

Annual Economic Report 2013



DRIVING THE DIGITAL FUTURE

European Telecommunications Network Operators' Association

PUBLICATION NOVEMBER 2013

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Introducing ETNO

ETNO has been the voice of Europe's telecommunications network operators since 1992. With their investment and innovation in new e-communications services and networks, ETNO member companies create economic growth & jobs and improve the daily lives of citizens.

ETNO's 37 member companies and 12 observers* from Europe and beyond represent a significant part of total ICT activity in Europe. They account for an aggregate annual turnover of more than 600 bn EUR and employ over 1.6 million people. ETNO companies are the main drivers of broadband and are committed to its continual growth in Europe.

ETNO members also hold new entrant positions outside their national markets. ETNO brings together the main investors in innovative and high-quality e-communications platforms and services, representing 70% of total sector investment, 71% of total revenues of telecom services and 77% of European jobs in the sector.

ETNO strongly contributes to shaping a favourable regulatory and commercial environment for its members to continue to deploy innovative and high quality services and platforms for the benefit of European consumers and businesses.

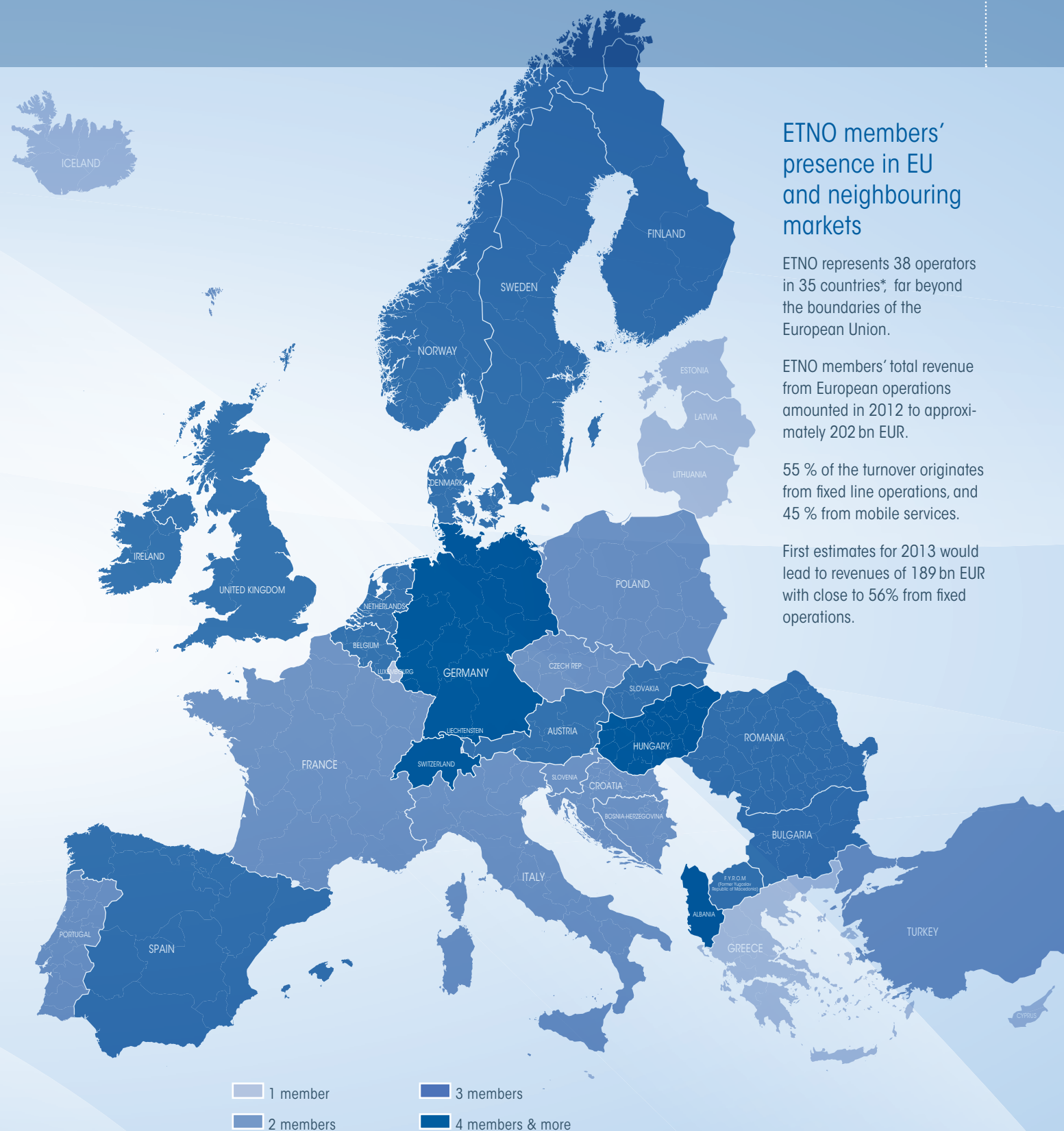
ETNO members' presence in EU and neighbouring markets

ETNO represents 38 operators in 35 countries*, far beyond the boundaries of the European Union.

ETNO members' total revenue from European operations amounted in 2012 to approximately 202 bn EUR.

55 % of the turnover originates from fixed line operations, and 45 % from mobile services.

First estimates for 2013 would lead to revenues of 189 bn EUR with close to 56% from fixed operations.



* December 2012

* ALBtelecom (Albania), Belgacom, BH Telecom (Bosnia and Herzegovina), Telefónica O2 Czech Republic, Croatian Telecom, Cyprus Telecommunications Authority (CYTA), Deutsche Telekom, Entreprise des Postes et Télécommunications Luxembourg, eircom, Elisa Communications Corporation (Finland), Elion (Estonia), Finnet Group (Finland), France Telecom, Go (Malta), Invitel (Hungary), Koninklijke KPN, Lattelecom (Latvia), Makedonski Telekom (F.Y.R. of Macedonia), Magyar Telekom (Hungary), OTE (Greece), Portugal Telecom, Romtelecom (Romania), Síminn (Iceland Telecom Ltd.), Slovak Telekom, Societatea Nationala de Radiocomunicatii (SNR-Romania), Swisscom, TDC, TDF (France), Telecom Italia, Telecom Liechtenstein, Telefónica, Telekom Austria, Telekom Slovenije, Telekomunikacja Polska, Telenor (Norway), TeliaSonera (Sweden-Finland), TEO (Lithuania), Türk Telekomünikasyon (Turkey), Vivacom (Bulgaria).

INTRODUCTION



Introduction by Daniel Pataki, ETNO Director



Back in 2012 ETNO released the AT Kearney report entitled "A Future Policy Framework for Growth" which pointed out areas for growth upon which ETNO association members

have based their positions over the last year. These areas are: pricing of core services and networks and new NGN/LTE infrastructure; content distribution; adjacent businesses; and efficiency and scale measures, including consolidation.

Shortly thereafter, in July 2012 Vice-President Kroes announced a new policy and regulatory environment for broadband investment. This was a major step forward for building investor trust and as such, ETNO welcomed the development. In 2013, the debate around the challenges faced by the telecoms sector and the need for regulatory reform intensified. In order to contribute constructively to this discussion, ETNO along with the Boston Consulting Group, embarked on a study to assess the underlying reasons for these sector challenges and proposed a comprehensive program to get the Digital Agenda back on track.

The comprehensive study, entitled "Reforming Europe's Telecoms Regulation to Enable the Digital Single Market", quantifies the impact of the required measures. Change needs to happen otherwise the sector will keep course with its annual

2% drop in revenues. The report estimates that the shortfall in investment needed to meet EU Digital Agenda targets for broadband coverage and penetration will aggregate between 110 bn EUR and 170 bn EUR, leading to an enormous missed opportunity for the broader EU economy: up to 750 bn EUR in GDP growth and as many as 5.5 million jobs. A pro-investment policy environment and a consolidated regulatory framework are needed in order to allow the European telecoms industry to contribute to growth and jobs in the EU.

The European Commission announced its *Connected Continent proposals* in September of this year, combining a Regulation, Communication and Recommendation. This is proof that the telecoms industry holds centre-court and policy makers recognise that it is time to push Europe to the front of the competitive edge and regain its status as a global digital leader. As the main ICT sector association in Europe and representing those companies that invest the most in EU telecoms/ICT infrastructure, ETNO drives those initiatives that provide a sustainable Internet ecosystem and the most efficient use of the networks, to the benefit of all. As such, ETNO will be heavily engaged in the legislative process throughout 2014 and I look forward to working in close co-operation with our members on this important new chapter for our sector.

Daniel Pataki, ETNO Director

Introduction by Luigi Gambardella, ETNO Executive Board Chair



Do you remember the days when Europe led the way for technology that served as the backbone of the digital economy? Today the Asian and North American markets enjoy that position with fibre access penetration that is up to 20 times higher than that of Europe. Obviously, their markets are larger and there are different dynamics at play, but there is still real reason for concern and we cannot afford to continue to lag behind.

Cloud computing, smart grids, the Internet of Things, big data, e-Government, e-Education and e-health all rely on fast connection speeds. However, in order to achieve such velocity, innovation is needed and, more importantly, a strong economy to provide such resources. At the moment, Europe is not delivering on these fronts.

Up to 750 bn EUR in GDP growth and as many as 5.5 million jobs in the economy of the EU are at risk by 2020 because of the lack of next generation network investment. Over the last five years, investment in the telecoms sector has been falling by 2% each year for almost 5 years now. By 2020, we estimate that that the shortfall in investment needed to meet EU Digital Agenda targets for broadband coverage and penetration will be between 110 and 170 bn EUR, leading to an enormous missed opportunity for the broader EU economy. Meanwhile, investment in international telecoms markets is increasing. Europe must fight to keep a seat at the global competition table!

President Barroso has recognised that the telecoms sector is far from being fully integrated. Even if we have an internal market for physical goods, we still have 28 national digital markets. We need a winning industrial strategy which recognises that the furious pace of technological change means that only substantial and rapid deregulation of basic telecoms markets promises a real solution. We also need to take a full view of the ICT value chain, including content provision, in a technology agnostic manner and with a differentiated geographic lens, based on the service provided. I often talk about level playing fields and this is because right now we are trying to play the game on a slope littered with regulatory mines and moving goal posts.

Therefore, we see an urgent need to update the overall European regulatory regime, to ensure a predictable and consistent approach across communications services to the extent that they are comparable and substitutable. In this way, consumers will be able to make informed choices between providers competing on a level playing field. We have to think ahead.

Luigi Gambardella, ETNO Executive Board Chair

INTRODUCTION

Introduction by IDATE



As in the previous years, this edition of ETNO's Annual Economic Report will present the main figures on the evolution of European telecom markets and shed a light on the role played by ETNO members in these markets.

The growing number of accesses and the diversification of usages show that telecommunication services continue to be high in demand and mobile and data services are indeed more popular than ever before. However, despite the positive evolution of demand, 2012 has seen a continuation of the negative growth trend that has affected the region's telecom revenues since 2009. Overall revenues of telecom services were 1.8% lower in 2012 than the year before and reached 273.8 bn EUR.

Driven by rising demand for data, mobile services accounted for the biggest share of this figure with 143.3 bn EUR. Yet, despite the success of wireless broadband this figure is 1.7bn EUR lower than the year before. Like mobile, fixed Data and Internet services have surpassed fixed telephony in terms of revenue. This segment turns out to be the only one that continues to show positive growth with revenues attaining 71.5 bn EUR in 2012; up from 69.8bn EUR the year before. As expected, fixed telephony continued on its long-term downward evolution. Under pressure from VoIP and mobile communications, fixed telephony revenues have declined by 5bn EUR during the year 2012, falling to 59bn EUR.

ETNO represents an important part of the European telecoms industry, with its members accounting for 71% of all service revenues of telecom services. ETNO weighs even more heavily in terms of employment. More than 77% of the jobs in the sector in Europe are created by ETNO member companies.

Despite a difficult environment with shrinking revenues, telecom operators throughout Europe are upholding their investment efforts to roll out ultra-fast fibre-based fixed broadband infrastructures and fourth generation mobile networks. After significantly stepping up their investment in 2011, operators in Europe have maintained their commitment to upgrading the continent's communications networks and even spent slightly more in 2012, with total Capex reaching 46bn EUR. Of this amount, 26 bn EUR were channelled to fixed networks and 20bn EUR went into mobile infrastructures. Again, ETNO members play a leading role in this context. They account for almost 2/3 of capital expenditure in fixed (65%) and for more than half (56%) of the investments made in mobile networks. At the end of 2012, ultra-fast broadband infrastructures cumulatively passed 54% of European homes according to the European Commission. This figure includes cable networks, which enjoy a cost advantage over their telco rivals for upgrading to their networks NGA standards and which are largely unregulated. In ultra-fast broadband, cable-cos have therefore emerged as main rivals of ETNO members in many markets. Still the share ETNO members amounts to 37% of all homes passed.

The above figures illustrate that ETNO members are a key pillar of Europe's telecom markets. However, if communication services are "economic oxygen" (Commissioner Kroes), the conditions must be in place for the sector to thrive. Regulatory certainty and incentives to invest in infrastructure are important elements of making telecoms the engine and facilitator of overall economic recovery in Europe.

Didier Pouillot, IDATE
Christoph Pennings, Head of Regulation Practice

MARKET TRENDS

The European telecom industry going through dire straits

Across Europe, revenues of telecoms services have reached 273.8 bn EUR in 2012. This level is 1.8% lower than in 2011 and the fourth consecutive decline of aggregated revenues of telecom services in the region. The decline of fixed telephony revenues due to price competition as well as substitution of mobile and OTT VoIP services is a long-term trend, which has continued in 2012. The growth of mobile revenues has turned negative for the first time in 2011. This trend has accelerated in 2012 with revenues shrinking by 1.2%, compared to 0.4% in the previous year. Data and Internet services thus again been the sole growth drivers for the industry in Europe. Data and Internet revenues grew by 2.3% on a yearly basis, which is still healthy but well below 3.8% growth in the preceding year and the lowest growth rate in the 2007-2012 period.

Comparing the European markets with their counterparts in the USA and Japan shows that markets have performed better in these countries. While growth in Japan is negative, too, the decrease of 1.2% is smaller than in Europe (EU5: -2.9%, ETNO perimeter: -1.8%). In the United States, growth has slowed down in 2012 compared to 2011 but remains solidly positive at 2.5% year-on-year. This evolution also translates into a decline of Europe's weight in the global telecoms services market. Europe's share of this market peaked at 30% in 2002 and has declined to 22% in 2012 (2011: 25%).

In all geographies growth of telecom services revenues has trailed GDP growth in 2012, indicating a global need to identify new levers for growth. The gap between the growth rates of telecoms services and GDP has been more marked in Europe than in the US or Japan.

In terms of access lines, 2012 has seen a continuation of the existing broad trends. The number of fixed telephony lines shrinks and is doing so at an increasing speed. In 2012 there were 5.7% less traditional fixed lines than a year before. In

2011 the number of fixed lines fell by 5% and by 4.4% in 2010. Mobile is by far the most frequently adopted form of access with the number of lines growing moderately by 1.9%, to reach 774 million connections at the end of the year. There were nearly 160 million fixed broadband lines in 2012. This represents a growth of 4%, which is still sizeable but well below the double-digit growth levels that were still reach in 2009.

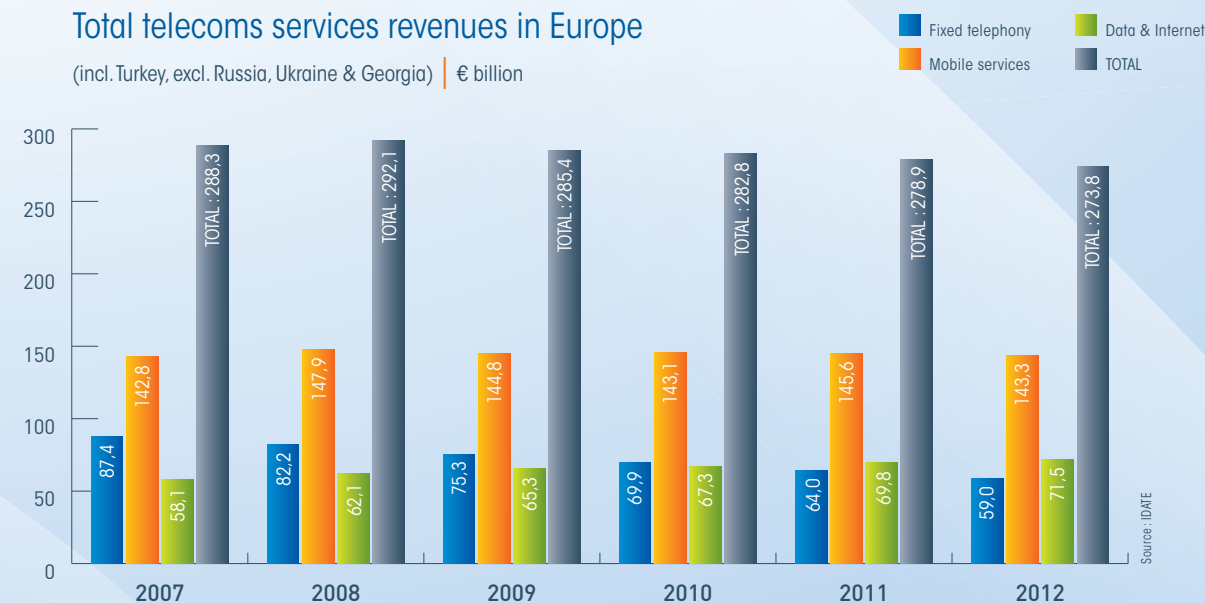
ETNO members' revenues were also affected by the adverse revenue growth trend. Their total revenues across Europe and other regions reached 275 bn EUR, corresponding to a 1% decrease compared to 2011. However, ETNO members performed better than the industry as a whole which saw its revenues diminish by 2% to reach 390 bn EUR. ETNO therefore accounts for 70% of the telecom sector's revenues.

Telecom operators and notably ETNO member companies continue employing a significant number of staff. Across the ETNO perimeter, its members had 668k employees in 2012, accounting for more than 77% of total sector employment in this geography.

OVERALL FIGURES

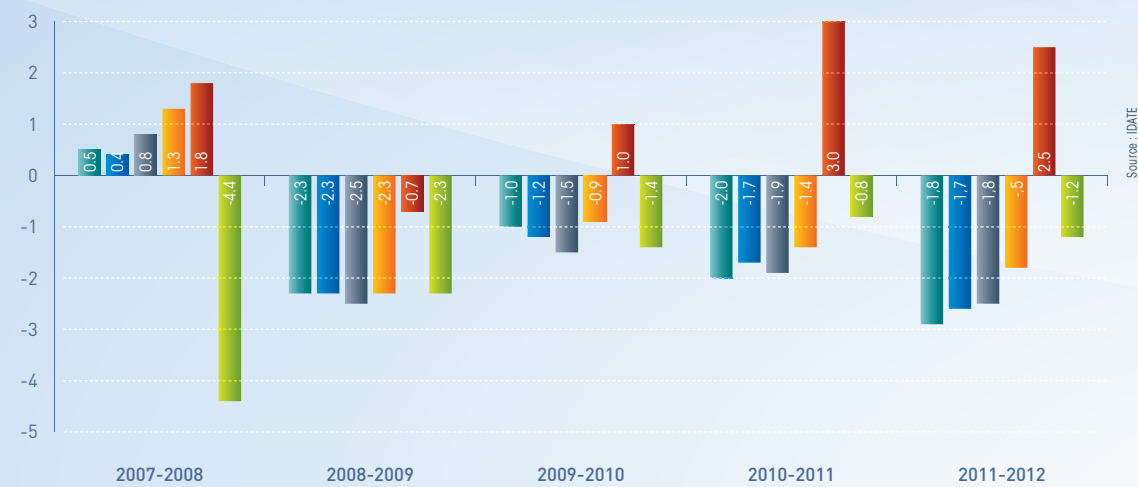
Total telecoms services revenues in Europe

(incl. Turkey, excl. Russia, Ukraine & Georgia) | € billion

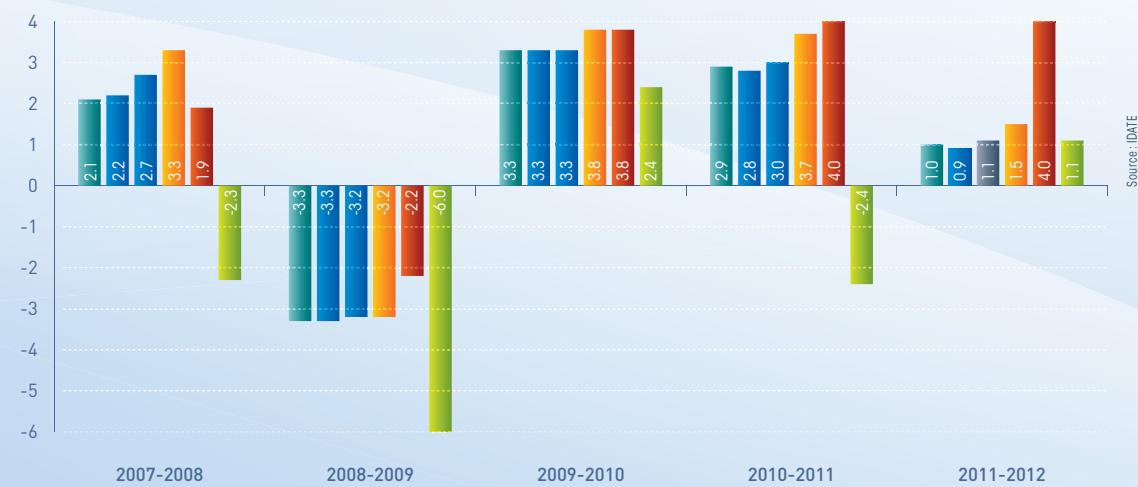


MARKET TRENDS

Telecoms market revenue growth in EU compared to US/Japan & overall economic growth | %



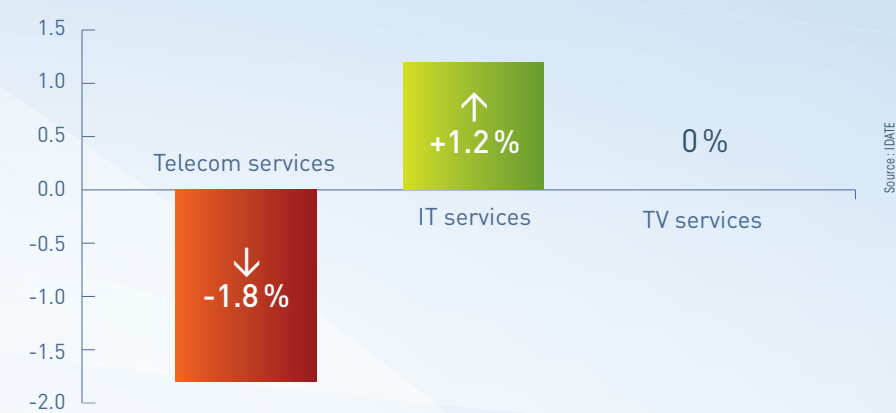
Current GDP growth | %



EU-5 EU-15 EU-27 EU (ETNO perimeter) USA Japan

EU telecoms market growth 2011-2012 compared to IT services & TV services

ETNO perimeter | %



Investment in EU telecoms sector compared to US/Japan

CAPEX growth of the EU telecoms sector vs. CAPEX in the USA and in Japan | %

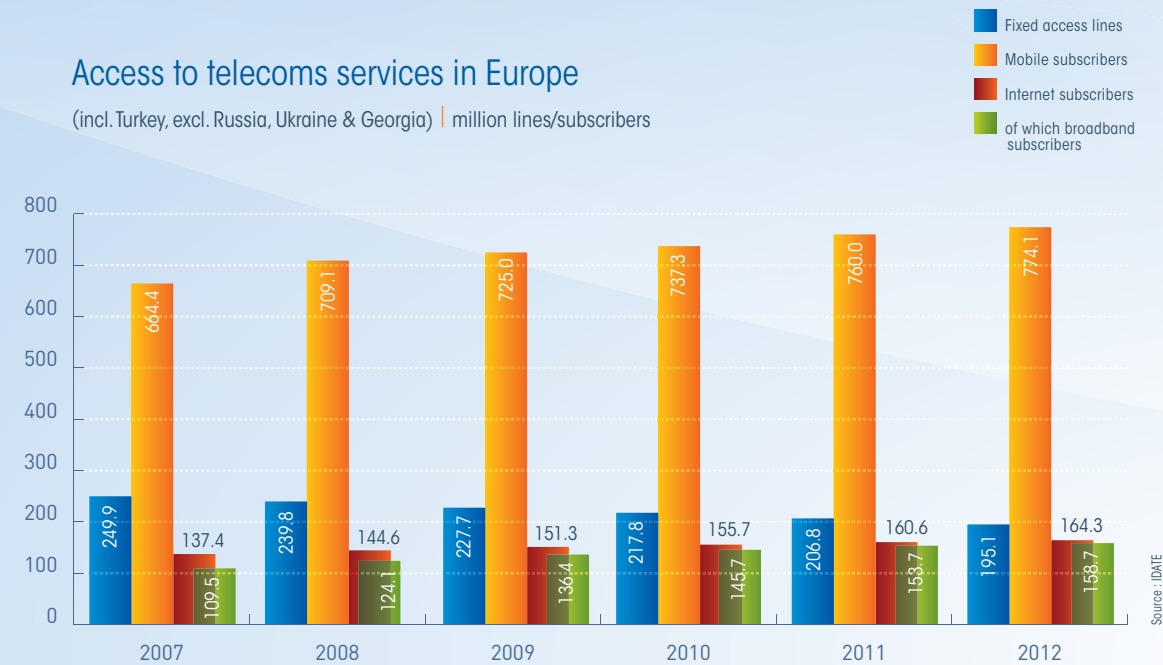


EU-5 EU-15 EU-27 EU (ETNO perimeter) USA Japan

MARKET TRENDS

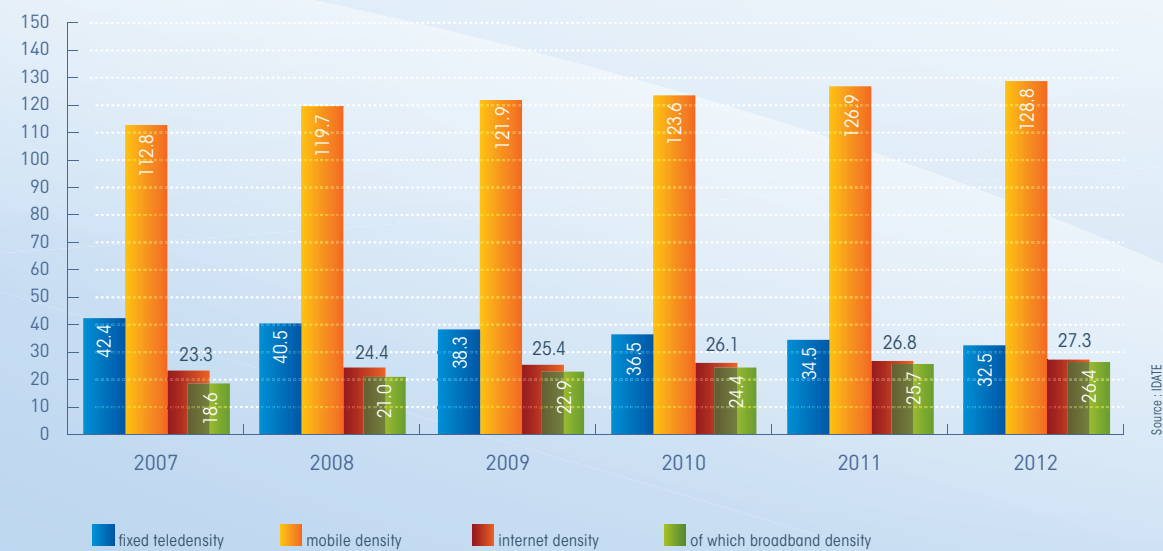
Access to telecoms services in Europe

(incl. Turkey, excl. Russia, Ukraine & Georgia) | million lines/subscribers



Teledensities in Europe

(incl. Turkey, excl. Russia, Ukraine & Georgia) | lines/subscribers per population



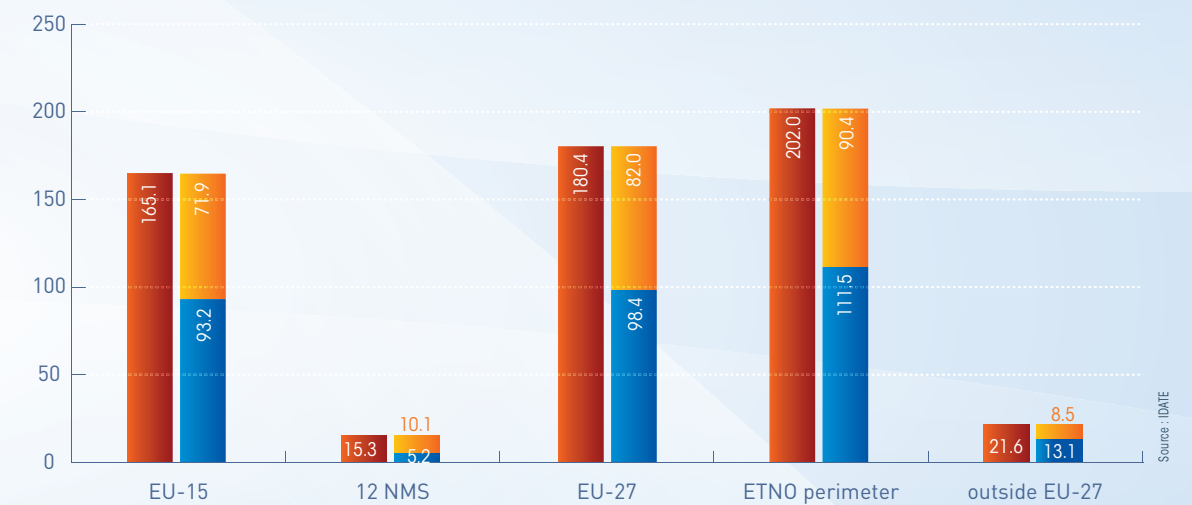
ETNO MEMBERS

Split of ETNO members' turnover

€ billion

	EU-15	12 NMS*	EU-27	ETNO perimeter	outside EU-27
2011 European turnover	165.1	15.3	180.4	202.0	21.6
of which fixed	93.2	5.2	98.4	111.5	13.1
of which mobile	71.9	10.1	82.0	90.4	8.5

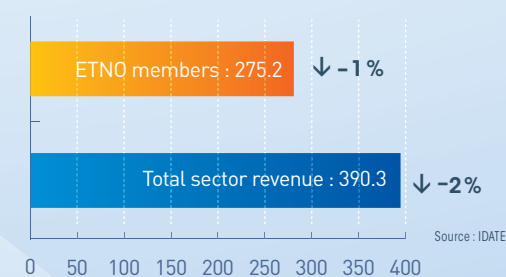
Source: IDATE



Aggregated revenue of ETNO members

Europe + non Europe | € billion

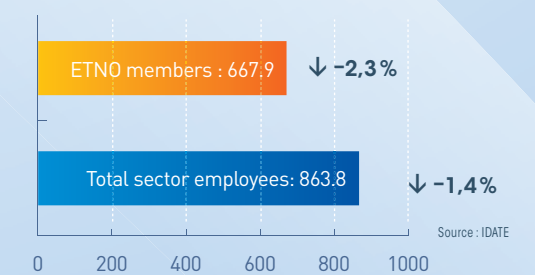
Share of total sector revenue = 70.5 %



ETNO members' employees

ETNO perimeter | thousand

Share of total sector employment = 77.3 %



REVENUE & SERVICE TRENDS

Broadband the industry's remaining growth driver

Facing intense competition and regulatory pressure telecom service revenues continued to shrink in 2012. Still growing uptake make fixed broadband the only remaining source of growth. The investment needed in order to meet EU DA targets for BB coverage has been estimated between 110 and 170 bn EUR, contributing to the overall EU economy with an additional growth of 750bn EUR in GDP and as many as 5.5 million jobs (Source: The Boston Consulting Group 'Reforming Europe's Telecoms Regulation to Enable the Digital Single Market' July 2013).

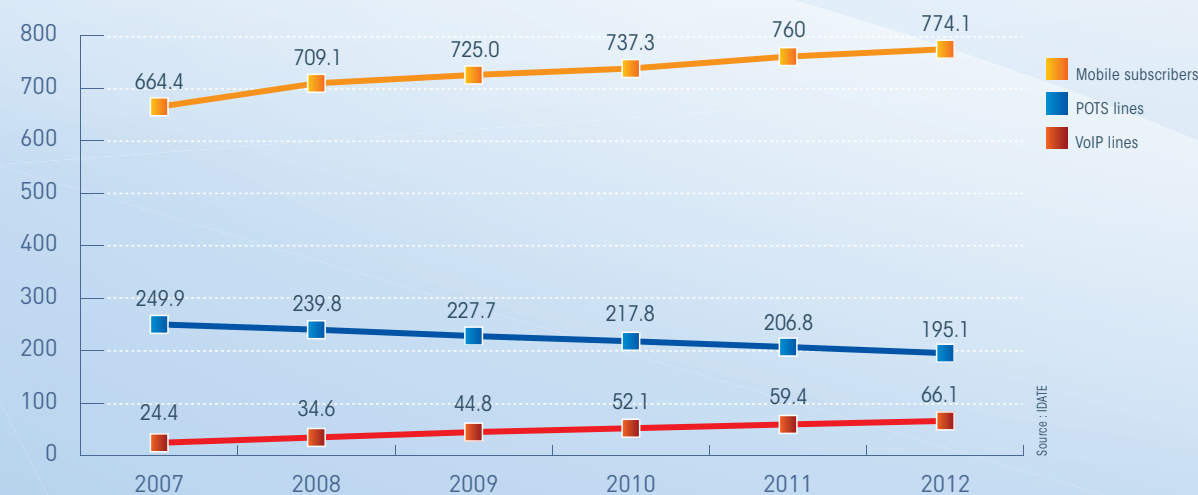
Whereas the decline in fixed-line revenues should be expected, given the negative trend for take-up of services, the 3.8% fall in mobile retail revenues despite the growing number of subscribers and the huge popularity of smartphones seems more unusual. Intense price competition between operators (MNOs and MVNOs), the substitution of OTT offers for SMS and other services as well regulatory intervention as in the case of international roaming play into this equation. Attractive broadband offers continue boosting demand with related revenues up by 3.5% in 2012.

Although traditional fixed line telephony is on a lasting downward trend, analogue telephony lines continue to be the dominant form of managed fixed access. In 2012 there were 195 million circuit-switched telephony access lines compared to merely 66 million managed VoIP lines. However, the trend clearly speaks in favour of packet-switched telephony lines. Since 2007, the latter grew by 171%, whereas the number of legacy lines shrank by 22%. This trend will accelerate as an increasing number of operators will fully switch over to All-IP networks in the years to come. The number of mobile telephony subscribers has risen by 16% over the same period, from 664 million to 774 million.

OVERALL FIGURES

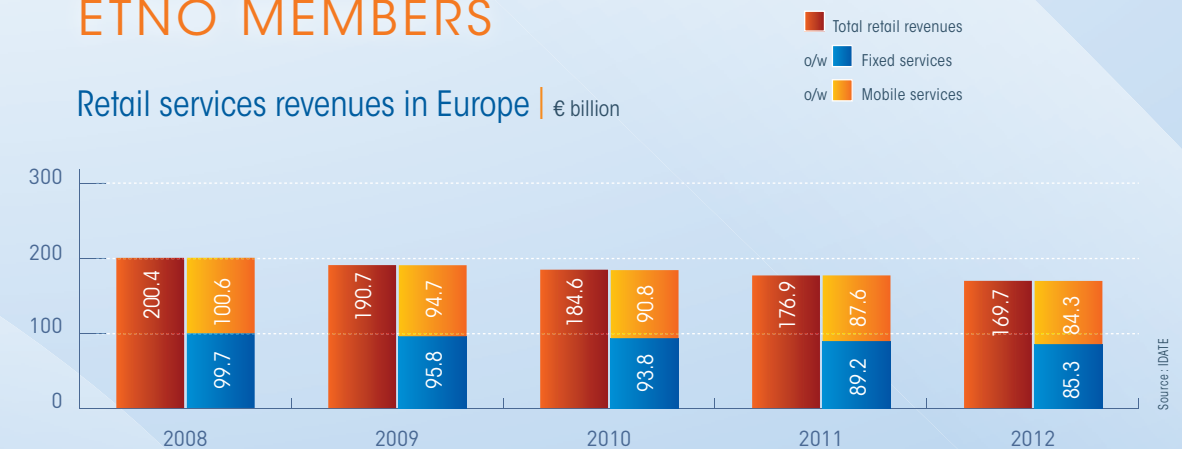
Fixed telephony vs mobile telephony take up growth + take up of VoIP services in Europe

(incl. Turkey, excl. Russia, Ukraine & Georgia) | million



ETNO MEMBERS

Retail services revenues in Europe | € billion



INVESTMENT TRENDS

ETNO members driving force behind network upgrades

As the demand for data traffic in fixed and mobile networks is ever-growing, operators keep upgrading their infrastructures to NGA and LTE-standards. More than 150 million European homes are already passed by FTTx-networks and more than 22 million mobile users had an LTE-subscription in 2013.



Growing at a rate of 0.3% investment levels have remained fairly stable in 2012 after a strong acceleration in 2011. Against the background of a shrinking market, this means that operators are devoting a higher share of their revenues to investing in new networks than before.

Operators' investments in the ETNO perimeter reached 46 bn EUR in 2012. The lion's share of this sum (28 bn EUR or 61%) came from the members of ETNO.

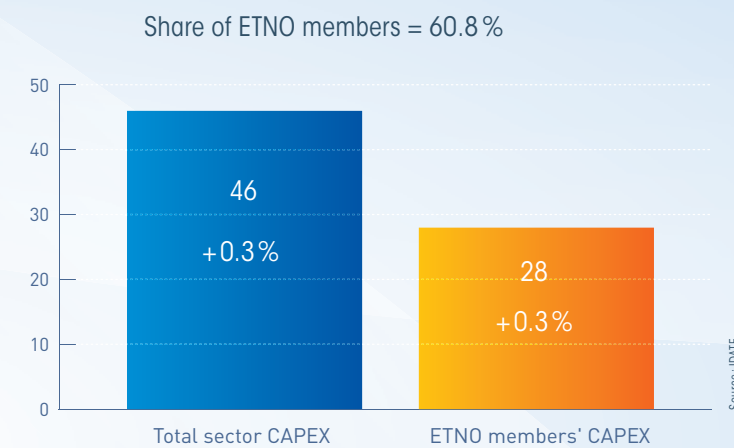
At 25.6 bn EUR, Capex in fixed networks continues to be higher than in mobile networks in 2012 (+0.2% y-o-y). ETNO members account for almost two thirds (64.6%) of the total amount. While ETNO members increased their spending on fixed infrastructure upgrades by 0.7% in 2012, the investments of other operators fell by 0.8%.

In the mobile sector, too, ETNO member firms show a high degree of activity. They invested 11.4 bn EUR in their networks, representing 56% of the mobile sector's total investment of 20.3 bn EUR.

OVERALL FIGURES

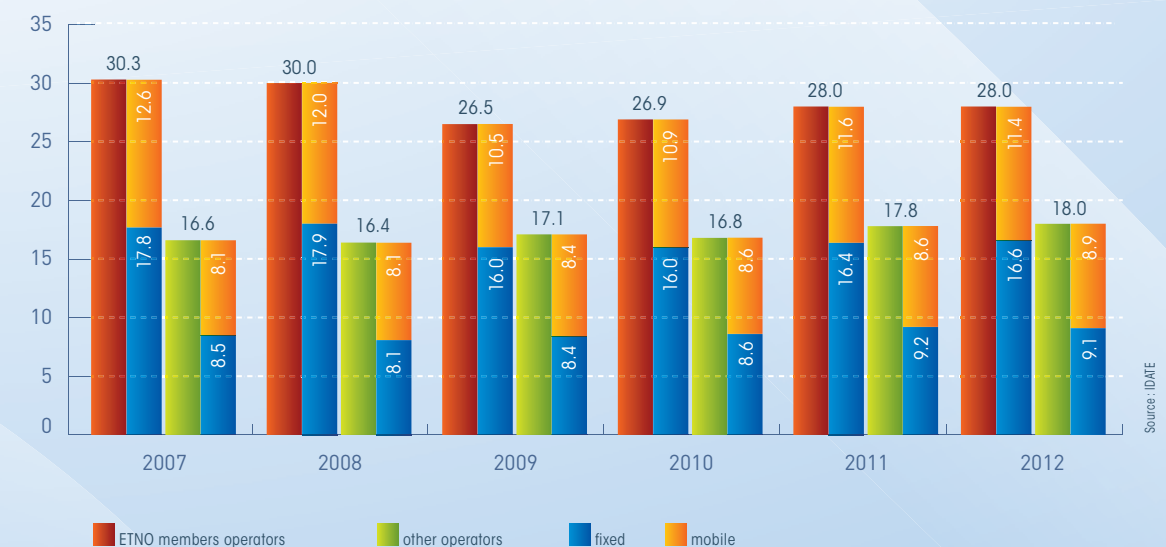
Total sector investment for 2012

ETNO members' CAPEX (ETNO perimeter) and share of total sector CAPEX | € billion



Investment in fixed vs mobile segments

Telcos' tangible CAPEX (ETNO perimeter) | € billion

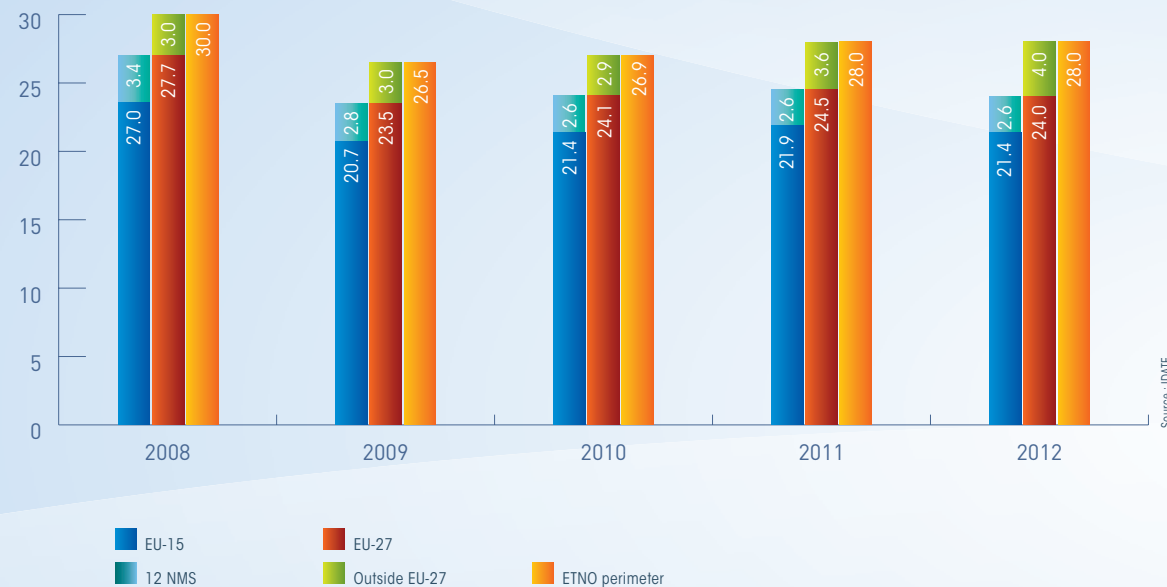


INVESTMENT TRENDS

ETNO MEMBERS

Aggregated investment by ETNO members in Europe

ETNO members' tangible CAPEX in Europe (ETNO perimeter) | € billion



Share of revenue devoted to CAPEX in 2012

Part of turnover devoted to investment (ETNO members) | %

	EU-15	12 NMS	EU-27	ETNO perimeter	outside EU-27
Tangible CAPEX/turnover	13.1%	14.2%	13.2%	13.7%	17.7%
fixed	15.5%	16.6%	15.6%	16.0%	18.8%
mobile	10.6%	12.8%	10.9%	11.3%	16.2%

Source: IDATE

BROADBAND

Increasing adoption of NGA and mobile broadband

Broadband continues to be on the rise in Europe with 6 EU homes out of 10 subscribing to a fixed broadband service in 2012. The Digital Agenda's goal of universal availability of basic broadband has virtually been achieved with coverage standing at 100% in 17 countries and reaching 99% in the EU27 and ETNO perimeters.

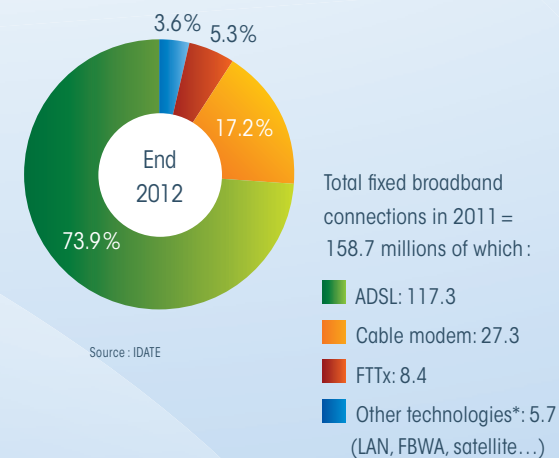
DSL continues to be the dominant form of fixed access, holding a 74% share of access lines in the ETNO perimeter. There has nevertheless been a gradual shift towards other technologies. Cable accounted for 17.2% of the lines at the end of 2012 compared to 16.1% a year earlier. The share of FTTH/B has grown from 3.5% of the fixed broadband market to 5.3%. More largely, superfast broadband connections now account for 16% of total (11% in 2011).

3G subscriptions have outnumbered fixed line accesses since 2009 and the gap is widening as an increasing number of users adopts not only smartphones but also other connected devices, notably tablets. While LTE adoption is still limited, increasing availability of services will drive demand and reinforce the mobile's popularity in the broadband segment.

OVERALL FIGURES

Broadband penetration per technology

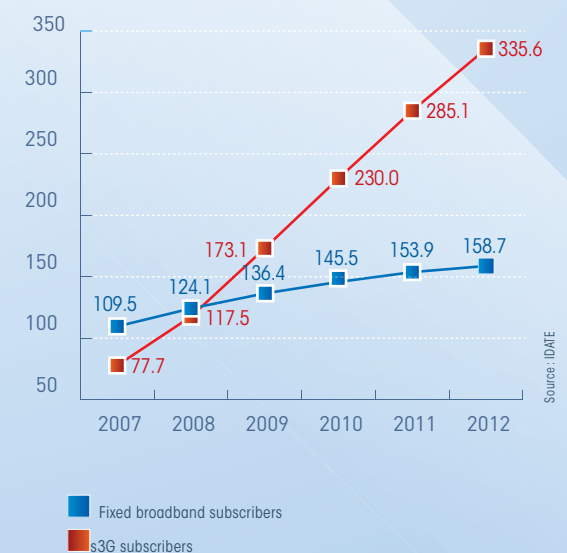
Structure of the European fixed broadband market (ETNO perimeter) | % of total broadband connections



*VDSL and cable/ DOCSIS 3.0 are accounted for in the FTTx category

Fixed vs mobile broadband

Fixed and mobile broadband subscribers (ETNO perimeter) | thousand subscribers



ETNO members at the forefront of NGA deployments

NGA networks continue gaining traction in the European market. More than 50% of European homes can effectively sign up to ultra-fast broadband services today.



Coverage of superfast broadband services has grown by 13% compared to 2011. More than 150 million homes are now passed. Out of these, 23.7 million have actually taken a subscription at the end of 2012. Even more important is the significant growth in actual take-up of services. In 2011, 11% of the homes passed had signed up to the services, compared to 16% one year later. While this certainly still leaves significant upward potential, the trend is encouraging.

In terms of FTTH/B, coverage rose to 34.9 million homes in the EU, compared to 29 million in the previous year. FTTH/B subscriptions reached 6.4 million. In the European Union, ETNO members account for 36.7% of homes passed, across all FTTx technologies. When considering FTTH/B only, this share rises to 48.5%.

VDSL is also an important piece in the high-speed broadband puzzle and particularly so for ETNO members, with some of having achieved coverage of 50% of homes in their respective domestic markets. With the use of vectoring technology, VDSL becomes even more relevant. Deutsche Telekom, for instance, recently announced covering 24 million homes with vectoring by 2016.

OVERALL FIGURES

Main technologies/network architecture models

NGA deployment (Homes passed at end 2012) | million

Homes passed at end 2010	Total EU	ETNO members	% ETNO members
FTTH/B	34.9	16.9	48.5%
FTTx* (incl. VDSL, FTTLA, LAN...)	150.5	54.9	36.5%

*All cable/DOCSIS 3.0 deployments are taken into account in the FTTx category

Source : IDATE

NGA deployment in Europe

FTTx deployments and share of ETNO members per country (end 2012)

	FTTx homes passed (000s) ⁽¹⁾	share ETNO
Austria	3.847	63%
Belgium	6.952	58%
Bulgaria	1.720	16%
Croatia	670	47%
Cyprus	0	100%
Czech Republic	2.715	17%
Denmark	3.596	71%
Estonia	685	46%
Finland	869	94%
France	9.660	17%
Germany	36.184	34%
Greece	130	96%
Hungary	3.290	36%
Iceland	179	40%
Ireland	963	22%
Italy	3.073	97%
Latvia	883	49%
Lithuania	1.320	58%
Luxembourg	285	100%
Malta	0	0%
Netherlands	9.558	66%
Norway	705	49%
Poland	3.896	28%
Portugal	6.069	26%
Romania	5.147	na
Slovakia	1.144	60%
Slovenia	675	26%
Spain	10.300	21%
Sweden	2.150	44%
Switzerland	6.399	76%
Turkey	7.250	81%
UK	20.199	0%

(1) aggregated data

Source : IDATE for council Europe

Broadband coverage at end 2012⁽¹⁾

	D.A. 2013	DIGITAL AGENDA 2020		
	Standard ⁽²⁾	VDSL ^{(3) (4)}	FTTLA ^{(3) (4)}	FTTH/B ⁽³⁾
Austria	100%	63%	36%	6%
Belgium	100%	82%	60%	0%
Bulgaria	100%	0%	0%	61%
Croatia	97%	14%	18%	3%
Cyprus	100%	na	na	na
Czech Republic	98%	29%	0%	5%
Denmark	100%	50%	54%	35%
Estonia	96%	15%	64%	38%
Finland	100%	na	11%	22%
France	100%	0%	13%	21%
Germany	100%	32%	55%	3%
Greece	100%	3%	0%	na
Hungary	98%	7%	57%	21%
Iceland	98%	na	na	na
Ireland	98%	12%	44%	2%
Italy	99%	8%	0%	11%
Latvia	99%	25%	0%	80%
Lithuania	98%	0%	0%	97%
Luxembourg	100%	100%	0%	35%
Malta	100%	na	na	na
Netherlands	100%	67%	37%	23%
Norway	98%	na	0%	31%
Poland	98%	12%	12%	3%
Portugal	100%	0%	96%	53%
Romania	98%	0%	17%	34%
Slovakia	93%	0%	20%	40%
Slovenia	98%	3%	35%	41%
Spain	99%	na	41%	19%
Sweden	100%	na	0%	47%
Switzerland	100%	100%	42%	17%
Turkey	100%	21%	0%	17%
UK	100%	26%	47%	1%
Total EU-15	100%	19%	34%	12%
Total EU-27	99%	17%	31%	14%
ETNO	99%	19%	29%	15%

(2) as a % of population

(3) homes passed as a % of households

(4) capable of speeds over 30 Mbps

Source : IDATE for FTH Council Europe

NEW BROADBAND SERVICES

Over the Top services and applications become more and more popular

Online search remains the staple food of internet usage. However, new applications keep arising with mobile broadband facilitating their development.

Online search is the most frequently used service in any of the countries sampled. More than 90% of UK, French and German fixed internet users call on the services of search engines to find their way through the Internet.

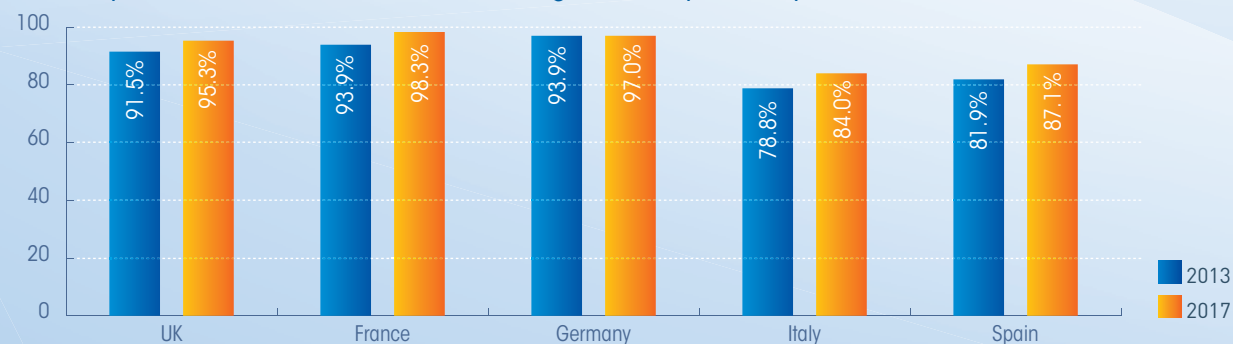
Social networks are another service that is highly popular and will remain being so. However, the growth of users joining social networks seems to have passed its peak. More than half of all users have already signed to a social network of virtual world and more of them will be doing so by 2017, however the progression will be moderate, ranging from less than 3 percentage points in Germany and France to 7.1 percentage points in Italy. It is interesting to note that there is no catch-up effect in Germany and France, which are the countries in which overall adoption of social networks is the lowest in the given sample.

With respect to e-commerce, the picture is remarkably contrasted. Almost 80% of users in the UK and more than three quarters of German users buy online, but only 34% of Spanish users and less than a quarter of Italian fixed internet users engage in online shopping.



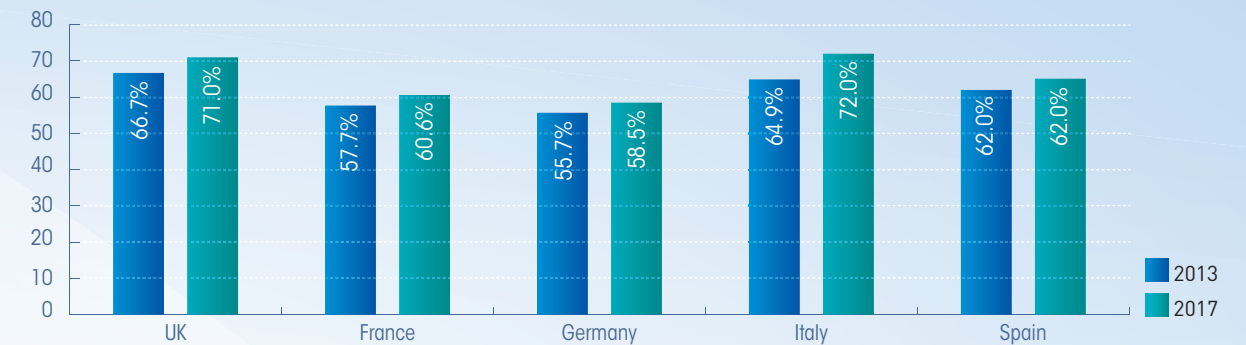
OVERALL FIGURES

Proportion of Internet users searching online by country in 2013 and 2017 | % of fixed Internet users



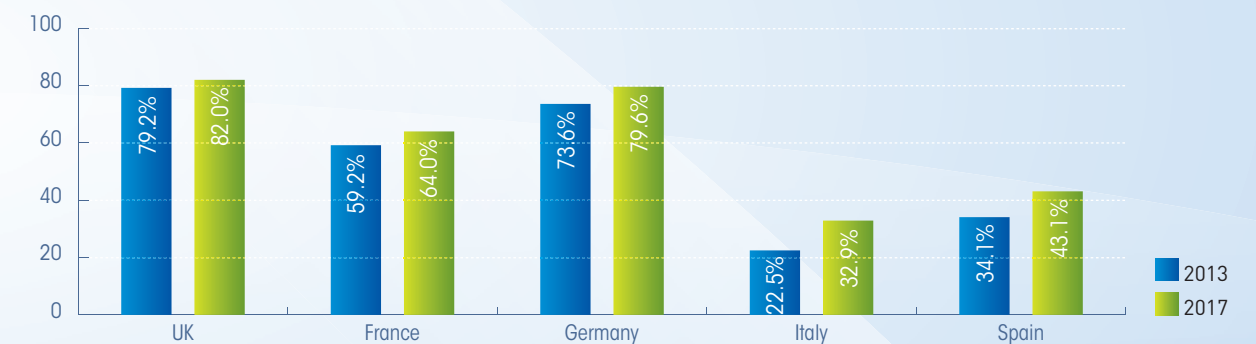
Source: IDATE, in "World Internet Services Market", June 2012-3

Use of social networks by country in 2013 and 2017 | % of Internet users



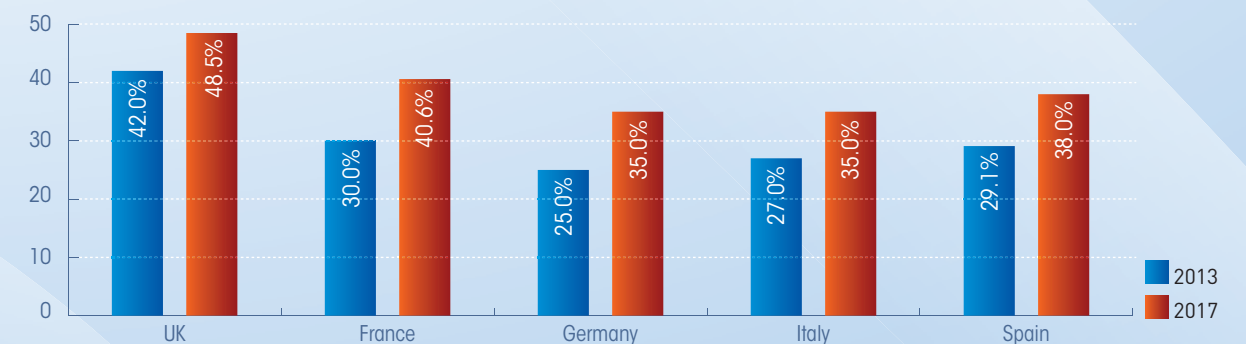
Source: IDATE, in "World Internet Services Market", June 2012-3

Proportion of Internet users shopping online by country in 2013 and 2017 | % of Internet users



Source: IDATE, in "World Internet Services Market", June 2012-3

Use of Location Based Services by country in 2013 and 2017 | % of mobile subscribers



Source: IDATE, in "World Internet Services Market", June 2012-3

Top 50 telecom operators in the world

Rank	Company	Country	2012 sales (€ million)
1	NTT	Japan	104377
2	AT&T	USA	99181
3	Verizon	USA	90162
4	China Mobile	China	69097
5	Telefónica	Spain	62356
6	Deutsche Telekom	Germany	58169
7	Vodafone	UK	54643
8	Comcast	USA	48698
9	América Móvil	Mexico	45805
10	Orange	France	43515
11	KDDI	Japan	35723
12	China Telecom	China	34902
13	Softbank	Japan	32953
14	China Unicom	China	30692
15	Telecom Italia	Italy	29503
16	Sprint Nextel	USA	27525
17	Vimpelcom	Russia	23061
18	BT	UK	22441
19	Telstra	Australia	20443
20	Time Warner Cable	USA	16645
21	KT	South Korea	16437
22	BCE	Canada	15559
23	Century Link	USA	14302
24	Telenor	Norway	13608
25	MTN	South Africa	12808
26	KPN	Netherlands	12409
27	TeliaSonera	Sweden	12050
28	SingTel	Singapore	11724
29	Bharti Airtel	India	11697
30	STC	Saudi Arabia	11668
31	SFR	France	11288
32	Oi	Brazil	11207
33	SK Telecom	South Korea	11047
34	Rogers	Canada	9726
35	MTS	Russia	9679
36	Swisscom	Switzerland	9449
37	Hutchison Whampoa	HK	9033
38	Telus	Canada	8507
39	Everything Everywhere	UK	8184
40	Rostelecom	Russia	8107
41	Liberty Global	USA	8025
42	LG U+	South Korea	7534
43	Ooredoo	Qatar	7209
44	MegaFon	Russia	6880
45	Etisalat	UAE	6834
46	Portugal Telecom	Portugal	6599
47	Belgacom	Belgium	6462
48	PT Telkom	Indonesia	6396
49	Türk Telekom	Turkey	5506
50	Bouygues Telecom	France	5226

Source: I.D.A.T.E

Top 20 European telecoms operators

Rank	Company	Country	2012 sales (€ million)
1	Telefónica	Spain	62356
2	Deutsche Telekom	Germany	58169
3	Vodafone	UK	54643
4	Orange	France	43515
5	Telecom Italia	Italy	29503
6	BT	UK	22441
7	Telenor	Norway	13608
8	KPN	Netherlands	12409
9	TeliaSonera	Sweden	12050
10	SFR	France	11288
11	Swisscom	Switzerland	9449
12	Everything Everywhere	UK	8184
13	Portugal Telecom	Portugal	6599
14	Belgacom	Belgium	6462
15	Türk Telekom	Turkey	5506
16	Bouygues Telecom	France	5226
17	Virgin Media	UK	5041
18	Tele2	Sweden	5023
19	Telekom Austria	Austria	4330
20	TDC	Denmark	3509

Source: I.D.A.T.E

Further information:

- ALBtelecom (Albania) www.albtelecom.al
 - Belgacom (Belgium) www.belgacom.com
 - BH Telecom (Bosnia and Herzegovina) www.bhtelecom.ba
 - Croatian Telecom (Croatia) www.t.ht.hr
 - Cyprus Telecommunications Authority (Cyprus) www.cyta.com.cy
 - Deutsche Telekom (Germany) www.telekom.com
 - Eircom (Ireland) www.eircom.ie
 - Elion (Estonia) www.elion.ee
 - Elisa Communications Corporation (Finland) www.elisa.com
 - POST Group Luxembourg www.postgroup.lu
 - Finnet Group (Finland) www.finnet.fi
 - GO (Malta) www.go.com
 - Koninklijke KPN (The Netherlands) www.kpn.com
 - Lattelecom (Latvia) www.lattelecom.lv
 - Magyar Telekom (Hungary) www.magyartelekom.hu
 - Makedonski Telekom (F.Y.R. of Macedonia) www.telekom.mk
 - Orange (France) www.orange.com
 - OTE (Greece) www.ote.gr
 - Portugal Telecom (Portugal) www.telecom.pt
- RomTelecom (Romania) www.romtelecom.ro
 - Siminn (Iceland) www.simi.is
 - Slovak Telekom (Slovakia) www.slovaktelekom.sk
 - Societatea Nationala de Radiocomunicatii (Romania) www.radiocom.ro
 - Swisscom (Switzerland) www.swisscom.com
 - TDC (Denmark) www.tdc.com
 - TDF (France) www.tdf.fr
 - Telecom Italia (Italy) www.telecomitalia.it
 - Telecom Liechtenstein www.telecom.li
 - Telefónica (Spain) www.telefónica.com
 - Telefónica O₂ (Czech Republic) www.cz.o2.com
 - Telekom Austria (Austria) www.telekom.at
 - Telekom Slovenije (Slovenia) www.telekom.si
 - Telekomunikacja Polska (Poland) www.telekomunikacja.pl
 - Telenor (Norway) www.telenor.com
 - TeliaSonera (Sweden – Finland) www.teliasonera.com
 - Teo Lt (Lithuania) www.teo.lt
 - Türk Telekom (Turkey) www.turktelekom.com.tr
 - VIVACOM (Bulgaria) www.vivacom.bg

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