

Make Your Publications Visible.

A Service of



Leibniz-Informationszentrum Wirtschaft Leibniz Information Centre

Ünver, Mehmet Bilal; Göktaylar, Yavuz; Tezel, Fatih

# **Conference Paper**

Regulatory Implications of FMS for Voice Services in Turkey: Analysis of Recent Regulatory Acts on Deregulation and Margin Squeeze

26th European Regional Conference of the International Telecommunications Society (ITS): "What Next for European Telecommunications?", Madrid, Spain, 24th-27th June, 2015

# **Provided in Cooperation with:**

International Telecommunications Society (ITS)

Suggested Citation: Ünver, Mehmet Bilal; Göktaylar, Yavuz; Tezel, Fatih (2015): Regulatory Implications of FMS for Voice Services in Turkey: Analysis of Recent Regulatory Acts on Deregulation and Margin Squeeze, 26th European Regional Conference of the International Telecommunications Society (ITS): "What Next for European Telecommunications?", Madrid, Spain, 24th-27th June, 2015, International Telecommunications Society (ITS), Calgary

This Version is available at: https://hdl.handle.net/10419/127186

# Standard-Nutzungsbedingungen:

Die Dokumente auf EconStor dürfen zu eigenen wissenschaftlichen Zwecken und zum Privatgebrauch gespeichert und kopiert werden.

Sie dürfen die Dokumente nicht für öffentliche oder kommerzielle Zwecke vervielfältigen, öffentlich ausstellen, öffentlich zugänglich machen, vertreiben oder anderweitig nutzen.

Sofern die Verfasser die Dokumente unter Open-Content-Lizenzen (insbesondere CC-Lizenzen) zur Verfügung gestellt haben sollten, gelten abweichend von diesen Nutzungsbedingungen die in der dort genannten Lizenz gewährten Nutzungsrechte.

#### Terms of use:

Documents in EconStor may be saved and copied for your personal and scholarly purposes.

You are not to copy documents for public or commercial purposes, to exhibit the documents publicly, to make them publicly available on the internet, or to distribute or otherwise use the documents in public.

If the documents have been made available under an Open Content Licence (especially Creative Commons Licences), you may exercise further usage rights as specified in the indicated licence.



# Regulatory Implications of FMS for Voice Services in Turkey: Analysis of Recent Regulatory Acts on Deregulation and Margin Squeeze

Mehmet Bilal Ünver\*, Yavuz GÖKTAYLAR\*\* and Fatih TEZEL\*\*\*

#### **Abstract**

FMS (fixed-to-mobile substitution) has increasingly been echoed within the regulatory agenda of the global and domestic policy actors as the usage of mobile telephony has rapidly exceeded that of the fixed telephony in the last decade. In this line of thinking and upon the drastic changes in market figures, e.g., diminishing fixed subscriber number and traffic, Information and Communication Technologies Authority (ICTA), regulatory authority in Turkey has had a survey carried out across the country in 2013, primarily to evaluate the degree of FMS. The survey results demonstrated the existence of one-sided (or imperfect) FMS, which has been found to influence fixed access and calling markets so as to ensure that these two markets are more competitive under a forward-looking approach. Moreover, ICTA has advanced the wholesale regulations within the context of fixed call origination market by imposing margin squeeze remedy on the fixed incumbent (SMP operator). While the latter step is criticized as being in conflict with the deregulation decision, the nature of the remedy being on ex post basis could be speculated to eliminate the concerns to an extent. Aggravating the discussion, an interesting development during the course of ICTA's intervention has happened in January 2015 when the SMP operator has increased its two retail prices so as to rearrange the margins. In this context, two questions arise from the discussions which extend to the philosophy of market regulation and deregulation: (i) First, does the regulator have a responsibility to pursue a regular (although being ex post) way of examining and when necessary intervening the incumbent's retail prices despite the fact Competition Authority has

-

The views and statements expressed in this article are those of the authors, and do not reflect those of Information and Communication Technologies Authority.

<sup>\*</sup> Head of Sectoral Competition Department in ICTA (since 2011), ICT Expert in ICTA (since 2005); Telecommunications Assistant Expert in Telecommunications Authority (ex-ICTA) (2001-2005); PhD Candidate in Private Law at Selcuk University; LLM in Information Technologies, Media and E-Commerce, University of Essex (2007); MSc in European Studies, Middle East Technical University (2004); LLB, Ankara University, Faculty of Law (2000). The author deals with market analyses and competition-oriented market remedies in electronic communications sector. E-mail address: bunver@ICTA.gov.tr.

<sup>\*\*</sup> Senior ICT Expert at Information Communications and Technologies Authority of Republic of Turkey (ICTA) (since 2011), ICT Expert at ICTA (since 2005); Telecommunications Assistant Expert at Telecommunications Authority (ex-ICTA) (2001-2005); MA in Economics at Boston University (2008); MSc in Science and Technology Policy Studies at Middle East Technical University (METU) (2007); BS in Economics at METU (2000). The author is interested in regulation policies, price regulation, collecting and assessing market data. E-mail address: ygoktaylar@ICTA.gov.tr.

<sup>\*\*\*</sup> Senior ICT Expert in Information Communications and Technologies Authority of Republic of Turkey (ICTA), Masters in Economic Policy Management in Columbia University (2013) and Bachelors in Economics in Istanbul University (2004). The author is a senior expert In competition affairs, auctions and market analyses in electronic communications sector. E-mail address: ftezel@ICTA.gov.tr.

opened investigations several times on the same issue. (ii) Would the exposed degree of FMS have had a driving role for deregulation of fixed access and calling markets, which are freed from regulation including margin squeeze remedy on a different route across EU, i.e. mostly inner-market (or VOB-driven) developments towards effective competition. In this paper, such debates are addressed under the light of the reasons that justify margin squeeze as well as deregulation acts issued both by the Turkish regulator itself and in general way of regulatory understanding, i.e. with a particular emphasis to EU perspective and implementation. It is elaborated whether the underlined concerns relating to the degree of market regulation are successfully sorted out and translated into regulatory practice, specifically when thought with Turkey-centric competition problems, i.e. predominant WLR type service-based models, diminishing fixed markets. After discussions, it is found that although belatedly imposed and accompanied by deregulation, such a remedy would serve as a check-balance tool for a transition period, but not suffice to cover all the long-term problems by itself in cases where competing operators have insufficient competitive tools in terms of replicability. Last but not the least it is concluded that although European way of deregulation draws a differing roadmap, EU-centric pillars for regulation are implicitly injected into the Turkish system, which tries to resolve the issue with a trade-off together with the little possibility of ruling in a regulatory vacuum. Should this and a comparable risk of regulatory opportunism be prevented, a hybrid and promising example would be mentioned under the context of deregulatory reform.

**Key words:** margin squeeze, deregulation, FMS, EU regulatory framework, market definition, fixed, mobile, voice, Turkey.

#### 1. Introduction

In Turkey, fixed telephony service markets are deregulated and margin squeeze remedy is introduced as a precautionary measure at the same time. Indeed, ICTA has advanced the wholesale regulations within the context of fixed call origination market by imposing margin squeeze remedy on the fixed incumbent (SMP operator). While this step is criticized as being in conflict with the deregulation decision, the nature of the remedy being on ex post basis could be speculated to eliminate the concerns to an extent. Aggravating the discussion, an interesting development during the course of ICTA's intervention has happened in January 2015 when the SMP operator has increased its two retail prices so as to rearrange the margins. Therefore, deregulation of fixed services at retail market due to FMS, margin squeeze remedy and crossing administrative functions of Competition Authority (CA) and ICTA have become important topics recently in Turkey. Does the regulator have a responsibility to pursue a regular (although being ex post) way of examining and when necessary intervening the incumbent's retail prices despite the fact Competition Authority has opened investigations several times on the same issue? Would the exposed degree of FMS have had a driving role for deregulation of fixed access and calling markets, which are freed from regulation (including margin squeeze remedy) on a different route across EU, i.e. mostly inner-market (or VOB-driven) developments leading to effective competition?

The scope of this paper is limited with policy discussion of whether ex-post margin squeeze remedy is necessary provided existence of FMS and existence of competition rules. We will particularly focus on how those issues interact each other in Turkey with a particular emphasis to EU perspective and implementation. In this paper, a short literature review has first been conducted and main findings have been summarized. Then we discuss FMS in Turkey based on survey results conducted by ICTA and other evidences. In the following sections of the paper FMS based changes over market analysis in Turkey such as deregulation of fixed services at retail level and creating margin squeeze remedies at wholesale level are discussed comprehensively. Through this discussion, CA's role and interaction of institutional powers of CA and ICTA are also involved with a forward-looking view to elaborate Turkish market structure. Finally, some important points including comparative analytical inputs with regard to broadband are summarized in the conclusion. We hope to show limitations and trade-offs of proposed policies by ICTA given the existence of FMS in the context of unique Turkish regulatory experience such that we believe it will be useful for future policy setting in Turkey as well as for policy makers in similar emerging economies.

#### 2. Literature Review

The existence of FMS has been challenged until one decade ago as the diffusion pattern for mobile telephony was vague and unclear. Now, it is usually recognised as an important fact affecting the whole communications industry almost all around the world. According to Albon (2006) the term 'fixed to mobile substitution' is used to depict the relationship between fixed and mobile networks or the replacement of fixed telephony services with mobile services. FMS may be understood in the form of either fixed to mobile traffic substitution or fixed to mobile access substitution.

The sources of FMS are various. Rapid technical progress in mobile telecommunications leads to more useful and cheap mobile handsets as well as higher quality of service. Furthermore, high competition in mobile sector drives prices downward. Asymmetric regulation is in favour of mobile sector rather than fixed telephony sector. These are among several sources of FMS such that users have changed their preferences in time in favour mobile connection and mobile telephony usage

FMS has become more important since it creates dilemmas for policy makers. For instance, should a national regulatory authority change its market definitions and regulations in the presence of FMS? Is the degree of substitution adequate to justify deregulation of fixed telephone services at retail level? Should regulatory authority impose a margin squeeze test after deregulation as a precaution for potential abuse? Should regulatory authority still supports new entrants to fixed telephony markets? Many researchers answered these questions reluctantly and said that it was too early to decide, reserving the possibility of action in the future (Rodini et al., 2003). However, in time technological change has started to affect regulations. For instance, European Commission has dropped markets for national and international calls from its relevant market list in 2007 that were subject to ex-ante regulation though that move was justified by increasing importance of broadband and voice over broadband applications. More recently, fixed and mobile telephony (broadband) services are accepted to exist in the same market in Austria that implies strong fixed to mobile substitution while European Commission has serious doubts about FMS-centric market definitions (Berec, 2011).

In the last fifteen years, existence of traffic or access substitution has been studied such that researchers tried to clarify whether mobile telephony was a substitute or complement for fixed telephony. However, the results are mixed. Indeed, earlier studies can be classified into three categories. The first group suggests that fixed and mobile telephony are complements while another group suggests that they are substitutes. While studies of Hamilton (2003) and Garbacz and Thompson (2007) are in the first category, Rodini et al (2003), Madden and Coble-Neal (2004), Vagliasindi et al. (2006), Chu et al. (2009), Narayana (2010), Karacuka et al. (2011), Briglauer et al. (2011), Suarez and Garcia-Marinoso (2013) and Barth and Heimeshoff (2014a, 2014b) are in the second category. On the other hand, the third group suggests that it depends on some specific conditions such as level of maturity of the mobile and fixed markets as well as usage substitution or access substitution. The studies in this category are authored by Banerjee and Ross (2004), Hodge (2005), Dou and Long (2006), Zimmerman (2007), Mao et al. (2008), Grajek and Kretschmer (2009) and Biancini (2011).

Initial studies on the issue have seen mobile telephony as a complement. Later studies are usually in favour of FMS. However, for developed countries traffic substitution prevails, while penetration or access substitution usually occurs in developing countries where the fixed telephony sector is comparably underdeveloped in general. Most of the empirical works are based on relatively old data sets. Therefore, we can also reasonably claim that nowadays FMS is more effective than it was during previous decades. It would be beneficial if we focus on latest studies in the context of the paper.

Karacuka et al. (2011) have tried to estimate the short run and long run demand elasticities for mobile telephony in Turkey on the basis of firm level data covering the period from January 2002 to December 2006. They have segregated the market into two parts, namely pre-paid and post-paid. They estimated long-run price elasticity for the post-paid market segment as – 0.72 and for the pre-paid market segment as –0.33. Likewise, they estimated short-run price elasticities for the post-paid market segment as –0.36 and for pre-paid market segment as – 0.20. Furthermore, the cross price elasticity was estimated as 0.33 for the pre-paid market suggesting that fixed-line telephony and mobile telephony are substitutes. However, for the post-paid market, the estimated cross price elasticity was found insignificant. Hence, this study does not support the claim that there is a fixed to mobile substitution for voice telephony on the part of post-paid customers.

Briglauer et al (2011) estimated cross price elasticities for mobile services using time series data from 2002 to 2007 for Austria. They found strong fixed to mobile substitution for national calls while fixed to mobile access substitution was small. After comparing estimated elacticities with critical elasticities, they concluded that fixed and mobile calls are at same market while fixed and mobile access cannot be justified to be in the same market for the Austrian case.

Suarez and Garcia-Marinoso (2013) found small degree of access substitution using quarterly household panel data for the period 2004 to 2009 for Spain while they also tried to identify which characteristics drive household decision for fixed to mobile access substitution.

Barth and Heimeshoff (2014a) studied fixed to mobile traffic substitution with relatively new quarterly panel data for 16 different European Countries from 2004 to mid-2010. They have found strong positive cross price elasticity for short and long run that implies strong fixed to mobile substitution.

Barth and Heimeshoff (2014b) also studied fixed to mobile access substitution using panel data from 2003 to 2009 belonging to 27 European countries and they estimated positive modest cross price elasticity as 0.19 that implies fixed to mobile access substitution. Based on this estimation they have implemented SSNIP test, having concluded that fixed and mobile access markets do not belong to a common market.

In the early phases of liberalization, regulatory aim was promoting entrance to market by new firms as well as protecting consumers from excessive prices of privatized incumbent firms. In the context of the ladder of investment hypothesis, once new firms would enter the market with minimum investment by utilizing existing networks of incumbent firms with regulations of CS/CPS and LLU, they would move across the vertical value chain in time. However, from the regulatory point of view, at later phases of liberalization, focus has shifted from excessive prices to low prices at retail markets such that incumbent firms could rise wholesale prices for their new rivals while decreasing their retail prices so that new firms could not keep adequate profit margin (Briglauer et al, 2010). The prime motive for the incumbents is to compensate loss of current profits due to low retail prices later by higher profits with excessive prices once rivals are eliminated from the market.

Regulatory focus moving to margin squeeze has led to usage of margin squeeze tests by NRAs. A margin squeeze test is basically comparing wholesale unit cost of production of interested service or service bundle plus retail unit cost of same service or same service bundle with retail price of interested service or service bundles in order to check whether new entrants can replicate the same service or service bundle. It can be also adjusted to differences of scale economies and scope economies between incumbent firms and new entrant. According to Gaudin and Saavedra (2014) implementing ex-ante margin squeeze tests were getting popular among NRAs in EU in order to promote competition while it was used to prevent margin squeeze as an exclusionary abuse in competition law. In fact, they underline that ex-ante margin squeeze tests would be key tool in the regulation of next generation access (NGA) networks in EU.

From static economic efficiency perspective, low prices means increase in consumer surplus and social welfare in general. From dynamic economic efficiency perspective, temporary gains of social welfare will be extracted by incumbent once it has forced its rivals to exit from the market so economic intervention on behalf of new entrants can be justified in this ground. However, if there exists strong fixed to mobile substitution, then incumbent firm cannot increase its retail prices later. That implies implementing ex-ante margin squeeze tests cannot be justified on economic efficiency grounds in case of existence of strong fixed to mobile substitution. Besides, given existence of strong fixed to mobile substitution, ladder of investment thesis becomes obsolete since low profit margins with declining volume of traffic and access lines mean disincentive for investment for new entrants.

Indeed, these lines of thought are the main sources of divergence on US regulations and EU regulations on this issue. US case law gives more credit on efficiency while European Commission decisions are based on fairness and protection of rivals (Oğuz, 2015). According to Gaudin and Saavedra (2014), FCC does not use margin squeeze tests as an ex-ante regulatory tool in the US due to the Supreme Court rules<sup>1</sup>. Apart from the initial Alcoa case, at other several high profile margin squeeze cases in USA, Supreme Court decisions underline that it was very difficult to determine 'just' prices by administrations and so market process should be priority. In contrast, several big margin squeeze cases handled by European Commission and European Court of Justice (Court of Justice, CJ) resulted in conclusions whereby incumbent were found to abuse their dominant positions and squeezed profit margins of their rivals (Oğuz, 2015). Oğuz (2015) criticizes those decisions claiming (i) EU's implicit assumption that protecting existing competitors makes it possible for new entry may not be true in all situations, (ii) ensuring 'fair' amount of profit to competitors can be justified in natural monopoly situations and in transition to a liberal market system as part of the investment ladder approach that can be questioned now due to appearance of FMS with rapid technological change in telecommunications, (iii) EU gives priority to protect competitors rather than maximizing social welfare that means wealth transfer from consumers to producers and (iv) EU keeps its monopoly position in margin squeeze cases by putting national regulations to a secondary place such that it acts as a regulatory agency.

\_

<sup>&</sup>lt;sup>1</sup> In fact, there is no access regulation in the US since 2003 because of the existing inter-platform competition between incumbents and cable operators.

# 3. Fixed-to-Mobile Substitution (FMS) in Turkey

#### Market trends

Turkey has been witnessing the quick spread in mobile phone and internet using across the globe for the last 30 years. According to GSMA database we have almost 7.5 billion mobile connections by mid 2015. In case of Turkey by mid-2015, there are more than 72 million mobile subscriptions corresponding to 92.5% penetration rate and 7.2 million fixed internet subscribers (ICTA, 2015). Similar to the world trend in which mobile phone usage out bounded and scissor between fixed and mobile usage in terms of calling traffic is widening. Figures show share of landline in calling traffics has been steadily falling whereas the share of mobile is increasing. In 2003 the landline voice traffic with 86% (74,1 billion min.) of the total voice traffic decreased to 10% (19,4 billion min.) in 2012. However mobile usage was 14% of the total voice traffic in 2003 and increased to 90% in 2012.

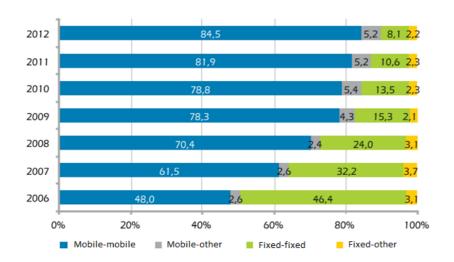
Amount of traffic, billion min. 200 189,2 180 160 149,5 132,2 140 120 103,7 Mobile 90,9 100 86,6 Fixed 80 Total 60 40 20 0 2005 2006 2007 2008 2009 2010 2011 2012 2003 2004

Graphic 1: Total traffic volume of fixed and mobile calls

Decomposition of the total fixed call origination (traffic volume) is also worth being analyzed in this sense. The total share of mobile-mobile and mobile-other reached to 50,6% in 2006 and widening gap rose up to 90% in 2012.

<sup>\*</sup>Data is gathered from 2012 Annual Report of Information and Communication Technologies Authority.

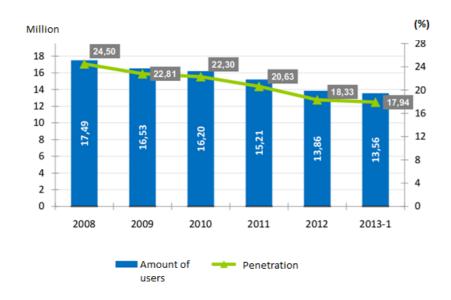
**Graphic 2: Total traffic distribution** 



<sup>\*</sup>Data is gathered from 2012 Annual Report of Information and Communication Technologies Authority.

In terms of number of fixed telephony subscriptions, landline networks have been on steady fall since 2008 and the number of fixed telephony subscriptions in Turkey declined by 22,5% to 13,56 mil. by the first quarter of 2013.

**Graphic 3: Number of fixed telephone subscriptions** 

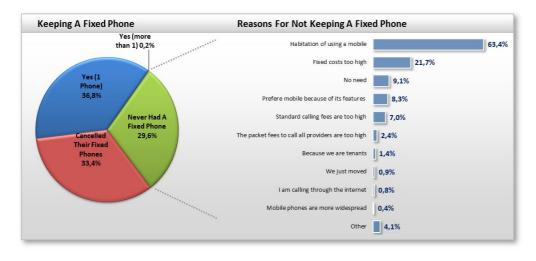


<sup>\*</sup>Data is gathered from 2012 Annual Report of Information and Communication Technologies Authority.

#### Market survey

ICTA has conducted a market survey to understand market trends and user preferences for landline and mobile telephone usages<sup>2</sup>. Survey analyzed telephone and internet usage tendencies as well as how these affect usage of communication tools and the internet through their home and mobile preferences. Market survey further aimed at analyzing the FMS and its possible effects for fixed-mobile and internet access among individual and corporate users. Market survey includes three comprehensive questionnaires designed for households, individuals and corporations both in rural and urban areas across the country with over 3000 respondents for each questionnaire.

In order to investigate user preferences and the reasons behind keeping landline phones, respondents questioned first if they have a fixed phone and for the reasons not to use it. It has been clear that every respondent without a fixed phone has have given up more than one landline (1.2 answers on average) when asked for the reasons why they don't have any fixed line. When examining the reasons for non-landline users, 63.4% of the respondents answered that it is because of their mobile phone habituation, 8.3% answered about mobile phone features, 0.4% said that mobile phone usage is more common. 72.1% of the total answers show reasons of the mobile phone usage being more common. Having a 72.1% of non-landline users stating mobile phone habits for not having a fixed phone shows that the mobile phone is a serious alternative for a landline. The second important reason for not having a landline is stated as the fixed costs being high with 21.7%. Therefore, we can conclude that the landline service (telephone) providers should be very sensitive when it comes to an increase in fixed costs for the households.



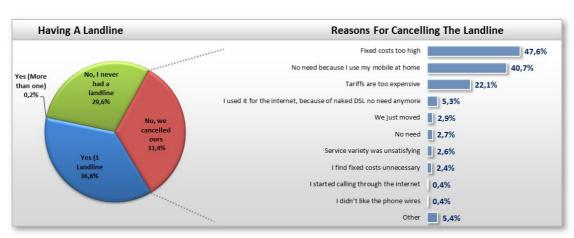
**Graphic 1: Reasons for keeping a fixed telephone** 

Market survey also investigated the reasons behind cancelling the landline subscription. 33% of the population who cancelled their landlines were asked for the reasons. 48% of them pointed to the high fixed costs. When the fixed costs of landlines increase, consumers have an easy alternative of completely cancelling the landline and just using the mobile phones to

-

<sup>&</sup>lt;sup>2</sup> As an acceding country to the EU, Turkey follows European regulatory framework as an anchor by accepting a general authorization regime and conducting market analysis prior to ex-ante regulation.

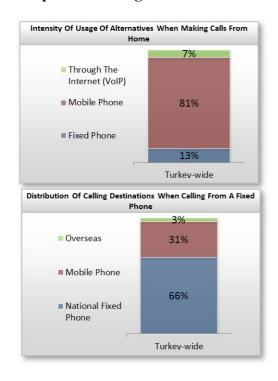
meet their needs for a convenient price. 22% of the respondents who cancelled their landlines stated that the expensive tariffs were the reasons for cancelling. Thus, we can conclude that 70% of the answers showed cost related reasons (high fixed costs, expensive tariffs) for cancelation of the landlines. That shows it would not be easy for the landline providers to increase their fixed rates because consumers have the ability to easily respond with cancelling their landlines. Furthermore almost 41% of consumers reported they have cancelled their landlines due to mobile phone usage at home which in turn bring about the fact that mobile phone is regarded as a serious alternative to the fixed phone.

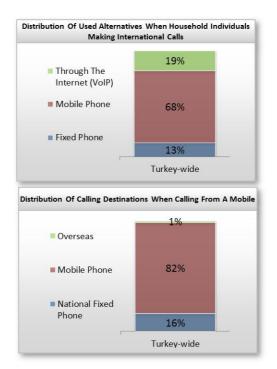


**Graphic 2: Reasons for cancelling the landline** 

Market survey further investigated mobile phone usage at home. It is reported that 81% of calls are from mobile phones and only 13% are from landlines at home. That means the majority of household and individual respondents stated that they make their calls over mobile phone when they are at home.

**Graphic 3: Calling distribution** 





Market survey also sought answers for the use of fixed lines among corporate users and compared the results in terms of calculated price elasticities with households through elasticity tables. Elasticity is calculated as the ratio of percentage of the respondents who reported that they will switch in response to a 10% price increase ( $\Delta Q/\Delta P$ ). Here the 10% price increase is considered a proxy for hypothetical monopolist test mainly referred to a small but significant non-transitory increase in price (SSNIP).

According to market survey's calculations, we saw the corporate elasticity level for calling from fixed lines is higher than it was for households. Calling mobiles, fixed lines and making international calls with a 10% increase in prices will decrease the use of fixed lines by households drastically.

When corporations and households are compared a lesser negative effect was observed on corporations. Specifically making international calls from fixed lines doesn't seem to have much negative effect on corporations. Besides, corporations make only 22% of their international calls from fixed lines. Thus the few international calls made by corporations from fixed lines makes it a high elasticity segment with -1,09. The reaction to a 10% increase in mobile calling costs are quite similar in households and corporations and this reaction can be observed as less compared to an increase in fixed lines. The main reasons for this may be that it is more difficult for either households or corporations to give up using the mobility and technology of smart phones. The only time that corporations show more elasticity for an increase in costs for mobiles compared with fixed lines is when making international calls. When having a look at the ways corporations make their international calls it can seen that 24% is using VoIP, 54% mobiles and 22% is using fixed lines.

Table 1: Use of fixed lines and mobile phones in households and corporations – Elasticity (Summary table)

Elustreity (Summary tusie)		
Use of Fixed Lines and Mobile Phones - Elasticity	Corporate	Household
10% Increase In Costs Calling Mobile from Fixed	-1,56	-4,17
10% Increase In Costs Calling Fixed from Fixed	-1,84	-3,48
10% Increase in Costs Making International Calls from Fixed	-1,09	-3,85
10% Increase in Costs Calling Fixed from Mobile	-1,16	-1,60
10% Increase in Costs Calling Mobile from Mobile	-1,27	-1,23
10% Increase in Costs Making International Calls from Mobile	-1,68	-1,38

Corporate	Household	
Medium	Very High	
Medium	High	
Medium	High	
Medium	Medium	
Medium	Medium	
Medium	Medium	

Market survey compared the cross elasticities for mobile and fixed phone callings as well. 10% increase for the landlines to various lines (mobile, land, international) effects mobile use on the households more than corporations. This case shows corporations do not change their communication habits by the price changes of the communication alternatives. 10% increase for the mobile lines to various lines (mobile, land, international) hardly affects landline use of the households and corporations. Both households and corporations, instead of increasing their landline use, prefer decreasing their mobile use, which causes a decrease for their total communication traffic. In other words, 10% increase for the landlines cause an increase for the mobile use; but markup for mobile lines hardly affects landline use.

Table 2: Landline and mobile line use for the households and corporations - Cross elasticity (Pivot table)

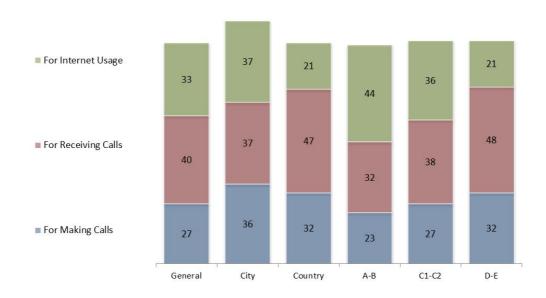
Landline and Mobile Line Use - Cross Elasticity	Corporate	Household	
Mobile Phone Use When the Landline to Mobile Prices Increased 10% (Cross Elasticity)	0,96	2,96	
Mobile Phone Use When the Landline to Landline Prices Increased 10% (Cross Elasticity)	1,02	2,34	
Mobile Phone Use When the Landline to International Lines Prices Increased 10% (Cross Elasticity)	0,42	1,96	
Landline Use When the Landline to Mobile Prices Increased 10% (Cross Elasticity)	0,31	0,20	
Landline Use When the Landline to Landline Prices Increased 10% (Cross Elasticity)	0,11	0,08	
Landline Use When the Landline to International Lines Prices Increased 10% (Cross Elasticity)	0,16	0,07	

Corporate	Household
Medium	High
Medium	High
Low	High
Low	Low
Low	Low
Low	Low

As shown in the graphic below, the reasons for having a landline examined; 33% of the respondents report; they use landline for internet services. Among the respondents 40% said

that they use landline for receiving calls, whereas 27% of them use landline for making calls. Below are the responses of different social segments.

Graphic 4: Reasons for having a landline at home

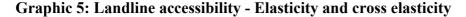


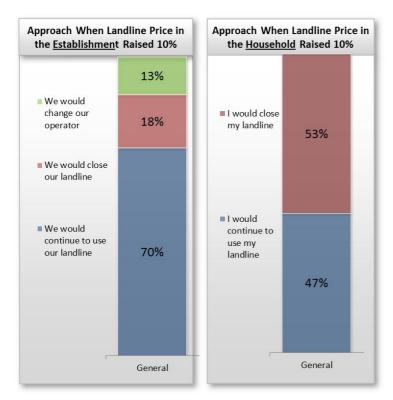
In order to understand user preferences for access to landline phone services, market survey calculated the elasticities as well. Accordingly, 18% of the corporations and %53 of the households choose to cancel their subscriptions, as a result for a 10% markup. 13% of the corporations also state that they would switch to another provider. 10% increase for the landline access largely affects both households and corporations. Another interesting finding at this point, for both households and corporations, 10% increase for the landline access affects the increase of mobile use more than 10% increase for the voice communication.

Table 3: Access to fixed phone - Elasticity and cross elasticity (Pivot table)

Access to fixed phone - Elasticity and Cross Elasticity	Corporate	Household
Elasticity when landline prices increased 10%	-1,79	-5,34
Use of mobile phone when landline prices increased 10% (Cross Elasticity)	1,14	3,74

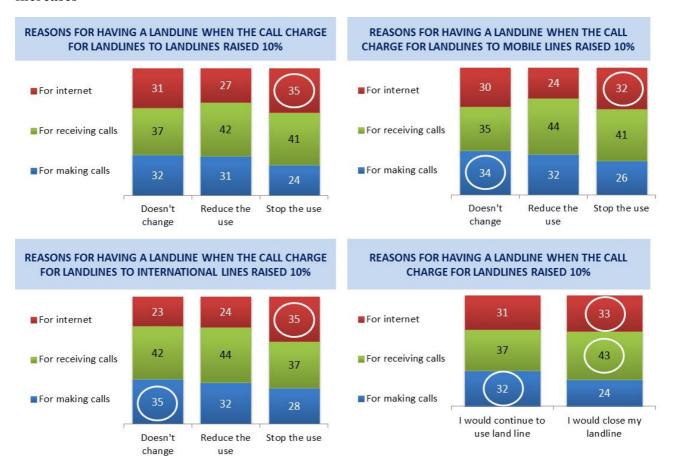
Corporate	Household
Medium	Very High
Medium	High





When respondents with landlines at home asked what would be their response in case of a 10% call charge increase for fixed to fixed, mobile and international lines. And, respondents reported that they would stop making calls, and use landline more for the internet usage reasons. Generally, respondents who use landlines for internet usage and receive calls are more sensitive to price increases.

Graphics 6: Cross analysis of having a landline at home and response to fixed call price increases



# Regulatory implications of FMS in Turkey

Market analysis has a key role over the ex ante regulation in terms of ensuring competition in the markets for electronic communications services and networks. 2007 EU Recommendation identifies retail access to the public telephone network at a fixed location and retail calls markets at a fixed location however foresees ex ante regulation only for the retail fixed access market. Following the 2007 Recommendation regulators in the member states deregulated the market for retail call services provided at a fixed location since this market was removed from the relevant markets list susceptible to ex ante regulation with 2007 Recommendation due to the development of competitive conditions.

The retail access market includes narrowband as well as PSTN services. Since broadband access is not considered as substitute to narrowband access, Commission defined a single relevant market for both residential and non-residential users for retail access to telephony network at a fixed location. However in the 2014 Recommendation and the Commission the retail access market is not included. Explanatory Note document annexed to the 2014 Recommendation gives the reasoning why the fixed access market is no longer considered as a relevant market susceptible to ex ante regulation. The reasoning is established on the

competitive pressures stemming mainly from broadband services and to a lower degree from the fixed to mobile substitution (European Commission, 2014).

While pursuing negotiations with the European Union, Turkey, through its regulations related to electronic communications sector, is closely following European Union's regulatory framework. In this context, in accordance with the Recommendations issued by European Commission in 2003 and 2007, the market analysis processes were carried out by ICTA since 2005 that represents the first round. Following the process of the entry into force of the Electronic Communications Law (ECL) No. 5809 and after the secondary legislation revised, the second and the third rounds of market analysis were completed by the first quarters of 2010 and 2013 respectively. Updated version of secondary legislation for market analysis is the "By-Law on Market Analysis"<sup>3</sup>,.

Following the market survey for market trends and user preferences ICTA has published "Report on Fixed to Mobil Substitution in the Electronic Communication Sector" in late 2013 proposing the reevaluation of retail markets for fixed call services and fixed access markets.

Final Document for Market Analysis regarding Access to Fixed Telephone Network has become effective<sup>4</sup>. The relevant market has been split into two submarkets under the context of market analysis. Submarket for individual (residential) users is no more susceptible to ex ante intervention due to lack of need for regulation. However in the second submarket defined for corporate (non-residential) users Turk Telekom is still designated as the operator with significant market power and imposed on access and non-discrimination obligations at the wholesale level.

It should be noted that wholesale line rental (WLR) obligation is still in force and has been kept on within the context of Market Analysis of Call Origination in Fixed Networks<sup>5</sup>.

Final Document for Market Analysis regarding Calling Services over Fixed Network has become effective<sup>6</sup>. Market analysis concluded that there is no longer need to ex ante regulation, withdrawing all retail level obligations imposed in the earlier market analysis.

In order to create effective competition in the sector and to prevent price-based anticompetitive conducts by ensuring that the relevant tariffs do not lead to margin squeeze, within the context of Market for Call Origination on Fixed Telephony Networks, margin squeeze remedy was imposed on Turk Telekom, fixed incumbent (SMP operator), who still keeps its position of vertically integrated in the market<sup>7</sup>. In the context of Procedures and Principles Regarding Determination and Remedies of Margin Squeeze, which lays down the principles that apply to the said (margin squeeze) remedy, having entered into the force by 01.07.2014<sup>8</sup>. The margin squeeze tests must be performed at least at the end of every quarter

<sup>&</sup>lt;sup>3</sup> By-Law on Market Analysis entered into force after being published on Official Gazette on November 27, 2012 with numbered 28480.

<sup>&</sup>lt;sup>4</sup> Upon approval by the Board Decision No. 2014/DK-SRD/170 and dated 26.03.2014.

<sup>&</sup>lt;sup>5</sup> Upon approval by the Board Decision No. 2014/DK-SRD/172 and dated 26.03.2014.

<sup>&</sup>lt;sup>6</sup> Upon approval by Board Decision No. 2014/DK-SRD/171 and dated 26.03.2014

<sup>&</sup>lt;sup>7</sup> Upon approval by ICTA Board Decision No. 2014/DK-SRD/171 and dated 26.03.2014

<sup>&</sup>lt;sup>8</sup> Upon the approval by ICTA Board Decision No. 2014/DK-SRD/332 and dated 26.06.2014.

unless otherwise determined by the Authority by taking into account the "flagship products" on the basis of the reports that include necessary information (including income, traffic, subscriber number, etc.) to be submitted monthly by Turk Telekom to ICTA as a general and primary rule.

# 4. Comparison of ICTA's Margin Squeeze Remedies with those of Competition Authority

# General outlook: Interaction and power relations between ICTA and CA

Within the meaning of Electronic Communications Law, ICTA has principally been entrusted *ex ante* powers to remedy market failures. However, its power to take the remedies so as to ensure a competitive marketplace has been set open-ended therein, which one could easily figure entailing *ex post* obligations. ICTA has also thus far considered itself powerful enough to pursue investigation with regard to competition breaches and to take the necessary remedies via this perspective. However, with a few exceptions such as the recent margin squeeze measure introduced for the fixed voice prices, ICTA has generally refrained from actively using ex post intervention tools and mechanisms.

On the other hand, CA is entrusted with the general power to investigate all kinds of competition breaches that are of *ex post* nature. Whereas ICTA is responsible for removal of barriers that would prevent entry into the electronic communications markets, monitoring market structure and functioning, determining ex ante market remedies including access prices for related wholesale services to ensure effective competition in the marketplace, CA is in charge of identifying anticompetitive agreements between undertakings, abusive behaviours of dominant undertakings, and controlling mergers and acquisitions which would affect competition. CA, in the course of issuing decisions and performing its duties (e.g., regarding abusive behaviours, concerted actions, mergers/acquisitions) is under legal obligation to primarily take account of ICTA's view and its implementing regulations. <sup>10</sup>

In Turkey, interaction and the cooperation between ICTA and CA could be said to have taken place mostly in an unhealthy manner, far from being a target-based one (e.g., not geared to common and mutual approaches) in the past. Such interaction could be classified in *three consecutive* periods.

The first period started with CA's interventions to the sector as a more experienced authority, having had an oversight of a responsible governing body for anti-competitive behaviours

17

<sup>&</sup>lt;sup>9</sup> The competences and duties of the CA are governed by the Law on Protection of Competition (Competition Law). Competition Law prohibits agreements and concerted practices that restrain competition (Article 4) as well as abuses of dominant position (Article 6), and delegates CA to release of negative clearances for mergers/acquisitions (Article 7). Among these, the latter power of CA regarding mergers/acquisitions is of an ex ante nature exceptionally.

<sup>&</sup>lt;sup>10</sup> See Electronic Communications Law, Date: 10.11.2008, No: 5809, Article 7 (2).

across all markets, either regulated or unregulated. As ICTA was established in 2000 and has had a smooth way of delving into the issues of regulation, CA appeared more experienced and eager to intervene with a dynamic face having newly established staff.<sup>11</sup> In real and historical terms, we could not mention a deep-dive ex ante regulation at that time when the sector was not liberalised (until the end of 2003), and just horizontal relations among the interconnection suppliers (e.g., fixed incumbent and mobile network operators) have been scrutinised and focused on with rate settings and minimal regulation. During this time frame, CA deemed itself powerful enough to intervene when necessary, seeing a great untouched area for itself. The famous *Roaming* decision of CA has been made in this period, resulting with two separate interventions to the same case (each with the same amount of administrative fine).<sup>12</sup> In the same period, CA's forceful opinion regarding Turk Telekom's separation into two legal entities, namely establishment of TTNet nearby Turk Telekom also gave a clear signal about CA's attitude towards the telecom industry and its capability to take an active role during the legal courses.<sup>13</sup>

\_

<sup>&</sup>lt;sup>11</sup> ICTA (formerly, TA) was not formed as a brand new institution such as CA, but built on the Directorate General of Broadcasting Issues under the Ministry of Transportation. For this and other reasons underlying the process of establishment of ICTA at that time, see Ardiyok, S. & Oğuz, F., Competition law and regulation in the Turkish telecommunications industry, Friends or foes?, *Telecommunications Policy*, Vol. 34, No. 4, 2010, pp. 239. The authors' two-period approach also concurs with the first two sequential periods made here in this paper. (Ibid)

<sup>&</sup>lt;sup>12</sup> Roaming dispute arose out of the unmet demand of Is-Tim (using the brand of Aria), who entered into the market in late 2000 and wished to spread its services to all over the country by making roaming agreement(s) with Turkcell and Telsim. Turkcell and Telsim refused to open their networks to Is-Tim, namely did not accept the conditions offered by Is-Tim for roaming agreement. Is-Tim has applied to both CA and TA (ex-ICTA) in reaction to their refusals to grant roaming over their networks. Each Authority has concluded that the so-called refusal constituted breach of law, and punished Turkcell and Telsim for not permitting roaming. Applying an administrative fine that was not faced before, CA reached its finding via application of Essential Facilities Doctrine, and deemed the infrastructures of Turkcell and Telsim as "essential facility" during the phase of entry of GSM operators into the market. According to CA, Turkcell and Telsim, holding a joint dominant position in GSM telecommunications infrastructure market, abused their market power by refusing to make roaming with Is-Tim. On the other hand, TA ordered Turkcell and Telsim to allow Is-Tim to make roaming through their own networks in accordance with Article 10/5 of the Law No. 406 (currently not in force) which brought out an obligation to meet reasonable, economically proportionate and technically feasible roaming requests. The fine decisions of the two Authorities have become the subject-matter of a number of legal cases both before national administration courts and international arbitration court. For the details of this dispute and historical background, see Atiyas, İ. & Doğan, P., (2007), When good intentions are not enough: Sequential entry and competition in the Turkish mobile industry, Telecommunications Policy, Vol. 31, pp. 509-511; Atiyas, İ., (2005), Competition and Regulation in the Turkish Telecommunications Industry, Economic Policy Research Institute, Working Paper 3, pp. 27-30, http://www.tepav.org.tr/tur/index.php?type=books, last visited by 28.05.2015; Ünver, M. B., (2004), Essential Facilities Doctrine Under EC Competition Law and Particular Implications of the Doctrine for Telecommunications Sectors in EU and Turkey, MSc Thesis, Middle East Technical University, pp. 145-155, http://etd.lib.metu.edu.tr/upload/12605496/index.pdf, last visited by 28.05.2015...

<sup>&</sup>lt;sup>13</sup> During the course of privatisation of Turk Telekom, CA rendered a decisive opinion setting out the prescribed conditions to be ensured before privatisation, and enforced the process towards separation of the provision of retail Internet services from Turk Telekom. In the rendered opinion, the Board held that TTNet, who has formerly been managed under Turk Telekom as a unit dedicated to offering Internet services, should be separately organised within a distinct legal entity with the view to eliminating cross-subsidy and making the relevant costs transparent. Upon this decision, in May 2006, Turk Telekom restructured itself by dedicating to wholesale Internet (access) services and by leaving the retail-level Internet services to TTNet, whose shares and management powers have remained under control of itself. Provision of (retail) Internet services was thus transferred to TTNet, who has started its activities as an ISP at the beginning of June 2006. TTNet, for the time being, provides residential (xDSL, FTTX, Wi-Fi) and business (ATM, FR, Metro Ethernet) internet access services to end-users. On the other hand, Turk Telekom, providing access to its DSL network and associated

In the years following 2004 the regulatory measures and interventions became more pervasive with both horizontal and vertical dimensions. In the coming years, alternative operators have become more protected against incumbents with lowered interconnection rates, new authorisation rules, reference access and interconnection offers under detailed rules and legislation. In 2005 market analyses have been launched and culminated with a set of SMP obligations including non-discrimination, transparency, cost-orientation, etc. Since then, these analyses have been revised every three year for the purpose of monitoring each market with new remedies if are found necessary to ensure competition. <sup>14</sup> The result meant a large-scale involvement of ICTA to the market dynamics and developments. Accordingly, and with an increasing pace after enactment of Electronic Communications Law in November 2008, CA refrained from largely intervening to the sector, and preferred to stay in a passive mode.<sup>15</sup> This time-frame and CA's positioning corresponds to the second period, starting in mid 2000s and coming today with some extensions, which could also be seen in an implicit form under the Protocols signed between ICTA and CA afterwards. 16 Yet, the Council of State decisions have cut off this growing process, challenging the passive standpoint of CA, and the cooperative rules designed between ICTA and CA in an indirect manner.

In the third period commenced with the Council of State decisions tracing back to early 2012, CA's position (lack of intervention) following ICTA's approval and regulatory processes has been challenged by the Court. Most prominent aspect of this new process is Council of State's assuming CA a more active role by which the Authority is expected to look into details of each case even after ICTA's intervention. This approach of the Court brought out an implication of a reverse process to the past, namely an implicit call on CA to revitalize its position against the abusive acts of market players similarly with the first period. One could speculate that lying at the centre of this cornerstone development was the fact that ICTA's ex ante ruling and regulation was not deemed sufficient by the Court resulting with an expectation on part of CA to eliminate the whole risks in view of the remaining hazards/anticompetitive effects of abusive conducts.

facilities needed for provision of retail Internet services, is the sole provider of wholesale xDSL services to the ISPs. (See Ünver, M. B., Exploring the Ways to Create a National Broadband Policy: A Critical Discussion on the Main Drawbacks and Possible Measures for Turkey, *Competition Journal*, Vol. 11, No: 2, 2010, pp. 208-209, <a href="http://www.rekabet.gov.tr/File/?path=ROOT%2f1%2fDocuments%2fRekabet%2bDergisi%2fdergi47.pdf">http://www.rekabet.gov.tr/File/?path=ROOT%2f1%2fDocuments%2fRekabet%2bDergisi%2fdergi47.pdf</a>, last visited by 28.05.2015).

<sup>&</sup>lt;sup>14</sup> To these, some other regulatory measures such as introduction of number portability, examining access contracts to make necessary amendments over them, monitoring quality of service parameters, increased number of audits and safeguards to protect consumers could be added within this period.

<sup>&</sup>lt;sup>15</sup> See also Ardiyok & Oğuz, pp. 241

<sup>&</sup>lt;sup>16</sup> Within the context of the Cooperation Protocol dated January 22, 2015 are existing provisions dedicated to mechanisms aiming to increase the coordination and collaboration between the Authorities (ICTA and CA), and specifically the issues of "data conveyance", "exchange of views" and "coordination and cooperation" (See <a href="http://btk.gov.tr/elektronik">http://btk.gov.tr/elektronik</a> haberlesme sektoru/sektorel rekabet/piyasaanalizleri/dosyalar/PROTOKOL.pdf, last visited by 28.05.2015). This Protocol, except with the changes envisaged to extend the existing mechanisms to the postal sector under the context of the new Law No. 6475, does have the same content with the one dated November 2011, the original Protocol.

#### Cases and their evaluation

The interrelation between ICTA and CA has had some tensions in the past. However, these tensions have not resulted with a real gap regarding margin squeeze cases and their treatment. As a matter of fact, CA has intervened into such cases whenever ICTA has had no ex ante intervention but some approval exercises regarding wholesale prices, which are clearly subject to regulatory monitoring from the beginning. While ICTA is in the position to set the access prices, either monthly or one-of fees (e.g.,, after receiving proposals of SMP operators), such a determination is not in place for retail prices. Just until the end of 2009, ICTA has set some price caps for relevant baskets out of specified services, but not looked into the margins between wholesale retail.<sup>17</sup> This situation has seemingly driven CA to become more interventionist and responsive against margin squeeze. For instance, CA has issued two important decisions in November 2008<sup>18</sup> and December 2013<sup>19</sup> regarding alleged margin squeezes for broadband services. While in the first decision an abuse of dominant position has been found for margin squeeze on part of Turk Telekom and its subsidiary TTNet, the second one has revealed a few tariffs under this scope which include IPTV package (Tivibu).<sup>20</sup>

The referred decisions were based on CA's investigations during the periods respectively for November 2006 - March 2008 and December 2008 - February 2013 over the pricing strategies of Turk Telekom and TTNet in the market for wholesale and retail broadband Internet access markets. These operators were deemed by the Competition Board as constituting an *economic unit*, namely a single undertaking in terms of competition law enforcement. Pursuant to the decisions, the economic unit has abused its dominant position by leveraging of its market power in the wholesale broadband Internet access market to the retail broadband Internet access market by means of price squeezing. The pricing behaviours of Turk Telekom and TTNet have been challenged on the basis of a price squeeze test inspired from the decisions of European Commission (and CJ), namely *Telefonica*<sup>21</sup>, *Deutsche Telekom*<sup>22</sup>, and *Telia* 

<sup>&</sup>lt;sup>17</sup> While this situation represents fixed voice market, there has been no such a price cap regime for broadband services. For the beginning, retail broadband tariffs are neither subject to any kind of notification or nor being scrutinized by ICTA for margin squeeze purposes.

<sup>&</sup>lt;sup>18</sup> Competition Board Decision, Date: 19.11.2008, No: 08-65/1055-411.

<sup>&</sup>lt;sup>19</sup> Competition Board Decision, Date: 19.12.2013, No: 13-71/992-423.

<sup>&</sup>lt;sup>20</sup> Whereas the first Board decision has imposed an administrative fine on Turk Telekom and its subsidiary which constitute an economic unity, there was no fine determined by the Competition Board in the second decision. In the first decision, the Board found that the economic unit comprising Turk Telekom and TTNet abused its dominant position in wholesale broadband Internet access market by means of price squeeze in retail broadband Internet access market, and imposed on the so-called economic unit an administrative fine equal to 12,394,781.16 TL (near 7.85 million USD at the prevailing exchange rate) for the infringement in question.

<sup>&</sup>lt;sup>21</sup> Summary of the Commission Decision of 4 July 2007 relating to a proceeding under Article 82 of the EC Treaty (Case COMP/38.784 — *Wanadoo España v Telefónica*), <a href="http://eurlex.europa.eu/LexUriServ/LexUriServ.do?uri=OJ:C:2008:083:0006:0009:EN:PDF">http://eurlex.europa.eu/LexUriServ/LexUriServ.do?uri=OJ:C:2008:083:0006:0009:EN:PDF</a>, last visited by 28.05.2015.

<sup>&</sup>lt;sup>22</sup> Commission Decision of 21 May 2003 relating to a proceeding under Article 82 of the EC Treaty (Case COMP/C-1/37.451, 37.578, 37.579 - *Deutsche Telekom AG*), <a href="http://eur-lex.europa.eu/legal-content/EN/TXT/PDF/?uri=CELEX:32003D0707&from=EN">http://eur-lex.europa.eu/legal-content/EN/TXT/PDF/?uri=CELEX:32003D0707&from=EN</a>, last visited by 28.05.2015.

Sonera<sup>23</sup>. Considering the most prevailing tariffs and packages widely preferred by ISPs and their subscribers and the two/three year distributed transactional costs (on top of the wholesale fees) incurred by TTNet, the Board found that there have occurred negative margins for the periods of investigations, which means no room being left to other ISPs (who are deemed as efficient as the dominant undertaking) to carry out their activities.<sup>24</sup> While such a clear picture was in place in the first margin squeeze decision dated November 2008, in the second (December 2013) decision of the Board just the IPTV (multi-play) packages have been found threatening the margins, yet with no breach of competition, namely no envisaged restrictive effect on competition for the limited time-frame.<sup>25</sup>

While the abovementioned decisions must be noted to demonstrate CA's preparedness to intervene in cases where ex ante regulatory measures fall insufficient and/or absent, the situation is not so different for the fixed voice services. The main difference between them is that the retail broadband services are offered by not Turk Telekom but its subsidiary, whereas retail fixed voice services are provided by Turk Telekom itself.<sup>26</sup> Margin squeeze cases regarding fixed voice services trace back to 2008 when Competition Board has rendered a decision, being passive against such allegations in view of ICTA's ex ante processes. As explained above, saving ICTA's recent margin squeeze remedy, ICTA's ex ante processes have not so far meant deeply challenging the retail prices, which have just been subject to a price cap regime until the end of 2009. Afterwards, pre-notification has become applicable until July 1, 2014<sup>27</sup> and since then this regime has been replaced with a margin squeeze remedy that is run at most every three months on the basis of accumulated data.

Despite the fact that a real margin squeeze test is not used to be done ex ante regulatory processes until July 1, 2014, CA seems to have taken into account the wholesale approval processes and the entire system under which sufficient margins are supposed to exist. However, CA's lack of intervention, more explicitly its decision not to open an investigation following ICTA's monitoring processes made Council of State suspicious about the existing picture, bearing a radical shift from the CA-ICTA relations with a crucial implication for margin squeeze. Even though three landmark cases revealed this shift specifically with Borusan Telekom<sup>28</sup>, Telkoder<sup>29</sup> and Kule AŞ<sup>30</sup> judgments, Telkoder is of utmost importance

-

<sup>&</sup>lt;sup>23</sup> Case C-52/09 Konkurrensverket v TeliaSonera Sverige AB, Judgment of 17 February 2011, <a href="http://eurlex.europa.eu/legal-content/EN/TXT/PDF/?uri=CELEX:62009CJ0052&rid=1">http://eurlex.europa.eu/legal-content/EN/TXT/PDF/?uri=CELEX:62009CJ0052&rid=1</a>, last visited by 28.05.2015.

<sup>&</sup>lt;sup>24</sup> Competition Board Decision, (November 2008), *supra* note 19, pp. 68-75.

<sup>&</sup>lt;sup>25</sup> Competition Board Decision, (December 2013), *supra* note 20, pp. 49-50.

<sup>&</sup>lt;sup>26</sup> See supra note 14.

<sup>&</sup>lt;sup>27</sup> According to pre-notification rule, which has been brought with the By-law on Tariffs (Article 8), Turk Telekom has been obliged to notify ICTA of its retail tariffs, -unless otherwise decided- 15 days before their entry into force.

<sup>&</sup>lt;sup>28</sup> Judgment of the Council of State Chamber No. 13, Date: 13.02.2012, No: 2012/359 K. *Borusan Telekom* decision, the leading case representing the view of Council of State towards interaction of ICTA and CA, was related to allegations regarding Turk Telekom's obstructing activities of long distance telephone operators via some behaviours. Such behaviours are characterised as not applying peak/peak-off prices by itself, awaiting reconciliation decisions to apply reference fees, preventing call origination through exchanges other than those run by No. 7 signals as well as unregulated issues like misinformation subscribers of alternative operators, not making the necessary preparations for the retail fixed voice services to be offered by them. Competition Board's decision dated 03.07.2008 and numbered 08-43/586-219 has been annulled by the Court with the finding that the

for its relation with margin squeeze. Yet to remind here that, all these cases together started another phase within the context of power relations among the parties, which we call the third period. All the findings common to these decisions, were referring to the fact that ICTA's role and interventions do not obviate the possible encroachment of CA, who, in the Court's mind, still has to delve into the case and examine whether dominant player's behaviours have distorted the market. CJ's Deutsche Telekom judgment dated October 14, 2010 has its repercussions within the decision of Council of State.<sup>31</sup> The main elements of *Deutsche* Telekom judgment were lack of immunity of regulated sectors (such as electronic communications) from competition law enforcement and co-existence of both competition law and sector specific rules.

CJ's approach, which seems to have been adopted by Council of State, has also become apparent in Council of State's *Telkoder* decision dated 08.05.2012 and numbered 2012/960 K., which is directly relating to margin squeeze pertinent to fixed voice services. Telkoder, one of the leading cases of the so-called third period, very well represents the view of Council of State towards interaction of ICTA and CA. In this case, Council of State continued its approach described above, relying on the same prescription followed by itself. The Court, stating "taking into consideration the fact that the tariffs in question have been prepared by Turk Telekom, the probability that the tariffs that are subject-matter of the dispute could cause margin squeeze would have been envisaged by Turk Telekom, and the said tariffs may result with margin squeeze through the price discounts made by himself towards retail tariffs in view of price cap practice", concluded that "undertakings acting in accordance with the decisions made by regulatory authorities could not be immunised from the competition law rules". 32 Based on this viewpoint, the Court deemed Competition Board always powerful enough to diagnose and penalise anti-competitive behaviours even in the cases where the

approach of the Board not to open an investigation and/or a preliminary investigation because of ex ante regulatory decisions is groundless and devoid of real justification.

<sup>&</sup>lt;sup>29</sup> Judgment of the Council of State Chamber No. 13, Date: 08.05.2012, No: 2012/960 K.

<sup>&</sup>lt;sup>30</sup> In *Kule AŞ* case, the dispute arised because of the exclusivity provision witin the base station set-up agreements prepared by Kule AŞ (Kule Hizmet ve İşletmecilik AŞ), a subsidiary of Turkcell the leading mobile company in Turkey, via which Kule AS is alleged to potentially disclose competing firms from the market. The application made within the context of both Article 4 (regarding anticompetitive agreements between undertakings) and 6 (regarding abusive behaviours of dominant undertakings) was not translated into an investigation by CA, who relied on ICTA's facility sharing regulations and related measures in its decision (Competition Board Decision, Date: 22/04/2009, No: 09-17/381-90). Council of State, depending on the same reasons referred to in its Borusan Telekom and Telkoder decisions, annulled Board decision, finding the justifications underlying the Board decision insufficient.

<sup>&</sup>lt;sup>31</sup> See Judgment of the Court of Justice of 14 October 2010 in case C-280/08 Deutsche Telekom v Commission. Deutsche Telekom (DT) judgment concerns abuse by DT in the form of a margin squeeze generated by a disproportion between wholesale charges and retail charges for access to the local network. Both wholesale and retail prices were subject to sector-specific regulation, but DT have been using a commercial discretion which would allow it to restructure its tariffs further so as to reduce or indeed to put an end to the margin squeeze. Considering this fact, Commission concluded that Deutsche Telekom has abused its dominant position in the market for the provision of local access to fixed telecommunications networks via margin squeeze between the wholesale local access (LLU) prices and retail access prices so as to result with unfair selling prices within the meaning Article 102(a) of the Treaty. The Court of Justice upheld the Commission's decision, affirming that such conducts might be subject both to the competition rules and to national or European sector-specific measures (co-existence principle).

<sup>&</sup>lt;sup>32</sup> *Telkoder* judgment, pp. 14.

regulatory decisions have been complied with. The Court found the decision issued by the Competition Board inadequately justified for the immunity approach followed, and annulled the decision made by them.<sup>33</sup>

The *Telkoder* decision, not only for its frontier role regarding ex ante-ex post relations but also by challenging the ICTA's attitude relating to margin squeeze in an indirect way, brings out important inputs for the Turkish telecommunications market. This landmark decision not simply strengthens the principles pursued in *Borusan Telekom* decision but also reminds the state actors, namely CA and ICTA, their roles and responsibilities in a sensitive field such as margin squeeze. While the first addressee of the decision is CA, who is supposed to revise its decision regarding whether to open an investigation or not, ICTA could also be deemed another addressee who should reconsider its role and the given tasks by the Law. This is so because ICTA has the duty to ensure competition in the market at the first place before and independent of a possible intervention by CA.<sup>34</sup>

Coming today, what kind of steps each Authority has taken after these developments could be questioned. This is quite important because a Cooperation Protocol has been prepared and signed between the Parties in November 2011 (revised in January 2015), revealing important tools for collaboration and exchange of views, which seems to be overlooked or disregarded by the Council of State. According to the Protocol, it became possible for each party to hand over a file brought before him to the other party (Authority) after examining the details of the application and/or complaint. Furthermore, after an investigation has been commenced, it also has become possible for CA not to proceed with the file when ICTA has made a step to resolve the case, for instance through a market analysis or reconciliation decision. In such instances, CA is supposed to cease delving into the investigation until a regulatory decision is made by ICTA that has potential effect to eliminate the relevant market failure(s).

However, the abovementioned provisions of the Protocol has become under question and an indirect threat with the Council of State's approach first established in February 2012 with *Borusan Telekom* and pursued later on. Indeed, the so-called approach makes CA's not to intervene to a case that has passed through ICTA's approval/monitoring mechanisms (via a regulatory decision, market analysis, etc.) quite difficult even near impossible. On the other hand, Protocol has been envisaged not only for exchange of views among ICTA and CA but also for exchange of files to some extent. However, Council of State intervened to this memorandum of understanding through superseding ICTA's regulatory interventions and making them under scrutiny by CA. Given this fact, a bigger role is given to CA with regard to saying the last word as to elimination of market failures and their harmful effects. An indirect message could definitely be taken by ICTA with respect to how to treat to SMP operators and their possible obligations under ex ante mechanisms. Indeed, ICTA has the role to open the relevant markets to new/licensed operators who are in the position to compete with the incumbent. Should competition deficiencies/failures be diagnosed and deterred ineffectively a large room seems to be left to CA's realm of intervention. In cases where such

\_

<sup>&</sup>lt;sup>33</sup> Telkoder judgment, pp. 14.

<sup>&</sup>lt;sup>34</sup> See Electronic Communications Law, Date: 10.11.2008, No: 5809, Articles 4 (a), 6 (a, b), 7.

problems have been effectively eliminated, CA still becomes capable, even responsible to deal with the relevant file yet with a minor/small-scale intervention.

To reiterate, CA could no longer close the files brought before himself under the light of ICTA's ex ante measures and regulatory processes according to the precedents of Council of State. CA, having to open investigate in such cases, accordingly shifted its approach and delved into alleged margin squeeze practices. To illustrate, after *Telkoder* judgment, Competition Board has opened an investigation concerning the said allegations, and this time dealt with the case in detail. In this regard, he evaluated the arguments of each side, made the necessary evaluations and calculated the margins according to the available costs. Considering the most risky scenario in view of call origination/termination prices, port fees, leased line rentals, the Board concluded that there existed no margin squeeze at the time of application.<sup>35</sup> In reaching such a conclusion, the Board has not referred to ICTA's regulatory position but relied on evaluations of retail/wholesale tariffs and margin calculations with no finding of breach at the end.

As seen above, margin squeeze is a very central case in the picture of tripartite roles. This is an area which is sensitive enough for the Council of State to insist on CA's task of ex post review even after ICTA's ex ante measures. Council of State's approach of assuming a superior role for CA as portrayed above has very direct and particularised repercussions on this issue. This so because non-price competition breaches could be speculated to be eliminated via mandatory access rules and related remedies (i.e. transparency, non-discrimination, monitoring of KPAs-SLAs, etc.) to a great extent, whereas price-related anti-competitive behaviours could pass regulatory monitoring and ex ante exercises, and could be able to impair the competitive marketplace such in margin squeeze.

While a rather long timeframe passes for an abusive behaviour to be found and penalised on part of CA, such abuses should be pre-empted in advance if they are persistent and harmful enough. In other words, in markets where possibilities of disclosure effect highly exist and threat the market competition, ICTA, without awaiting CA's intervention, should focus on such behavioural problems with a monitoring exercise that systematically analyse possible anticompetitive acts of SMP operators. Squeezed margins between retail and wholesale tariffs clearly exemplify this, rendering an ex ante role to ICTA, who is supposed to do more than price cap regulation and/or wholesale access setting. While the past experiences of ICTA reveal contradiction with this, the recent step of ICTA to start a remedy for SMP operator in fixed call origination market (Turk Telekom) not to squeeze margins could be deemed as a positive development.

ICTA's applying this remedy, even not as a response to Council of State's decisions, but rather as a part of market analysis exercise (following FMS study) would be deemed a responsive and target-tailored step. However a question arises as to how the parties should act in case some clashes between CA and ICTA happen regarding margin squeeze. This question becomes more compelling as following ICTA's regulations and interventions, competition

\_

<sup>&</sup>lt;sup>35</sup> Competition Board Decision, Date: 22.01.2014, No: 14-04/81-34.

breaches could still exist within the Court's approach, and such breaches could result with anti-competitive harms and effects. Ordering CA to examine such acts and challenge if necessary, the Court almost made it impossible to find a new way through the existing Protocol, which is normally signed for this purpose.

The last intervention of ICTA to Turk Telekom's tariffs in January 2015 demonstrates the possibility of clashes between two Authorities, which could figure in future cases. Indeed, according to Court's approach, which could be said to have been reflected in CA's recent decisions, <sup>36</sup> a dual system appears to be in place for margin squeeze cases. When European approach is acceptable for the supra-national character of EU competition rules, <sup>37</sup> a quasi-appeal mechanism to be established before CA (over ICTA's interventions) could hardly be effective and healthy. Instead, a mutual understanding and cooperative approach between each Authority, under which not only exchange of views but also exchange of files are easily happening, is an ideal way to achieve social welfare with no forum shopping and/or possible administrative clashes.

#### 5. Conclusion

Turkish telecommunications industry and the related regulatory developments have rather a distinct history, when compared with the regulatory progresses in EU. Although the roadmaps followed in each side have common aspects like three-criteria test, which evaluates whether there is a need to ex ante regulation, FMS-based regulatory trend in Turkey seems to mark a difference in the overall picture. EU has implicitly left out such a discussion as the European countries have deregulated their fixed voice markets on the basis of their market reviews, namely in view of the observed competition inside such markets (i.e. with the growing number of competitors). While the early growth of LLU and WLR type whole services forged competitive markets regardless of FMS, which hardly figured in the agenda of EU, Turkey's path has revealed a rather distinct model of deregulation under FMS conception.

While whether regulatory implications of FMS in Turkey has been thoroughly evaluated by the regulator itself could be questioned, nation-wide consumer survey done in 2013 shows that FMS is a reality for Turkish market. ICTA's response to this including introduction of a margin squeeze remedy, seems to draw a compromising solution via which deregulation has been injected into the industry. While the remedy being run on ex post basis points to a rather light-touch approach, practical results give some hints about post-deregulation environment. In fact, Turk Telekom's breaching margins in two specific tariffs demonstrates somehow shaking results which may challenge the ground of FMS.

On the one hand, Turk Telekom's breach shows the real possibility of margin squeeze for the predictable future, proving the appropriateness of the remedy itself. Turk Telekom's increasing its two retail prices daring the negative consequences, on the other hand, opens up

<sup>&</sup>lt;sup>36</sup> See supra note 35.

<sup>&</sup>lt;sup>37</sup> See Geradin, D. (2004), Limiting the Scope of Article 82 of the EC Treaty: What can the EU Learn from the US Supreme Court's Judgement in Trinko in the Wake of Microsoft, IMS and Deutsche Telekom, *Common Market Law Review*, No: 41, p. 1591-1592.

the question whether deregulating the industry is an immature step for Turkish fixed voice market.

While discussion could be enriched via different perspectives, there are some fundamentals that need to be taken into consideration. First, the fact that two of the ten flagship products tested have failed to pass ICTA's margin squeeze analysis reveals that Turk Telekom's strategy is in favour of a retail price increases rather than wholesale price changes. Second, Competition Authority's several inquiries for the same purpose (by making margin squeeze test) showed that there is no margin squeeze on the basis of EEO. Given these facts, ICTA's (adjusted EEO-based) margin squeeze tests could be deemed target-based solutions, although being a late intervention. On the other hand, as this intervention serves as a safeguard against the possible ex post anti-competitive effects, ICTA's measure seems to replace CA's role to a great extent through deregulating the market.

Under this light, ICTA's deregulatory formula seems to both affirm the FMS reality and preserve the prospect of the market competition. However, ICTA's approach could also be deemed a rather pragmatic one, considering the presence of deregulation with an accompanying margin squeeze remedy. An alternative way would have been leaving out this market entirely to CA, who is in charge of diagnosing and penalising abusive behaviours. Yet, this, more appropriately, could be done after a stage when the market has proven to be a more mature and innovative one, having a working competition under which very diverse tariffs compete with each other.

Fixed voice products become far more complementary to broadband in the current telecommunications sphere, and this trend is more apparent in Turkey, where FMS drives the market. Then, replicability concerns are even more relevant in broadband markets, although operators have a greater income via more competitive tariffs in field of retail broadband. Considering the facts that 25% of mobile operators' income come from broadband and FMS would also be relevant for broadband market in the coming future, a more responsive and timely regulatory reaction would be pursued for broadband markets. That is to say, margin squeeze would be rather introduced before FMS discussions start regarding broadband services. In such a case, discussions regarding how to (de)regulate fixed broadband would not include any dilemma which we now face in the area of fixed voice services. This is also compelling for the reason that CA, whilst not finding a breach of margin squeeze for fixed voice, has found such an infringement in broadband market. However, ICTA has not introduced margin squeeze remedy for broadband markets as opposed to fixed voice.

To sum up, timing and formulation of deregulation is of importance in growing markets like Turkey where competitive forces are immature. This is so because ICTA's safeguarding role in these markets supersedes the need to deregulate such markets if the indicators show some discrepancies. While Turkey's solution to respond margin squeeze whilst deregulating the market reveals some conflicting results, introduction of this remedy is a promising measure even with the deregulation decision. In view of Turkey's market structure, timely focusing on replicability concerns with an emphasis on bundle services (and thus for broadband services) would be quite important as in the coming future FMS could also be attached to this area,

which requires a more responsive and intervening role so as to enhance competitive models for the time being. Last but not the least, co-operation between ICTA and CA has an increasing stake in margin squeeze cases, which seem to keep its importance in Turkey for the predictable future. Should such cooperation include an effective macro-level policy making able to prevent different formulas/interventions for possible breaches, deregulation processes would be managed more thoroughly.

# 6. References

- Ardiyok, S. and Oguz, F. (2010) Competition law and regulation in the Turkish telecommunications industry, Friends or foes?, *Telecommunications Policy*, Vol. 34, No. 4, pp. 233-243.
- ATİYAS, İ. (2005), Competition and Regulation in the Turkish Telecommunications Industry, Economic Policy Research Institute, Working Paper 3, pp. 27-30, http://www.tepav.org.tr/tur/index.php?type=books.
- Atiyas, I. & Dogan, P. (2007), When good intentions are not enough: Sequential entry and competition in the Turkish mobile industry, Telecommunications Policy, Vol. 31, pp. 509-511.
- Banerjee, A. and Ros, A.J. (2004) 'Patterns in global fixed and mobile telecommunications development: a cluster analysis', *Telecommunications Policy*, Vol. 28, No. 2, pp.107–132.
- Barth, A. and Heimeshoff, U. (2014a) 'What is the magnitude of fixed-mobile call substitution? Empirical evidence from 16 European countries', Telecommunications Policy, Vol. 38, pp. 771-782.
- BEREC Report on Impact of Fixed-Mobile Substitution in Market Definition, 8 December 2011, BoR (11) 54, <a href="http://berec.europa.eu/doc/berec/bor/bor11">http://berec.europa.eu/doc/berec/bor/bor11</a> 54 FMS.pdf.
- Biancini, S. (2011) 'Behind the scenes of the telecommunications miracle: an empirical analysis of the Indian market', *Telecommunications Policy*, Vol. 35, No. 3, pp.238–249.
- Briglauer, W., Götz, G. and Schwarz, A. (2010), 'Can a margin squeeze indicate the need for deregulation? The case of fixed network voice telephony markets', *Telecommunications Policy*, Vol.34, pp.551-561.
- Briglauer, W., Schwarz, A. and Zulehner, C. (2011), 'Is fixed-mobile substitution strong enough to de-regulate fixed voice telephony? Evidence from the Austrian markets', *Journal of Regulatory Economics*, Vol.39, pp.50-67.
- Chu, W., Wu, F., Kao, K. And Yen, D.C. (2009) 'Diffusion of mobile telephony: an empirical study in Taiwan', *Telecommunications Policy*, Vol. 33, No. 9, pp.506–520.
- European Commission. (2014). "Commission Recommendation on relevant product and service markets within the electronic communications sector susceptible to ex ante regulation in accordance with Directive 2002/21/EC". European Commission website. http://ec.europa.eu/digital-agenda/en/news/commission-recommendation-relevant-product-and-service-markets-within-electronic-communications
- Garbacz, C. and Thompson, H.G. (2007) 'Demand for telecommunication services in developing countries', *Telecommunications Policy*, Vol. 31, No. 5, pp.276–289.

- Geradin, D. (2004). "Limiting the Scope of Article 82 of the EC Treaty: What can the EU Learn from the US Supreme Court's Judgement in Trinko in the Wake of Microsoft, IMS and Deutsche Telekom", Common Market Law Review, No: 41, pp. 1519-1593.
- Göktaylar, Y. and Ünver, M. B. (2011). Fixed-to-mobile substitution in Turkey: a policy perspective, *International Journal of Management and Network Economics*, Vol. 2, No. 2, pp. 177-196.
- Grajek, M. and Kretschmer, T. (2009) 'Usage and diffusion of cellular telephony, 1984–2004', *International Journal of Industrial Organization*, Vol. 27, No. 2, pp.238–249.
- ICTA (2015). "Electronic Communications Market In Turkey, Market Data <a href="http://eng.ICTA.gov.tr/kutuphane">http://eng.ICTA.gov.tr/kutuphane</a> ve veribankasi/pazar verileri/pazar verileri.php
- Karacuka, M., Haucap, J. and Heimeshoff, U. (2011). 'Competition in Turkish mobile telecommunications markets: price elasticities and network substitution', *Telecommunications Policy*, Vol. 35, No. 2, pp.202–210.
- Oğuz, F. (2015). 'The politics of margin squeeze in telecommunications: diverging paths of the US and EU',info, Vol. 17, Iss 2 pp. 1-15 <a href="http://dx.doi.org/10.1108/info-11-2014-0046">http://dx.doi.org/10.1108/info-11-2014-0046</a>.
- Ünver, M. B. (2010). Exploring the Ways to Create a National Broadband Policy: A Critical Discussion on the Main Drawbacks and Possible Measures for Turkey, Competition Journal, Vol. 11, No. 2, pp. 183-253, <a href="http://www.rekabet.gov.tr/File/?path=ROOT%2f1%2fDocuments%2fRekabet%2bDergisi%2fdergi47.pdf">http://www.rekabet.gov.tr/File/?path=ROOT%2f1%2fDocuments%2fRekabet%2bDergisi%2fdergi47.pdf</a>.
- Ünver, M. B. (2004). Essential Facilities Doctrine Under EC Competition Law and Particular Implications of the Doctrine for Telecommunications Sectors in EU and Turkey (Master Thesis), Ankara, <a href="http://etd.lib.metu.edu.tr/upload/12605496/index.pdf">http://etd.lib.metu.edu.tr/upload/12605496/index.pdf</a>.
- Vagliasindi, M., Güney, İ. and Taubman, C. (2006) 'Fixed and mobile competition in transition economies', *Telecommunications Policy*, Vol. 30, Nos. 8–9, pp.349–367.
- Zimmerman, P.R. (2007) 'Recent development in US wireline telecommunications', *Telecommunications Policy*, Vol. 31, Nos. 6–7, pp.419–437.