enhance market entry. For this purpose NRATI proposed that JSC MOLDTELECOM draw up the Reference Interconnection Offer for unbundled access to the local loop, a document intended to ensure access of new operators to the local loop under transparent, non-discriminatory conditions and at cost-oriented prices.

Through December 31, 2005 providers of INTERNET access had only one option of access to the local loop: shared access, in which case JSC MOLDTELECOM used only the low-frequency channel (0-4Khz), for fixed telephony service provision, the rest high-frequency channels being used for alternative operators broadband service provision (xDSL technology). JSC MOLDTELECOM charged companies 120 lei (VAT included) and 48 lei monthly (VAT included) for shared access to the local loop.

Though the monthly fee for shared access to the local loop offered by JSC MOLDTELECOM is lower than the average monthly fee of 3,3€ applied in EU member countries, NRATI consider that it is possible to reduce this fee to the level applied in UK (1,9€), Belgium (1,6€) or Germany (2,3€).

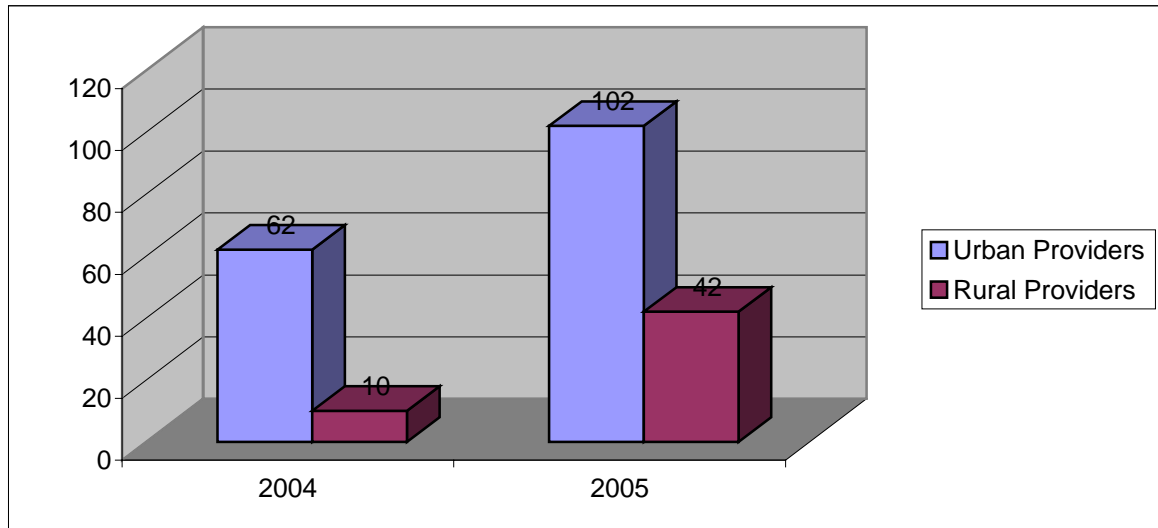


**Fig. 2.43 Fees for Shared Access in Some European Countries in €, VAT-free**  
Source: NRATI and EUROPEAN ELECTRONIC COMMUNICATIONS REGULATION AND MARKETS 2005 (11TH REPORT)

## 2.5 Cable/Air TV Service Sector

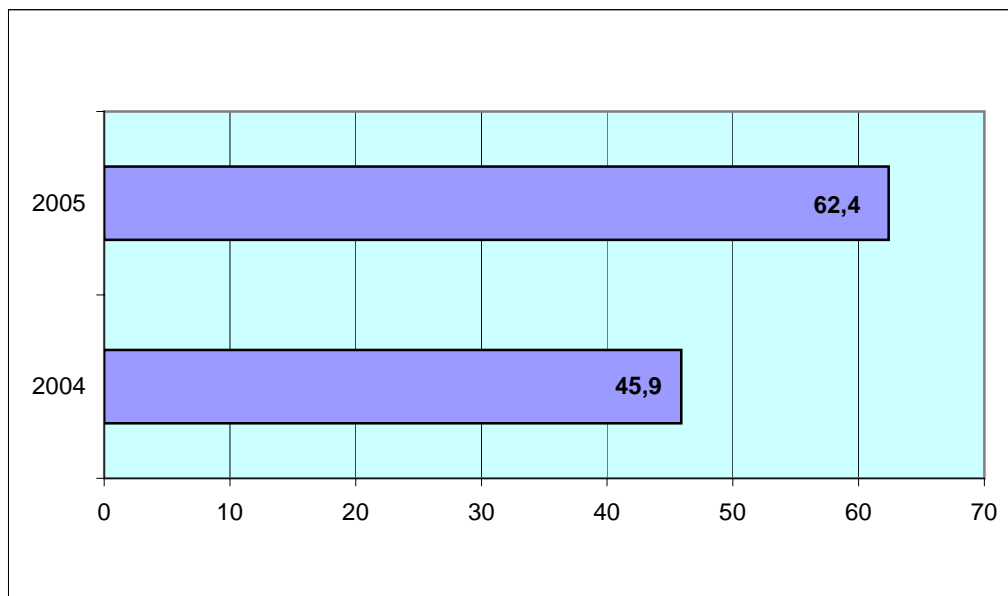
### 2.5.1 General Overview

As of January 1, 2006 144 technical license authorized to provide services of construction, maintenance, operation and creation of cable/air TV stations. In the timeframe under report, 102 of them provided services in urban areas and 42 – in rural places. The market share of these services was 1,7%. According to sales volume and number of subscribers the biggest cable/air service providers operate in Chisinau, Balti and Comrat.



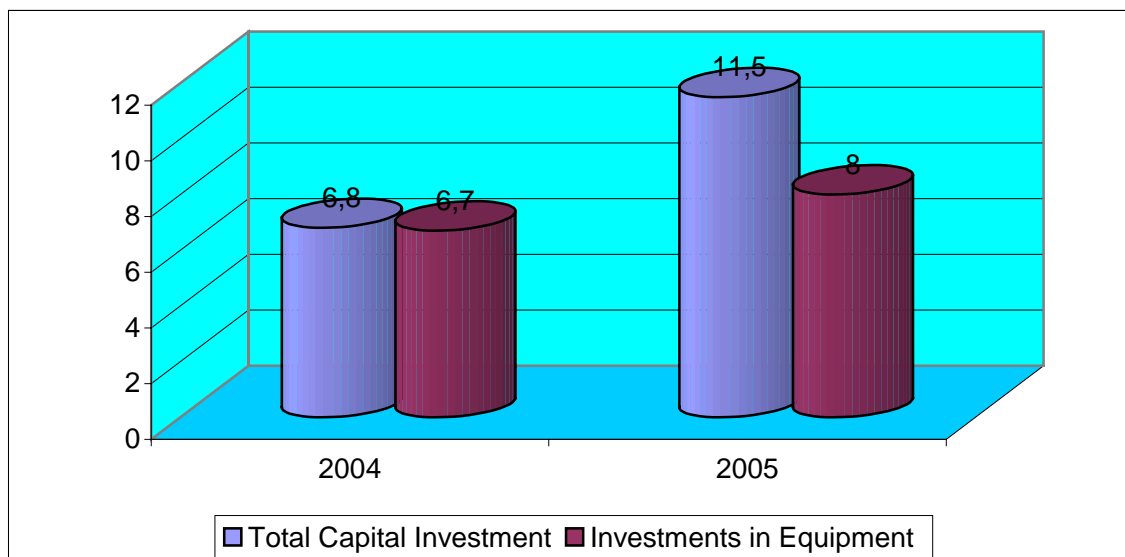
**Fig. 2.44 Number of Cable/Air TV Service Providers in Urban and Rural zones**  
**Source: NRATI**

In 2005 the total revenue generated by cable/air TV service provision grew 35,9% compared with 2004 reaching 62,4 million. lei



**Fig. 2.45 Evolution of Revenues Generated by Cable/Air TV Service Provision (million lei)**  
**Source: NRATI**

In the reporting timeframe 11,5 million. lei or 69% more than in 2004 was invested in this market segment. 8.0 million lei or 19,4% more than 2004 was invested in network equipment.

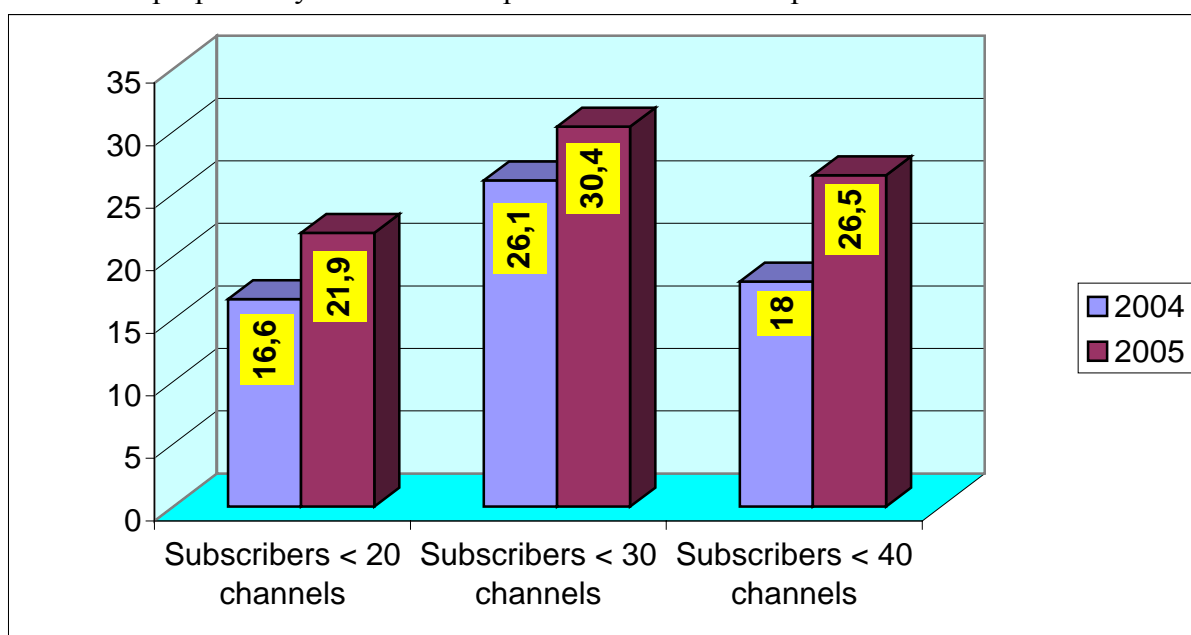


**Fig. 2.46 Investments in Cable/Air TV Service Sector (million lei)**

Source: NRATI

### 2.5.2 Users and Tariffs

In 2005 the number of users of cable/air TV services grew 11,4% compared with 2004 and reached 202,3 thousand, of which 169,1 thousand are urban users and the rest – urban. This growth occurred mostly due to accessibility of subscription fees and the increase in the number of channels proposed by cable/air TV operators at reasonable prices.



**Fig. 2.47 Evolution of the Number Cable TV Users in relation to the number of Channels (thousand)**

Source: NRATI

In 2005 the monthly fee for cable TV services in rural areas was 20-25 lei, and the connection fee - 300 lei. In Chisinau municipality the fees were slightly higher – 30-35 lei, while the fee varied, depending on the cost of equipment used by the Company SUN COMMUNICATIONS, - the biggest cable /air TV operator. SUN COMMUNICATIONS offered in 2005, five service packages from 18 to 180 lei. The connection fee for “Premium” package” was 250 lei, for other packages – 100 lei.