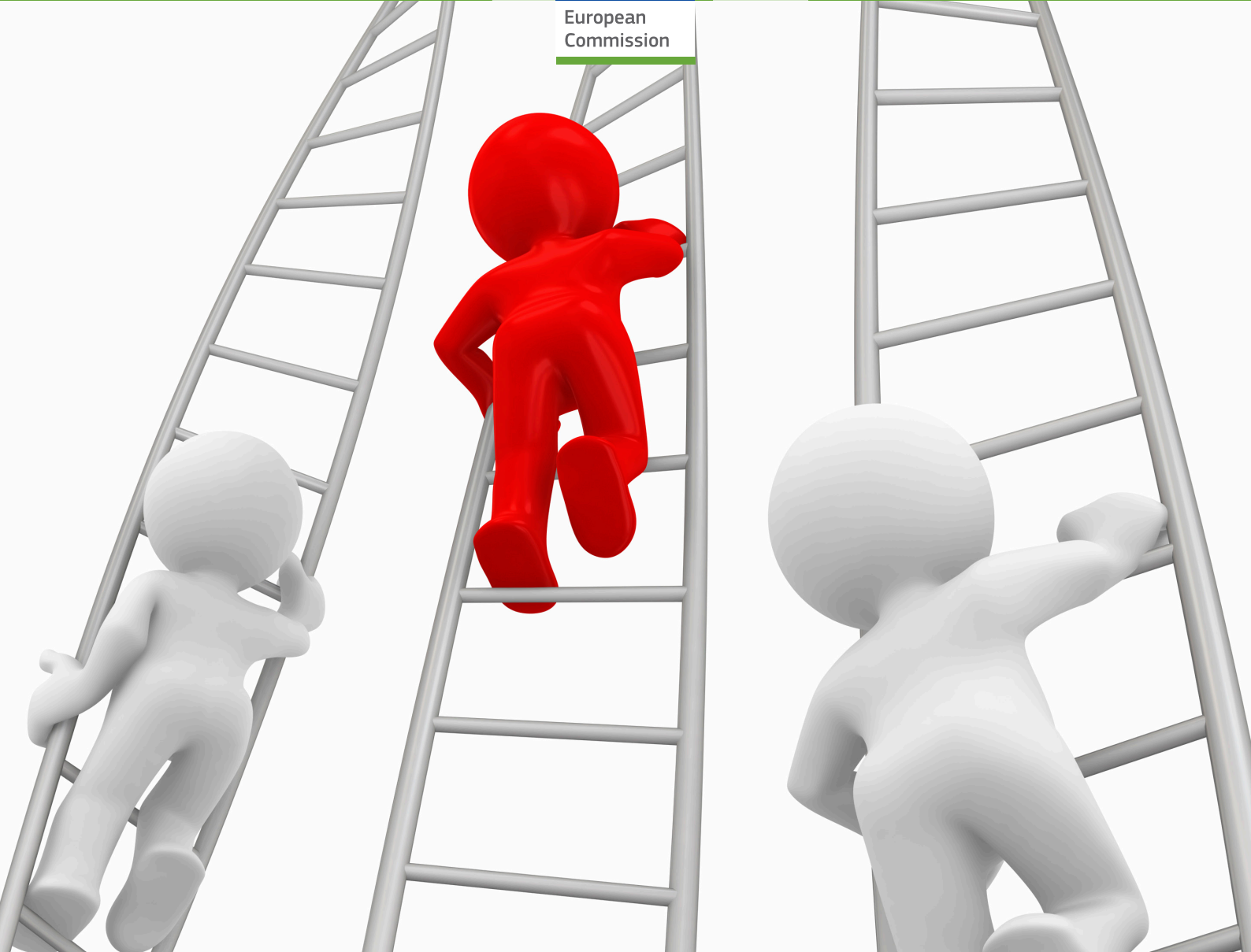




European  
Commission



Report of the  
**EXPERT PANEL ON EFFECTIVE WAYS OF  
INVESTING IN HEALTH (EXPH)**

on

**Competition among health care providers**  
Investigating policy options in the European Union





EXPERT PANEL ON EFFECTIVE WAYS OF INVESTING IN HEALTH  
(EXPH)

Competition among health care providers

-

Investigating policy options in the European Union

The EXPH adopted this opinion at the 10<sup>th</sup> plenary meeting of 7 May 2015  
after public consultation

### **About the Expert Panel on effective ways of investing in Health (EXPH)**

Sound and timely scientific advice is an essential requirement for the Commission to pursue modern, responsive and sustainable health systems. To this end, the Commission has set up a multidisciplinary and independent Expert Panel which provides advice on effective ways of investing in health ([Commission Decision 2012/C 198/06](#)).

The core element of the Expert Panel's mission is to provide the Commission with sound and independent advice in the form of opinions in response to questions (mandates) submitted by the Commission on matters related to health care modernisation, responsiveness, and sustainability. The advice does not bind the Commission.

The areas of competence of the Expert Panel include, and are not limited to, primary care, hospital care, pharmaceuticals, research and development, prevention and promotion, links with the social protection sector, cross-border issues, system financing, information systems and patient registers, health inequalities, etc.

### **Expert Panel members**

Pedro Barros, Margaret Barry, Helmut Brand, Werner Brouwer, Jan De Maeseneer (Chair), Bengt Jönsson (Vice-Chair), Fernando Lamata, Lasse Lehtonen, Dorjan Marušič, Martin McKee, Walter Ricciardi, Sarah Thomson

### **Contact**

European Commission  
DG Health & Food Safety  
Directorate D: Health Products and Systems  
Unit D3 – eHealth and Health Technology Assessment  
Office: B232 B-1049 Brussels

[SANTE-EXPERT-PANEL@ec.europa.eu](mailto:SANTE-EXPERT-PANEL@ec.europa.eu)

The opinions of the Expert Panel present the views of the independent scientists who are members of the Expert Panel. They do not necessarily reflect the views of the European Commission nor its services. The opinions are published by the European Union in their original language only.

## **ACKNOWLEDGMENTS**

Members of the Working Group are acknowledged for their valuable contribution to this opinion.

The members of the Working Group are:

### **Expert Panel members**

Professor Pedro Barros	Rapporteur
Professor Werner Brouwer	Chair
Professor Jan De Maeseneer	
Professor Bengt Jönsson	
Dr Fernando Lamata	
Professor Lasse Lehtonen	
Dr Dorjan Marušič	
Dr Sarah Thomson	

### **External experts**

Dr Marco Varkevisser

The declarations of the Working Group members are available at:

[http://ec.europa.eu/health/expert\\_panel/experts/working\\_groups/index\\_en.htm](http://ec.europa.eu/health/expert_panel/experts/working_groups/index_en.htm)

## ABSTRACT

In this opinion, the Expert Panel on effective ways of investing in Health (EXPH) addresses the role of competition among health care providers as an instrument to improve efficiency in the use of health system resources.

As an instrument, the use of competition among health care providers needs to be measured against the different objectives of health systems. These objectives may be conflicting and require a balance. It is unlikely that competition is aligned with all of these objectives at the same time.

The conditions for competition to be a useful instrument vary across countries, health care subsectors and time. There is no golden rule or unique set of conditions that can be met to ensure that competition will always improve the attainment of health system goals.

Introducing, increasing or changing competition in health services is a delicate policy exercise. The need for an appropriate regulatory framework should be analysed, and relevant institutions and mechanisms put in place. Accreditation of providers and the detailed design of payment systems are of specific importance. Sound policy evaluation studies are also needed to assess and judge the impact of competition, because policy design and policy outcomes are likely to vary from one context to another. Such evaluation should form the basis for changes in regulation to meet defined policy goals.

Key elements to consider when introducing, changing or increasing competition are ensuring market transparency, with availability of information on quality and prices, careful monitoring of access and equity effects, promoting health literacy, and enforcing competition rules to prevent the creation, strengthening and abuse of dominant positions.

Competition among health care providers is distinct from patient choice. The value of patient choice has gained important status in several countries as a principle underpinning the health system, and as an instrument for making the allocation of health system resources responsive to patient preferences. Patient choice may be combined with different degrees of competition among health care providers; between public providers only, between public and private providers, and with different restrictions for entry to the market. Patient choice works best in situations where patients can easily assess the quality of the services provided.

There is a permanent need to build empirical evidence in a way that is useful for policy makers, as context-specific realities will change and with them the effects of introducing or increasing competition among health care providers.

Keywords: EXPH, Expert Panel on effective ways of investing in Health, scientific opinion, competition among health care providers.

### Opinion to be cited as:

Expert Panel on effective ways of investing in Health (EXPH), Report on Investigating policy options regarding competition among providers of health care services in EU Member States, 7 May 2015

© European Union, 2015

ISSN 2315-1404  
doi:10.2875/867590

ISBN 978-92-79-48145-1  
EW-BA-15-001-EN-N

[http://ec.europa.eu/health/expert\\_panel/index\\_en.htm](http://ec.europa.eu/health/expert_panel/index_en.htm)

**TABLE OF CONTENTS**

<b>ACKNOWLEDGMENTS</b> .....	<b>3</b>
<b>ABSTRACT</b> .....	<b>4</b>
<b>EXECUTIVE SUMMARY</b> .....	<b>6</b>
<b>BACKGROUND</b> .....	<b>8</b>
<b>TERMS OF REFERENCE</b> .....	<b>11</b>
<b>1. OPINION</b> .....	<b>12</b>
<b>1.1. Competition and health systems</b> .....	<b>12</b>
1.1.1. What is competition?.....	12
1.1.2. What role for competition in health systems? .....	14
<b>1.2. Competition among health service providers: theory and evidence</b> ....	<b>21</b>
1.2.1. Types of provider competition .....	21
Competition for the market .....	22
Benchmarking/yardstick competition .....	23
Patient Choice .....	24
1.2.2. Dimensions of competition .....	29
1.2.3. Conditions for effective competition.....	31
1.2.4. Impact on price, quality and equity .....	43
<b>1.3. Provider competition in European health systems: experience, options and outcomes</b> .....	<b>51</b>
1.3.1. Primary care .....	51
1.3.2. Specialist care .....	52
1.3.3. Hospitals .....	53
1.3.4. Medicines.....	55
1.3.5. Pharmacies .....	56
1.3.6. Competition among health care providers and health systems objectives ....	57
<b>1.4. Provider competition in European health systems: key issues and challenges</b> .....	<b>61</b>
1.4.1. Health insurance arrangements .....	61
1.4.2. Provider payment and incentives .....	61
1.4.3. Low vs. high volume .....	62
1.4.4. Competition at local, regional, national and international levels .....	64
1.4.5. Competition between public and private providers .....	64
1.4.6. The role of EU law.....	66
1.4.7. Political economy factors.....	68
1.4.8. Health system characteristics .....	69
1.4.9. The potential for new forms of competition in future .....	70
<b>1.5. What role for provider competition in European health systems?.....</b>	<b>71</b>
<b>1.6. Conclusions</b> .....	<b>75</b>
<b>2. PUBLIC CONSULTATION</b> .....	<b>81</b>
<b>LIST OF ABBREVIATIONS</b> .....	<b>82</b>
<b>REFERENCES</b> .....	<b>83</b>
<b>GLOSSARY</b> .....	<b>88</b>
<b>ANNEX</b> .....	<b>91</b>

## **EXECUTIVE SUMMARY**

Competition is an instrument for organising the use of resources to achieve health policy goals. It is often used as a means of improving efficiency by allocating resources where they are likely to be most valuable. Competition is defined here as rivalry among providers of health care, resulting in incentives for tailoring health care provision to the preferences of patients, with effects on prices, quality, service level, etc.

Competition among health care providers should be distinguished from patient choice. The value of patient choice has gained important status in several countries as a principle underpinning the health system. Encouraging patient choice does not automatically imply introducing or strengthening competition. However, extending patient choice is often combined with measures to increase the number of potential providers.

Effective competition typically requires a number of preconditions to be met, including the existence of multiple providers, the easy entry and easy exit of providers and enough information on the prices and quality of providers. In health care markets, these preconditions are often not fully met. Multiple deviations to these preconditions are typically present simultaneously. The degree to which preconditions are met is likely to differ between health systems and sub-sectors, as well as over time. This implies that countries and health sectors can learn from the experience of others but should always carefully translate solutions to their own context.

There is no fixed set of conditions that will ensure that competition improves health system performance. Whether or not performance will be improved depends on the specific problems the health system faces and the objectives it is important to meet. Competition must be judged in relation to alternative institutions and mechanisms to achieve defined health policy goals.

The introduction of (or an increase in) competition in health care provision will not always be the best instrument to achieve health system goals, it will not solve all health system problems and it may have adverse effects. Competition, like other health policy instruments, is unlikely to improve all aspects of health system performance at the same time. It is unlikely that competition will address the trade-offs policy makers face between different, sometimes conflicting, health system objectives. Examples from different European countries illustrate these points.

Because competition is an instrument, robust policy evaluation studies are needed before it is implemented and to assess and judge its impact.



When considering the use of competition among health care providers, decision makers should take into account the following:

1. Introducing, changing or increasing competition in the provision of health services is a delicate and complex policy exercise.
2. It requires additional policy actions aimed at allowing the market to function properly and should be accompanied by careful and constant evaluation of effects.
3. It also requires, among other things, the enforcement of competition rules to prevent the creation, strengthening or abuse of dominant positions.
4. Although there is no general presumption about the impact of competition on equity objectives, policy concerns about adverse effects reinforce the need for careful monitoring.
5. There is an urgent need to develop empirical evidence, on when and how competition among health care providers works, in ways that are useful for policy.

## **BACKGROUND**

The idea of competition in health care can provoke strong reactions from commentators, with some considering it anathema and others seeing it as a magic bullet. Proponents of competition generally fall into one of two camps: those who believe in the innate value of market-based resource allocation (that is, a decentralised approach to production and consumption decisions, with prices providing the main signals for such decisions) and those who favour the market more for its potential to correct the failures of government regulation. Both camps typically expect competition to do the following things: strengthen patient choice, stimulate innovation, improve quality and enhance control of costs as well as efficiency – in short, to give people what they want in the least costly way possible. Opponents of competition, in contrast, typically fear it will lead to undesirable outcomes such as a reduction in quality, access to health care based on ability to pay rather than medical need and, as a result, inequity in the distribution of health services.

In this report, we take the balanced view that competition among health care providers can, but need not be, beneficial for health system performance. The discussion is not about whether competition is 'good' or 'bad' but about under what conditions it is likely to be better than alternative institutions and mechanisms for resource allocation in health care.

Whether or not competition achieves desirable or undesirable outcomes depends in part on whether a given market meets a range of important conditions. The extent to which this is the case varies across sub-markets and contexts. Since no market is perfect, effective competition (maintaining rivalry between providers) usually relies heavily on the ability of governments to adequately respond to market failures – for example, through regulation and the provision of information. Market failure refers to situations in which decentralised decisions by consumers and producers do not lead to an optimal (efficient and fair) use of available resources. As a result, the starting point for thinking about competition is not the unattainable ideal of a perfect market often described in economic textbooks, but rather the messy and diverse reality of the status quo. The crucial issue is whether or not competition will contribute to the attainment of health system goals.

Competition already plays a role in European Union (EU) health systems, taking place at different levels, among different actors and in different contexts. It is often used to supply the health system with labour, goods and capital investment. When it comes to the provision of health services, however, there is more variation across countries. In a small number of countries, purchasers (such as health insurers) compete to offer people health coverage (access to health care when needed) and health service providers

compete for contracts with purchasers of health care. In many countries, health service providers compete for patients, both in community and hospital settings. In most countries, those who supply non-clinical services (e.g. cleaning or catering) compete for contracts with other purchasers and providers. In all countries, there is some form of competition among those who produce medicines and medical devices. Therefore, even if not explicitly promoted or acknowledged, competitive forces are likely to be at play in one way or another. Competition may take place on the basis of price, but also on the basis of quality, timely access, innovation and other factors relevant to patients and to purchasers acting on behalf of patients.

The focus of this report is on competition between providers of clinical health services (including public health interventions such as screening and vaccination programs) and medical goods such as medicines and devices. Policy interest in competition is usually driven by the expectation that the market will encourage providers to be more efficient and responsive to patient needs, which, in turn, will enhance timely access to treatment, foster innovation in interventions and models of service delivery and improve quality – in other words, that competition will improve value in health care through improved health care delivery and efficient allocation of health care resources. There is often an assumption that effective competition will lower total health care costs too. Although this may be the case in specific circumstances, in general cost control is best achieved using other policy instruments.

Competition should be seen as an instrument for achieving policy goals, not as a goal in its own right. This has two implications for policy. First, the existence of problems with markets and market mechanisms does not automatically imply that alternatives will do better and vice versa. Second, as an instrument, competition should be evaluated against appropriate alternatives. Given the complexity of health care markets, such an evaluation may be challenging. Moreover, the type of competition introduced, the type of market in which it is introduced, the specific contextual features of these markets, the regulation and monitoring of competition – and factors relating to policy design, implementation and political economy – will play a large role in determining whether or not competition improves the attainment of (specific) policy goals in comparison to alternatives.

In some instances, provider competition is driven by a desire to promote choice for patients: choice of hospital or individual physician, choice of delivery setting and choice of treatment. Patient choice can be seen either as having intrinsic value or as being instrumental to the attainment of policy goals. The degree of choice available to patients differs across countries. Patient choice may conflict with certain forms of provider

competition, particularly where providers compete for contracts with purchasers. While patient choice and provider competition are often closely connected, they are different concepts and have distinct implications.

This report assesses the role of competition among health service providers in EU health systems. It explores how competition can contribute to the attainment of health system goals under different conditions – in theory and based on evidence – and examines the effects of competition on health system performance in different European countries. Where scientific evidence is not available, the report reflects the opinion, expertise and experience of the members of the Expert Panel. The European Commission organised a literature review to support the Expert Panel's work.

## **TERMS OF REFERENCE**

The European Commission asked the Expert Panel on Effective ways of Investing in Health to provide an opinion on if and how health systems in the European Union could benefit from competition among providers of health services, in terms of enhancing equitable access to improved quality of care, cost-effectiveness in service organisation and delivery and transparency and accountability and expenditure control.

The opinion could be organised along the following lines:

1. Which essential conditions have to be fulfilled for competition between providers of health care to be effective, in an environment with for example information asymmetries, uncertainty, adverse selection, and moral hazard?
2. How do differences between EU Member States' health systems have an impact on possible competition between health care providers?
3. When considering the introduction of competition in the health care sector, how could the following aspects be dealt with?
  - a. Low vs. high volume
  - b. Competition for the patient vs. competition for the insurer/government/payer
  - c. Competition at local, regional or national level
  - d. Competition between public and private providers
  - e. In which sub-sectors of the health system (primary care, pharmacies, hospitals etc.) would competition between health care providers be likely to be most and least effective?
  - f. What type of competition is likely to be most effective for different goods and services (price, quality or both price and quality)?
4. Assess the impact of current practices of competition in health care systems in EU countries on quality of, access to and expenditure control in health care.

## 1. OPINION

### 1.1. Competition and health systems

#### 1.1.1. What is competition?

Competition is an instrument to stimulate organisations to be more efficient and responsive to preferences of whom they serve. The role and outcomes of competition depend on the context and the alternatives. It is one policy instrument among alternatives.

Competition provides a particular set of incentives that may or may not be most effective in achieving goals defined by society.

1. Societies have to find ways to organize the production of goods and services and to determine how these should be allocated, either for use by people or for the production of other goods and services. An economic system is the process by which society decides who produces what, how much, for whom and when. It determines which resources are to be used in the production process, and how much is required of each good and service. In doing so, it needs to consider both current and future needs and populations, to enable investment in goods and services that can change future production possibilities.
2. Competition is defined here as rivalry among providers of health care, resulting in incentives for tailoring their health care provision to the preferences of people eventually affecting prices, quality, service level, etc.
3. There are other ways than markets of organising such decisions – for example, through discussion and consensus. However, market mechanisms have become the dominant means of facilitating and coordinating the many decisions made by millions of economic agents using prices or other values to reflect the relative scarcity and value of goods and services. In its simplest form, the price mechanism conveys information to many different people at once. As a simple illustration of the mechanism, using an example from outside the health sector, an increase in the price of oranges signals to consumers that oranges have become more difficult to obtain; as a result, people may buy fewer oranges, choosing to maximise their welfare by spending their limited resources on other things. The price increase, in turn, encourages producers to bring more oranges to the market.
4. Competition exists when several entities make alternative offers of products and services, without explicit coordination among them, and have to satisfy consumers in order to thrive. It is distinct from privatization, even though competition usually involves private entities, and it is possible to have privatization without having competition – for example, where there is private monopoly or collusion. Monopoly

or collusion undermine competition through the exercise of market power, a situation in which one entity or a small number of entities is able to set the terms of an economic transaction, especially the ability to set high prices. It is also possible to have competition without private entities.

5. A good economic resource allocation system will not waste resources when producing goods and services (technical efficiency) or pay excessive rents to producers (no return above what is needed to keep producers active). It will also result in valuable innovation (dynamic efficiency) and cater to the different needs and preferences of the end users of products and services.
6. An equitable distribution of resources and goods and services is commonly considered as being important as well, although what constitutes an equitable distribution may vary. This holds for many sectors of the economy, and especially for the health sector. Conventional economic systems may rely on the initial distribution of income in combination with decentralised decision making to allocate goods and services traded in markets. Willingness and ability to pay are important concepts in this context, relating the needs and desires of individuals to the prices and production of products. However, such a distribution may not be considered desirable in some markets, requiring the use of alternative mechanisms to allocate resources. Government may also regulate markets, to achieve distributional goals.
7. Many transactions do not take place in a market. Another alternative is to allocate resources administratively, through hierarchies and planned decisions. Planned decisions are often associated with government intervention. However, the distinction between markets and hierarchies is not necessarily one of private versus public organisations. Entities operating in private markets are themselves hierarchies. Long-term relationships structured in an organisation offer advantages and disadvantages; while some economic relations are better managed through a hierarchy than through market transactions, having only one large firm to run the economy in its entirety would encounter problems of coordination, information, market power and decision-making processes. Consequently, health and other sectors face decisions about how much hierarchy is desirable.
8. In summary, competition is an instrument used to stimulate firms to be more efficient and responsive to consumer preferences, i.e. to provide more value for the available resources. The primary goal is thus to reduce cost of the goods and services produced and/or improve the quality and outcome (value). It is conceptually distinct from privatisation, which can exist in both markets and in

- hierarchies, although it will function differently, and have different implications, in each.
9. Whether or not competition achieves desirable objectives and outcomes and/or have unintended and undesirable consequences, depends on whether a given market meets a range of important conditions. The extent to which this is the case differs between (sub)markets and context. But since no market is perfect, effective competition (competition that maintains rivalry between entities) usually relies heavily on the ability of governments to adequately respond to market failures – for example, through regulation and the provision of information.
  10. This report assesses the role of competition among health service providers in EU health systems. It explores how competition can contribute to the attainment of health system goals in theory and examines what effect it has on health system performance in practice. In addition to drawing on evidence from international literature of theoretical and empirical studies, it reflects the expert opinion of the members of the Expert Panel.
  11. The rest of this section outlines the role of competition in health systems. Section 2 reviews in more detail different types of competition among health care providers in theory, then summarises evidence on the impact of provider competition on price, quality and equity. Section 3 examines the experience and outcomes of provider competition in EU health systems. Section 4 highlights some of the key issues and challenges involved in using provider competition to improve health system performance in the European Union. Section 5 discusses the optimal role for provider competition in EU health systems and section 6 concludes the report with a summary of the study's key finding and implications for policy.

### 1.1.2. What role for competition in health systems?

Health systems have several goals. Competition can in theory exist in health systems in a number of ways and will affect different services differently. Quality and information on quality and prices play a key role in determining the impact of competition in health care.
---

12. Health systems aim to meet a range of goals, among which the following have a high degree of importance: a) equitable access to improved quality of care; b) cost-



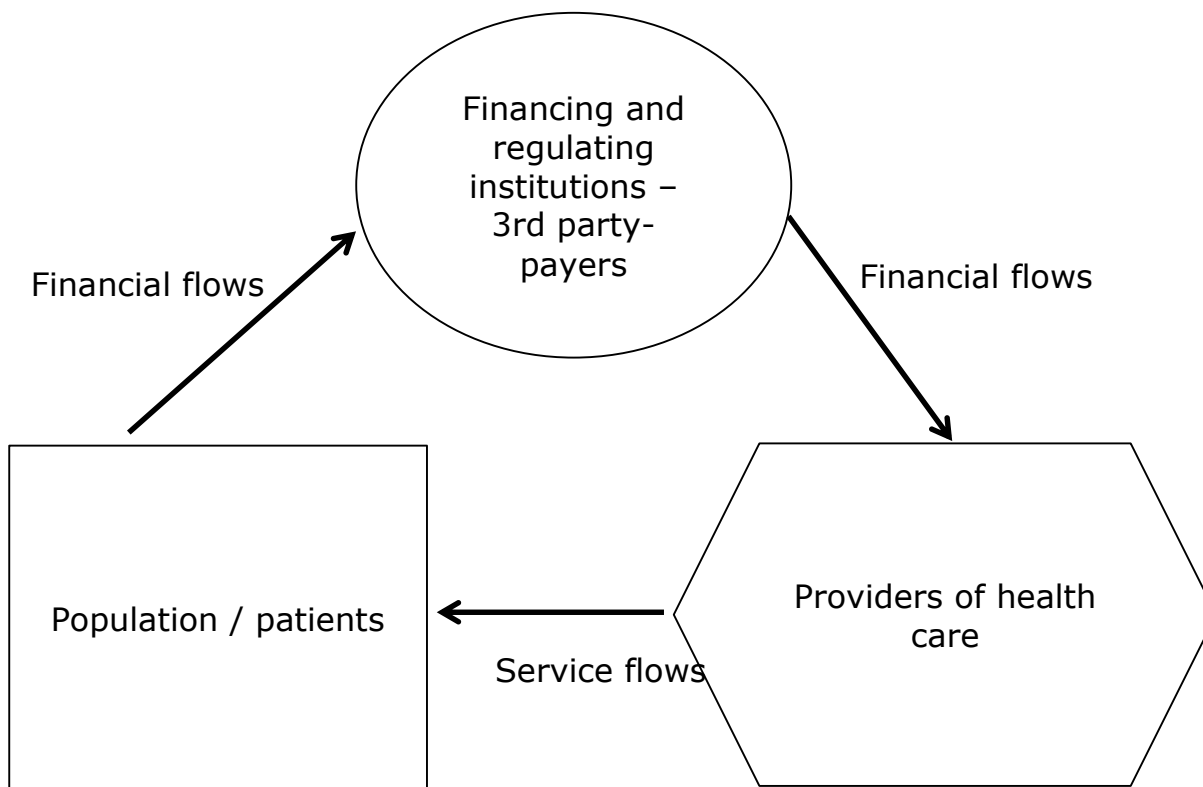
- effectiveness in service organisation and delivery; and c) transparency and accountability. Efficient allocation is but one of the several objectives.<sup>1</sup>
13. Competition is often looked at as a solution to problems that Government-run and regulated health systems did not solve. Although this puts competition as an instrument to achieve policy goals, it does not provide an accurate guide to when is introducing (or incrementing) competition beneficial to health systems' goals. Failure of one instrument does not automatically make another instrument a better one.
  14. The conditions under which competition and the market mechanism provide a good allocation of resources in the health sector have been discussed for (at least) half a century.<sup>2</sup> Figure 1 depicts the relationship between the three main actors in health systems – the population (including patients), third-party payers and health service providers. A considerable part of the discussion on the role of competition in health systems has taken place with regard to the relationship between people and third-party payers and insurance arrangements (e.g. voluntary vs mandatory, the breadth, scope and depth of health coverage and the role of private entities). The focus of this report is on competition among health service providers; we do not discuss competition in health insurance.
  15. An important factor to consider when introducing competition is who makes decisions about health care provision. Since financial protection against the costs of becoming ill introduces a third-party payer in the market, there may be a tension between the right of patients to choose health care providers and the right of payers to select the health care providers whose services they are willing to finance. In the latter case, we may see patients as choosing providers of health care through their choice of third-party payer, when this choice is available in the health system.

---

<sup>1</sup> Health systems have other objectives as well. We focus here on the objectives for health systems highlighted in the terms of reference of the mandate.

<sup>2</sup> The starting point is normally considered to be Arrow (1963).

**Figure 1. The triangle of agents in health systems**



Note: Many other flows exist in health systems, including as examples “reimbursement” payments from the third-party payers to the population/patients; “out-of-pocket” payments from population/patients to providers of health care.

16. Competition between health care providers may be desired for its instrumental ability to ensure an efficient allocation of resources and to strengthen the position of the patient in relation to providers, often seen as the weakest side in the triangle. Provider competition is also a decentralized way of matching the services on offer to patients’ differing needs and preferences.
17. Giving people choice of provider is a pre-requisite for some types of competition (see below) and may be promoted to facilitate competition, as set out in the paragraph above. However, it is also promoted for its intrinsic value – that is, people like to be able to choose their health care provider, even if choice has no direct effect on the behaviour and performance of providers. Regardless of the exact impact, the opportunity of the patient to express preferences over the quality of services, the choice will contribute to the provision of information on the value of services. Other ways of doing this, through professional evaluations (HTA) or

surveys on quality of care and outcome among the users of health services, have shortcomings as well.

18. In order to choose a provider it is required that citizens (patients) have alternatives to choose from. In this sense, the existence of alternatives always implies some sort of competition. A way to promote the emergence of alternatives is to have providers of care competing among them to satisfy patient needs. Another way is to have regulatory (or administrative) determination of these alternatives. Competition among health care providers is one instrument, though not the only one, to bring alternatives to citizens (patients). In addition, competition among health care providers can include private providers, public providers, both or only one of them.
19. A different concern is about the role of capacity constraints in health systems and its effect on choice. Under capacity constraints, health systems will have mechanisms of rationing care to patients. These rationing mechanisms may be implicit or explicit, and include or not prioritization. In particular cases, capacity constraints in public health systems do trigger mechanisms of patient choice, like in the case of some waiting list management programs allowing choice between public and private sector for treatment when a certain waiting time limit is reached (Siciliani et al., 2013). We use the term capacity here in a comprehensive manner, including organization and workforce capacity.
20. Health systems involve providers of many different goods and services, as set out in Table 1. Within each category, subdivisions can be established. For example, imaging will contain several distinct technologies that may warrant separate treatment; pharmaceutical products can be separated according to therapeutic goals and to whether patents expired or not; curative services can be divided into primary care, secondary and continued care, etc. We do not provide an exhaustive list of all possible subdivisions as such an exercise is not essential to our main points.
21. This opinion restricts its scope to competition in pharmaceutical products and competition among health service provision in primary care, among specialists and among hospitals. Other types of health care provision, or subdivisions of the above-mentioned areas, may be occasionally discussed.

**Table 1. Types of health care provision**

<b>Type</b>	<b>Examples</b>
Health goods	<ul style="list-style-type: none"> <li>▪ Pharmaceuticals; equipment; supplies and devices used to promote or restore health or to provide diagnostic information.</li> </ul>
Health services	<ul style="list-style-type: none"> <li>▪ Health promotion activities, disease prevention, early detection, diagnostic procedures, curative treatment, rehabilitation and palliative care.</li> <li>▪ Laboratory tests.</li> </ul>
Non-clinical services	<ul style="list-style-type: none"> <li>▪ Patient transport (ambulances), IT services, communications, catering, cleaning etc.</li> </ul>

Source: Expert Panel

22. Whether competition among health care providers is able to achieve desired outcomes depends on a range of factors. These include the specificities of the health care market and the nature of different health care goods and services; the priority afforded to different goals for health care provision; issues around the way in which competition is implemented; and the potential for unintended consequences. Assessing the impact of provider competition is also challenging. We briefly discuss each of these factors in the following paragraphs.
23. Relationships in the health system are often characterised by the presence of uncertainty and incomplete information. As a result, they may work differently from the standard model of demand and supply in a market illustrated in the example of a market for oranges. In standard transactions, the entity providing a good or service to a consumer receives a payment (the price) from that consumer. Adding a (public or private) health insurer to this relationship means that people transfer funds to the health insurer (in a variety of ways, differing from country to country), that suppliers of goods and services provide these to patients and that the health insurers pay the providers for these goods and services (in a direct or indirect way). Individuals may know more about their health care needs than insurers. Providers may have a better assessment and knowledge about what health care is required to treat a patient in particular conditions than patients and insurers. The time and extent of need of health care of a particular member of the population are typically not known in advance, even if chronic conditions mean that some health care needs

are more predictable. Thus, the notions of demand (who wants to have access to health care goods and services), supply (who wants to produce health care goods and services) and market equilibrium (how demand and supply meet) often require adjustments when referring to health care goods and services. The fast and simple analogy sometimes made between health care and other markets is often misleading and potentially harmful.

24. Having said that, using the special features of health care provision to argue that competition is of no benefit in the health care sector ignores the fact that (i) in some submarkets the differences between health care and other goods may not be large or justify a different approach and (ii) alternatives to competition are not flawless. Thus, for each situation careful appraisal is required. It is not possible to make general statements such as 'competition is always bad' or 'competition is always beneficial'. Competition is an instrument within a broader framework of organising economic relationships and should be judged on its instrumental value in specific situations and contexts.
25. Regarding health care provision, societies often have particular objectives that thus go beyond the mere allocation of resources. This leads active policy action directed at the provision of health care. Policy goals in health care provision may include all or several of the following simultaneously: quality, efficiency, accessibility, equity, transparency and accountability. Some of these are rooted in non-economic considerations. Efficiency in the allocation of resources is therefore an important criterion in policy actions within health care markets, but not the only one.
26. Competition may not be able to achieve all goals at the same time, and achieving more of one particular goal may lead to a lower level in another goal. Trade-offs in terms of objectives may have to be made. Expectations about the effects of competition on different goals need to be consistent in the sense that such trade-offs need to be included in the formation of expectations about the likely impact of competition. When there is more than one goal, usually more than one instrument is needed. It is unlikely that the same instrument can achieve many goals at the same time. The role of competition depends on what other health policies are in place, or will be used, to achieve the multiple goals of health care systems.
27. Also, under certain benchmark conditions, the market mechanism to allocate resources performs well, while under other conditions it may fail on one or several of the above goals. Alternative mechanisms will have their own advantages and disadvantages.

28. Competition has many sides. The outcome of competition is conditional on the starting point of the market, on regulatory capacity to enforce and nurture market competition and on the ability to identify, evaluate and eventually correct unintended consequences.
29. Assessment of the role and effectiveness of competition as an instrument to drive health system performance improvement should take place at the level of the activity subject to competition. Attempting to make this assessment at the level of the health system as a whole is impossible. There are many different services and goods provided in the health care sector. The degree to which competition in relation to a specific service or good is feasible and delivers the desired outcomes will vary. It will vary with the characteristics and nature of the product or service, with the information available, with the decision maker regarding consumption, with context and with regulations, for example.

## 1.2. Competition among health service providers: theory and evidence

Discussion of competition requires several concepts to be defined and evidence about their role to be gathered. There are several types of provider competition: in the market, for the market and through benchmarking. There are several variables on which competition may take place, simultaneously or in isolation. Of particular interest are prices and quality, which are subject to different types of regulations across health systems.

30. In health care, interest in competition has also resulted from the implications it may have for the balance of power between the different actors in the triangle of patients, payers and providers. Competition can occur in different places within the triangle. Main forms are: competition between health insurers for the decision of the population regarding health insurance; competition between health care providers to be chosen by the population for delivering health care and competition between health care providers for contracts with health insurers.

### 1.2.1. Types of provider competition

31. Competition between providers can take various forms, according to whom (or what) they compete for and what is (are) the variable(s) used in that process of competition. Health care providers may compete for patients based on price, or based on quality, or both. Quality may be intrinsic quality of the product or service, or may be waiting time or priority in treatment, for example. Health care providers may compete for budgets within health systems, as in the case of auctions for Public-Private Partnership contracts to provide a health care service. Competition through choice of geographic location is also an important instrument used by providers to compete for patients in health care markets.

32. Three broad types of competition can be distinguished, each with its own set of pre-conditions, as set out in Table 2 below. Which type of competition is most suitable depends on the economic characteristics (structure) of the market involved. Competition in the market is most common and is discussed in more detail below.

#### Competition in the market

33. Competition in the market is the most commonly recognised form of competition, with several providers making available alternatives to those that decide what to consume. In the case of health care markets, the decision maker regarding use of a particular alternative or provider can be the patient or a health professional (usually a medical doctor) on behalf of the patient.

## Competition for the market

34. Mechanisms that promote price competition, like tendering procedures, require little information about the supply side to the third-party payer. As effective competition between providers brings prices closer to marginal costs, the third-party payer, absent in collusion between providers, does not need to know the costs on the supply side, information that it is required if a direct one-to-one negotiation takes place.

### **Box 1: Competitive bidding for generic drugs in the Netherlands**

On July 1, 2005 five large Dutch health insurers jointly started a competitive bidding process for three blockbuster generic drugs for lowering cholesterol and preventing cardiovascular disease: omeprazole, simvastatin, and pravastatin. Their collective purchasing strategy was straightforward: for each of these generics, a supplier was preferred when he offered the lowest price at the reference date (July 1 and December 1 of each calendar year) or when his price was within a bandwidth of 5 percent above the lowest price offered by another supplier in that particular market. Due to the bandwidth, there was no restriction on the number of suppliers that could obtain a preferred provider status. Since these health insurers did not reimburse generics from non-preferred suppliers, their strategy entailed closed drug formularies for omeprazole, simvastatin, and pravastatin.

Initially, the price effects of the collective purchasing strategy fell short of expectations. Prices did not change and all but one generic suppliers of omeprazole, simvastatin, and pravastatin became preferred providers since their prices were less than 5% higher than the cheapest generic drug in the market. Only the original brand-name drugs were excluded from the preferred drug formulary.

By the end of 2007, however, things changed dramatically. One generic drug supplier, who newly entered the Dutch market, posted a price for simvastatin that was about 15% lower than what was until then the lowest price in the market.

Since all other prices were outside the bandwidth of 5%, as of January 2008 this supplier suddenly became the only preferred supplier for this generic drug. Subsequently all other suppliers of simvastatin reduced their prices even further. The emanating fierce price competition resulted in a dramatic drop (of more than 90%) in the average price of simvastatin.

Replacing the joint competitive bidding process, in 2008 health insurers in the Netherlands started with preferred drug formularies for generic drugs on an individual basis. As a result of the increased price competition in the market for generics, prices for the ten biggest-selling drugs were structurally reduced by 76 percent to 93 percent (Boonen et al., 2010; Kanavos et al., 2011).

### **Box 2: Competition among providers in Slovenia**

Year 2009 was the year when Health Insurance Institute of Slovenia (HIIS) decided to introduce national tender for health care programmes. The goal of national tender was to increase access to health care services by introducing price competition among health care providers for defined programmes. Additional to price the condition to cooperate in the tender was to assure the quality of health care programmes. In spite of anticipated lower prices the measurements of quality of health care services provision were introduced simultaneously – the indicators in the first year were selected by each



provider and were planned to be standardised in the following year. One of the indicators was EQ-5D to measure subjective health related quality of life. This was a soft way to make the providers get used to quality and safety as goals for service provision for patients.

The funds for national tender were provided through already signed yearly contracts between health care providers and HIIS, whereby the planned volume of health care programmes in year 2010 was decreased by 30% for each provider that carried out programmes included in national tender. To ensure the financial stability of the health care providers, this decrease could in any case not be higher than 3% of total planned inpatient or outpatient budget of the provider. After the tender the health care programmes were redistributed among providers depending on their offer regarding the price and date of provision of health care services.

Since the first national tender improved accessibility to health services (13% more services were provided for the same budget due to lower prices) HIIS decided to repeat national tender also in 2010. The second tender included 10 health care programmes, among them also 4 health care programmes that were included in the first tender. The programmes that were repeated in the tender in 2010 were hip replacement, hernia surgery, vein surgery and carpal tunnel release.

Result: Through competition the prices for health care services fell, quality and accessibility increased. The allocation of programs among providers changed; for some providers the volume of programs increased, for other it decreased. The only issues not taken into account were the different legal obligations of providers towards their employees – in private practices labour costs are lower than in public practices (in private practice there is more contract work and social security contributions are lower and there is no payment for holidays and sick days), hence they were more competitive than public providers and program was shifted from public into private practices. This is also the reason that national tender was stopped in 2012.

### **Benchmarking/yardstick competition**

35. Scheifer (1985) suggested the potentialities of comparing similar regulated firms with each other. The crucial requirement is that private information on costs of providing the service is correlated across providers. When this happens, using the cost of one provider to set prices for another provider implicitly uses the private information of the first one to set incentives. Yardstick competition is a regulatory instrument that can be used if direct competition between agents doesn't exist or does not lead to desirable outcomes (CPB - Netherlands Bureau for Economic Policy Analysis, 2000). The comparison of performance, benchmarking, can be linked to financial incentives in order to promote efficiency improvements. It is necessary to define the "products" and the "inputs" to be compared, and to establish measurement procedures. Benchmarking across countries is particularly difficult to establish, as data collection does not follow the same rules in every country, and different definitions hinder comparisons. Additional benchmarking issues include differences in the level of patient choice within regions, the elements to consider in benchmarking tools (e.g.

mortality rates, complications, waiting lists), differences in management rules, variations between countries in task differentiation in specialist areas, etc.

### **Patient Choice**

36. The patient choice policies adopted in Denmark, England, the Netherlands and Sweden share a common view of empowering patients and of market competition as the instrument to achieve it.<sup>3</sup>
37. Patient choice is closely related to competition. Patient choice is not equivalent to competition. Competition between providers of health care only makes sense if there is choice on the demand side. It may be patients' deciding or another agent on their behalf.
38. Patient choice may exist without competition between health care providers. Providers can be heterogeneous at the eyes of patients by some exogenous characteristic, such as geographic location and choice of patients be exerted over that. These are, usually, exceptions. Patients' choice occurs usually in settings in which competition between health care providers is present.
39. Patient choice is considered a basic patient right in some countries. It has been set as a guiding principle in these health systems. Currently, within the European Union, most countries have recognised patients' choice as an important feature. In some of the countries, it is explicitly included in a Patients' Rights charter.

#### **Box 3: Freedom of choice as a citizens' right**

An example is provided by the principles set in the UK NHS Constitution:

"Your rights to choice in the NHS: Everyone who is cared for by the NHS in England has formal rights to make choices about the service that they receive. These include the right to choose a GP surgery, to state which GP you'd like to see, to choose which hospital you're treated at, and to receive information to support your choices.

These rights form part of [the NHS Constitution](#)(...)"

From Lithuania's Law on the rights of patients and compensation for the damage to their health, article 5 "1. A patient shall have the right to select a physician, nursing staff member, health care institution which is either a part of the National Health Care System of Lithuania, or not. At the institutions of the National Health System of Lithuania, a patient shall have the right to select a physician or nursing staff member, without violating the institution's subordination to the level of organising the activity of the National Health System of Lithuania. This right may be limited in accordance with the procedure established by the laws of the Republic of Lithuania."

---

<sup>3</sup>Vrangbaek et al.

Other examples exist, with varying degrees of importance given to right to choice in health systems.

40. Patients' choice is not an on/off feature. It goes from unrestricted choice of provider (primary care physician, specialist and hospital) to existence of stronger constraints (such as choice of primary care physician in a delimited geographic area, with no choice of specialist or hospital). The existence of referral from primary care to either specialist care or hospital care is the more common constraint on patients' choice. Territorial constraints and financial constraints (extra-billing, for example) are also present in some countries.
41. The role of referral, and the choice of provider, was addressed in EXPH (2014a), Opinion on primary care, where diversity of approaches to referral for specialist consultations was discussed.
42. There is a role for patient organisations in enhancing patient choice. Patient organisations argue in favour of patients and often advocate patient choice. Their role should be through empowerment and education of patients, not by lobbying activities alone.
43. Patient choice and empowerment of considerations, when crossed with competition among health care providers may raise new issues, not yet addressed in a complete way (or addressed at all) in the existing literature and discussions.
44. As stated in EXPH (2014b): "The health care system ensures patients the right to participate as partner in making health care decisions that affect their lives, according to their capacity and wishes." It is unclear how competition contributes to patient involvement and partnership between doctors and patients. Such involvement cannot be achieved with all competing providers of health care at the same time. Still, by facing competition, a provider of health care may more easily choose mechanisms that promote patient involvement. Since patient choice may reduce the expected return of these investments by health care providers, it is necessary empirically to measure these several effects, that operate in opposing directions and assess whether an optimal level of competition among health care providers can be established and guide policy options. An indicator of patient choice and empowerment mentioned in EXPH (2014b) is the "proportion of patients with chronic conditions who actively participate in the development of a treatment plan focusing on their goals (in terms of quantity and quality of life) with their health care provider." In a framework with competition among health care providers, the fine details of which information will be used by the patient if (s)he changes medical

doctor will influence what can be expected from competition. If no information about a patient's history and past medical results can be carried to a new doctor, patients have some lock-in with the current doctor and probably more so under active participation and engagement.

**Table 2. Types of competition**

<b>Type of competition</b>	<b>Requirements for competition</b>	<b>Information needs</b>
Competition among health care providers in a market	Several providers Goods and services more or less substitutable Providers have freedom over relevant aspects of the service they provide Patients have free choice of provider Providers compete to attract patients Payments to providers are based on patients treated	Information about location, quality and prices of providers, information available to patients and to third-party payers
Competition for the market (e.g. competitive bidding)	Several providers (fewer than above) compete for the right to provide a service or good Only one or a few providers will be selected in a geographical area or to provide a specific service (eg drugs, Public Private Partnerships for hospitals) Mechanisms to determine the selected provider include tenders, auctions	Ability to describe the service or good in an accurate and verifiable way
Yardstick competition	Provider incentives based on comparative performance information More useful when providers are geographically distributed but not directly competing with rivals	Good information about providers; definition of performance indicators

Source: Expert Panel

45. Choosing from alternative modes of competition is not trivial. Available information on demand and on costs and to whom it is known is an important consideration. Also, the ability of the third-party payer to organize demand is of relevance.
  
46. In the health care sector, the products (goods and services) provided should have the capacity to improve, maintain or restore the health of the patient / population, avoiding premature mortality and unbearable pain. It is helpful to classify health care according to goods, clinical services and non-clinical services, as these will have different characteristics with bearing on the expected gains and costs from competition. Non-clinical services and Health Care Goods are more likely to be standardised and more prone to the development of information systems on price and quality.

47. The producers of health care services are mainly health professionals, adequately trained, that have to prove their competence through a process of registration or licensing. The facilities and settings (hospitals, clinics, etc.) where health care services are provided have to be authorised by regulators and are subject to standards.
48. For the different health services / activities, there can be protocols or guidelines for the procedures (diagnostics, treatments). But as it is a personal service in a "unique" situation, it is not easy to define standards for the outcomes. It is possible to define standards for the "inputs", and for certain aspects of the "process" (dedicated time per patient; check lists for surgery; guidelines and protocols, etc.). It is not possible to guarantee results, and it is not possible to establish standards for the complete clinical outcomes to be always met.
49. The patient does not always make the choice of provider. Many times, the choice of the more complex or more expensive treatment (for example chemotherapy) is not a decision taken by the patient. He/she relies on the opinion of the health care professional. The doctor is who prescribes the medicine or recommends the test or the intervention. There is a delegation of decisions to a more informed party.
50. The delegation of decisions from the patients to the doctor (or a health care professional, in a more general sense) has implications for how competition unfolds. This delegation is the reason why providers of hospital technologies or medicines will target the doctors for their marketing campaigns, for example. Another decision-making agent could be the pharmacist: if policies oriented to generalise prescription by active ingredient are introduced with the choice of a particular pharmaceutical product being made at the pharmacy, then the marketing campaigns may be re-directed to the pharmacists.
51. An important aspect to consider when introducing competition is who is going to choose a provider and who is going to pay for the care provided. When a patient is asking for a service privately, then he/she is who choose the doctor or the hospital, and he/she is going to pay for it. That means that he/she is balancing the costs and the benefits that expect to obtain. He/she will ask for certain treatments or certain insurance coverage according to his/her ability to pay. In this case, the "choice" of a service means that the incentive given to the provider comes directly from the customer. The "market" signals go on both sides. When the payer is a public institution financed by taxes and/or social contributions (or compulsory regulated insurance), there are other elements to consider. In the EU, there is a context where all the countries have almost 100% of the people covered by at least one

financial protection system against the future costs of health care. In universal health care systems, all the people are entitled to the same range of services. The benefits package is usually comprehensive, including primary care, specialists, hospital care, medicines, etc. In this context, some forms of competition can have unexpected effects.

52. The financial protection provided by health insurance, be it publicly provided or by private (commercial) health insurance, also plays an important role when patients choose a provider of health care. The level of protection and the rules of payment for within-network or out-of-network providers of care associated with health insurance coverage do matter.
53. If the patient is allowed to choose freely, without consideration of costs and the system assigned an “incentive” for the provider, then the provider can generate “supplier-induced” demand, with higher total costs for the system, without the barrier of cost for the patient. An increase in competition by bringing lower prices will decrease the incentive for providers to induce demand. But lower prices add consumption to the well-known moral hazard effect of health insurance. These are two different effects that bring the possibility of too much consumption of health care and may have cumulative effects. Competition between providers, by increasing the number of alternatives, may contribute to a stronger effect. An example is with full coverage of patients, meaning the patient pays nothing at the moment of consumption, in non-invasive diagnosis technologies – a new technology is adopted on top, and not by substitution, of existing ones. Supplier-induced demand can also be present without competition or patient choice, as it reflects decisions from providers of health care in reaction to the payment system they face. Supplier-induced demand is to be distinguished from moral hazard in consumption of health care services, resulting from demand decisions facing a lower price than the cost of service provision.
54. Moreover, competition in technology, a medical-arms race, may take place when patients react to technology as a signal of quality and prices are irrelevant for patients’ decisions due to health insurance protection.<sup>4</sup>
55. The final user of health care is always the patient. The decision maker about the treatment and care received will often not be the patient. Both the health

---

<sup>4</sup> Competition under asymmetric information to signal quality by providers does have some subtle points, as for technology to work as a signal to quality of provider needs to entail different costs to different providers. Still, the possibility of too much investment from a social point of view is present (Barros et al., 1999).

professional and the health insurer (public or private) take decisions regarding the consumption of health care by the patient.

56. As mentioned above, patients delegate decisions to other agents, mostly health professionals. Competition may exist on this choice by the patient. The most obvious example is the choice of GP that will then navigate the patient through the health system. While GPs may compete to be selected by patients, specialised health care that requires referral by a GP will compete for GP attention. Or patients may select a protection system that has unrestricted access to specialists, in which case specialists compete for patients. Depending on the particular health system, the choice of the patient can be about the treatment or about the doctor, about a particular provider or about an integrated care pathway. These different alternatives of organisation also define who is subject to competition.

### **1.2.2. Dimensions of competition**

57. Other relevant distinctions in the market mechanism are worth detailing. The market mechanism balances (reaches market equilibrium, in economic jargon) by adjusting prices (which often are monetary but in particular cases may be non-monetary, e.g. time) or some other variable (quality of care, for example). The market equilibrium price is the price that makes demand and supply equal. Price regulation interferes and changes the market mechanism of price determination. Price regulation removes one (in some cases, “the”) variable that organisations use to compete (e.g. use to make them more attractive to the decision maker, the patient or some entity of his/her behalf). Adequate functioning of the market mechanism often also relies on free or, at least, uncomplicated and low cost entry on and exit from the market. Another method to interfere with the market mechanism is through entry regulation.
58. The degree of competition in a market can be assessed in several ways. Market structure, that is, the number of providers that are to provide the good or service, and their size, is one element. Market conduct, that is the behaviour and decisions of economic agents, is another one. In the assessment of the degree of competition, a major element is the notion of market power and associated with it the concept of abuse of market power. According to Article 86 (EEC, new [Article 102 TFEU](#)) there is market power when a provider enjoys a position of economic strength that enables it to prevent effective competition by giving it the power to behave independently of competitors and consumers. Existence of market power

does not necessarily create a problem in the allocation of resources, but the abuse of market power does. Important examples include charging unreasonably high prices; depriving smaller competitors of customers by selling at artificially low prices they can't compete with; obstructing competitors in the market (or in another related market) by forcing consumers to buy a product/service which is artificially related to a more popular product; refusing to deal with certain customers or offering special discounts to customers who buy all or most of their supplies from the dominant company; and making the sale of one product conditional on the sale of another product.<sup>5</sup> Competition, by providing alternatives to consumers (or to agents deciding on their behalf), therefore requires limits (competitive constraints) on the abuse of market power, and policy instruments to mitigate, eliminate and preferably prevent the creation of market power.

59. The two polar examples of market structure are competitive market structure, defined as many sellers of the same good or service, each with very little or no ability to define the price (in the sense that naming a too-high price leads to consumers opting for alternative providers), and monopoly, defined as a single seller, who is able to name the price for the services or goods that it provides without constraints from alternative providers.
60. The different market structures differ in the way each seller is conditioned in their decisions by other sellers. Under a competitive market structure, the existence of many sellers of the same good or service means that trying to increase price (or lower quality) will be met by a diversion of consumers to other sellers. Under monopoly, no constraints from other sellers exists. Under product differentiation, that is goods and services that are not exactly the same in the eyes of the consumers, constraints, due to the presence of other producers, on the decisions of a provider regarding price (or some other relevant aspect) may approximate more closely the competitive market structure, if differentiation is not large, or a monopoly, if a high level of differentiation between goods or services exists. A single producer in the market (a monopolist) may choose a competitive behaviour and produce the same resource allocation as if competition exists, but this often will not be optimal from its point of view and, therefore, will not be likely observed.
61. Product differentiation can relate to physical characteristics of the good or service, information, geographical location, or even to perceptions of people. Product

---

<sup>5</sup> [http://ec.europa.eu/competition/consumers/abuse\\_en.html](http://ec.europa.eu/competition/consumers/abuse_en.html)



differentiation is a broad term encompassing many different situations. It is usual to group differentiation dimensions into two broad categories.

62. One category includes all the features (of the product or service) that have the characteristic of being positively valued by consumers (patients in the case of health care services and goods). A medicine with smaller side effects is an example. Quality is one dimension of product differentiation that (usually) falls into this category.
63. The other category includes the features that some people value it more in a positive direction and others in a negative direction. The prime example is geographic location of health care providers. Patients living nearby one provider will value it more than alternative providers, everything else constant.
64. Government intervention can affect diverse conditions and aspects of market functioning, market structure and market conduct.
65. European health systems differ regarding their preferred mechanisms to allocate resources. Contextual and cultural factors specific to each country play an important role in health system design, and some of these factors may lead to potentially different effects when introducing (or increasing) competition between health care providers. In making any policy change, it is always important to consider the starting point and the objectives of the health system in which the change takes place.

### **1.2.3. Conditions for effective competition**

Conditions for effective competition include the existence of multiple providers, easy entry and exit, standardised products and reliable and transparent information.
--

66. **Our focus in this opinion is on the conditions for competition between health care providers to achieve policy goals in a balanced way.** As stated earlier, competition is an instrument. As such, the value in its use lies in the extent to which it allows to achieve policy goals. Competition may work better for some goals of health systems (such as efficient provision of health services and products) than for others (such as equity concerns). For each policy goal, or set of policy goals, selecting competition as the instrument, or as one instrument to use, implies comparing the market mechanism with another possible non-market mechanism, like hierarchies and bureaucracies, to deliver health care. But it also implies comparing competition in markets with varying degrees of regulation, and markets

with many health care providers versus those with a few or just one health care provider.

67. In this context, it is useful to introduce the concept of effective competition. Effective competition means here that conditions in the market are such that health care providers are not able to sustain prices permanently at a level considerably above the costs of production (where the appropriate notion of costs includes return on investments made by the owners of health care providers) and thus do not earn abnormal profits. In a more informal way, effective competition is present when health care providers face strong pressure from other health care providers to find least-cost ways of delivering health care and satisfying patient needs. Although most discussions about effective competition relate to avoiding high prices, as it will be discussed below, quality issues in health care are equally important and are discussed below in detail.
68. The conditions required for competition to achieve the desired outcomes can be discussed and defined at the health system level, and at the product level. However, as it will become clear below and stated previously, the health system level is not a helpful or an appropriate level to discuss the merits and problems of competition. Conditions for effective competition are primarily associated with the product (or service) level. Still, some conditions are set at the macro level and even in a broader scope than the health system. Competition law is a condition defined at the economy level. General procedures and rules for monitoring the impact of competition in equity in delivery of health care are other examples of health system level measures. The macro level conditions are addressed later in the report.
69. A crucial question is *when* competition will have beneficial effects (i.e. will likely improve efficiency, without obvious negative consequences for other policy goals). The more clear situations of when benefits, under appropriate conditions, of having competition may be expected, include:
- When providers of health care have, and exercise, market power. Then, competition can be an effective way to bring prices (and health expenditures) down;
  - When health care providers have market power and have inefficiencies in their operations. Then, competition provides incentives for efficiency and innovation as other, more efficient, providers can offer the same product or service to patients at more attractive conditions (lower price or higher quality or even both);
  - When health care providers are not (sufficiently) responsive to key decision-makers preferences. Then competition may increase this responsiveness (namely

patients when they have the right to choose) and accommodate in a decentralized way heterogeneity in patients characteristics and preferences.

- When there is a lack of innovation. Then competition, for instance through market entry, may be a driver for innovation, both product and process innovation. Process innovation means the ability to provide the existing products and services at a lower cost. Product innovation concerns the creation and the introduction to market of new products and services.

70. The traditional model of competition sets conditions for the “market” mechanism to deliver a good allocation of resources. In the context of health care provision, several aspects may, or may not, be fulfilled depending on the particular health care good or service provided. It is well known that such traditional model does not exist. Although the framework defined by such model does not apply to health care (and to many other sectors), it provides a benchmark from which relevant aspects can be discussed and assessed.

71. At a general level, the main elements to verify as pre-conditions that favour effective competition between providers of health care are:

- Existence of multiple providers;
- Easy entry and easy exit of providers;
- Enough information on prices and qualities of providers;
- Standardised product (or service);
- Multiple buyers.

72. In health care markets at large, each and every one of these assumptions can be challenged. Some are challenged by the nature of health care goods and services (e.g. standardisation). Others are challenged by how health systems are organized, and the reasons for that organisation (e.g. easy exit, that is, closure of public health care providers). It is often the case that multiple deviations from these assumptions are present simultaneously. Competition between health care providers may, under adequate conditions, constitute the best mechanism to achieve some policy goals. Alternative mechanisms, as direct Government operation, may, on their side, face Government failure, as bureaucracies tend to be less responsive to patients heterogeneous needs, for example.

73. A recent report by Andersson et al (2014) discusses under which conditions private health care providers can be beneficial (including the increased efficiency in the public sector activities resulting from competition with the private sector). The role of transaction costs is an important consideration in the discussion, as the economic relationships within the public sector and with the private sector have a different nature, with both advantages and disadvantages in each case. As stated, “Market

control is particularly efficient for services that are simple, easy to specify and measure and that do not require any special investments.” Thus, different types of health care services will meet these conditions to a different extent.

74. The transaction-costs approach from Andersson et al (2014) suggests several conditions for private markets to ensure and favour competition. These conditions are services and goods involved in transactions that 1) occur very frequently, 2) do not require investments that only matter in each particular type of transaction, 3) have little uncertainty and 4) are easy to measure. The role of information, in particular for quality measurements, is also pointed out as a key element.

### **Multiple Providers**

75. The term competition is used with different meanings according to the context. When stating that a market has competition, people may have in mind the statement that there are many health care providers in the market. Or they may want to state that the market outcome provides the same result “as if” many providers were in the market. In some contexts, having two providers leads to the same allocation of resources as having many providers, and two is enough to have “competition”. Counting the number of providers in a market and their size is only a first step in the analysis of competition and its feasibility to attain policy goals. Many times, effective competition, meaning behaviour of economic agents close to that of competition, is considered good enough to achieve the desired goals.
76. For competition to exist there is the need for alternatives, and in that sense entry of providers as alternatives is necessary. When there are several providers (and several does not need to be a large number), the issues of information and knowledge about the characteristics of the product (or service) become more relevant than adding one more provider to the market, once several exist. If there are too many providers this may actually reduce the amount of information available to patients (or to the agents deciding on their behalf). Coupled with competition between providers there is a demand for information by whoever buys health care. When information about the product or service, its characteristics and prices exists, and this information is clear and reliable, adding more health care providers may increase competition and may contribute to lower prices and a more efficient allocation of resources.

## Entry and Exit

77. When discussing competition between providers of health care, an initial distinction needs to be made. As long as private providers of health care can start activity, subject to non-discriminatory licensing, enter the market (the activity of providing health care), there is potential competition if not effective competition. Thus, the relevant question is whether, or not, the formal organisation of health systems gives a central role to competition as a mechanism to guide decisions. Health insurance arrangements may define a payment framework with full coverage of health expenditures when using defined provider network and full out-of-pocket (no insurance) when choosing outside the network, it is the health system organisation that “decides” how relevant competition is through its definition of the purchasing arrangement, conditional on the existence of several health care providers.
78. Professional qualification requirements, while assuring quality of service providers to patients, may also work as a barrier to entry for professionals, especially when defined in ways that protect already existing providers against new ones. Higher prices for these services may result from lower competition.
79. Before competition can work, clear rules regarding failure (exit) and ensuring no-interruption of services to the population is essential. The existing legal rules at the EU level provide the necessary framework regarding failing health care providers.<sup>6</sup> Competition as an allocation mechanism relies on the pressure to exit on providers that are not chosen by patients to provide incentives for efficiency and for innovation. Changing exit conditions will change the power of competition as an allocation mechanism. A typical example in health care lies in public health care providers. Whenever public health care providers are assured not to fail, whatever results and decisions, then competition has no effect as a disciplining device. Or when private providers become “too big to fail”, in the sense that a Government bailout is very likely, a similar effect occurs, with reduction if not altogether elimination of competitive pressures. In such situations, if EU State aid rules are observed, the distortion of competition can be minimized. Therefore, competition may not be eliminated.

---

<sup>6</sup> Communication from the Commission — Guidelines on State aid for rescuing and restructuring non-financial undertakings in difficulty (OJ C 249, 31.7.2014, p. 1-28) or [Commission Decision](#) of 20 December on the application of Article 106(2) of the Treaty on the Functioning of the European Union to State aid in the form of public service compensation granted to certain undertakings entrusted with the operation of services of general economic interest (OJ L7, 11.01.2012, p. 3-10).

80. Heavily regulated health systems constraining competition among health care providers will not be, typically, innovation friendly. But a balanced view is in order. Health systems providing financial protection to citizens, allowing the free entry of providers of health care will be characterised by too much innovation, which may actually be detrimental to the health system. Competition creates an incentive for innovation. When the patient does not pay at the moment of use of health care, technologies generating low added value may be adopted and be associated with too much expenditure for the health outcomes produced. There is the possibility of supplier-induced demand in adoption of innovation, especially when patients do not sense the link between utilisation and payment for the new technology. One example pointed out as illustration is robotic surgery.
81. Whenever health systems decide to promote competition to guide allocation of resources, there is the need to define a way to penalize non-performing providers without hurting continuity of service to the population. The exact solution defined by each health system has to consider whether, or not, there are other alternatives to provide the service and whether, or not, closing is an option (i.e. does not interrupt the service to the population). An example is withdrawing hospital (provider) management autonomy, without necessarily closing it. Another possibility is substitution of management teams or chief officials (medical and administration) of the provider. Other possibilities may be devised, of course.
82. Due to the complexity of health care services strict regulations are in place to guarantee quality and safety of services provided. Health professions, health care centres, hospitals, technology, medicines, etc., have to follow a process of authorisation, registration, and inspection. At the same time, the exit from the market of a health care centre that has financial losses (for example a hospital, or a pharmacy) could damage the supply of services in a district and may trigger action by the regulator in the context of a public health system, or the public health system may introduce direct provision of health care in substitution of private health care providers in case they exit the market. In situations, where Member States decide to grant financial support to such loss making entities, State aid rules concerning the rescue and restructuring of undertakings in difficulty,<sup>7</sup> or other applicable State aid rules,<sup>8</sup> apply. When the entity is a provider of services of

---

<sup>7</sup> Communication from the Commission — Guidelines on State aid for rescuing and restructuring non-financial undertakings in difficulty (OJ C 249, 31.7.2014, p. 1–28).

<sup>8</sup> Commission Decision of 20 December on the application of Article 106(2) of the Treaty on the Functioning of the European Union to State aid in the form of public service compensation granted to certain undertakings

general economic interest ('SGEI') the application of such rules allow where necessary to take account of the specific nature of SGEI and, in particular, of the need to ensure continuity of service provision in accordance with Article 106(2) of the Treaty.

### **Information**

83. Information – particularly information on the benefits associated with health care – is a critical requirement for effective competition. For competition to be an effective instrument, Governments or regulatory agencies have to improve the availability of information on quality. This information should be comprehensive, comparable, reliable and understandable to buyers of services, especially patients. However, it is important to note that more information in itself does not make markets more transparent.
84. Some health care services may be seen as credence goods. Neither the necessity of (use of) such goods nor their quality or their value can be assessed fully by individual patients, even after their use. In such cases, competition may still be a useful instrument to improve outcomes, but it normally should not depend on patient choice or assessments. It can still function through third-party payers, based on objective and relevant outcome parameters.
85. Information can be considered an economic good for which there is demand, supply and an optimal level. The type and detail of information required by buyers from providers depends on who is the key decision maker and who is responsible for payment to the health care provider. Thus, the specifics of relationships between patients, providers and third-party payers in a given situation will determine who should receive what information (see Table 3).

---

entrusted with the operation of services of general economic interest (OJ L7, 11.01.2012, p. 3-10) ('SGEI Decision'). The SGEI Decision also applies in case of SGEI providers in difficulty.

**Table 3. Information requirements for different health care buyers**

<b>Buyer</b>	<b>Provider cost/price information required</b>	<b>Provider quality information required</b>
Third-party payer	<ul style="list-style-type: none"> <li>▪ Where prices are negotiated</li> </ul>	<ul style="list-style-type: none"> <li>▪ Where prices are negotiated</li> </ul>
Health care provider	<ul style="list-style-type: none"> <li>▪ Where providers bear some of the cost of referral</li> </ul>	<ul style="list-style-type: none"> <li>▪ In all instances</li> </ul>
Patient	<ul style="list-style-type: none"> <li>▪ Where the patient pays and is subsequently fully or partially reimbursed</li> <li>▪ Information on user charges where these apply<sup>9</sup></li> </ul>	<ul style="list-style-type: none"> <li>▪ In all instances</li> <li>▪ May include information on waiting times</li> </ul>

Source: Expert Panel.

86. Not all buyers need to be equally informed. Insurers deciding on behalf of patients may collect the relevant information and be able to benefit from competition among providers. Doctors acting as agents for patients will have more information, enabling competition between health care providers. The information used by insurers (third-party payers more generally) when negotiating contracts with providers on behalf of their insured, allows patients to receive the benefits of competition even if patients lack information. Even if patients are the key decision maker, it may be sufficient that only a fraction of them are informed about health care providers to have competition in the market and benefit all patients.

87. Competition between providers of health care may reduce the information required by the third-party payer, as competition may bring prices closer to marginal costs even if the third-party payer is uninformed about their value. One particular example of efforts to produce information that can be used to foster competition is the pay-for-performance approach. It requires the definition of quality

---

<sup>9</sup> We refer here user charges only for the purpose of illustrating what information needs to be reported. The role of user charges in a health system is discussed in section 3.4.3 of the EXPH Opinion “Definition of a frame of reference in relation to primary care with a special emphasis on financing systems and referral systems”.



- measurements and their valuation. These can be later used not only to condition payments but to choose among providers, creating the possibility of competition on quality.
88. An important consideration for competition in health care markets is the existence of information problems. Information issues can be divided into two main areas: imperfect information and asymmetric information.
89. **Imperfect information** (in which uncertainty plays a role but without the strategic use of information advantages by agents in the market): inability to measure quality of care does not allow the specification of quality objectives, competition based on quality or quality-based payment. Some health care products and services are characterised by intrinsic uncertainty, and information about the final outcome is not available beforehand. Treatments often have this uncertainty.
90. **Asymmetric information**, where strategic use of information is present: if only the provider knows quality, the provider may reduce quality in order to save costs, making a strategic use of the information it has. There are other examples of strategic use of private information (that is, only known to one agent of the relationship) in health care that influence competition conditions and results.
91. Information is better and easier to obtain in the case of goods. It is relatively easy to obtain for non-clinical services, but it is more difficult to obtain for clinical services. For clinical services there is a lot of information available at clinical settings for the health personnel involved, but summarising this information for patients and payers is not easy. There is no wide consensus on which variables to use, on whom is reporting, and so on. Who gathers, analyses and provides information, and under which conditions, is important to ensure that information provided to patients is not biased and self-serving to the objectives of providers of health care.
92. Some products and services in health care are experience based goods, only after their use the patients learn their true value. Also, patients gain more information over time, especially when they experience chronic conditions. They can learn about different possibilities, different treatments. They can choose a doctor and then discuss with her/him the alternatives, but normally they don't go looking for different treatments or components of a treatment like they go looking for a pair of trousers or a book.

93. In all instances, there is asymmetry of information between buyers and service providers. It is difficult for buyers to judge and evaluate quality of care. Sometimes patients choose based on information about short waiting lists, more privacy or secondary aspects (comfort, meals, decoration, etc.), not necessarily clinical aspects, more difficult to measure and interpret by patients. They may use these other elements to make inferences about clinical aspects, or simply use them as decision drivers. When information is scarce about health care providers, resorting to other variables, not necessarily relevant to quality of care, is more likely.
94. Third-party payers may have greater capacity to collect and process information. There are specialists in regulatory bodies and payer organisations equipped to assess the functioning of hospitals and clinics. But they do not have the detailed knowledge on the characteristics of each patient and each treatment. They normally manage indicators, averages, etc.
95. New organisational models that create more of a partnership between patients and medical doctors (or other health professionals) bring more of this knowledge on individual heterogeneity together, which in turn reduces the possibilities for effective competition as this knowledge becomes relationship specific.
96. The strategic issues of asymmetric information creates further complexities, as competition under asymmetric information will have the resulting allocation of resources conditional on the information of each party and the use that is made of it. Some of the problems also exist without competition, and under some conditions competition can actually work as a mechanism to reveal relevant information. Overall, the effect of competition upon the equilibrium allocation of resources in the presence of information asymmetries is contingent on characteristics of the type of health care and on payment systems. Whenever benchmarking and yardstick competition is feasible, (proxy) competition improves the allocation of resources. Whenever competition makes the selection of patients possible (that is risk selection by third-party payers or providers), it may reduce the market efficiency of resource allocation.
97. An important feature to bear in mind is the adjustment of providers to the market context. Asymmetries of information provide possibilities for decisions by providers that are misaligned with the objectives of the health system. These potential problems include supplier-induced demand, upcoding (classifying patients into higher priced diagnostic codes in hospital treatments) and over-declaration (Schut et al 2013; Hasaart 2011). Also “dumping” (the explicit avoidance of high severity patients), “creaming” (over-provision of services to low severity patients), or

- “skimping” (under-provision of services to high severity patients) may emerge (Ellis 1998).
98. Patient selection risks increase when information is disclosed. Patients’ selection of providers based on the information made publicly available means that health care providers may change their conduct to influence the information available about them. An example is the disclosure of mortality rates rankings, leading providers to consider rejecting high-complexity, high-mortality risk patients in order to improve their ranking position.
99. Naturally, selection of patients is not possible if there are no alternative patients and providing care is mandatory. But monopoly, even if it's a public monopoly, in health care provision does not rule out supplier-induced demand, up-coding, and other strategies that are revenue-enhancing for the provider facing a single payer. These issues are more associated with the particular payment systems and incentives that are set than with the existence, or not, of competition, although competition may change its profitability to health care providers. The mere possibility of the existence of these behaviours does not immediately imply they will occur, as they may entail costs, including reputation costs and eventually fines if detected.
100. The level of information provided to patients varies considerably across countries and across products. The information available is the outcome of both statutory impositions of the health system and of interaction between the different players in the health sector and their interest to request or to disclose information relevant to patients.
101. Information to health care users includes several different aspects. Van Ginneken et al (2014) review ten different types of information that can be provided to patients: (a) Information on hospital clinical outcomes; (b) Comparative information about the quality of individual providers (e.g. doctors); (c) Comparative information about hospitals; (d) Interactive web or 24/7 telephone information; (e) Information on patient satisfaction collected (systematically or occasionally); (f) Information about statutory benefits; (g) Comparative information about purchasing organisations; (h) Comparative information about the quality of hospitals; (i) Information on hospital waiting times; (j) Patient access to own medical record. From these, the first five are more common than the others. In particular, information on hospital clinical outcomes is present in a majority of countries. On the other hand, several countries provide no information whatsoever.

102. Patients under full insurance arrangements will not have to think about health care costs and will focus on quality of care when deciding which provider to use. In this context, the distinction patient-insured is also important. That is, when insurers mainly compete for healthy insured rather than sick patients, this may have serious consequences for provider competition initiated by those insurers. For example, if an insurer wants to avoid certain types of patients (suffering from particular costly conditions), it may not contract with high-quality medical specialists in that area in an attempt to discourage these types of patients from enrolling. Such selective network building would influence competition between health care providers.
103. Whenever the third-party payer wants to make patients cost aware, it will provide information on costs of provision (payments the third-party payer makes to providers of health care). If the concerns for cost awareness of patients lead to the existence of user charges at the moment of usage of health care, then patients will need information on them. If the user charge is set as a proportion of the price of the provider, then information on prices charged by each health care provider will be required. Prices paid by patients are, in such cases, a competitive tool to health care providers. The extent to which patients pay a price for health care services at the point of use has efficiency implications and equity implications.<sup>10</sup>

### **Standardised products (or services)**

104. Health systems cover a wide range of services, from long-term management of chronic conditions (with patients at their homes) to emergency care and highly specialised surgical procedures. The settings of delivery of these services span a very diverse range of organisations.
105. This panel of experts sees product (service) standardisation, and detailed information on prices and qualities, as a more crucial aspect than the number of providers or the contestability of the market (easy entry and exit).
106. The possibility to standardize products (goods and services) is a key aspect in order to have effective competition, ensuring that the user/buyer can choose based on a comparison between products with well-defined characteristics and requirements.
107. Products are normally standardised in the sub-market of goods. It is not so easy to set and control standards in the sub-market of non-clinical services, and it is more

---

<sup>10</sup> Of course, the way financial protection is funded has equity implications as well. Their discussion is beyond the scope of the opinion.

challenging for the sub-market of clinical services (see EXPH opinion on quality of health care).

### **Multiple buyers**

108. The standard view of competition considers the existence of multiple buyers in the sense neither of them has the ability to impose conditions upon providers of health care. While this is certainly a good description of the role of individual patients, it is less so when terms and conditions of delivery of health care are set between the providers of health care and large third-party payer organisations, like insurance companies, sickness funds or a National Health Service.

#### **1.2.4. Impact on price, quality and equity**

On the impact of competition among providers of health care on price, quality and equity, both theory and available empirical literature show it to be very context dependent (the devil is in the details). Overall, the empirical literature is limited in scope and depth of results available.

109. Analysis of competition in health care markets provide several insights into expected effects from competition and from changing the level of competition in health care markets, with a distinction between introducing competition where there is none and adding more competition to markets where some competition is already present.

110. Under competition, health care providers take decisions upon variables, price and quality being the most commonly discussed, that influence patients' choices.<sup>11</sup>

111. The expected impact of competition on the efficiency of allocation of resources, namely upon prices and quality, is context specific. That is, economic theory does not provide an unambiguous prediction regarding the impact of increased competition on quality when both quality and price are available strategic variables for the health care provider. Theoretical work suggests that competition can generally be beneficial to quality levels when prices are regulated. Under regulated prices, and with a positive margin to health care providers from treating patients, providing more (observable) quality becomes the main way to be selected by patients. The more sensitive demand is to quality, the higher the expected positive

---

<sup>11</sup> For a discussion see Barros and Martinez-Giralt (2012), chapter 12.

impact of competition on quality levels. An important qualification needs to be mentioned: if regulated prices are too low, and determine a negative margin, competition will hurt quality. Under negative margin, competing providers want to divert demand away. Note that this effect of competition on quality occurs even if providing more quality increases costs to the provider. As long as a positive operational margin exists, the incentive is to attract demand to benefit from that margin and not to lower quality to lower costs, as it would also lower demand. Thus, the surplus motive (or requirement) of providers under regulated prices will drive the impact of competition on quality.

112. With unregulated prices, the predictions from theory are context sensitive and no general result is obtained. That is, increases (or introduction) of competition may result in higher or lower quality levels, and generally result in lower prices. The market outcome is determined by the nature of competition and by how sensitive patients are to prices and to quality. When providers of health care have freedom in setting their prices (that is, prices are not regulated or negotiated with health care insurers or public health systems), more competition leads to the use of prices as a way to be favoured by patients.<sup>12</sup> In a simple, non-rigorous, way, the intuition of these results can be explained as follows. More competition reduces prices, holding everything else constant, which reduces the margins associated with quality. This in turn reduces the incentive to provide quality. But if patients choose a provider based more on quality than on price, more competition drives up the need for more quality, which increases costs and requires higher prices. Thus, the interaction of price and quality in health care markets with competition is not an easy one to determine final effects. The impact of competition in such markets depends on the features and design of the market environment. Providing higher quality can increase the cost per treatment, although higher quality of treatment may reduce, in some but not all cases, future need of health care and as such reduce overall health care costs.

113. The occurrence of these effects is based on the presumption that quality is recognisable to patients (or whoever decides on their behalf), and that information on quality is available and trustworthy.

---

<sup>12</sup> Brekke, Siciliani and Straume (2011) show that, even when prices are fixed, with a general cost structure for production and providers that care about profits and health of patients, the relationship between competition and quality is generally ambiguous. Brekke, Siciliani and Straume (2012) and (2015) investigate hospital behaviour when hospitals compete on quality to attract patients and have respectively profit constraints or have soft budget constraints. Again, the relationship between competition and quality is ambiguous.

114. The prediction is clear when prices are fixed and demand responds to quality differences – competition in this context increases quality. Regulated prices need to ensure non-negative economic profits for the providers (otherwise, exit of the market will take place by private providers and public providers will have to either close or receive extra funds from the Government). Specific features of the health care sector, like non-profit organisations and totally inelastic demand for some services (e.g. emergency room cases) do not change these results.<sup>13</sup>
115. The limited empirical evidence broadly supports the theory that quality competition under regulated prices drives up quality, measured by mortality, if the health care provider has a positive margin. Most studies have been done for the US and for hospital competition in particular. There is also some evidence gathered for England. There is a lack of generalised evidence across countries and using other measures of quality. Since the US and the UK health systems are not representative of all existing health systems, the conclusion needs to be seen with caution.
116. A widely cited example purporting to show that competition among hospitals increases quality examined the association between the degree of competition in local health care markets in England and the speed of decline in mortality from heart disease (Cooper et al., 2010). However, this interpretation has been challenged. As critics noted, while the association was clearly observable, it was not consistent with previous research (Propper et al., 2004) and there was no plausible biological mechanism that could have explained what was seen (Pollock et al., 2011). As Bevan and Skellern (2011) have noted, there are substantial problems with the choice of exposure to competition and the outcome, and the organisational mechanisms that might link them (which they describe as a “black box”). Although it has been suggested that the explanation for the conflicting results at different times may be explained by whether or not prices were fixed (Gaynor and Propper, 2012), it is also plausible that the explanation is as likely to lie in artefacts of the data, such as coding changes, which pose an inevitable problem in comparisons of hospital performance.
117. The empirical studies trace the effect of competition between health care providers in three different ways: the first approach is based on changes of market concentration indicators (market concentration measures how large are providers relative to market size; larger providers imply higher market concentration and higher likelihood of low competition), the second one results from analysis of

---

<sup>13</sup> Gaynor and Town (2012)

mergers (reduction in the number of independent operators, seen as reduction in competition) and the third line is the impact of entry of new operators (increase in the number of economic agents, interpreted as an increase in competition).

118. The majority of empirical studies proxy competition conditions by market concentration indices, namely the Herfindahl-Hirschman index.<sup>14</sup> This index provides a summary indicator of size distribution of providers.<sup>15</sup> Market concentration is a proxy indicator for the degree of competition (high concentration is considered to be associated with lower competition).<sup>16</sup> Most empirical papers find a positive relationship between market concentration and prices – markets with less / larger providers are associated with higher prices. The US evidence of increased concentration in the hospital sector already started from a point of high concentration in market structure, also with a strong role for networks of providers. The wave of mergers was triggered by the need to obtain bargaining power vis-à-vis health plans, in reaction to the rise of managed care and its feature of aggressive price negotiations. Thus, before assuming a general result, more information from other countries is necessary.
119. Unlike hospital care, competition between physician practice groups is essentially between small groups, in markets with low concentration (with several providers of roughly similar size), with differences across types of care (markets are less concentrated for primary care and more concentrated for specialists).
120. The existing empirical literature on the impact of increasing concentration provides some other stylized facts. An important distinction to make is between markets where price competition is possible and markets that work under price regulation (and competition is done in other variables). In the past few years, some interesting overview studies have been published which can serve as starting point. Another important distinction, as mentioned earlier, refers to the type of competition.
121. In markets where prices are not regulated, it has been found that price differences are unrelated to quality, leaving the exercise of market power (ability of providers to dictate prices) as a possible explanation for such variation.

---

<sup>14</sup> See Hirschman (1964) and Rhoades (1993).

<sup>15</sup> It is computed as the weighted sum of the market share of each provider, where the weight is the market share. It has value 1 if only one provider is in the market and it approaches zero when many providers with a small market share each are present in the market.

<sup>16</sup> Gaynor and Town (2012), Gaynor et al (2010).



122. From the UK experience(s) several interesting results emerge. The English NHS saw in the early 1990s the introduction of the notion of “internal market”, with competition between providers of health care but not between “health insurance” (the English District Health Authorities). The late 1990s had an end to this “internal market” experience, with a move to a system with an emphasis on quality but not on price, with “prices” (tariffs) set by the Department of Health.
123. Policy changes, in the mid-2000s, aimed at increasing patient choice and competition for hospital care generated evidence that better hospitals attracted more patients, that sicker patients responded more to quality differences in providers, that more patient choice did not end in increased inequalities, that some increase in productive efficiency resulted, that no impact on financial performance and on waiting times was found. The overall assessment is that pro-choice policies were able to deliver some positive effects even with only some patients actually exerting that choice.
124. More recently, the Health and Social Care Act of 2012, being in effect since 2013, brought further changes to the English National Health Service in the direction of further patient choice.
125. The difference between the 1990s and the 2000s helps to frame the empirical results that found an increase in quality associated with more competition in this second period and a decrease in quality associated with more competition in the first period.<sup>17</sup> However, these results referring to the UK can be questioned if a comparison is made with the improved performance of these indicators in other EU countries where the same mechanisms of competition were not implemented.
126. A concern voiced about the introduction of competition in health care relates to equity implications, and whether, or not, competition is harmful to equity. Empirical work available from the UK, for two different periods of competition increase, early 2000s and the 1999s, found no evidence on the impact of competition on socioeconomic health care inequality. The analysis used hospital utilisation from its difference according to origin (deprived areas) for the years 1991 – 2001 and years 2003 – 2008.<sup>18</sup>
127. It is also interesting to compare the evolution of performance between England, Wales and Scotland over recent years, knowing that Wales and Scotland have not

---

<sup>17</sup> Note: Hospital quality is in most cases proxied by mortality rates.

<sup>18</sup> Cookson et al (2013), Cookson et al. (2012), Cookson et al. (2010).

- promoted competition policies. Bevan et al (2014) found that “the different policies adopted by each country appear to have made little difference to long-term national trends on most of the indicators that the authors were able to compare”.
128. Most of existing empirical studies on hospital competition proxy quality with heart attack or overall mortality rates. It is important to test the effect of competition on a broader set of quality measures. Gravelle et al. (2014), using 16 quality measures (including mortality rates, readmission, revision and redo rates, and three patient reported indicators) in English hospitals, show that quality measures are not highly correlated or not correlated at all. In line with Cooper et al (2011), Gravelle et al. (2014) examined the effect of market structure on the level of mortality for AMI, hip fracture and stroke in the UK, finding market structure (having more competitors) influenced outcomes negatively for AMI and hip fractures, but not for stroke mortality. Brekke et al. (2014) reviewed the empirical literature on the relationship between quality and demand for hospital care. Most studies found that demand responds to quality but the elasticity is low.
129. On the performance of the health system at the macro level, the introduction of mechanisms of competition did not produce health results that can be clearly distinguished from previous situation and/or from health systems that did not introduce competition.
130. On the choice of general practice physicians, British patients are more likely to choose a physician near home to attend although some response to quality does seem to exist (proxied by Quality and Outcomes Framework points).<sup>19</sup> The introduction of competition in the choice of general practitioners did produce some response although it is apparently much smaller than expected by advocates of competition.
131. Another area with research about competition effects is generic substitution in pharmaceutical markets. In some countries (Finland, Netherlands, Norway, Portugal, Spain), introducing generic competition resulted in lower prices, while in others (Austria, Belgium) it had no visible effect.
132. On the consequences of competition in the Swedish welfare system, some remark that there is a remarkable lack of knowledge of the effects of competition. Hartman (2013) described some elements (information asymmetries, externalities, entry barriers etc.) that explain why open competition doesn't produce clear benefits.

---

<sup>19</sup> Santos et al (2013)

133. Some studies didn't find improvements in clinical outcomes (Propper et al 2004). Concerning the efficiency goal, some research showed that administrative costs had increased (Health Policy Network 1995; Mukamel et al 2005). Equivocal results were found when comparing access, with some evidence of negative results (Curtis et al 1997). When comparing health systems at a macro-level it is generally observed that more regulated systems are less expensive than less regulated systems in the EU (Joumard 2012, Lamata 1998). Customer satisfaction and reduction of waiting times are aspects improved in most cases when introducing more choice, but at the cost of increasing total public health expenditure.
134. A noteworthy point about the literature reporting empirical evidence is that where introduction of competition did not produce the expected results (namely lower prices), the researchers tended to draw the recommendation of further measures to introduce more competition. It is possible that this reflects a pro-competition bias in the literature. It may also reflect the need to improve competition conditions, which were not fulfilled. The implications need to be carefully deduced.
135. Another point is a word of caution about the introduction of competition as the market power of health care providers tends to be underestimated. Before introducing competition in a particular area it is important to assure that the business culture of providers will make competition work.
136. The most immediate gain usually expected from competition is better prices (or, in economic jargon, a reduction of exercise of market power on price). In particular from a policy perspective, it is important to emphasize that "better prices" does not automatically result in lower total expenditure. Hence, more efficiency at the micro level is not always associated with lower total spending at the macro level. Additionally, as discussed above, lower prices may come at the expense of quality.
137. The effects of competition among health care providers on the quality of care need to include the several dimensions associated with it, as detailed in EXPH (2014b): a) improvement of health outcomes; b) prevention of avoidable harm related to care; c) involve patients/people as key partners in the process of care; d) efficiency in the sense of best value for the money spent; e) equity, defined as equal access to available care for equal quality of care for all.
138. The current literature on the effects of competition addresses only the first dimension, health outcomes, and even so in a limited way as it mostly restricts attention to mortality outcomes. Therefore, the quantity of evidence related to the impact of competition on quality is rather limited compared with the dimensions of

quality considered as relevant. This shortcoming is dictated by data availability to some extent. It should be emphasised that mortality outcomes are a limited quality measure, and a poor one in the context of non-fatal diseases with a large impact on quality of life (such as sensory diseases or certain mental health problems).

139. Efforts should be made to increase the knowledge on the impact of competition related to other quality dimensions and other health outcomes. For example, the introduction of competition among providers of health care may change the choices available to patients and through such a change influence how and when doctors and their patients meet and the involvement of patients in the decision process.
140. **The conclusion that the impact of competition in health care provision is context dependent does not imply randomness of effects. It means that details do matter considerably to the end result.**
141. To summarize the main findings, the introduction of competition between health care providers when prices and quality levels are unregulated will have final effects dependent of the characteristics of demand sensitivity to both variables. Thus, it is likely to have different effects across types of care and across countries. Under the common feature of regulated prices (either set by Governments or by insurers), the impact of competition on quality is conditional on the sensitiveness of demand to quality and on the margin to the provider.

### 1.3. Provider competition in European health systems: experience, options and outcomes

Using the insights gained in the previous sections, here we focus on provider competition in four different health care sectors: primary care, specialist care, hospitals, and medicines.

For each different sector, some key observations relevant for the introduction of competition and its expected outcomes are discussed.

We also present some illustrations. These examples of real-life experiences with provider competition in European health systems illustrate some of the policy options faced by policymakers.

#### 1.3.1. Primary care

142. Competition in primary care is usually set in terms of freedom of choice by patients (users of health care). Many European health systems have elements of freedom of choice in primary care. This freedom of choice is, in some cases, limited to contracted providers or a geographical area. In other countries, citizens are automatically allocated to a primary care physician. Allowing patients to choose across geographical location does not necessarily imply competition between providers of primary care. Over time, an increasing number of countries offer some sort of choice to citizens. This implies at least some competition between primary care physicians or between primary care organisations.

143. As citizens benefit from insurance protection and are protected to a considerable extent (if not completely) from prices at the moment of use of health care, competition in primary care is usually based on patient perceptions of quality (including timely access). If relevant, price negotiations, and therefore potential price competition, are between the providers and the third party payers.

144. Regarding the freedom of choice of primary care physician, there is a diversity of situations.<sup>20</sup> Several countries have unlimited choice of primary physician. About the same number of countries have some sort of limitation of choice. The limitations in the choice of primary care physician can be divided into two types. The first type of limitation is the definition of geographic catchment areas. The second type of limitation is the definition of contracted network. Patients can naturally go to private physicians when paying out of pocket. User charges are present in several cases, with higher user charges regularly observed when patients decide to go to a primary care physician outside of the defined limitations.

---

<sup>20</sup> A general review is provided in van Ginneken et al (2014).

145. The analysis of primary care systems by Kringos et al. (2012) and Kringos (2012) identified countries with primary care systems that were classified as strong. Without going into the details of the classification reported in these studies, it was revealed that such countries have, in the majority of cases, choice which is limited geographically. It is not claimed as causality. It, nonetheless, shows that free patient choice (allowing patients to switch provider if they want to) is not the inevitable way to achieve a strong primary care system.
146. Introducing competition in primary care does not have seem to have been a priority in most health systems, and in the countries where it was introduced it has not led to results that stand above the health systems that opted for choice limitations (constraints in competition between primary care physicians).
147. Issues that may lower the intensity of competition among providers of primary care include patients' willingness to travel, their (sometimes longstanding) personal relationships with primary care physicians, and requirements to formally register with providers.
148. Competition in primary care may exist as patient choice between different points of contact and formats. For a description of primary care and its evolution, see the Expert Opinion on primary care (EXPH, 2014a).
149. Continuity of care and smooth pathways for patients in the health system may require cooperation instead of competition between health care providers.

### **1.3.2. Specialist care**

150. Choice of specialists is to some extent present in all health systems, as private medicine, paid out of pocket by citizens, is not prohibited in any of the EU countries. A different issue is whether, or not, choice of specialists is a feature of the main health insurance protection mechanism. In some countries (e.g. Sweden) patients have almost free choice of specialists, but in most countries choice is not unlimited. When limitations exist they can be of two origins: choice limited to geographical area and choice limited to contracted providers. The overall picture is one of diversity of option by health systems.
151. In some countries (e.g. the Netherlands), patient choice of specialist is closely related to the hospitals contracted by their insurer. If insurers (or other third party payers) offer a restricted network of contracted hospitals, choice of specialists is also not free.

### **1.3.3. Hospitals**

152. Quality of care is an important instrument for competition and under strict price regulation it may be the main instrument health care providers can use to differentiate their services from competitors.
153. For quality to be an instrument for competition, it needs to be observed by the key decision maker. The key decision maker in some cases will be the patient, while in other cases it will be the physician deciding on behalf of the patient, or the health plan/insurer deciding on whether or not to include providers in the contracted network or health insurance coverage.
154. Competition over quality is regarded to occur not on a patient-by-patient basis but as a general effort at the hospital level which determines the quality of services provided.
155. The great majority of empirical studies relating competition and quality focus on hospital activity.
156. Under regulated prices, the studies reviewed by Gaynor and Town (2012) point to a positive impact of competition on quality of care (proxied by mortality rates), but these studies are performed in the context of US and UK health systems only.
157. Under market-determined prices, Gaynor and Town (2012) review of studies on the effect of competition on quality shows a more diverse picture with an almost equal occurrence of positive, zero and negative effects of competition on quality.<sup>21</sup> Some studies, within the same context and data, find different impacts of competition according to the quality indicator used. Competition over the two main variables, price and quality, yields empirically an unpredictable relationship with regard to final effects, consistent with economic theory. The evidence is mostly gathered from the United States.
158. Hence, competition among hospitals may, or may not, result in positive outcomes. It needs to be recognised that general conclusions are difficult to draw because the devil certainly is in the details.

---

<sup>21</sup> See also the debate above about the available evidence.

**Box 4: Hospital competition in the Netherlands**

During the 1980s, top-down rationing policies implemented in Dutch health care were subjected to growing criticism. The criticism focused particularly on the lack of incentives for efficiency and innovation within the prevailing system of health-care finance and delivery. In the 1990s it became clear that the cost-containment policies aimed at constraining supply and controlling prices resulted in increasing waiting lists for hospitals, nursing homes, home health care and institutions for the mentally handicapped. This fuelled the public discontent about the functioning of the, at that time strictly regulated, Dutch health care system (Schut and Van de Ven, 2005).

Following a court decision in 1999 stating that, within the Dutch social health insurance scheme, patients have an enforceable right to timely health care a system with activity-based payments replaced the fixed budget system for hospitals. This introduction of activity-based funding, however, was considered by the Dutch government as only a temporary solution to reduce waiting times. The limited incentives for efficiency and the lack of countervailing power of the health insurers increased the urgency of more comprehensive and fundamental reforms. The Netherlands has opted for a system of regulated competition and private insurance, with wide-ranging reforms implemented since the mid-2000s to reinforce the role of market mechanisms. In 2006, competition among health insurers was reinforced with the introduction of the Health Insurance Act, which made private health insurance mandatory for everyone. The basic idea behind the reform was to give risk-bearing health insurers appropriate incentives to act as prudent buyers of health services on behalf of their customers. To that end, the Health Insurance Act allows health insurers to selectively contract with health care providers. However, also after the introduction of managed competition the Dutch government is concerned about the rapid growth of health care expenditure caused by the combination of hospitals' and specialists' incentives for extra production and uncertainty about insurers' countervailing buyer power (Schut and Varkevisser, 2013). In the Netherlands, real hospital care expenditure (constant prices) growth escalated from 0.2 percent in 2000 to on average 4 to 5 percent in more recent years.

Against this background, the Dutch government introduced two additional policy measures to counteract possible price increases and supplier-induced demand. First, it substantially increased the incentives for health insurers to negotiate more forcefully with hospitals about prices and production by making insurers fully financially accountable for hospital services (previously health insurers were retrospectively compensated for part of their hospital expenditure). Second, the government negotiated an agreement with the associations of hospitals and health insurers to limit the growth of hospital expenditure (in real terms) per year. To be able to enforce the agreement the government created a legal option of using a "macro budget instrument" to guarantee that the aggregated annual expenditure on hospital services does not exceed an ex ante macro budget set by the government. In case the aggregated hospital expenditure exceeds the annual budget, the government can require all hospitals to repay the excess revenue in proportion to their respective national market shares (in terms of expenditure). In contrast to the previous system of individual hospital budgeting, this threat implies that hospitals' final revenues in year  $t$  do not only depend on their own performance but also on the performances of all other hospitals. As a result, each individual hospital faces a prisoners' dilemma: if it does not raise revenues while all other hospitals do, it may nevertheless face the same revenue cut. Hence, the unintended effect of the enforcement of this macro budget is that all hospitals have incentives to increase revenues by raising prices. If prices are well above marginal costs, they may also have an incentive to increase production. These incentives may be counterbalanced by, among other things, stronger incentives for health insurers to reduce costs. However, the combined impact of all (conflicting) incentives is ambiguous and therefore difficult to predict.



#### 1.3.4. Medicines

159. All countries have a lot experience with competition in some health care sectors, of which the market for (generic) medicines is perhaps the most prominent one. As presented by Dylst et al. (2011), European countries frequently use tendering as an instrument to lower spending on outpatient prescription pharmaceuticals through competitive bidding and other negotiation mechanisms which allows the payer to obtain better prices while assuring quality.
160. The pharmaceutical market is very important, accounting for a 10 to 30% of health care expenditure (including in-hospital medicines and ambulatory medicines), depending on the country. Different strategies have been developed to improve efficiency in this market. From the point of view of the payers, this means for example obtaining lower prices.
161. In Spain, the Ministry of Health with the Regional Health Services have created a coordinated procurement mechanism in order to obtain better prices, reinforcing the purchaser bargaining power.<sup>22</sup>
162. In the EU, a Joint Procurement Agreement was approved which will enable EU countries to procure pandemic vaccines and other medical countermeasures as a group, rather than individually. Joint procurement enables Member States to ensure that pandemic vaccines and medicines are available in sufficient quantities and at a correct price, in the case of a cross-border health threat. The mechanism will benefit all EU countries, in particular the mechanism to purchase vaccines.
163. Strategies to increase the utilisation of generics, where competition between different producers is more obviously present, have obtained good results. In this sub-market, competition is a positive mechanism to improve efficiency (Niëns and Brouwer, 2013).
164. Design and negotiation of the type and number of agents in the distribution chain, and negotiation of prices can improve efficiency (Barrios, 2004). The threat of generic competition upon patent expiry generates incentives for patent holders to further invest in developing innovative medicines, while at the same time it may provoke unwanted strategic behaviour aimed at prolonging patents' life and delaying generic

---

<sup>22</sup> See Box 5 for further details.

competition.<sup>23</sup> Competition between innovators to introduce new products with the same therapeutic purpose, also earning their own patents, decreases the market power created by one patent.

165. Competition created by generics, that is entry of products with bioequivalence and thus close to the economic notion of “perfect substitutes” (the term “therapeutically equivalent products” has been used in this context), resulted in lower prices, according to evidence from several countries. Price is, in this particular situation, the predominant competition variable, as quality is ensured by safety and regulatory requirements. Price competition produced savings to payers. Note the pre-conditions that apply to this case: information about the product is available to all (the active ingredient is known in its properties and effects from the under-patent period) and quality is enforced by regulation and essentially equal for all products.

166. Another relevant element to take into account when discussing introduction of competition is the starting point. If the market already has competition, additional elements of competition may have little impact overall, and the costs of promoting further competition may exceed its benefits.

167. Tendering programs for medicines can achieve substantial savings in the short term. However, potential problems and uncertainties regarding the long-term effect allied with these programs are not to be neglected. These include, among other things, possible effects on the sustainability of the generic medicines industry and/or the delivery of selected medicines.<sup>24</sup>

### **1.3.5. Pharmacies**

168. Also pharmacies are often a sector targeted for competition. The existence of regulated markups over costs in many European countries has been considered as a motive for introducing (or strengthening) competition.

169. Incumbent pharmacies are often protected by entry restrictions, based on population density and/or geographic distance. Lowering entry restrictions is expected to result in more competition generating benefits for patients (Schaumans

---

<sup>23</sup> The OECD expert paper "Unjustified delays in generic drug competition" by C. S. Hemphill (2014) provides some examples of strategic behaviours intended to prolong patent life and delay generic competition.

<sup>24</sup> See Box 1 above for a country example.

and Verboven, 2008). That is, as the market is more concentrated, individual pharmacy bargaining power vis-à-vis payers increases.

170. Community pharmacy was an area in which increase the competition was argued to be beneficial to increased accessibility of medicines for patients, as competition will lead to opening of more places of sale, and eventually drive down pharmaceutical spending. In the case of over-the-counter medicines, the new facilities may not be pharmacies. The most common objection to the introduction of competition in community pharmacies was the drop in the quality of services that would follow as well as reduce accessibility for vulnerable groups and/or remote areas.

171. On these three dimensions, the recent review and comparison of countries in Vogler et al (2014) points to a) increased accessibility; b) uneven results in pharmaceutical costs (decrease in Sweden but not in Norway, for example); and c) if anything, a decrease in quality of services provided. The increased accessibility resulted from both an extensive adjustment (more pharmacies) and an intensive adjustment (longer opening hours). No price effects were detected, namely in the over the counter medicines, which have liberalized prices. In Norway, concerns were expressed about the concentration of activity in a few networks after deregulation (with emergence of an oligopolistic structure, three pharmacy chains having 81% of market share). Another important qualification resulted from the short-term nature of opening of new pharmacies. Following the evidence presented by Vogler et al (2014), it seems that a shake-out period occurs after liberalization, with entry bringing the number of pharmacies above the long-run number that can be sustained. Exit (closure) then follows. On the quality of services, the effects observed in Norway, Sweden and England were an increase in workload for pharmacists, less counselling to patients (Sweden) and lower professional training (Norway).

### **1.3.6. Competition among health care providers and health systems objectives**

172. The impact of competition in health care could be different depending on the level where competition is implemented. The macro level needs to be distinguished from the meso/micro level. Competition between providers of health care takes place on the micro level, and the aggregated effects are felt on the macro level.

173. The relevant questions are about the impact of the introduction of competition between providers in health care in a particular area on objectives at different levels of the health system. The work by Joumard et al. (2010) highlighted some of the challenges of system-level comparisons. The study showed more variation within

health system 'types' than across them. The policy implication of this is that the details of policy design in specific areas are in some ways more important than overall system architecture. This variation in overall health systems' performance seem unrelated to existence of competition among health care providers in any particular area or in general across areas of health care provision.

174. In the European Union there are different kind of health systems. The majority share common values: Universality (100% of people entitled); Solidarity (more than 70% publicly financed); Access to high quality services (comprehensive benefit package); and, Equity (reasonable accessibility to services for all people, not fully accomplished in all countries)
175. The way in which each system is organised and managed differs depending on the history, the culture, the development of different institutions, etc.
176. At the aggregate level, an imperfect proxy for the existence of competition as a way to organize transactions is the extent to which the health system uses elements of market mechanisms.
177. It is clear that health systems in Europe differ in the degree of private provision in primary care and hospital care, on extent of patient choice (ability to choose primary care physician, to choose hospital and to access secondary care without referral) and the utilisation of explicit monetary incentive systems.
178. According to the OECD review of health systems characteristics (Paris et al, 2010; Joumard et al 2010; OECD 2012) examples of systems with more "market mechanisms" were Luxembourg, Belgium, France, Germany, the Netherlands, and examples of systems with "weak market signals and strict regulation" were Italy, Finland, Portugal and Spain. The term "market mechanisms" refers here to a broad (and somewhat imprecise notion at the macro level) of more areas of health care delivery where there is competition among health care providers.
179. The relationship of "competition" to efficiency (or any other policy goal) faces methodological issues. Establishing causality from competition to efficiency faces methodological challenges. The decision to introduce (or to increment) competition may be endogenous to the level of efficiency in the provision of health care. Lack of efficiency in the health system may lead to the introduction of competition as an instrument to improve it. At first glance, the correlation between efficiency and competition may therefore be negative; i.e. one may observe that countries with less efficiency have also introduced more competition at that particular moment in

time. Whenever competition results in more efficiency over time, a positive correlation would be observed. This raises an issue of identification of which case is at hand. Competition policies have to be analysed in a case-by-case approach, focusing on specific sub-markets and taking into account the context. For health systems as a whole, or for different submarkets out of their specific contexts, generalization of results could lead to severe mistakes (in either direction, in favour or against “competition” as an instrument to achieve health policy goals).

180. Costa Font et al (2012) when analysing the evidence in cost-containment and choice, highlighted that “traditionally less integrated health care systems, which also tend to allow more provider choice, seem to exhibit historically high expenditures”. They suggest that there could be other drivers for “choice and competition reforms” (middle class demand for reforms, commercial interests, modernization). Hartman (2013) analysed Swedish competition reforms and concluded that on basis of existing research it is not possible to find any proof that the reform of the public sector (competition oriented) has entailed the large quality and efficiency gains that were desired. After analysing reforms based on hierarchy or market orientation some authors have recommended changing policies based on external stimuli towards policies aimed at supporting NHS organisations and staff to lead and deliver improvements (Ham 2014).

181. Competition could be useful to reach certain objectives in a meso-micro level, mainly in submarkets of Health Care Goods and non-clinical services. The submarket of clinical services may behave differently.

182. At the micro level, for clinical services, a certain degree of competition could have positive effects in certain conditions combined with cooperation strategies. But, it depends on the desired policy goals: expenditures, quality, responsiveness, etc. In countries with high degree of competition, to reduce choice and incentives may be beneficial. In countries with a low level of competition, an increase choice and incentives can also be beneficial. Each country has to achieve the appropriate combination of cooperation and competition according to their economic capacity. The balance of market versus non-market mechanisms will be conditional on policy goals defined by the health system.

183. Competition, in the context of low information availability, could have adverse effects that should be known and controlled. More competition (more choice for patients, and incentives for providers), under some conditions, will increase total costs and expenditure, and will increase the positive subjective opinion of patients (responsiveness). Provider costs may decline, but as a whole the program may cost

more to the payer, as more providers serving more patients expand utilisation. The extra utilisation of health care can be a positive effect, or not, depending on the benefits that it generates. Some competition could be useful to compare performance between different institutions for a certain procedure (e.g. dialysis, MRI scan, endoscopies, etc.). But the key aspect is to have a good system of control and assessment of clinical outputs (not only quantity, but also quality, relevance, etc.).

184. Putting together the existing views and evidence, a cautious case-by-case approach is required in the analysis and potential recommendations regarding the role of more, or less, competition among health care providers. As stated several times already, the impact is context dependent, including the starting point of the health system, and valuation of this impact is to be done based on health system objectives and their prioritisation, which may differ from country to country as well.

#### **1.4. Provider competition in European health systems: key issues and challenges**

185. In this section we highlight some key issues that cut across different parts of the health system and may influence the outcomes of competition among providers. These include health insurance arrangements, the methods used to pay health care providers, the potential for economies of scale, the scope for competition at local, regional and national levels and competition between public and private providers. We then consider potential challenges such as the role of EU competition law, political economy considerations, differences in health system characteristics and future developments.

##### **1.4.1. Health insurance arrangements**

186. Where people do not have to pay out of pocket for health care, the focus of competition between providers shifts from price to other elements observable by the patient – timely access, the presence of the latest equipment, the appearance of facilities etc. If providers are sensitive to patient preferences in this regard, costs may rise.

187. Making providers compete to enrol in insurance networks shifts the focus of providers away from attracting patients towards negotiation of prices and conditions of provision. The latter can include aspects of quality, but may also include prior approval of procedures and other restrictions on the supply of health care. Insurance networks may, on the other hand, engage in competition for stellar providers (individuals or organisations), enhancing the bargaining power of these providers and enabling them to obtain higher prices for their services.

##### **1.4.2. Provider payment and incentives**

188. The way in which providers are paid can have a strong influence on provider behaviour, which in turn may influence the outcome of competition. For example, retrospective (fee-for-service) payment will promote provider activity, while prospective payment may create incentives for risk selection. Prospective payment creates stronger incentives for cost control, but the unit of payment is also important. Under prospective payment systems, paying for episodes of treatment has different implications from paying a fixed amount per capita per unit of time

(typically, a year). These effects need to be anticipated and monitored when introducing competition.

189. Innovation is driven both by the prospect of future gains and by putting current gains at risk. Some competition may be needed to stimulate innovation. At the same time, competition should not undermine incentives to develop new products and services. Historically, most innovation in health care has produced new products. However, there is a pressing need to find payment systems that reward process innovation (developing ways of providing existing services at lower cost).
190. Providers do not only respond to financial incentives. They may be motivated by other factors, including being part of a valued institution and the sense that they are offering people a valuable service. If competition is introduced carelessly, driven mainly by short-term commercial interests or electoral considerations, then the damage to the health service can be high in terms of – for example – fragmentation, increased costs, poor quality and also demoralisation of professionals and loss of confidence by the population.

#### **1.4.3. Low vs. high volume**

191. Competition should be aligned with value, where value is defined as health outcomes per unit of cost over the full care cycle.<sup>25</sup> One way of achieving this is to focus on treatment volumes, using minimum volume standards to ensure an efficient use of existing capacity.
192. The issue of low vs. high volume provision of health services is closely related to economies of scale and learning economies. Where there is potential for economies of scale, increasing the scale of an operation and increasing the volume of activities carried out will lower the average cost. As a result, overall health care costs will be lower when volume is concentrated on a few providers. Economies of scale require high-volume activity to be maintained permanently. Whether, when and at what level economies of scale exist needs to be examined carefully (e.g., these may occur when treating more patients with a specific disease, but not necessarily when treating more, but diverse patients in a hospital). A related but distinct concept is learning economies. These are unit cost decreases linked to the accumulation of

---

<sup>25</sup> Porter and Teisberg (2006), Porter and Guth (2012).



- experience and know-how. The volume of provision can also be related to improvements in the quality of the provision (practice makes perfect).
193. Achieving a sufficiently high volume of activity per provider is not always possible if the minimum efficient size for an organisation is large relative to demand for its services. In such instances, not many organisations will be available and competition will be weak. This is particularly true in specialty areas where there is an established link between volume and outcome. Of course, where there is competition *for* the market, the potential to stimulate high volumes is greater (as long as there are economies of scale).
194. Teaching institutions may face different requirements. Achieving a sufficient high volume of activity may be harder to achieve for settings that function both as health care providers and training centres for specialists and other health allied professionals.
195. Economies of scale are not possible in all forms of activity. If they were, having a single provider for each type of health service would be optimal. At some point, the organisation of health care delivery becomes so complex that smaller organisations are likely to be more efficient. The level of activity at which economies of scale are exhausted (that is, the point at which becoming larger increases unit costs) may vary from procedure to procedure.
196. The stronger the potential for economies of scale, the smaller the scope for many providers to be present in the market at the same time, which may relax competition pressure between health care providers. It may be the case that under strong economies of scale (relative to demand size) having only one provider of health care leads to lower costs (natural monopoly). Economies of scale are a well-known and thoroughly discussed barrier to entry and to more competition in a market.
197. Determining the optimal size of a provider is particularly challenging in health care, which involves many different services and products. In addition, the appropriate training of new professionals requires organisations to be large enough to contain a sample of all relevant clinical cases.

#### 1.4.4. Competition at local, regional, national and international levels

198. The geographical scope for competition depends on two factors: the extent to which patients are willing to travel and the time-to-treatment required for different interventions. Within an area, the degree of competition is therefore related to the cost of travel for patients and on how many providers that area can sustain. For non-urgent elective surgery, the relevant scope may well be international – even more so in border regions. In contrast, emergency care tends to be local in nature and proximity to a health care provider is the relevant criterion. Primary care is also generally local in nature and is likely to remain this way.
199. ‘International’ has different implications for countries centrally located in the European Union (e.g. Belgium or Austria) and countries in the periphery (e.g. Portugal, Greece, Romania). Travel costs in the latter are more likely to drive national markets in procedures that may have more international flows in the former.
200. Cross-border care remains relatively modest in Europe, perhaps due to cultural, linguistic and health system differences.<sup>26</sup> The way in which providers are contracted may also play a role in determining cross-border flows. The current procedure, in which patients first pay the costs of treatment and later receive reimbursement according to home-country prices or costs, deters patients who lack the financial ability to pay such care in advance. By extending the scope of health coverage to the whole of the European Union (with conditions), the EU Directive on Cross-border health care is likely to enhance options for citizens and spur competition between health care providers across countries.

#### 1.4.5. Competition between public and private providers

201. In theory, two factors are pivotal to determining the outcome of competition between public and private providers: the legal status of provider organisations and rules about access to private or non-contracted providers. There are also rules about access to public providers that restrict competition between public and private providers. An example is the Portuguese case of the patients’ referral system from public primary care providers to public hospitals. Patients have unrestricted freedom of choice only when choosing private providers.

---

<sup>26</sup> WBF Brouwer, NJA van Exel, HEGM Hermans & AP Stoop. Should I stay or should I go? Cross-border care and waiting lists in the Netherlands. *Health Policy* 2003; 63(3): 289-298.

202. Non-profit, for-profit and public providers may have different objectives regarding financial results, access to health care and quality of care. For-profit providers will prioritise financial results, with quality and access being relevant to the extent that they contribute to those results. Public or non-profit providers may have objectives regarding access, tilting their focus in that direction. This can lead to differences in behaviour.
203. As a result, the presence of non-profit or public providers, with objectives different from simple profit maximization, may be a substitute for adding providers. However, if public providers have discretion in the use of any surplus generated, their incentive to generate financial results will be closer to that of for-profit providers, since both will want to generate a surplus even though they distribute it in different ways. In practice, there is no evidence of differences in behaviour.<sup>27</sup> The literature on competition between for-profit, non-profit and public hospitals suggests that all three types of provider respond to financial incentives.
204. Two other features seem to be emerging in health care delivery. First, we observe the increased political, bargaining and market power of large providers. Secondly, there is the emergence of new actors such as international institutional investors.
205. In publicly or privately financed coverage, how third-party payers treat the reimbursement of patients who opt for a private or non-contracted provider can also influence market equilibrium. There are three possible options: first, the insurer can refuse to cover any of the cost (to patients) of using a non-contracted provider; second, the insurer can agree to cover the actual cost of visiting any provider; and third, the insurer can agree to cover a fixed share of the cost, regardless of which type of provider a patient visits.
206. In theory, the first option generates a competitive imbalance against the private or non-contracted provider. It will have to charge lower prices and serve a small share of patients, as most people will opt for covered providers. As a result, the public provider faces little or no competitive pressure and costs (prices, if negotiated in some sort of internal contracting with the public payer) will tend to be above the efficient level. However, if there are waiting times for covered providers – or other reasons for patients to be dissatisfied with covered provision – private providers will be able to cater to those willing to pay for their services. In practice, it is often

---

<sup>27</sup> Capps et al (2010a), Duggan (2000, 2002).

observed that private providers treating privately financed patients have higher prices than those (or when) treating publicly financed patients.

207. The second option<sup>28</sup> results in competitive pressure on the public provider, an arrangement predicted by economic theory to generate lower costs and prices than the first option.<sup>29</sup> Empirical evidence is not conclusive on the issue. Depending on the starting point and context – and design – this outcome (lower prices overall) may not arise.
208. Option three substantially lowers this competitive pressure. As a result, costs (prices) will be higher than under the first or second option.
209. These conceptual frameworks highlight the complexity of providing a “genuinely” level playing field. They also highlight the importance of payment mechanisms in guiding patients’ decisions in the choice of providers of health care. These considerations are to be added to other concerns among which is the drive for efficiency (absent from this discussion so far). This can especially be challenging when specific types of care (e.g. emergency care, highly specialised care), types of functions (e.g. teaching) and populations (e.g. poorer or less healthy populations) are treated only in the public sector.

#### **1.4.6. The role of EU law**

210. The provision of health care goods and services may come under the remit of EU and/or national competition laws. EU competition rules prohibit undertakings from participating in anti-competitive activities such as agreements to set prices (collusion) or the abuse of dominant position. Furthermore, any State support given to undertakings carrying out economic activities in this field should comply with State aid rules. Finally, mergers or acquisitions in the sector have to comply with EU/ national notification requirements. National policy makers may want to intervene in a market in a way that may lead to a certain degree of tension with EU competition rules, which nevertheless apply directly.
211. The main prerequisite to the application of EU competition and State aid rules is the qualification of health care providers as undertakings for which it is necessary that their respective activities are qualified as 'economic'. The Court of Justice has

---

<sup>28</sup> This was the option taken in the cross-border directive.

<sup>29</sup> Barros and Martinez-Giralt (2002)

- consistently defined undertakings as entities engaged in an economic activity, regardless of their legal status and the way in which they are financed.<sup>30</sup>
212. To some extent, this qualification depends on national specificities – in particular, the degree to which different health services providers can compete with each other in a market environment. In the case of hospitals, for example, this largely depends on the particularities of national health systems.
213. In some Member States, public hospitals are an integral part of the health system, their operation is directly funded from social security contributions and/or other State resources and they provide their services free of charge (or at a small fee for some services) to affiliated persons on the basis of universal coverage. The European Courts have confirmed that, where such a structure exists, the relevant organisations do not carry out an economic activity (e.g., Case T-319/99 FENIN [2003] ECR II-357, see also para. 22 of the SGEI Communication<sup>31</sup>).
214. In many other Member States, hospitals and other health care providers offer their services for remuneration, be it directly from the patient or from his insurance (e.g., Case C-244/94 FFSA and Others [1995] ECR I-4013; Case C-67/96 Albany [1999] ECR I-5751, paragraphs 80-87). In such systems, there is a certain degree of competition between hospitals concerning the provision of health care services. Where this is the case, the fact that a health service is provided by a public hospital is not sufficient for the classification of the activity as non-economic (see para. 24 of the SGEI Communication).<sup>1</sup>
215. Article 107 of the Treaty on the Functioning of European Union limits the granting of State aid to undertakings if it will distort competition and affect trade between Member States. Where public entities engage in public-private partnerships triggering public support, Member States would have to ensure State aid rules are observed.
216. The European Commission ensures that market players respect competition rules, as well as rules on free movement of goods and services within the internal market.

---

<sup>30</sup> Joined Cases C-180/98 to C-184/98 Pavlov and Others [2000] ECR I-6451.

<sup>31</sup> Communication from the Commission on the application of the European Union State aid rules to compensation granted for the provision of services of general economic interest Text with EEA relevance (OJ C 8, 11.1.2012, p. 4-14).

217. The Directorate General for Competition has tried to encourage competition in the health sector through its competition law tools such as a sector inquiry<sup>32</sup>, follow-up patent settlement monitoring exercises, anti-trust decisions<sup>33</sup>, as well as by monitoring state aid measures and mergers in the sector.
218. It is important to note that EU laws apply uniformly across the European Union, regardless of national health system structures. It is irrelevant whether the patient pays for services and is later reimbursed by the state or receives services as a benefit in kind. However, the impact of competition law may vary depending upon the degree to which Member States employ market-based mechanisms to finance, manage and provide health services.

#### **1.4.7. Political economy factors**

219. To be effective in achieving desired goals, any form of competition needs to be carefully designed, taking into account the nature of the good or service involved, the health system starting point and other contextual factors. As set out in section 2, the ability of policy makers to ensure that necessary conditions are met is a key contextual factor.
220. Critical tasks for government (or other actors) include setting up an appropriate regulatory framework and developing regulatory infrastructure, establishing clear rules about entry and exit, ensuring regulators and people have access to the information they need and monitoring and evaluating policies to ensure unintended consequences are addressed and goals are being met. The technical and financial capacity needed to fulfil these tasks effectively is substantial. Government ability to fulfil these tasks is likely to vary across countries.
221. Another factor likely to vary across countries is political commitment to ensuring competition achieves its goals without undermining other goals for the health system. This is particularly important given the wide range of interests involved in health systems and the often highly asymmetrical balance of power among different

---

32 See <http://ec.europa.eu/competition/sectors/pharmaceuticals/inquiry/index.html>.

33 See press releases for Case 39612 Perindopril (2014) ([http://europa.eu/rapid/press-release\\_IP-14-799\\_en.htm](http://europa.eu/rapid/press-release_IP-14-799_en.htm)); Case 39226 Citalopram (2013) ([http://europa.eu/rapid/press-release\\_IP-13-563\\_en.htm?locale=en](http://europa.eu/rapid/press-release_IP-13-563_en.htm?locale=en)) and Case 39685 Fentanyl (2013) ([http://europa.eu/rapid/press-release\\_IP-13-1233\\_en.htm](http://europa.eu/rapid/press-release_IP-13-1233_en.htm)); Case 39510 — LABCO/ONP [http://europa.eu/rapid/press-release\\_IP-10-1683\\_en.htm](http://europa.eu/rapid/press-release_IP-10-1683_en.htm), Case 37507 Astra Zeneca (2006) ([http://ec.europa.eu/competition/antitrust/cases/dec\\_docs/37507/37507\\_193\\_6.pdf](http://ec.europa.eu/competition/antitrust/cases/dec_docs/37507/37507_193_6.pdf)).

interest groups (tax payers, the public, patients, third-party payers, health service providers, manufacturers, investors and others).

222. The potential for regulatory capture –a form of political corruption in which regulations favour the interests of the industry being regulated rather than the public interest – is high in some contexts, especially where market actors are very large and enjoy significant political influence. Policy makers will require strong political skills to manage conflicting interests.

#### **1.4.8. Health system characteristics**

223. To what extent do differences between health systems affect the potential for competition to take place and be effective? We identify the following factors as being relevant to this question:

224. Differences in the *emphasis* placed on various health system goals. The goals themselves are broadly consistent across EU countries. Over the last 60 years, all EU countries have tried to build health systems that share common values such as solidarity, universality, equity and access to a comprehensive package of safe and effective health services of high quality. However, some countries may place greater emphasis on responsiveness to public preferences than on efficiency or cost control and vice versa.

225. Differences in norms: history, traditions and consensus around a particular way of doing things may affect the acceptability of competition as a policy instrument and also its effectiveness.

226. Differences in health system starting point, which may lead to differences in objectives for competition. For example, when Medicare in the US introduced diagnosis-related groups (DRGs) to replace fee-for-service hospital payment, the aim was to control overall hospital costs. In contrast, when many European countries introduced DRGs, they used them to replace global budgets, and the aim was to increase activity, potentially increasing overall hospital costs but lowering costs per case. Similarly, the introduction of so-called managed competition in the US implied a reduction in some aspects of provider competition relative to the previous situation.

227. Where health system characteristics are concerned, differences in provider payment methods, differences in the degree of competition that already exists, differences in the public-private provider mix and differences in provider autonomy are more

likely to be significant – in terms of their impact on competition – than structural differences in health system financing and organisation.

#### **1.4.9. The potential for new forms of competition in future**

228. A wide range of developments within and external to the health sector may drive new forms of competition in future, generating new opportunities and risks, new issues and challenges. It is not easy to predict how these developments will evolve. Examples include the following.
229. The EU Cross-Border Directive, which has opened an EU-wide market and created a right to access health services throughout the European Union.
230. There are changes in the mode of provider ownership that may lead to new forms of competition. In recent years, investment funds have become owners of health service providers. These funds are often international and driven by the prospect of profit through investment rather than through health care activity, potentially creating uncertainty and instability. They become a fourth player, in addition to citizens/patients, providers of health care and third party payers providing (public or private) health insurance.
231. ICT innovation leading to new ways of distributing goods and services, which disrupts traditional organisation. Some of these modes may be multinational in nature, lacking a precise location, making regulatory intervention more difficult.
232. Scientific developments in genomics and proteomics are likely to enable a more personalised approach to health care. Access to diagnostics will drive access to treatment, but the scope for competition may be limited.
233. Competition in health care provision may come from new developments in the way care is provided to patients. As an example, an important point raised in the Opinion on Primary Care (EXPH, 2014a) was the changing role of patients, with an explicit mention of competition between different professional groups to become the first (main?) point of contact for patients and to provide health promotion services (namely, as front runners, nurses and community pharmacists).



**1.5. What role for provider competition in European health systems?**

234. The previous discussion has highlighted that effects of competition are context dependent.
235. Not all areas of health care provision have the same potential for competition to work as a mechanism to allocate resources.
236. The Expert Panel considers that some areas are more likely to fulfil the conditions for effective competition to exist and others less likely. This reflects the opinion of the Expert Panel, based on the interpretation of the available evidence.
237. It needs to be recognised that most of the areas of health care provision include different submarkets with different prospects for competition: e.g. within the market for pharmaceuticals the submarkets for generic vs. brand name drugs and single-source vs. multisource drugs can be distinguished. Also in some areas the conditions for one type of competition are likely to be fulfilled while this is not true the conditions for another type of competition.
238. An exhaustive list of markets (or submarkets within markets) is not possible to provide. The following broad markets and their classification are illustrative of the application of general principles. It provides a general presumption and an initial view. The situation in each country and submarket needs to be examined in detail before specific policy recommendations can be produced.
239. Table 4 focuses on the expected role that competition among health care providers may have. Tables 5 – 8 reflect the view of the Expert Panel on current possibilities for each particular condition to be met for competition to have the potential to operate. It does not endorse the adoption of policies increasing, or decreasing, competition among health-care providers in each market for particular countries.
240. Tables 4 – 8 are set for discussion and should not be interpreted as advice for or against competition in each area, time and country.
241. As an illustration, the Expert Panel considers it to be relatively unlikely that the conditions for effective competition will be met in the case of emergency care with respect to the choice of provider by individual patients when there is an emergency need. However, this does not imply that competition cannot take place at a different level (e.g. with purchasing of such care by third party payers in relatively densely populated areas with several providers of this care).

**Table 4. Propensity to fulfil conditions for effective competition in health systems**

<b>Good conditions</b>	<b>Average conditions</b>	<b>Conditions unlikely to be met</b>
Pharmaceuticals	Hospital care	Emergency room
Pharmacy distribution	Primary care	Pre-hospital emergency
Patients' transportation	Preventive care	Intensive care
Imaging	Long term nursing care	
Laboratorial tests	Long term home care	
	Medical specialists	
	Renal dialysis	

Source: Expert Panel views.

Table 5-8 outline conditions for effective competition

**Table 5: Existence of multiple providers**

<b>Good conditions</b>	<b>Average conditions</b>	<b>Conditions unlikely to be met</b>
Pharmaceuticals	Hospital care	Preventive care
Medical products	Long-term care	Intensive care
Equipment	Renal dialysis	
Construction	Imaging	
Transport of patients	Laboratory tests	
Communication technologies	Emergency care	
Auxiliary services (security, maintenance, cleaning, catering, etc.)		
Pharmacy distribution		
Primary care		

Source: Expert Panel views.

**Table 6: Product (goods / services homogeneity (standards))**

<b>Good conditions</b>	<b>Average conditions</b>	<b>Conditions unlikely to be met</b>
Pharmaceuticals	Construction	Hospital care
Medical products	Transport of patients	Emergency care
Equipment	Preventive care	Intensive care
Communication technologies	Primary care	
Auxiliary services (security, maintenance, cleaning, catering, etc.)	Long-term care	
Pharmacy distribution	Renal dialysis	
Laboratory tests	Imaging	
Transport services		

Source: Expert Panel views.

**Table 7: Information about quality and price**

<b>Good conditions</b>	<b>Average conditions</b>	<b>Conditions unlikely to be met</b>
Pharmaceuticals	Construction	Emergency care
Medical products	Auxiliary services (security, maintenance, cleaning, catering, etc.)	Intensive care
Equipment	Primary care	
Transport of patients	Hospital care	
Communication technologies	Long-term care	
Pharmacy distribution	Renal dialysis	
Preventive care	Imaging	
Laboratory tests		

Source: Expert Panel views.

**Table 8: Conditions to start (and exit) health services provision or production of health care**

<b>Good conditions</b>	<b>Average conditions</b>	<b>Conditions unlikely to be met</b>
Transport of patients	Pharmaceuticals	Intensive care
Communication technologies	Medical products	
Auxiliary services (security, maintenance, cleaning, catering, etc.)	Equipment	
Primary care	Construction	
	Pharmacy distribution	
	Preventive care	
	Hospital care	
	Long-term care	
	Renal dialysis	
	Imaging	
	Laboratory tests	
	Emergency care	

Source: Expert Panel views.

## 1.6. Conclusions

242. Discussion of the policy implications of introducing or increasing competition among health service providers starts with the observation that **competition is an instrument** for organising decisions about the use of resources. It aims to improve efficiency, i.e. value for money.
243. Health systems have multiple objectives, among which the following have a high degree of importance: a) equitable access to effective, high-quality health services without financial hardship for patients; b) cost-effectiveness in service organisation and delivery; and c) transparency and accountability. Fiscal constraints are an additional factor that may induce health systems to control expenditure.
244. Some of these objectives and additional factors may be conflicting. For example, increasing access to health care may conflict with expenditure control, while the most cost-effective way of organising a particular service may have undesirable effects on equity and health outcomes.
245. Neither competition nor strict reliance on government regulation will solve all health system problems. Attempts to avoid or correct market failure can result in government failure and vice versa.
246. **The conditions under which competition will be a useful instrument for policy vary across countries, health system sub-sectors and time.** There is no fixed set of conditions that will ensure that competition improves health system performance. However, conditions that make it more likely that competition will have a positive impact on the use of available resources in the health system include: adequate information about provider prices and quality, standardised products (or services), the existence of multiple providers, easy entry and exit of providers and multiple buyers. The Expert Panel stresses the importance of information about quality as a particularly important condition for competition to improve access to high-quality care.
247. The sub-market of medical goods tends to meet the conditions for effective competition. In the sub-market of non-clinical services, “products” can be standardised relatively well; the entry and exit of multiple providers has no major barriers; and information concerning providers and the quality of services produced is relatively easy to obtain. The sub-market of clinical services presents more difficulties and is therefore less favourable for the introduction of competition. In this case conditions such as the standardisation of products, information on quality, and market entry and exit are easy to meet. Note that for laboratories the

- propensity to fulfil conditions for effective competition is good, as stated in Table 3 above. **Only a detailed analysis of each sub-market in a particular country and at a given time will reveal whether or not the conditions for competition are met.**
248. Provider competition can contribute to improving value in health service delivery, but details about where, when and how to introduce competition are critical. **Competition in health care provision will not solve all health system problems and may have adverse effects.**
- 249. Neither economic theory nor empirical evidence support the conclusion that competition should be promoted in all health services.**
250. **Competition is unlikely to achieve improvement in all aspect of health system performance at the same time.** It will not solve all the trade-offs policy makers face between different, sometimes conflicting, health system objectives.
251. Without generalising to every country, health service or moment in time, the Expert Panel acknowledges that (i) competition may improve access to health care, (ii) may help to achieve lower unit costs at the micro-level, though often aggregate costs may increase at the macro-level, (iii) may improve quality of care when there is reliable and pertinent information about it and (iv) may not necessarily harm equity. As mentioned above, all of these effects do not have to materialize at the same time. **The absence of a general presumption about likely effects on different health system objectives reflects the importance of details specific to each situation.**
252. The Expert Panel advises against policy measures to introduce (or increase) competition without a careful prior assessment of conditions for improvement in health system objectives and probable effects. Inadequate policy design can easily lead to unexpected or adverse effects. To avoid these, introducing competition in health care also requires policy actions aimed at allowing the market to function properly (that is, decisions taken by market players leading to an adequate performance of the health system, according to the objectives specified previously).
253. Empirical evidence will reflect the context-specific effects of competition. Conclusions may vary according to market, country and policy details and time. The empirical evidence base on competition among providers of health care is small but expanding, focussing on a limited set of countries (mostly the US and the UK for

- competition among hospitals, but also the Nordic countries with regard to primary care and the Netherlands, Spain and Portugal, among others, for generic drugs).
254. In pharmaceutical markets, competition in generics has been able to provide wider access at lower prices in several EU countries.
255. In hospital markets, the emphasis, in studies on the effects of competition, on mortality rates in hospitals (almost the sole indicator used to measure performance) does not allow for the generalization of results.
256. From an economic perspective, where there is adequate market information about quality of care and dominant positions are absent, competition forces organisations to become more efficient and innovative and may therefore reduce unit prices.
257. Where quality is observable and used to guide demand and prices are regulated, competition among providers is likely to improve health service quality. Quality-based choices by patients (or their agents) avoid low-quality standards, as long as patients or agents have the required information about quality to be able to observe differences across providers of health care. Where prices are not regulated, there is no presumption about the impact of competition on health service quality.
258. Information on quality, process and outcome is key for competition to work to achieve goals of improving value in health care.
259. Competition can at the same time increase the number of services provided and billed, creating uncertainty in relation to overall health care costs. That is, the introduction of competition may well result in increased costs and add to fiscal pressures. Increased costs may, or may not, be justified by additional health benefits to the population (or some parts of the population).
260. Geographical access can be interpreted as one relevant dimension of quality and the above-mentioned considerations apply. More competition may increase geographical access by encouraging the entry of new providers or by expanding the network of existing ones. Where there is regulated cross-subsidization across geographical areas or very different market conditions in different areas (say, creating local natural monopoly markets for the provision of some health services), competition between health care providers may be harmful.
261. Competition may more easily accommodate the heterogeneity of patients, in a decentralized manner, contributing to a more responsive health system.

262. The impact of competition on the health system, on the demand and supply of health care, and ultimately on the health of the population will be conditional on the environment in which it is introduced. It also depends crucially on how different agents adjust to it. Fostering more competition in markets that already have effective competition among health care providers is likely to result in few additional benefits.
263. Competition among health care providers may have unanticipated adverse effects, especially if introduced without careful analysis of the market involved. For example, competing providers will focus on quality indicators that are being measured while at the same time neglecting other (important) aspects of quality that are not being measured.
264. Small details in market characteristics (e.g. the type of service and/or the level of transparency) may lead to very different results. The ability to anticipate how competition will unfold and the ability to quickly measure and react to unexpected and (eventually) adverse evolution should be maintained.
265. Policy makers need to anticipate unintended consequences. For example, by lowering prices, competition may lead to a strong volume effect (increase in the use of health care services) and expenditure may increase. For health products or services in which providers are able to induce demand, a decrease in competition (resulting in a price increase) may also trigger a positive volume response (due to induced demand), increasing expenditure on health care. Thus, the same outcome – increased expenditure – may result from very different policies (and market conditions); the social value of the volume increase may well depend on the reason at its roots.
266. As competition is an instrument, **sound policy evaluation studies are needed to assess and judge its effects**. Such empirical studies are currently rare and even absent in some countries.
267. The introduction of competition has uncertain effects on equity of access to health care, as it is conditional on the effects above and on the heterogeneity of patients. Empirical work has found that the introduction of competition among hospitals, in the UK, produced little or no result in equity terms. This limited evidence does not allow for general presumptions about the effects of competition on equity of access to health care.

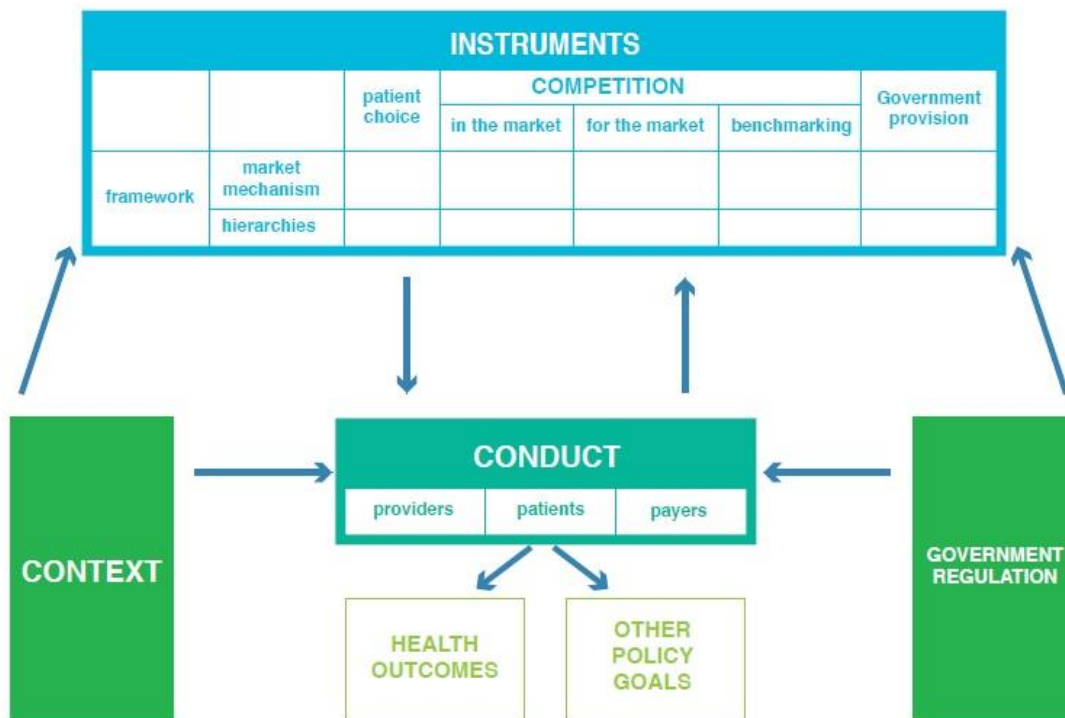


268. **Competition among health care providers needs to be distinguished from patient choice.** In principle, the former is possible without the latter and vice versa. Health systems may provide patients with alternatives to choose from, even if providers do not compete (that is, choose aspects of their activities to attract patients). Competition between providers may be, for example, to be included in networks of providers, without patients having the choice of which provider to go to, or may occur when health professionals make the choices on behalf of patients. Because the two concepts emerged at around the same time in many national public and policy discussions, they are often seen as two sides of the same coin, but they are in fact distinct. Patient choice is a less debated concept than competition. The value of patient choice has gained important status in several countries as an underlying principle for the health system. Patient choice does not imply competition among health care providers. Quality information and health literacy are important pre-conditions for patient choice and for direct competition to take place. Health literacy can be improved. Informed patients may drive performance improvement for the benefit of all.
269. The views expressed in this Opinion suggest several implications for policy. First, and foremost, **introducing or increasing competition in the provision of health care services is a delicate policy exercise.** The conditions for success and risks for failure need to be carefully assessed. In the right context, introducing competition may help to meet some health system objectives, although it is unlikely to contribute simultaneously and positively to all.
270. Secondly, **the introduction of competition in the provision of health care requires additional policy actions aimed at allowing the market to function properly followed by a careful, permanent evaluation of effects on relevant dimensions (qualities, prices, etc.).** Ensuring market transparency with availability of information on quality and prices, etc., is a complement to creating the conditions needed for the introduction of competition. The difficulties and challenges of measuring and comparing quality across services must not be underestimated.
271. Thirdly, the introduction of competition between providers of health care requires, among other conditions, **the enforcement of competition rules to prevent the creation, strengthening and abuse of dominant positions.**
272. Fourthly, **policy concerns about equity underline the need for monitoring of how the introduction of (or an increase in) competition between health care providers affects equity.** There is no general presumption about the impact

of competition on equity objectives. Competition is not, in general, the best instrument for addressing equity concerns. Details have to be discussed in each case (prior to predict and after to monitor).

273. Finally, **it is important to develop empirical evidence in ways that are useful for policy**. Empirical analyses need to be interpreted in the light of context-specific effects. They do not produce universal rules. Small details can lead to distinct impacts and a degree of uncertainty will always remain.

**Figure 2: Summary of forces and effects relating to competition as an instrument to achieve health policy goals**



Source: Expert Panel analysis

## **2. PUBLIC CONSULTATION**

A public consultation on this opinion took place via the website of the Expert Panel on Effective Ways of Investing in Health (EXPH) from 24 February to 13 April 2015. Information about the public consultation was widely communicated to national authorities, international organisations and other stakeholders.

Thirty seven organisations and one individual person participated in the public consultation providing input to the opinion. Out of the 37 organisations participating in the consultation, there were 4 public authorities, 5 universities/research institutions, 13 NGOs, 4 companies and 11 other.

Each submission was carefully considered by the Working Group and the EXPH and the scientific opinion has been revised to take account of relevant comments wherever appropriate. The list of references has been updated with relevant publications submitted during the consultation.

All contributions received and the reaction of the EXPH are available at [http://ec.europa.eu/health/expert\\_panel/consultations/docs/2015\\_results\\_healthcare\\_providers\\_en.pdf](http://ec.europa.eu/health/expert_panel/consultations/docs/2015_results_healthcare_providers_en.pdf).

## LIST OF ABBREVIATIONS

AMI	Acute Myocardial Infarction
anti-TNF	anti-Tumour Necrosis Factor
CPB	Netherlands Bureau for Economic Policy Analysis
DRG	Diagnosis-Related Group
EEA	European Economic Area
EEC	European Economic Community
EPOs	Erythropoietins
EQ-5D	is a standardised instrument for use as a measure of health outcome, primarily designed for self-completion by respondents and ideally suited for use in postal surveys, in clinics and face-to-face interviews
EU	European Union
EXPH	Expert Panel on effective ways of investing in Health
GP	General Practitioner
HIIS	Health Insurance Institute of Slovenia
HIV	Human Immunodeficiency Virus
HTA	Health Technology Assessment
ICT	Information and Communication Technology
INGESA	Instituto Nacional de Gestión Sanitaria (Spain)
IT	Information Technology
MRI scan	Magnetic Resonance Imaging scan
NGO	Non-Governmental Organisation
NHS	National Health Service (United Kingdom)
OECD	Organisation for Economic Co-operation and Development
OTC	Over-the-counter
SGEI	Services of General Economic Interest
TFEU	Treaty on the Functioning of the European Union
UK	United Kingdom
US	United States

## REFERENCES

- Andersson, F., Janlov, N., Rehnberg, C., 2013, Konkurrens, kontrakt och kvalitet – hälso- och sjukvård i privat regi, <http://eso.expertgrupp.se/wp-content/uploads/2013/08/English-summary6.pdf> [assessed 29.Nov.2014]
- Barros P, Martínez-Giralt X. Public and Private Provision of Health Care. *Journal of Economic & Management Strategy*. 2002. Vol 11 (1): 109-133.
- Barros, P.P. and X. Martinez-Giralt, 2012, *Health Economics. An Industrial Organization Perspective*, New York, Routledge.
- Bergström, F and Lund H, *Vinstdrivna sjukhus - Är fallet S:t Görans färdigbehandlat?*, Timro.
- Bevan G et al. *The four health systems of the United Kingdom: how do they compare?* The Health Foundation, Nuffield Trust. April 2014.
- Bidgood E. *Healthcare systems: Sweden & localism – an example for the UK?* CIVITAS. October 1st 2013.
- Boonen, L.H.M.M., S.A. van der Geest, F.T. Schut, M. Varkevisser (2010), *Pharmaceutical policy in the Netherlands: from price regulation towards managed competition*, in A. Dor (ed.), *Pharmaceutical markets and insurance worldwide*, *Advances in Health Economics and Health Services Research* 22, Emerald, Bingley (UK): 53-76
- Brekke K, Gravelle H, Siciliani L, Straume OR. Patient choice, mobility and competition among health care providers. In: Levaggi R, Montefiori M (eds). *Health Care Provision and Patient Mobility*. Vol.12. Springer; 2014, 1-26
- Brekke, Kurt, Luigi Siciliani and Odd Rune Straume, 2011, Hospital competition and quality with regulated prices, *Scandinavian Journal of Economics*, Volume 113, Issue 2, Pages 444-469
- Brekke, Kurt, Luigi Siciliani and Odd Rune Straume, 2012, Quality competition with profit constraints, *Journal of Economic Behaviour & Organization*, Volume 84, Pages 642-659
- Brekke, Kurt, Luigi Siciliani and Odd Rune Straume, 2015. Hospital Competition with Soft Budgets, *Scandinavian Journal of Economics*. Forthcoming
- Brekke, Kurt, Rosella Levaggi, Luigi Siciliani, Odd Rune Straume, 2014, Patient Mobility, Health Care Quality and Welfare, *Journal of Economic Behavior & Organization*, Volume 105, Pages 140-157
- Breton A (1996) *Competitive Governments. An Economic theory of Politics and Public Finance*. New York. Cambridge University Press 1996.
- Breton A (2003) *The Empowerment of Local Governments through Federalization*. Department of Economics. University of Toronto.

- Brouwer WBF, NJA van Exel, HEGM Hermans & AP Stoop. Should I stay or should I go? Cross-border care and waiting lists in the Netherlands. *Health Policy* 2003; 63(3): 289-298.
- Cookson R, Laudicella M, Li Donni P. Does hospital competition harm equity? Evidence from the English National Health Service. *Journal of Health Economics* 2013;32(2):410-422.
- Cookson R, Laudicella M, Li Donni P, Dusheiko M. Effects of the Blair/Brown health reforms on socioeconomic equity in health care. *Journal of Health Services Research and Policy* 2012;17(Suppl1):55-63.
- Cookson R, Dusheiko M, Hardman G, Martin S. Competition and inequality: evidence from the English National Health Service 1991-2001. *Journal of Public Administration Research and Theory* 2010;20 i181-i205. Download from Oxford Journals.
- Cooper, Z., S. Gibbons, S. Jones and A. McGuire, 2010, Does hospital competition save lives? Evidence from the English NHS patient reforms, mimeo, LSE.
- Costa-Font J and Rico A (2006). Vertical Competition in the Spanish National Health System. *Public Choice* 128 (3-4): 477-498.
- Costa-Font J, Zigarette V (2012). Are Health Care “Choice-and-competition” Reforms really Efficacy Driven? The London School of Economics and Political Science. Working Paper N°26/2012
- CPB - Netherlands Bureau for Economic Policy Analysis (2000), Yardstick competition: theory, design, and practice, Working Paper No 133.
- Curtis S, Petukhova N, Sezonova G, Netsenko N. Caught in the “traps of managed competition”? Examples of Russian health care reforms from St Petersburg and the Leningrad region. *Int J Health Serv.* 1997; 27(4) : 661-86.
- Dylst, P., A. Vulto & S. Simoens (2011), Tendering for outpatient prescription pharmaceuticals: What can be learned from current practices in Europe?, *Health Policy*, 101(2): 146-152
- Ellis RP (1998) Creaming, skimping and dumping: provider competition on the intensive and extensive margins. *J Health Econ*; 17: 537-555
- EXPH (Expert Panel on effective ways of investing in Health), Report on Definition of a frame of reference in relation to primary care with a special emphasis on financing systems and referral systems, 2014a.
- EXPH (Expert Panel on effective ways of investing in Health), Preliminary Report on Future EU Agenda on quality of health care with a special emphasis in patient safety, 2014b.
- Enthoven, Alain C. (1980). *Health plan: the only practical solution to the soaring cost of medical care*. Reading, MA: Addison-Wesley.

- Enthoven, Alain C. (1985). *Reflections on the management of the National Health Service: an American looks at incentives to efficiency in health services management in the UK*. London: Nuffield Provincial Hospitals Trust
- Enthoven, Alain C. (1988). *Theory and practice of managed competition in health care finance*. Amsterdam and New York: North-Holland.
- Farrar, S., J. Sussex, D. Yi, M. Chalkley, T. Scott, M. Sutton and P. Yuen, 2007, Evaluation of payment by results, draft final report to the Department of Health.
- Gaynor, M., K. Ho and R. Town, 2014, The industrial organization of health care markets, mimeo. March.
- Gaynor, M., R. Moreno-Serra and C. Propper, 2013, Death by market power: reform, competition and patient outcomes in the British National Health Service, *American Economic Journal: Economic Policy*, 5(4): 134 – 166.
- Gaynor et al 2011,
- Gaynor, M. and W. Vogt, "Antitrust and Competition in Health Care Markets" *Handbook of Health Economics*, Vol I, (Anthony J. Culyer and Joseph P. Newhouse, eds.), Amsterdam: North-Holland, 2000.,
- Gaynor, M. and R. Town, 2012, "Provider Competition," in *Handbook of Health Economics*, Vol II, Barros, P., McGuire, T. and Pauly, M., eds., Amsterdam: Elsevier. *Handbook of Health Economics*.
- Gaynor, M., 2006, What do we know about competition and quality in health care markets? *Foundations and trends in Microeconomics* 2(6).
- Godager, Geir. Tor Iversen Ching-to Albert Ma (2012) Competition, Gatekeeping, and Health Care Access. Health Economics Research Programme at the University of Oslo
- Gravelle H, Moscelli G, Santos R, Siciliani L. Patient choice and the effects of hospital market structure on mortality for AMI, hip fracture and stroke patients. Centre for Health Economics, University of York; CHE Research Paper 106, 2014.
- Gravelle H, Santos R, Siciliani L. Does a hospital's quality depend on the quality of other hospitals? A spatial econometrics approach. *Regional Science and Urban Economics* 2014; 49, p. 203-216.
- Ham Ch (2014) Reforming the NHS from within. Beyond hierarchy, inspection and markets. The Kings Fund, Jan 2014.
- Hartman L. The Consequences of Competition. What is happening to the Swedish Welfare System (2013). Centre for Business and Policy Studies (SNS), 17 june.
- Helderman, J.K., F. Schut, T. van der Grinten e W. van de Ven, 2005, Market-oriented health care reforms and policy learning in the Netherlands, *Journal of Health Politics, Policy and Law*, 30(1-2): 189 – 210.

- Hirschman A. O. (1964), "The paternity of an index", *The American Economic Review*, 54: 761
- Iversen (2011) *Vägvalet i Norden - en ESO-rapport om skillnader och likheter i Norden. Rapport till Expertgruppen för studier i offentlig ekonomi 2011:7.*
- Joumard I, André Ch, Nicq Ch (2010) *Health Care Systems: Efficiency and Institutions.* Economics Department. Working Papers N° 769.
- Kanavos, P. Sotiris Vandoros, Rachel Irwin, Elena Nicod, Margaret Casson, 2011, Differences in costs of and access to pharmaceutical products in the EU, study reported to Directorate General for Internal Policies, Policy Department A: Economic and Scientific Policy.
- Kringos D (2012) *The strength of primary care in Europe, dissertation, NIVEL, Utrecht.* Available at: <http://www.nivel.nl/sites/default/files/bestanden/Proefschrift-Dionne-Kringos-The-strength-of-primary-care.pdf>
- Kringos D, Boerma W, van der Zee J, Groenewegen P (2012) *Europe's Strong Primary Care Systems Are Linked To Better Population Health But also to higher spending,* *Health Affairs*, 32, no.4 (2013):686-694
- Lamata F. *Manual de Administración y Gestión Sanitaria.* Díaz de Santos. Madrid, 1998.
- Mukamel DB, Sector WD, Bajorska A. *Nursing home spending patterns in the 1990s: the role of nursing home competition and excess demand.* *Health Serv Res* 2005; 40(4): 1040-55.
- Niëns LM, Brouwer W. *Measuring the affordability of medicines: Importance and Challenges.* *Health Policy* 112 (2013) 45-52.
- OECD HSC (2012d), "Health System Characteristics Survey", OECD 2012
- Paris V, Deveaux M, Wei L (2010). *Health Systems Institutional Characteristics: A Survey of 29 OECD Countries.* OECD Health Working Papers, N°50, OECD Publishing.
- Polzin, P., Borges, J. and Coelho, A. (2015), *A decision support method to identify target geographic markets for health care providers.* *Pap. Reg. Sci.* doi: 10.1111/pirs.12167
- Porter, M. and Teisberg, E. (2006) *Redefining health care: creating value-based competition on results,* Harvard Business School Press.
- Porter, M. and Guth, C. (2012) *Redefining German health care: moving to a value-based system,* Springer.
- Propper C, Burgess S, Green K. *Does competition between hospitals improve the quality of care? Hospital death rates and the NHS internal market.* *J Public Econ* 2004; 88:1247-72.
- Propper C (2010). *The operation of choice and competition in healthcare. A review of the evidence.* 2020 Public Services Trust at the RSA.



- Rice T. Can markets give us the health system we want? *J Health Polit Policy Law* 1997; 22 (2): 383-426
- Rhoades S. A. (1993), "The Herfindahl-Hirschman Index", *Federal Reserve Bulletin*, 79: 188-189
- Saltman R, Busse R, Mossialos E. Regulating entrepreneurial behaviour in European health care systems. *European Observatory on health care systems series*. 2002.
- Schaumans, C. and F. Verboven (2008), *Entry and regulation: evidence from health care professions*, *RAND Journal of Economics*, 39(4): 949-972.
- Schleifer A (1985). A theory of yardstick competition. *Rand Journal of Economics*. 1985, 16(3): 319-327
- Schut E, Sorbe S, Hoj J (2013). *Health Care Reforms and Long-Term-Care in the Netherlands*. OECD Economics Department. Working Papers, N° 1010, OECD Publishing.
- Schut, F.T. and W.P.M.M. van de Ven (2005), *Rationing and competition in the Dutch health-care system*, *Health Economics*, 14(S1): S59-S74
- Schut, F.T. and M. Varkevisser (2013), *Tackling hospital waiting times: the impact of past and current policies in the Netherlands*, *Health Policy*, 113(1-2): 127-133
- Siciliani, L., M. Borowitz and V. Moran (eds.) (2013), *Waiting Time Policies in the Health Sector: What Works?*, *OECD Health Policy Studies*, OECD Publishing.  
<http://dx.doi.org/10.1787/9789264179080-en>
- SOU (1993), "Three models for the future of Swedish Health Care".
- Ståhl, I *The Growth of Health Care: Two model Solutions*" i A.J. Heidenheimer and N Elvander (eds) *The Shaping of the Swedish health Care System*. Croom Helm, London 1980.
- Ståhl, I *Can Efficiency and Efficiency be Combined? The Experience of the Swedish Health care System*. I M Olsen (red) *A New Approach to the Economics of health care*. AEI, Washington, 1981
- Van Ginneken, E., M. Bluemel, J. Cylus, A. Geissler, C. Hernandez-Quevedo, A. Maresso, S. Merkur, P. Mladovsky, D. Panteli, G. Pastorino, B. Rechel, E. Richardson, A. Sagan, S. Thomson, W. Quentin and R. Busse (2014). *Trends and patterns in EU28 health systems and Iceland, Norway and Switzerland*. Copenhagen, World Health Organization, on behalf of the European Observatory on Health Systems and Policies. In Press.
- Vogler, S., Habimana, K. and Arts, D., 2014, *Does deregulation in community pharmacy impact accessibility of medicines, quality of pharmacy services and costs? evidence from nine European countries*, *Health Policy*, 117: 311 - 327.
- Von Otter, C and Saltman R, (1987) *Re-vitalizing public health care systems: A proposal for public competition in Sweden*. *Health Policy Volume 7, Issue 1, Pages 21-40*,

## GLOSSARY

**Abuse of dominant position** – a market behaviour “which, through recourse to methods different from those which condition normal competition in products or services on the basis of the transactions of commercial operators, has the effect of hindering the maintenance of the degree of competition still existing in the market or the growth of that competition.” (Case 85/76, Hoffmann-La Roche v Commission of European Communities).

**Capitation** – “A method of paying doctors a fixed fee per period per patient registered (sometimes differentiated according to age or sex of patient) regardless of the amount of service provided” (Culyer, 2005)

**Competition** - is defined here as rivalry among providers of health care, resulting in incentives for tailoring their health care provision to the preferences of consumers eventually affecting prices, quality, service level, etc.

**Demand for health care** – use of health care as a function of several elements like health status, price of health care, distance from provider, quality of care, time spent, income, wealth, education, etc.

**Dominant position** – concept widely used in competition policy and competition law. “The dominant position ... relates to a position of economic strength enjoyed by an undertaking, which enables it to prevent effective competition being maintained on the relevant market by affording it the power to behave to an appreciable extent independently of its competitors, its customers and ultimately of the consumers” (Case 27/76, United Brands v Commission; Case 85/76, Hoffmann-La Roche v Commission of European Communities).

**Effective competition** – conditions in the market are such that health care providers are not able to sustain prices permanently at a level considerably above the costs of production (where the appropriate notion of costs includes return on investments made by the owners of health care providers) and thus do not earn abnormal profits. In a more informal way, effective competition is present when health care providers face strong pressure to find least-cost ways of delivering health care and satisfying patient needs.

**Fee-for-service** – “A method of remunerating professionals (especially medical doctors) according to an agreed fee-schedule specifying what is payable for each item of service supplied. It is to be distinguished from (though it may be used in conjunction with) capitation and salaried means of remuneration” (Culyer, 2005)

**Herfindahl-Hirschmann Index (HHI)** – Specific measurement of market concentration, that is, of the extent to which a small number of firms account for a large proportion of output. The HHI is used as one possible indicator of market power or competition among firms. It measures market concentration by adding the squares of the market shares of all firms in the industry. Where, for example, in a market five companies each have a market share of 20 %, the HHI is  $400 + 400 + 400 + 400 + 400 = 2\ 000$ . The higher the HHI for a specific market, the more output is concentrated within a small number of firms. In general terms, with an HHI below 1000, the market concentration can be characterised as low, between 1 000 and 1 800 as moderate and above 1 800 as high. (European Commission, Glossary of terms used in EU competition policy, 2002)

**Market equilibrium** – Market equilibrium occurs when demand for a product or service is equal to the supply of that product or service. To achieve market equilibrium, some variable (e.g., price, quantity, time, etc.) needs to adjust so that balance between demand and supply is achieved.

**Market power** – Ability of health care providers (firms) to price above marginal cost and for this to be profitable.

**Marginal costs** – Costs of producing one more unit of output.

**Payment system** – The way providers of health care products and services are paid. Examples of payment systems are cost-based payment, fee-for-service, capitation, etc. In a payment system, several of these elements can be simultaneously be present.

**Market failure** – Describes a set of situations in which the free market functioning does not achieve the best allocation of resources. There are many different reasons for market failure. The presence of market failure itself does not provide a ranking of mechanisms to allocate resources (e.g. free market vs. regulated market vs. Government direct provision).

**Reimbursement** – A retrospective payment made to someone for out-of-pocket expenses that they have incurred. (Culyer, 2005)

**Supply** – economic term describing the quantity of a product or service per unit of time that providers (firms) are willing to produce. It is a function of price of the product or service and of costs of production.

**Resource allocation** – in economic jargon, refers to the distribution of available resources (e.g., labour, land, equipment, natural resources, etc.) to alternative uses.

**State Aid** – “is defined as an advantage in any form whatsoever conferred on a selective basis to undertakings by national public authorities. Therefore, subsidies granted to individuals or general measures open to all enterprises are not covered by this prohibition and do not constitute State aid (examples include general taxation measures or employment legislation). To be State aid, a measure needs to have these features:

- there has been an intervention by the State or through State resources which can take a variety of forms (e.g. grants, interest and tax reliefs, guarantees, government holdings of all or part of a company, or providing goods and services on preferential terms, etc.);
- the intervention gives the recipient an advantage on a selective basis, for example to specific companies or industry sectors, or to companies located in specific regions;
- competition has been or may be distorted;
- the intervention is likely to affect trade between Member States. Despite the general prohibition of State aid, in some circumstances government interventions are necessary for a well-functioning and equitable economy. Therefore, the Treaty leaves room for a number of policy objectives for which State aid can be considered compatible. The legislation stipulates these exemptions. The laws are regularly reviewed to improve their efficiency and to respond to the European Councils' calls for less but better targeted State aid to boost the European economy. The Commission adopts new legislation in close cooperation with the Member States”.

(EC, [http://ec.europa.eu/competition/state\\_aid/overview/index\\_en.html](http://ec.europa.eu/competition/state_aid/overview/index_en.html))

## ANNEX

This annex contains illustrative examples of good and bad uses of competition as an instrument in health care markets. The examples are from the EU Member States, and were prepared by the members of Expert Panel. They are presented in no particular order.

### **Box 5: Centralized purchasing of health care goods (drugs and other products) in Spain**

The Health System in Spain was decentralized after the 1978 Constitutional Law. The 17 Autonomous Communities, or Regions, assumed the competences of planning, managing and contracting the provision of health services. The Regional Health Services were (and are) responsible for the contracting and payment of drugs and health care products. The size and economic volume of each Regional Health Service varies according the population of the Region, from 8.5 million people (Andalucía) to 350,000 people (La Rioja). Purchasing Goods for 46.5 million people (the Spanish population) could offer certain advantages for the health system.

Under the context of crisis and economic constraints, in March 2010 the Ministry of Health and the Autonomous Communities agreed, among other measures, to design a Centralized National Purchasing mechanism in which the Regions could participate voluntarily. Eight Regional Health Services participated in 2011 in the first centralized purchasing of flu vaccines, with estimated savings of €3.84 million. Subsequently fourteen Regional Health Services participated in the 2012-2013 campaign, with estimated savings of €5.2 million.<sup>34</sup>

The Ministry of Health and the Autonomous Communities decided to expand this practice to other drugs and health care products. The tenders would be organized and managed by a Central Unit (INGESA, Health Management Institute, at the Ministry of Health).<sup>35</sup>

A national tender including surgical gloves, glucose test strips, incontinence pads and bed soakers was launched in 2013. A group of manufacturing companies (represented by Fenin) contested the tender, and the process was suspended by the Court of Justice. Finally the tender was concluded satisfactorily (except, still, for the surgical gloves). The Centralized Purchasing Unit also put out a tender for recombinant factor VIII, anti-TNFs and erythropoietins (EPOs).

The manufacturers argued that the criteria for choosing products had to be not only price but also quality, and that tenders at national or regional level would create price pressure for manufacturers, limiting their access to the market.

The estimated savings of the different contracts (not counting flu vaccines) have been more than 50 million €. Between five and fourteen Regional Health Services participated in the different centralized purchasing agreements, depending on the tender.

Continuing this process, in June 2014 the Ministry of Health approved the inclusion in the centralized purchasing mechanism of other 74 products, like intraocular lenses, hip joint prosthesis, heart valves, stents, etc.<sup>36</sup>

<sup>34</sup> <https://www.msssi.gob.es/estadEstudios/estadisticas/sisInfSanSNS/tablasEstadisticas/infnsns2012.pdf> (page 162).

<sup>35</sup> <http://www.ingesa.msc.es/>

This mechanism (aggregated purchasing of health care products through tenders) seems to have contributed to improve efficiency and to establish quality standards for the National Health System.

#### **Box 6. Distortion of competition in the health services outsourcing in Spain**

In 2013 the National Competition Commission published a report on procurement and competition bidding processes for the provision of public health in Spain, analysing Public-Private Partnership contracts (long term concessions).

The report analyses five aspects of Public-Private Partnership contracts in Spain:

- the design of the tender procedure
- the setting up of the technical specifications
- the setting up of selection criteria
- the choice and weighting of award criteria
- contract modification

Different areas in which competition could have been distorted were identified: The size and design of the lots was not suitable; There was insufficient information (mainly financial implications); Of the 19 contracts that include medical services only 4 received more than one tender; The duration of the contracts seemed excessive; The foreseen quality control mechanisms were insufficient; In 24 out of a total of 38 contracts, there were significant changes of contracts after award; Excessive discretion of the contracting authority; The need for a rigorously controlled inter-center billing service when remuneration is capitation;

Reference:

National Competition Commission, 2013. Aplicación de la Guía de Contratación y Competencia a los procesos de licitación para la provisión de la sanidad pública en España. (Application Guide to Procurement and Competition bidding processes for the provision of public health in Spain).<sup>37</sup>

#### **Box 7: Competition among providers in Sweden**

The discussion about competition in health care in Sweden started already in the early 1970s, as a result of the debate on the need to curb growing public health care costs. It was stimulated by the emerging interest in health economics, and the late professor Ingemar Ståhl published a number of influential articles, his ideas are best summarized in two papers Ståhl (1980, 1981). The debate was inspired by Alan Enthoven's (1980) book "Health Plan; The only practical solution to the soaring costs of health care". His focus was on competition between insurers, who then controlled providers. In 1985 he published a book on the application of his ideas to the NHS, Enthoven (1985) and his ideas on "managed competition" were presented in an influential book, Enthoven (1988). While the growing health care expenditures was what initiated the debate, it is important to observe that the problem was defined as one of efficient allocation of resources; i.e. the optimal level as well as the direction of health care expenditures. Budget impact was not seen as the primary policy objective, rather a result emerging from optimal incentives for decisions about resource allocation.

<sup>36</sup> <https://www.boe.es/boe/dias/2014/06/25/pdfs/BOE-A-2014-6665.pdf>

<sup>37</sup> <http://www.cncompetencia.es/Default.aspx?TabId=228>

Enthoven observed that the growing importance of third party financing of health care in the US gave incentives for providers to expand the services without considering the costs and benefits at the margin. This contributed to the expansion of health services, and there was a lack of mechanisms to decide on the optimal level of health expenditures. Ståhl, coming from a public health care system, observed a similar growth of health care expenditures, and attributed to growth to a political pressure to increase costs above the optimal level, using a theoretical approach from public choice; a majority of voters would vote for increased public expenditures if they judged the benefits higher than the taxes paid. Competition among "health plans" where the consumer could make a choice between plans with different levels of benefits and costs was seen as the solution to the ailing US and the European health care systems.

During the 1980s, sociologists and political scientists entered the debate, not from the perspective of growing health care costs, but from the perspective of patient choice, see von Otter and Saltman (1987). It was noted that citizens, who had increasing choices in the private sector, totally lacked choice in important parts of the public sector. They "belonged" to a defined health care centre for primary care or a specific hospital for secondary care. Competition was thus a consequence of the goal to introduce more choice, and not a goal in itself. However, through choice information was provided about some aspects of quality of care, like access and the process of care, which could be observed and acted on by the patient. Choice can thus be seen as an instrument to improve aspects of value that otherwise may be neglected. It was debated if competition among public providers was enough to meet the objectives of empowering patients, or if opening up the market to private providers was necessary to give patients the desired choice. While the focus was on patient choice, the role of competition to meet other policy goals such as cost control and efficiency was indirectly brought into the discussion from the perspective of "patient empowerment".

The debate about alternative ways of organising health care forced/stimulated the county councils in Sweden to start experiments with alternative form of organisation. The reforms were based on the idea of separating the role of payers and providers within the county councils, thus breaking up the fully integrated health care system, where budgets were allocated directly to providers. New remuneration systems were also tried, for example payment of hospitals per patient treated, according to a classification of patients in diagnosis related groups (DRG). Competition for resources between providers was thus introduced, but since choices for patients were limited, particularly in less populated regions of Sweden, the degree of competition was also limited. However, the impression was that initially the introduction of competition increased productivity, which was an implicit goal for the reforms. Since the county councils in Sweden both can decide on the tax rate for financing of health care, and have great freedom in how the services should be organized different "models" developed, without central control.

However, the central government by the end of the 1980s decided that it was time for a thorough investigation of alternatives for Swedish health care organisation for the future. A public investigation was initiated by HSU 2000, with the remit to review all aspects of the Swedish health care system during the 1990s, and it published its final report in 1999. As the start of HSU 2000, a report by an Expert committee "Three models for the future of Swedish Health Care" (SOU 1993:38), different organisational frameworks for the Swedish health care system were evaluated. Competition among providers was one aspect of the evaluation, but played a minor role in relation to other structural aspects; most importantly the pros and cons of centralization versus decentralization of different types of services., and the merits of a change to an insurance based system in Sweden.

With the start of the new century, two important conclusions were reached. The first was that there were no practical possibilities and/or support for competing health care insurers in Sweden. The second was that the purchaser/provider split was established as

the norm in the health care system. As a result, this opened up for private providers who could compete within a system with public providers for contracts. Focus thus shifted from competition to patient choice.

One major hospital in Stockholm, Capio St Göran, was privatised in 1999, after being transformed into a publicly owned limited company in 1994, and there was an intensive debate on the consequences (Bergström and Lund, Timro). While the accounts show that St Göran is delivering cost-effectiveness care compared to the public providers, it has also been pointed out that the lower costs may be explained by specific advantages from a pricing and cost point of view. The available information systems do not allow a definitive conclusion, which may indicate that potential differences are rather small. There may also be benefits in having one private hospital within a system dominated by public providers, even if observed ex post differences are limited. It should be noted that the corporatization in 1994 was followed by significant improvements in productivity, reducing the headroom for improvements from the privatization. Capio St Göran has recently signed an agreement with the county council for providing services until 2021, which could be seen as a sign of success.

Most reform during the last 10 years have focused on "vårdval" (choice of provider) within a single payer system. In Sweden, patients have a free choice of primary care provider, and there is also free entry, if providers fulfil the criteria set up. This is regulated in a law that was in-acted in 2010 (LOV Lagen om vårdval).. can be seen as a goal in itself, patient empowerment, but also as an instrument to improve productivity and quality of care. Free entry for private providers of primary health care that meet the county council's requirements for establishment, with public reimbursement, is also stated as a goal for the law. The two other stated goals are improved diversity and the development of quality and efficiency in health care. The introduction of the law was followed by extensive evaluation under the leadership of the Swedish Competition Authority. Several reports have been published, and while the lack of relevant data for evaluation is emphasised, the main conclusion is that the number of providers of primary care has increased. Areas of concern are the different conditions of operation for private and public providers and consequences in terms of impact in efficiency and equity. A new report, including the experience during the last years, is expected soon. The new government has put forward a law that will abolish the law of compulsory demand on the county councils to introduce freedom of choice and entry, indicating that these reforms are not merely technical but also political.

For specialist care there is also free choice of providers, with some restrictions, often linked to the length of waiting time. It has shown difficult to increase implement choice and private providers in specialist care. Two main issues are control over volumes and total costs. Structural aspects, and the need for integrated approaches to health care, makes it also more complicated to introduce privatisation for specialist services than for primary care.

There is a debate on the outcome of the reforms of choice and privatisation, see for example Hartman (2011). While the book has the title "Consequences of competition", focus is on "privatisation", i.e. the role of private providers of welfare services; health care being one of these. At the beginning privatisation was mostly based on the contract model, with public contracting bodies and their financial backers (local governments, county councils and the state) buying services from private companies in accordance with contractual terms and conditions. Since then there has been a gradual shift towards customer choice models, where consumers themselves can choose between approved producers. This involves residents taking a "bag of money" financed by the public authorities to their chosen producer. The research results so far do not reveal any clear-cut efficiency gains or losses, for example, in the form of lower public spending on welfare services, from greater competition. One area that possibly deviates slightly from this general picture is primary care, where accessibility as a quality measurement



appears to have increased. Two explanations are given for the lack of significant improvements from competition/privatisation. Firstly, these markets are not real markets but quasi-markets, where consumers only have limited power; for example demand is mostly determined by the public budget and public authorities also regulate the range of providers to varying extents. There are also a number of other market failures that can prevent competition from working.

Secondly welfare services are very special kinds of services as they are complex and linked to extensive externalities. It is often impossible to change your mind once a decision has been made.

In the chapter on “Private health services”, the author concluded that there is lack of data to describe the development of “privatisation” in health care, and very few Swedish studies of the consequences. In general, private providers get higher quality ratings than public, but the differences are small and both get high ratings. There is no evidence that productivity and efficiency in different county councils are related to the rate of privatisation. This cannot be expected since the level is rather small. It is only for primary care that relevant comparisons can be made. The chapter includes a section of consequences of for profit provision, mainly based on data from US. A conclusion is that payment mechanisms play a larger role than for- versus non-profit provision.

It has been difficult to document improvements in patient satisfaction, quality of care and cost control as a consequence of reforms to increase choice in health care and social services. There may even have been some indications of negative consequences for equity. But due to the large variations in implementation it is impossible to make definitive conclusions. A tentative conclusion may be that it has been easier to introduce competition in primary care than for specialist services. Specialist services are in Sweden mainly performed at hospitals, and the choices of hospital are limited except in the bigger cities. Empirical results from Norway suggest that competition has negligible or small positive effects on referrals. The results do not support the policy claim that increasing the number of primary care physicians reduces demand for and use of secondary care, Godager et al (2012).

The role of competition and privatisation of health services has been once more review in a recent Swedish report, see Andersson et al 2014. This report does not include any new empirical data, but analyses the issues from a contract and transaction cost perspective. The focus is on which type of health care markets that can expect to function well, and what types of regulations are necessary. The analysis covers both public procurement model and the customer choice model. In public procurement, the public buyer and the funder buy services from private or public agents in accordance with the rules for public procurement and contractual agreements. In a customer-choice model (choice of medical care), the patient herself gets to choose between suppliers of medical care that have been approved by the buyer. The suppliers of medical services can be either private or public. This means that patient choice governs the flow of resources to producer.

The authors find that activities that are characterised by low transaction specificity, high frequency, less uncertainty and the possibility to follow-up and measure are to a larger extent out-sourced to private agents. In particular, this concerns areas of care such as primary care and planned treatments with a relatively low uncertainty, which can be measured. In addition to the key factor of measurement of quality, they point to the importance of accreditation of private providers and the details of the payment system as important factors that determine the outcome of completion in health care markets.

The right to choose provider is now firmly rooted in the Swedish health care system. The discussion is not anymore focused on competition, but rather the observed differences in access to care, as well as differences in clinical outcomes between different county councils. It is not proven that variations in access are the main reason for variations in outcome, but focus in health policy has turned towards variations in access and outcome,

and competition is not seem as the most important instrument for improving quality of care and outcome. More centralization, through a reform where the county councils are replaced by a national health care system is the most discussed reform. The expectation is that this would facilitate coordination of resources and clinical processes, so that “all choices of providers are good choices”, leading to an effective, equitable and cost-effective provision of services.

There is still a debate about options for competing insurers, see Iversen (2011) in the Nordic countries, as a potential solution to some of the problems that rationing using open priorities, increasingly replacing waiting lists, as an instrument to allocate resources within a system of free choice of providers.

**Box 8: Competition helped to improve waiting times in Portugal**

Long waiting times for surgical intervention have been a problem in the Portuguese National Health Service for a long time. After several special funding programs in the late 1990s and early 2000s, 2004 saw a different approach being laid out. Instead of providing more funds to extra activity for hospital to treat more patients in the waiting list, the NHS started a centralized program of intervention that included a centralized IT system of registration of all patients in waiting list, target times to be met by hospitals and freedom of choice for patients of where to have surgery when 75% of the target time was met. The program creates competition for treatment of patients above the threshold. Competition was limited to the patients waiting too long for intervention, patients face no payment and the hospital that “loses” a patient to another one did not have, in the first years of the program, a financial cost associated with it, as the payment by global budget was insensitive to these cases. Currently, there is a financial cost to the origin hospital. The surgical teams taking up the patients above the threshold are paid on fee for service and these interventions take place outside the normal schedule of public activity in the destination hospital. This competition for extra activity contributed to lowering waiting times in hospitals and preliminary evidence suggests it helped to increase efficiency in operations in both normal (i.e. within the regular schedule of a NHS hospital) and extra activity.

**Box 9: Competition in OTC pharmaceutical products had only mild results in Portugal**

Pharmacies in Portugal had for a long-time exclusivity in the selling of several products, including naturally prescription-only pharmaceutical products and over-the-counter products. In 2005, the Government decreed a double liberalization: pricing freedom on over-the-counter products and entry freedom on entities selling these over-the-counter products. The new entities are not pharmacies although they have still to obey some licensing rules. Supermarkets have been some of the new entities (and the ones with largest growth) as well as smaller stores dedicated to over-the-counter and beauty/cosmetic products. A 2010 and 2006 measurement of the impact of this double liberalization process in the city of Lisbon (the capital and the largest city in Portugal) showed that entry took place, but price competition has not led to a substantial price decrease. These new entities do seem to have lower prices than pharmacies, but not an economically significant price difference. Moreover, the evolution from 2006 to 2010 did not reveal an increase in competition bringing lower prices to citizens in over-the-counter products. Convenience increased for patients as more points of sale do exist.

**Box 10: Competition resulted in lack of service for community pharmacies located in hospital premises in Portugal**

Hospitals in Portugal do not have traditionally an ambulatory pharmacy to sell pharmaceutical products to outpatients. Prescriptions given in outpatient visits were to result in the patient going to a community pharmacy, with exception of pharmaceutical products that are provided exclusively in the hospital (i.e. HIV drugs). A new law in 2006 opened the possibility for hospitals to concession opening a privately run pharmacy in their premises. The tendering procedure was selected in the law as the appropriate mechanism to select the private partner, in what constitutes a process of having competition for the market (it also has some features of introducing more pharmacies competition in the market, as the demand is diverted from community pharmacies outside the hospital to the new ones). This possibility was also regarded as a way for NHS hospitals to increase their external revenues, through the payments of the private partner. The tendering procedures took place in six hospitals. After seven years of passing the law, all these pharmacies are either closed or with a high indebtedness to the host hospitals. The proposed rent costs to be paid by the private partner to the hospital in the tendering procedure were unrealistic. The selection of the winners was based on the best revenue stream to the hospital. Competition for these pharmacies was fierce, as restrictions to opening a community pharmacy were and are in place in Portugal. However, the end result observed could have been predicted from the start, as the bids were clearly unfeasible. Some of the winning bids promised to pay the hospital per unit of sales more than the (regulated) margin accruing to the pharmacy from selling prescription-only drugs. For such bids, the private partner could only make a profit if it sold other, non-prescription, health products with relatively large margins. Despite warnings about the unlikely profitability of these bids, the contracts were awarded. When debts of the private partners in these pharmacies to hospitals started to mount, requests for renegotiation of conditions were presented but rejected under the contract terms. Closure and exit was the final decision. The hospitals decided to not repeat the process. The extreme competition for the market, which led to unreasonable bids, resulted in lack of service of a community pharmacy within hospital premises, with patients losing the possibility of buying immediately the pharmaceutical products prescribed in outpatient visits at the hospital. One can arguably say that the principle of competition for the competition was not the problem but rather its application. Nonetheless, this remains one instance where introduction of competition was not successful in Portugal.

**Box 11: Competition in health care in Finland**

The Finnish health care is based on public providers. Local health centres are run by municipalities and public hospitals by hospital districts (that are owned by municipalities). In addition, private doctors substitute the system by providing services for the patients that are willing to cover the costs. The costs of the patients are partly reimbursed from the national health insurance system that also covers the costs of sick leaves (e.g. salary losses). The third provider system is occupational health care which is financed fifty-fifty by employers and employees and is subsidised (up to 50 % of the acceptable costs) from the national health insurance.

There has been little competition in Finland between public health care providers until now. From 1.1.2014 onwards, the new Health Care Act allowed the patients to have free choice of their public provider. However, few patients thus far have used this possibility. Some hospitals have started marketing of their services especially to the Helsinki metropolis area, where the waiting times for specialised health care are longer than in some other cities in Finland. There is little data on quality of the hospitals available for patients to make the choice. Furthermore, since the bills are paid by the municipalities, the price of the service does not play a major role for the patients.

Instead, the competition to provide services in occupational health care has been fierce. The companies buying the services are opening their agreements every 3-5 years. There are 3-4 providers in Finland that cover most of the country and are able to contract with the major companies in Finland for their occupational health care. Most of the provider chains are now owned by capital investment companies and there has been much discussion on tax evasion and related issues. Despite the competition, the costs of occupational health care have risen during the past few years.

In traditional private health care, individual doctors compete against each other for patients. The competition in this area is very modest and the Finnish Medical Association has specific rules for marketing. In practice, the well known “stars” in medicine will have their patients and they may or may not charge somewhat higher prices from their patients than their average colleague.

**Box 12: Vertical competition (competition between health systems) in Spain**

The term vertical competition is to be interpreted as competition of vertically integrated systems through benchmarking. Vertical competition is more likely to be present in countries with regionalised health services.

In 1996, Albert Breton published *Competitive Governments* where he presented an economic theory of politics and public finance and the concept of vertical competition. He developed a model of Vertical Competition (Breton 2003).

The idea is that decentralization benefits competition.

It is a kind of competition between politically accountable jurisdictions that could produce significantly policy innovations in the provision of (health) services and welfare development. Vertical Competition “materializes as a result of the incentives to competition that result from the distribution of powers between government tiers” and represent a “pseudo yardstick competition” (Costa-Font 2006). The National Health System in Spain has developed this kind of vertical competition.

The government becomes potentially more responsive to constituents’ demands because the closeness of decentralised governments to the people, and also because they aim at guaranteeing re-election. This feature can give rise to competition between different government tiers.

At the same time, the comparison between health system performance of different regions or to that of a “benchmark” government could promote improvements and innovation.

In some cases a certain mobility between regions or countries can be observed, by those in search of better services.

Ham (2014) analysed the results for health care policies in the UK (hierarchy, inspection and markets) and suggested complementary approaches like internal competition: integrated service networks funded through capitation budgets competing with each other to improve performance while also collaborating and sharing learning across the system. This competition relies less on “external” economic incentives, and more on “reputation”, satisfaction with a job well done, pride in being part of a well functioning service, ... “fostering commitment rather than compliance... tapping into the intrinsic motivation of staff to do a good job” etc. Ham (2004) offers some examples of this policy orientation in New Zealand, US (Veterans Health Administration) and European Countries.

Public Health Services management and provision in Spain was decentralised in a process that began in 1978 and ended in 2002. Vertical competition between regional health services created policy innovation improving quality of services and patient satisfaction.

The basic characteristics of the system are common (benefits package, coverage, financial arrangements) but each regional health service can organize services in different ways, under its responsibility. Proximity to the population allows a better identification of the citizens' needs and a more agile response to them.

Comparison between regions stimulates the development of new measures. An example has been the development of health informatics in Spain (medical record, electronic prescribing and dispensing, digitized radiological imaging, telemedicine, etc.). Another example has been the coordination between health and social services, initiated in one region 8 years ago and now being developed in all the country. A third example is the definition of standards and guarantees in relation to waiting times: 15 years ago one region established a maximum waiting time and mechanisms to guarantee accessibility for diagnostic procedures and planned surgery, and now there are similar schemes in all the National Health System.

The implementation of the Primary Health Care model, the design and implementation of emergency and medicalised health transport systems, or the mental health model, community orientated, are other examples in which comparison and interchange of experiences have stimulated the development of services.

Scientific professional associations, patient associations and media, have been important actors in the dissemination of innovation between regional health services.

Reference:

Costa Font J and Rico A, 2006. Vertical Competition in the Spanish National Health System. Public Choice 128 (3-4):477-498

<http://link.springer.com/article/10.1007%2Fs11127-005-9011-y#page-1>





