

Recording and evaluation of issues encountered in the use of public health services in Greece

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ABSTRACT

Background: The Greek health care system is financed by the state budget, social insurance contributions and private payments. The economic adjustment program that is currently being implemented considers interventions in the health sector of core importance.

Objective: The aim of the present study was to record the experiences of the Greek patient population, identifying the issues encountered by patients using public health services and assessing whether these have worsened compared to the previous year.

Materials and Methods: 403 patients answered by a telephone interview in 34 questions about the useless of public health system. Statistical significance (p value) was set at 0.05 and data analysis was performed using the SPSS statistical package (version 13.0).

Results: 75% of patients referred that they used public health services and 25% used the private sector. The most serious were the delays in scheduling an appointment with a contracted physician (73%) and high phone call costs (61%) when contacting to schedule an appointment. This delay was associated with fewer doctors than patients' needs (53%), long waiting times (52%), and increased effort to access the doctor's waiting room as early as possible to be the first in line (39%). Even though drugs have become cheaper due to significant price reductions, interestingly, two out of three patients stated that this year they paid more money for their medication, attributing this to the increase in co-payments (41%), more expensive drugs (37%) and more expensive laboratory tests (32%). 91% of patients do not interfere with the therapeutic regimen proposed by the doctor.

Conclusions: Greek patients can really make a difference in the quality of care they receive if they get the empowerment they need despite the economy crisis.

Key-words: Economic crisis, health system reform, policy response, private sector, public health system

INTRODUCTION

Patients are at the center of the triangle representing the constitutional elements of a health care system: State - Health care providers - Pharmaceutical companies. Their role is not defined and yet constantly evolving into a more active one. Their contribution and perspective has not been clearly specified. Recording and evaluating their experiences, problems and attitudes towards the Greek health care system, is a promising start. This becomes even more interesting in the rapidly changing, cost-constrained health care environment.

Provision of public health services in Greece follows a mix of the Bismarck and Beveridge health care models (Reid, 2009). Inpatient services are provided mainly through the network of public hospitals and rural health centers of the National Health System (NHS), while ambulatory services are provided through the network of medical centers, contracted physicians and diagnostic centers of social security funds (Economou, 2010), which have been recently integrated in one single fund with regards to the provision of health services, i.e. the National Organization of Health Service Provision (EOPYY). It is well known that the Greek health care system never really satisfied its customers, the patients. Even though patient satisfaction has been shown to be positively related to health care expenditure, this doesn't seem to apply for Greek patients. Greece spends 10% of its Gross Domestic Product (GDP) on health care, exceeding the European average, yet Greek patients are the least satisfied among Europeans (Mossialos, 1997; Carone et al, 2012).

The Greek health care system is financed by the state budget (through direct and indirect tax revenues), social insurance contributions, and private payments (Economou, 2012; McKee et al, 2012). The financial viability and sustainability of the health care system depends to a great extent on the wellbeing of the Greek State which has, however, been significantly challenged during last three years, ever since the eruption of the fiscal crisis and the implementation of severe austerity measures foreseen by the economic adjustment program. At the same time, during the period of economic crisis there has been an increase in mental disorders, substance abuse, and infectious disease morbidity, which combined with the rise in unemployment and poverty increase the health care needs of the population and the demand for public health services (Karamanoli, 2011; Kentikelenis et al, 2012; Karamanoli, 2012).

The economic adjustment program that is currently being implemented considers interventions in the health sector of core importance, and includes a number of measures which aim to contain costs, increase transparency and enhance efficiency and

quality of care in the Greek health care system in the long run. Specifically, according to the targets set by the program, public health care expenditure will have to decrease to 6% of GDP and public pharmaceutical expenditure to 1% of GDP, close to the European average (Kanavos et al, 2011; FIRF, 2011). It should be noted, that long before the economic crisis, a number of health reforms had been implemented attempting to improve the structure and increase the efficiency of the health care system, yet with little success, with health care expenditure continuing to rise, quality of health care delivery declining and sickness funds experiencing budget deficits (Mladovsky et al, 2012; Thomson et al, 2010; Tountas et al, 2002).

How do patients react to this rapidly changing environment, during a period of economic crisis? It is our opinion that over these years public views and attitudes have been seriously underestimated and have not been accounted for in the policy formation and law implementation in Greece. Health care policy is changing across Europe with patients being at the center of care and shared decision making gaining ground in clinical practice (Eurobarometer, 2012; Thomson et al, 2009). Patients' societies are increasing in number and power in an effort to ensure access to better care and information for their members. Policy makers aiming at improving the performance of health care systems should base their decisions on scientific evidence and patients can contribute to that (Rechel, 2009).

Scientific evidence on the quality of health care delivery and patient satisfaction in the Greek health system is limited. In an effort to fill in the data gap and assist health care policy decision makers, the objective of the present study was to record the experiences of the Greek patient population, identifying the issues encountered by patients using public health services and assessing whether these have worsened compared to the previous year. We followed patients through all the stages of disease management and health service provision recording their perceptions and behavior with regards to the level of information provided by consulting physician, their involvement in treatment/medication decisions and treatment cost. It should be noted that the study was conducted during the period of the economic crisis, when Greece was already in the fifth year of recession and a series of harsh austerity measures had already been imposed leading to significant socioeconomic instability and increasing public discontent. Therefore, the findings of the study should be interpreted in the light of the economic crisis and the way that this may have affected patients' perceptions, expectations and attitudes towards the quality of health care provision (Health Service Executive, 2012; WHO, 2012).



MATERIALS AND METHODS

Fieldwork was performed from September 5th to September 20th 2012, by IPSOS GREECE and data were collected using face to face and telephone 20 minute interviews, conducted by trained interviewers. All participants were asked to answer a structured questionnaire of 34 questions, (some of which included sub-questions), categorized in 5 sections, i.e. demographics (4 questions), attitude to treatment (7 questions), perception of health care services and costs (13 questions), compliance (2 questions) and perception of drugs (8 questions). There were multiple choice, Likert scale and open ended questions.

Before answering the questionnaire patients signed a consent form and had no prior information on the content of the questionnaire. Interviewers did not interfere with or lead the answers of respondents in any way. The questionnaires which were clear and well understood were answered anonymously.

The sample consisted of 403 patients aged 25-70 years old, both men and women. 80% (323 patients) originated from Athens- Attica whereas the remaining 20% (80 patients) from other urban areas such as Thessaloniki, Patra and Heraklion. This lower achieved percentage of other urban areas' participants resulted from the reluctance of these patients to other urban participate in the study. 100 of patients were dealing with a temporary health issue, 207 with a chronic disease (e.g. hypertension, hyperlipidemia, diabetes, obstructive pulmonary disease, asthma, osteoporosis, e.t.c.) or had undergone surgery requiring a maximum inpatient stay of three days and 96 were dealing with a rare or life threatening disease (e.g. multiple Sclerosis, other autoimmune disease, orphan disease, cystic fibrosis, cancer, HIV, chronic kidney disease, etc) or had undergone surgery requiring a minimum inpatient stay of three days. Inclusion criteria were a) The use of the health care system services in the form of ESY (i.e. public hospitals, rural health centers) or in the form of social insurance funds, i.e. EOPYY (i.e. primary health care centers, contracted private doctors, diagnostic centers and a few hospitals) by themselves or their children and b) Age >25 years old. Socioeconomic and educational factors were not considered in defining participation eligibility. Five members of the Congress Organizing Committee and the Patients' Society were interviewed as well, in terms of in depth understanding and interpreting the research findings.

The primary objective of the study was to record patients' problems with regards to the NHS following patients through all the stages of health service provision, starting from the moment the health prob-

lem appears:

1. Access to public health services, separately for EOPYY and ESY,
2. Medical consultation, separately for EOPYY and ESY and
3. Access to medication.

Patients' were also asked to report whether the obstacles experienced using the public health services have become worse compared to last year, their degree of satisfaction and their expectations for the future. The impact of economic crisis was also assessed. In order to understand patients' attitudes towards these issues, their perception regarding disease management, source of information, involvement in choice of therapy and treatment costs were also recorded. An additional analysis assessed how patients' attitudes affected reporting problems and dealing with them effectively.

The sample size of 403 patients was determined by targeting a margin of error <4.9%. Statistical significance (p value) was set at 0.05 and data analysis was performed using the SPSS statistical package (version 13.0).

RESULTS

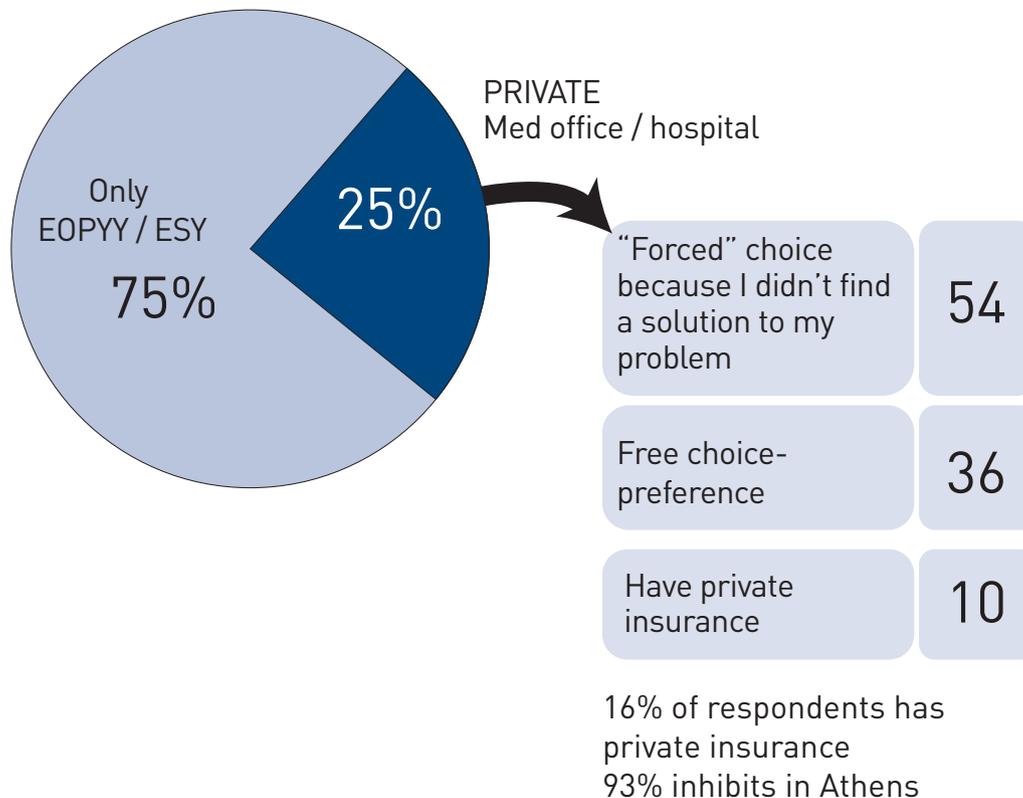
Data from 403 patients were analyzed. The results of this research showed that 75% of patients who participated in this study, referred that they used public health services (EOPYY and ESY) and 25% used the private sector (private non-contracted physicians and hospitals) (Figure 1). 36% of those using the private sector, reported that their choice was due to preference, 10% had private insurance, and 54% were "forced" to use the private services as a second choice, because the public sector could not provide a solution to their health problem.

ISSUES ENCOUNTERED DURING USE OF HEALTH SERVICES

The most serious problems reported by patients during the three stages of public health service provision (booking of medical appointment, medical consultation, access to medication) were the delays in scheduling an appointment with a contracted physician (stated by 73% of patients) and high phone call costs (61% of patients) when contacting EOPYY to schedule an appointment.

Pharmacists' strikes limited access to medication for the majority of patients (54%). Insufficient number of doctors on duty (53%) and long waiting times (52%) were the two frequently reported obstacles encountered by patients when visiting public hospitals and rural health centers of ESY. Moreover, the vast majority of respondents (74%- 86%) stated that the issues encountered during use of public health service have become worse compared to last

Figure 1. Use of public and private health services



year. Problems regarding all three stages of public health service provision, both for EOPYY and ESY, were recorded using multiple choice questions and are presented in the following sections:

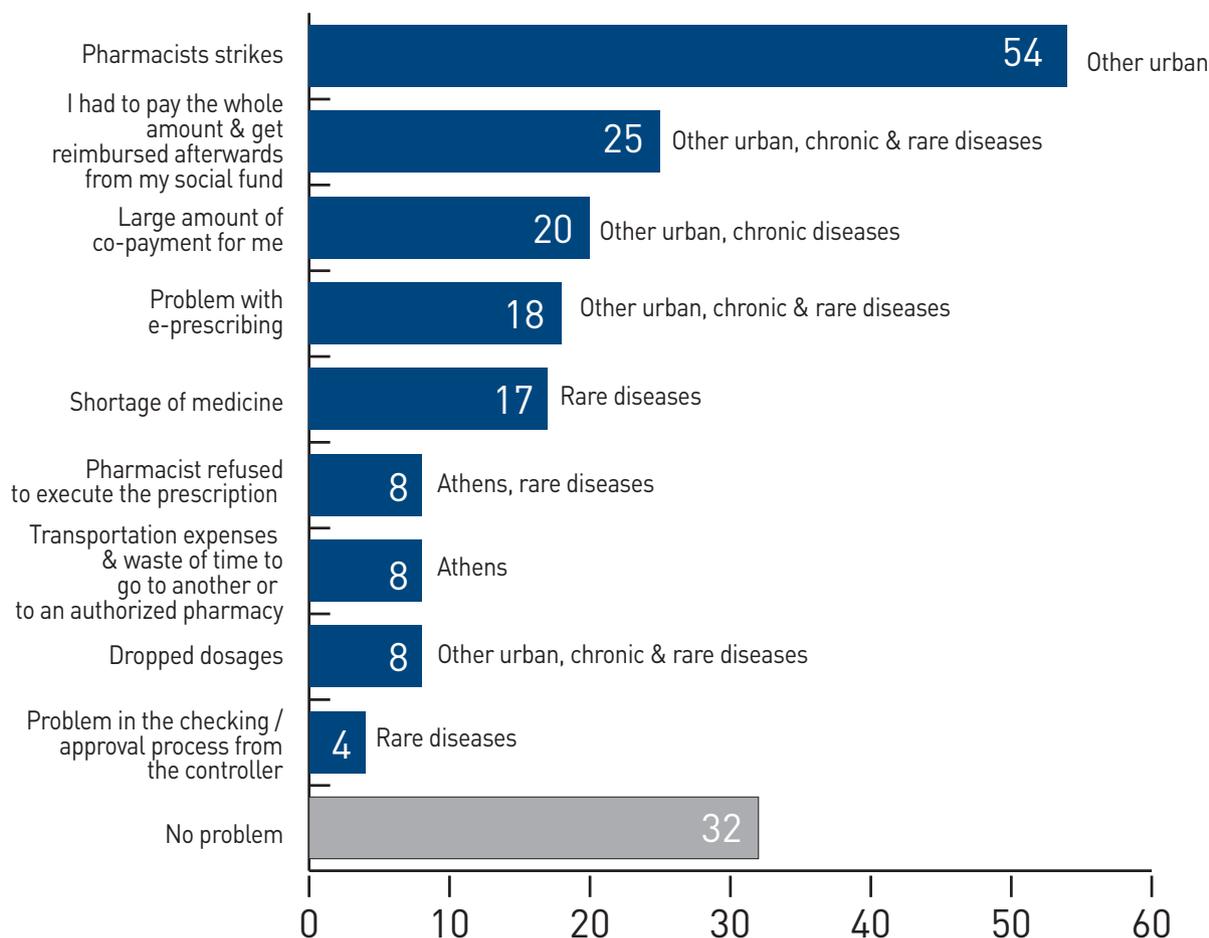
Stage1- Booking a medical appointment

With regards to health services provided by EOPYY, 73% of patients reported delays in scheduling a medical appointment. This was mentioned with statistically significant difference by the subgroups of patients aging 55-70 years and those with chronic diseases. Other issues reported by patients included appointment scheduling phone call costs (61%), missed appointments due to strikes (48%), long waiting times outside medical offices (46%) and difficulty in setting an appointment with the preferred doctor (45%). 80% of respondents estimated that all of the above mentioned problems had gotten worse this year compared to the previous year. Circumvention of the

appointments’ order was also mentioned as an issue (39%), This was mentioned with statistically significant difference by the subgroups of patients in other urban areas. It is noteworthy that only 18% of respondents stated that they didn’t have any problem using EOPYY services.

With regards to health services provided by ESY, setting an appointment or visiting a doctor at a public hospital or a rural health center, was associated with the following issues: fewer doctors than patients’ needs (53%), long waiting times (52%), and increased effort to access the doctor’s waiting room as early as possible to be the first in line (39%). The last two issues were recorded with statistical significance in the subgroup of patients with chronic diseases. Missed appointments due to strikes (37%), not setting an appointment with the preferred doctor (35%) and circumvention of the appointments’ order (29%) were also mentioned. Interestingly one

Figure 2. Issues encountered by patients in accessing medication



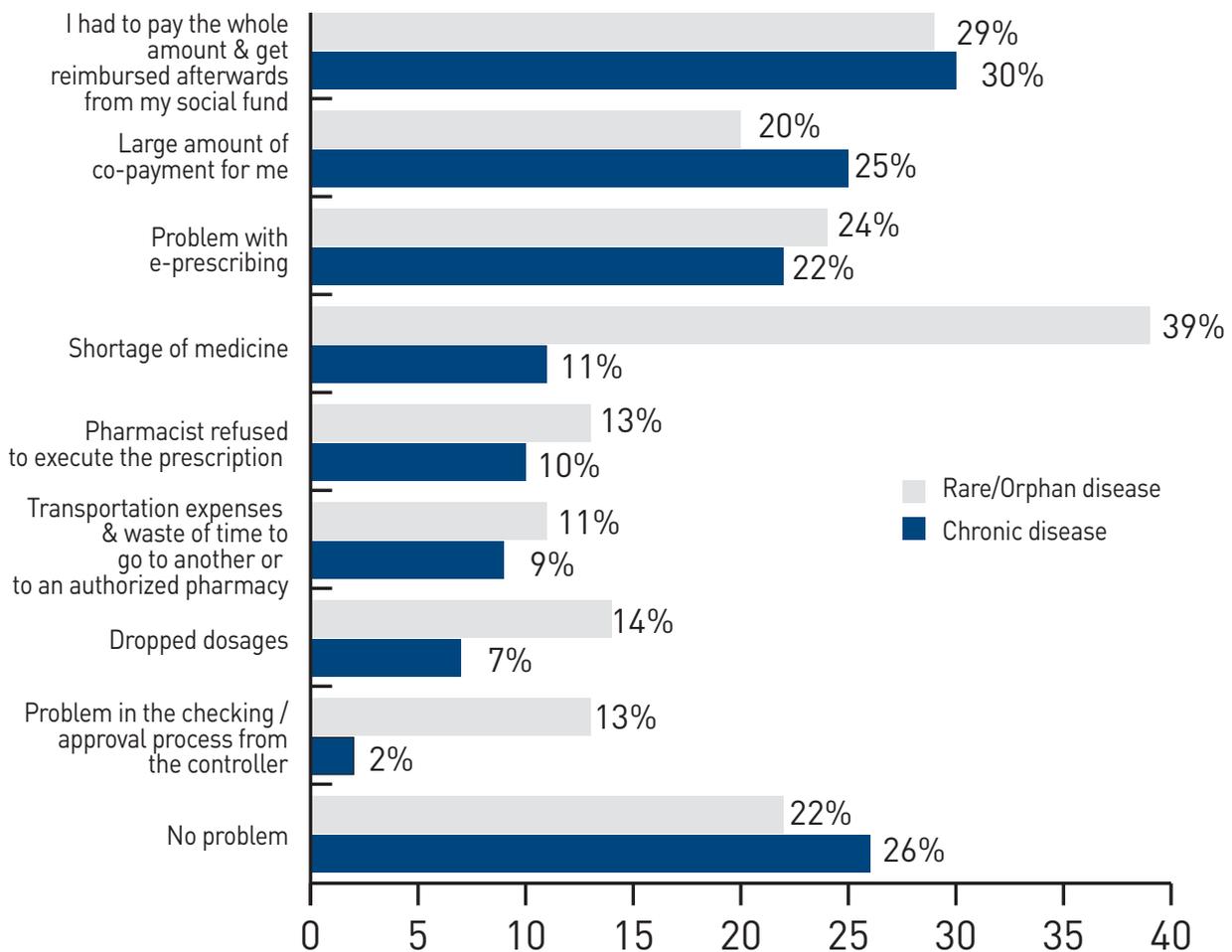
out of three patients (34%), mainly patients with rare/life-threatening diseases stated that they didn't come across any problem when scheduling an appointment with ESY facilities.

Stage 2- Medical consultation

Patients' experiences regarding the issues encountered during medical consultation display similarities between EOPYY and ESY. When they were asked to identify issues encountered during consultation, 53% of patients using EOPYY and 61% of those using ESY stated that they didn't face any problem, suggesting that patients' issues are not so much associated with the physician-patient relationship but with the rest of the services and administrative procedures involved in public health service provision.

Thus, 44% of those using EOPYY and 48% of those using ESY were satisfied with the way they were examined and were mainly patients living in Athens who were aged 40 years or more, and were suffering from acute, temporary health problems. On the other hand, 33% of patients using either EOPYY or ESY were not satisfied with medical consultation services, with those expressing lower satisfaction levels being patients with chronic diseases or living in other urban areas. The latter reported that their main problems were related to gaps in doctor-patient communication ("I didn't receive the required attention", "I wasn't asked enough questions", "The doctor didn't answer my questions", "The doctor didn't explain in simple words the situation") which lead to emotional distress.

Figure 3. Access to medication, based on disease type



Stage 3- Access to medication

As a result of the continuous pharmacists' strikes taking place during the period the study was conducted, 54% of respondents reported strikes as the main obstacle limiting their access to medication (Figure 2). Nevertheless one out of three respondents stated that they didn't face any problem. Minor issues, yet important to the subgroup of patients suffering from rare disease, were: the burden of paying the whole amount of drug cost in advance and getting reimbursed afterwards, the large amount of co-payment, problems with the e-prescribing system, drug shortages, missed dosages.

Trying to assess the impact of the above mentioned problems that appeared for the first time dur-

ing the period of economic crisis we performed a subgroup analysis based on the disease type as shown in Figure 3.

Furthermore the study recorded the patients' expectations and perceptions regarding the future of health service provision, their views on the impact of the economic crisis, and their attitudes towards health care provision.

FUTURE EXPECTATIONS

In particular, patients appeared pessimistic when asked whether they believed that the level of public health services, will improve remain the same or get worse over the next year. 70% and 71% of patients reported that EOPPY and ESY respectively will get



Figure 4. Sources of medical information based on disease type

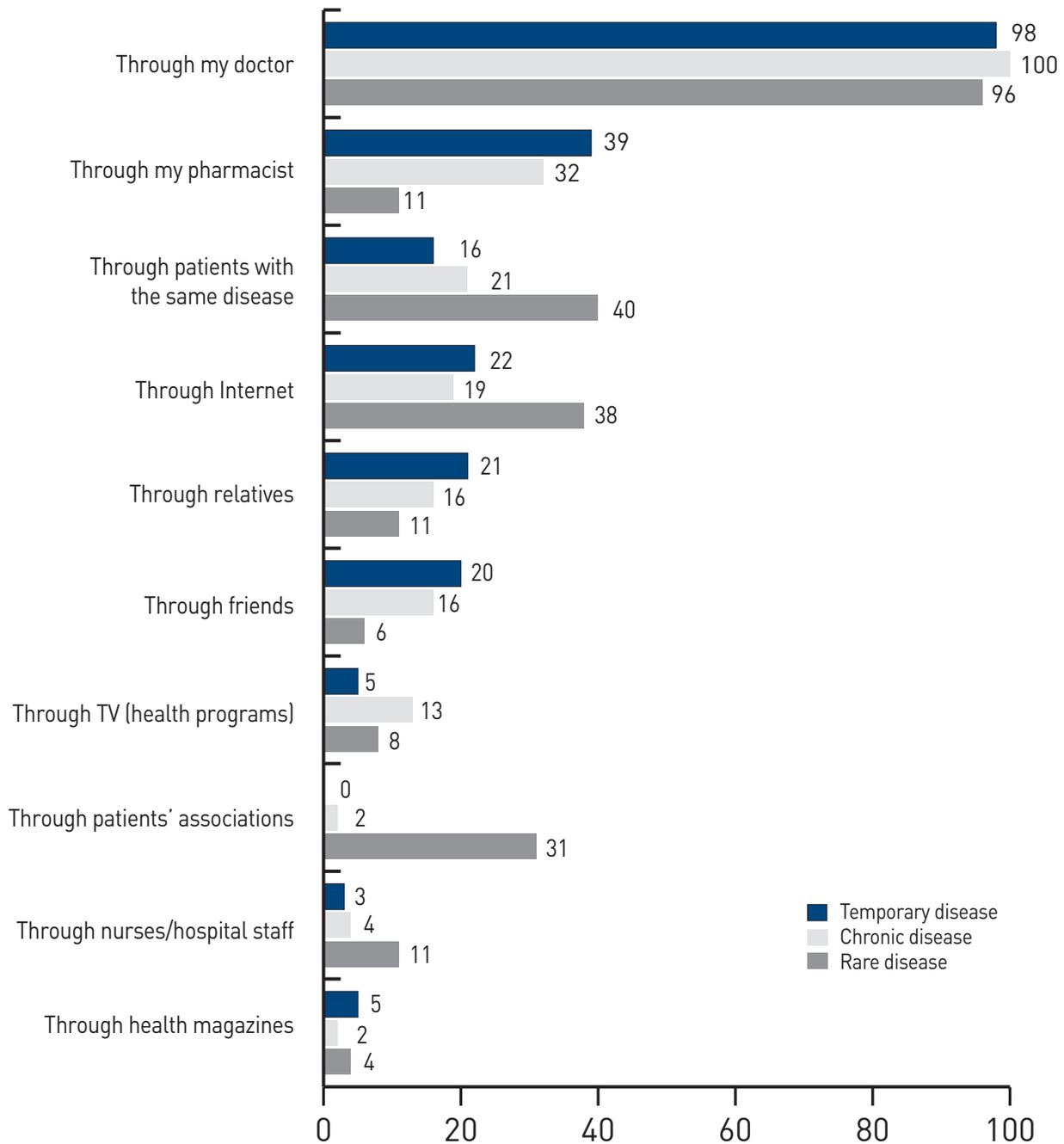
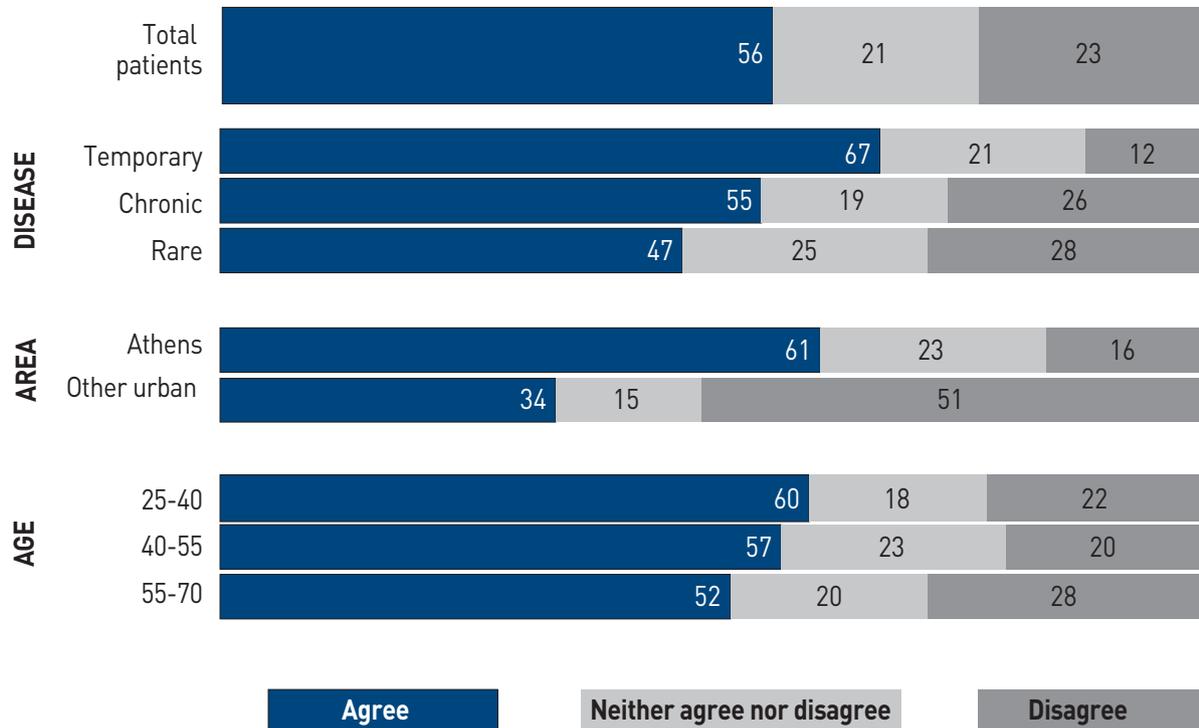


Figure 5. Patients attitudes towards health care provision based on age, place of residence and type of disease



worse over the next year, with patients from other urban areas expressing the most pessimistic views.

IMPACT OF ECONOMIC CRISIS

Even though drugs have become cheaper due to significant price reductions, interestingly, two out of three patients stated that this year they paid more money for their medication, attributing this to the increase in co-payments (41%), more expensive drugs (37%) and more expensive laboratory tests (32%).

Despite the impact that the austerity measures have had on the family budget, patients reported only small cuts in health spending, which were mainly related to preventive diagnostic testing. Patients admitted that they preferred to cut on other family expenses, rather than health related ones.

PATIENTS' ATTITUDES

When patients were asked about their sources of medical information, the vast majority (98%) named the doctor, while other frequently reported sources included the pharmacist (29%), other patients with the same disease (24%), the internet (24%), rela-

tives (16%), friends (15%), TV health programs (10%), and patients' associations (9%). Using the type of disease for subgroup analyses, the finding was that the more serious the disease the more diverse the sources of information (Figure 4).

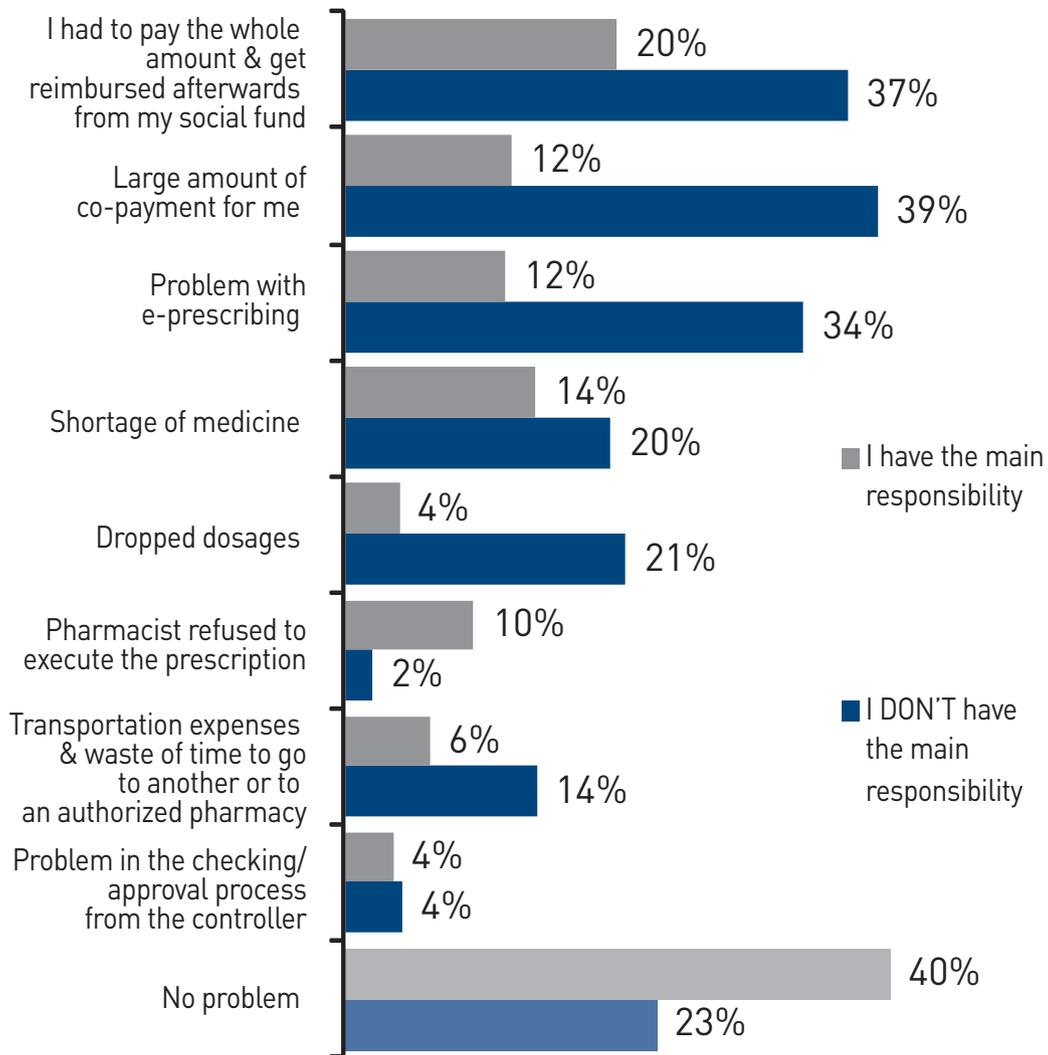
Patients'/disease informative campaigns have limited impact as only 27% of respondents stated that they get informed by them and as a result proceed to preventive laboratory exams or advise others to do so. Furthermore 50% of patients stated that they are aware of these campaigns but they don't take further action and 23% of them reported they do not recall any informative campaign.

91% of patients do not interfere with the therapeutic regimen proposed by the doctor. The remaining 9% of patients interfere to address possible side effects of medication seeking for solutions that best fit their life style (timing of doses and administration route) even if this means having to pay more. In the same context, 95% of patients answered that they do not intend to interfere with the proposed therapeutic regimen in the future.

Only four out of ten respondents are aware of



Figure 6. Cross type analysis: access to medication based on patients' responsibility for their health care



their patient rights, mainly patients with rare diseases and those aged 40-55 years, while only one out of six respondents knows where to get information about the corresponding legal framework. 72% of patients stated that they are fully compliant with their doctor's instructions and attributed this to the personal contact with the doctor and the detailed guidance they receive (95%), as well as to the presence of only limited side effects from medication (93%).

Although utilization of generic medication is quite high in other European countries, their penetration in Greece has remained considerably low until recent-

ly. However, the economic adjustment program set a number of targets regarding the increase of generic utilization (e.g. at least 50 percent of the volume of medicines used by public hospitals to be composed of generics, compulsory e-prescription of less expensive generics when available) in Greece, aiming to achieve significant cost-savings in the health care system. Therefore the new era on generic drug utilization raised the need to assess patients' attitudes towards this drug category. Approximately 60% of respondents reported minimal and/or lack of awareness regarding generic medication whilst they expressed confusion and a need for more informa-

tion on the topic.

Yet, when asked to answer a number of Likert scale “agree” or “disagree” type of questions regarding generics, 59% of respondents agreed that “not all generics are of the same quality, it depends of the manufacturer”, 47% agreed that “generics are not of the same quality and safety compared with the branded drugs”, 41% agreed that “generics have the same substance as the branded but they are cheaper”. At the same time, 45% agreed that “generics contribute to a more sustainable health care system”.

When patients were asked about their attitude towards the prescription of generics, seven out of ten said that they would not ask their doctor to prescribe such a drug to them. In addition, although they appeared to be willing to accept a generic medication for themselves, in case this was prescribed by their doctor, 32% wouldn't accept it for their children but instead would ask for a branded one.

Moreover, in order to reveal how patients' attitude towards their disease subsequently affects the ways they report health care issues and deal with them, the following question was asked: “How much do you agree or disagree (using a Likert scale) with the phrase: when I get sick, I (myself) have the main responsibility to get well, by selecting the appropriate doctor or institution, by cooperation, compliance with treatment and instructions as well as by getting informed”. 56% of patients stated that they agree, 21% neither agree nor disagree and 23% disagree. Subgroup analysis based on age, place of residence and type of disease was also conducted and is presented in Figure 5 below.

According to the results of the subgroup analysis it was shown that patients suffering from acute, temporary diseases expressed a more proactive behavior and felt keen to take responsibility on getting better, compared to patients with chronic or rare diseases. Place of residence was also shown to impact results, with patients living in Athens taking a greater responsibility for their health care compared to patients living in other urban areas.

Furthermore, based on the answer given to the previous question the study population was divided into two groups (“agree”/“disagree”) and a cross type analysis was performed in an effort to assess potential differences in the way each group reports the issues related to the usage of Healthcare system. Impressively, in the following example of this cross type analysis regarding issues related with access to medication (Figure 6) it was shown that 40% of patients who take responsibility for their health care (“agree” group) did not report any problem. The same group encountered significantly few-

er problems compared to the group of patients who do not take responsibility for their health care (“disagree” group).

DISCUSSION

Based on the findings of the study it was shown that Greek patients are currently experiencing various problems in accessing public health services, medication, and information. By assessing the issues patients are dealing with during the three stages of health service provision, i.e. at booking their appointment, meeting their doctor and getting their medication, we concluded that patients' problems are mainly stemming from the administrative procedures and other services, rather than from the consultation with their physician. Indeed 53% of the patients using EOPYY services and 61% of those using ESY services stated that they didn't come across any problems during their medical consultation. This is impressive especially if we take into consideration the difficult circumstances under which Greek doctors have to practice medicine nowadays in terms of facilities' support, system's inefficiencies and continuous administrative changes, financial constraints and professional perspectives. All the other mentioned problems related to communication issues and the whole patient-physician relationship, are also common in other health care systems (Catalyst Health Care Research, 2012; Lesser et al, 2010; Earnest et al, 2010).

Serious access problems were recorded during the appointment scheduling procedure. Delays in booking an appointment, high scheduling phone call costs, long waiting time, difficulties in setting an appointment with the preferred doctor, circumvention of the appointments' order, and medical staff shortages, are the main issues encountered by patients. The fact that 61% of patients reported that scheduling phone call costs are the second more serious problem they experience shows their frustration. Not only do they have to wait for a long time to meet with their preferred doctor, face delays on appointment schedule, or miss it due to strikes, but they also have to pay in order to book the appointment. It is worth mentioning that until last year patients didn't have to pay out-of pocket to schedule an appointment with a contracted doctor, therefore patients feel that the state is now asking them to pay money out-of pocket for public health care services. For all the above mentioned problems 83% of patients participating in the study reported that the quality of public health service provision has become worse compared to last year. In addition, the study showed that one out of eight patients had to resort to the private health sector in order to deal

with their problem, after failing to do so using the public health services. This is a very disappointing finding with serious equity implications and what is more important this is actually a denial of access to public healthcare services for these patients.

Whereas the vast majority of studies give correlations between no-show rates and patient characteristics another research interview patients to identify reasons why patients miss appointments (Lacy et al, 2004). They identify three major reasons for no-shows—discomfort experienced during the appointment, patient perception that the health care system disrespects their time and beliefs, and patient misconceptions about the consequence of missed appointments (Robinson et al, 2003; Gupta et al, 2008).

Moreover, drawing on issues related to accessing medication, and taking into consideration that during the study period there were continuous pharmacists' strikes, it comes to no surprise that the majority of patients attributed most of their problems to strikes. Other commonly reported problems in accessing medication were medication shortages. The problems in medication supply were related to a great extent to the implementation of a series of administrative changes and cost-containment measures in the pharmaceutical sector in the context of the economic crisis, resulting in uncertainty and instability in the market. This has a significant impact on patients' perceptions, because although they have always been encountering issues using the public healthcare system, this is the first time they come across problems regarding access to medication as a straight forward implication of economic crisis.

Focusing on patients with rare/orphan diseases, they seem to encounter more problems in accessing their medication, especially due to medication shortages as indicated by the subgroup analyses. Although these problems affect only a small proportion of the whole sample, they are of major significance for this sensitive part of the population. Nevertheless representatives of Patients' Societies reported that patients with rare/orphan diseases are more organized and used to encountering difficulties in accessing care and even though they are frequently facing serious problems, they seem to express lower discontent compared to other patients. This might explain why one out of five patients with rare diseases stated that they didn't have any problem in accessing medication and why one out of three patients, stated that they didn't come across any problem in booking an appointment with ESY facilities. Rare diseases are now on the political agenda, there are active and well-organized patient-parent advocacy groups, pharmaceutical companies including small biotech enterprises committed to

the development of orphan drugs have emerged, and public funding is becoming available for basic research as well as clinical trials on rare diseases. However, there are also some remaining challenges. It is important to also embrace the development of treatments for neglected diseases in developing countries. International networks and partnerships such as those described herein will be particularly valuable for such conditions (Haffner et al, 2002).

With regards to patients expectations the vast majority of patients are pessimistic about the future of the Greek health care system. This suggests that patients don't really have faith in the effectiveness of the healthcare reform that is being implemented in the context of the economic adjustment program. On the contrary, measures are considered isolated and not part of a bigger, robust business plan for the health care sector.

Penetration of generic medication in the Greek market is another example of how patients actually perceive financial austerity measures due to lack of appropriate information. Generics are considered as lower cost but also lower quality and lower safety medicine by patients, who would not ask their physician to prescribe them such a drug (Baghda-di-Sabeti et al, 2010). However, patients reported that if the doctor prescribed to them a generic they would be willing to accept it for themselves, but not for their child. These contradictions are typical implications of the way the cost-containment measures are being implemented and of the lack of proper information. Drug purchases over the internet from foreign countries is not a new term (Carone et al, 2012). Although studies have shown that generic drugs in Canada or western Europe were generally more expensive than the same products in the US market, without even taking shipping cost into consideration, temporary regulatory adjustment process to allow larger scale drug importation from countries with more established drug quality management systems (primarily western European countries, Canada, Japan and Australia) can provide relief to the current crisis of massive drug shortages (FDA, 2011). In Europe, the majority of drugs are authorized through the European Medicines Agency (EMA), a scientific agency that is roughly parallel to the US FDA (Johnson, 2011; Gu et al, 2011).

Furthermore, despite the impact of the economic crisis on the family budget patients seem to be willing to cut down on other expenses but not on the health care ones. Nevertheless, they tend to cut down on preventive medicine expenses, something that will definitely lead to more serious health care issues in the future (Souliotis et al, 2009; Sissouras, 2012). In a recent study, the researchers point to signs of a dramatic decline in the health of the population

and a deterioration of services at hospitals under financial pressure (Stuckler et al, 2009). Many Greeks have lost access to healthcare coverage through work and social security plans, and rising poverty levels mean growing numbers who would previously have used the private sector are now flocking to state hospitals. Hospital budgets dropped by 40% between 2007 and 2009 and there are reports of understaffing, shortages of medical supplies and patients paying bribes to medical staff to jump queues.

Additionally, indicative of the serious financial problems faced by patients due to the economic crisis is that two out of three stated that they have paid more money for their medication this year compared to last year, even though medicines are actually cheaper. Patients believe that medicines are more expensive because their income is less compared to last year.

Another significant finding of this study is that Greek patients have a serious problem in accessing information regarding their health problems. The physician is reported as their main source of information, while the vast majority of patients don't know about their rights or where to seek information about them. Additionally, patients do not interfere with their therapeutic regimen, nor do they wish to do so in the future. These results are picturing a physician centered health care, with patients adopting a passive, depended role, unwilling to take responsibility of their health care.

Finally, the study attempted to evaluate patients' attitudes towards their health problems. This analysis which was based on the question: "How much do you agree or disagree (using a Likert scale) with the phrase: "when I get sick, I (myself) have the main responsibility to get well, by selecting the appropriate doctor or institution, cooperation, compliance with treatment and instructions as well as getting informed", showed that 56% of patients take the main responsibility to get well. These results were subsequently used to run a cross type analysis aiming to assess the relationship between the attitude of patients towards their health care and the way patients evaluated their access to public health services. Thus, it was shown that patients that took responsibility of their health care reported fewer problems in accessing health services, were more willing to get involved in the planning of their therapeutic regimen and were more informed, receiving information from various sources. On the contrary, patients that did not take responsibility of their health care adopted a more passive role and reported more problems in accessing health services. This can conclude that patients need empowerment.

CONCLUSIONS

The escalating increase in the shortage of drugs has compromised patient quality of care and imposed a tremendous burden on our health care system. In response to the crisis, healthcare and government organizations have taken numerous initiatives, aiming to find rapid solutions. Financial crisis and austerity measures have significantly worsened patients' existing problems regarding access to healthcare services in Greece while at the same time patients are lacking access to appropriate information about their disease, their medication and their legal rights, often adopting a passive role, not taking responsibility of their own health care. Adding to that, the significant reduction of family income has led to a lower frequency of preventive medical care, resulting in increased morbidity and disease severity upon diagnosis. Nevertheless, it is our opinion that even in such hard times, Greek patients can really make a difference in the quality of care they receive if they get the empowerment they need.

Key elements to a successful program for managing drug shortages include a good understanding of the causes for the shortages, a clear channel for international communication and collaboration, and plans with all parties involved, and proven strategies for involving the entire health care system

Overall, the picture of health in Greece is concerning. In an effort to finance debts, ordinary people are paying the ultimate price: losing access to care and preventive services. Greater attention to health and healthcare access is needed to ensure that the Greek crisis does not undermine the ultimate source of the country's wealth - its people.

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