

ESMT White Paper

DEFINING PRODUCT MARKETS FOR SHOPPING CENTERS

THOUGHTS ON METHODOLOGICAL CHOICES

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1. Introduction and key results

It is well known that structural measures of concentration like market shares are sometimes poor indicators of market power and likely the competitive effects of a merger. Despite recent initiatives to de-emphasize the importance of concentration measures in merger analysis in the United States and the United Kingdom, concentration measures and, hence, market definition remains a decisive element in many merger decisions. In several jurisdictions there is a presumption of dominance if post-merger market shares are above a certain threshold, which varies from 30 percent (e.g., in Austria) to 50 percent (e.g., in Belgium).¹

Taking this emphasis on structural indicators as a given, this paper studies market definition in the sector of leasing and managing retail rental properties. This segment is interesting because in recent decisions national competition authorities have applied very different methodologies and have reached very different conclusions regarding the scope of the relevant product and geographic market.² The two extremes are relevant markets defined in a decision by the Polish competition authority which grouped the shopping centers in Warsaw by its characteristics and found a very narrow relevant product market and a recent decision by the Austrian Cartel Court, which applied a survey-based SSNIP test³ and found a wide product and geographical market.

In this paper, we identify a number of relevant stylized facts of the sector for leasing and managing retail rental properties and set out an economic framework for defining relevant markets in this sector.

Whether in a particular case markets should be defined narrowly (e.g., separating different types of retail spaces even within a given group of shopping centers or street strips) or widely (e.g., including all rental space for retail outlets in a given area) is an empirical question that will depend on the facts of the case. However,

¹ The specific thresholds can be codified in legal acts or stem from established case law precedents.

² These developments are summarized in more depth in section 2.1.

³ A SSNIP test is a more structured and economic approach relative to an *ad hoc* definition of the relevant market by using arguments about product similarity. In a survey-based SSNIP test, consumers are asked about their buying decisions to determine if a hypothetical monopolist could profit from a price increase of 5-10%. If a sufficient numbers of buyers indicate that they are likely to switch to alternative products so that lost sales would make the price increase unprofitable, then the tested hypothetical market is too narrow and the procedure is repeated with another (larger) basket of products. See more details in section 4.1.

we find that a segmentation based solely on characteristics will likely fail to identify the correct relevant market.

- First, existing industry classifications group shopping centers according to a number of characteristics. However, there is no agreement on which characteristics to use and in which order: more than 25 different categorizations have been adopted by various associations or vendors in different countries. These classifications were created with goals other than market definition in mind.⁴ Relying solely on such classifications would yield arbitrary market definitions.
- Second, in the shopping center business rents are set according to the Occupancy Cost Ratio;⁵ thus differences in the attractiveness of shopping malls and the expected turnover of a tenant are reflected in the level of rent. A shopping center that generates less traffic due to its inferior characteristics compensates this disadvantage by setting lower rents.
- Third, tenants or groups of tenants will consider the bundle of characteristics (including the rent) and trade off what they perceive as advantages and disadvantages. Their general location pattern (i.e., past location choices) will provide evidence on which location types are not considered by a specific tenant (type).
- Fourth, “multi-homing” by both tenants and shoppers shows further evidence of the existence of multiple viable alternatives for location.

Relying solely on product characteristics and existing classifications and disregarding actual substitutability patterns when defining relevant product markets may likely lead to erroneous market definitions that are too narrow.

The type of criticism of the characteristics approach that we present in this paper is based on well-known economic principles. Why then are approaches based solely on characteristics still so popular with competition authorities? We suggest that one reason is that a full formal SSNIP test is often difficult to implement. Indeed, we find that in the industry at hand owners of retail space tend to (or have to) conclude individually negotiated long-term contracts with tenants. Thus, in this

⁴ For example, the ICSC (International Council of Shopping Centers) classification which groups shopping centers according to size (i.e., neighborhood, community, regional and superregional) is essentially used as a tool for property valuation by investors and for benchmarking at an international scale.

⁵ Occupancy Cost Ratio (OCR) is the ratio of total occupancy cost for the tenant to their sales. This ratio measures the significance of real estate costs in the overall cost structure of the tenant. More detailed discussion of rents can be found in section 2.3.2.

industry we lack the data on frequent transactions that would enable us to apply a number of statistical techniques in order to predict the anticipated behavior of tenants in light of a hypothetical price increase.

However, such difficulties in applying statistical techniques should not lead to abandoning the logic embedded in the SSNIP test. A key feature of the SSNIP test is to identify consumers' response (switching) when faced with a small but significant price increase. In contrast to the characteristics-based approach, the SSNIP test focuses on the economic effects and possible consumer harm by identifying markets that are "worth monopolizing."

We suggest making use of a mix of evidence and methods that fit this logic. The most reliable evidence of sensitivity of demand to change in prices comes from tenants' actual responses to past price changes or the impact of unforeseen "natural experiments" on shoppers' behavior and/or the level of rents. More detailed analysis of the cost structure may be helpful in simulating the effects of a hypothetical rent increase on tenants and predicting switching. Surveys can be helpful in generating evidence on past behavior and the ordering of substitutes. Questions related to responses to a hypothetical price increase may complement such evidence, albeit we emphasize significant reservations due to potentially biased answers.

We identify a number of factors that appear relevant when applying the SSNIP test logic to shopping centers.

- **Positive externalities:** While in standard markets (without externalities) the profit reducing effect of a price increase is often limited to the loss of revenue generated by the customers that leave, shopping centers may also suffer more due to two further effects. First, if (attractive) tenants leave, traffic in the shopping center is reduced. This harms other tenants' revenue and will therefore lead to reduced rents. Moreover, vacancies impact negatively on the shopping center's image. If they last for a prolonged period of time they can initiate a downward spiral in terms of traffic. Second, if rent increases are passed on to shoppers, the number of shoppers for all tenants will decline. Again, this reduces the attractiveness of a shopping center for its tenants, leading to reduced rents. Accounting for the effect of these externalities tends to unambiguously widen the product market and failure to do so results in markets that are too narrow.
- **Tenant types:** The very business of shopping center managers is to find an optimal mix of tenants and to negotiate rents that reflect the revenue potential of a given tenant type, taking into account the positive effect

on traffic in the shopping center. This implies that there are limits to substituting tenant types. Also, different tenants may look for different rental units, so it may be useful to distinguish tenant types and consider their options separately. Lessons on the relevant markets for tenant types can be drawn from their past location decisions. Different tenant types may also differ in their ability to pass on rent increases to final consumers, which is also relevant for the analysis of the profitability of hypothetical price increases and market definition.

There are indications that in merger investigations, authorities should focus on the options of tenants with significant positive externalities (“anchor tenants”) to take an informed decision on market definition.

In the past, some competition authorities in the United States and in Europe have taken a very lenient attitude to merger control in the market at hand. In recent decisions national competition authorities have moved to the opposite extreme. With the methodology proposed in this paper, we attempt to provide an approach that can be adopted on a case-by-case basis. It may be complemented, however, by a more general empirical study of the impact of concentration on rents. We leave this for future research.

2. Background

2.1 Relevant precedents

Historically, competition authorities in various jurisdictions have rarely been concerned with antitrust problems in the market for retail rental space and have defined these markets relatively broadly. However, in two recent merger cases French and Polish competition authorities defined and analyzed the product market at a much narrower level than in any of the previous decisions. In this section, we briefly summarize historical developments in the United States and in Europe. A more comprehensive list of European cases and decisions can be found in the appendix.

2.1.1 United States of America

In the USA, a court decision from 1983 defined the product market for rental retail space relatively broadly.⁶ The court has found that retailers “seeking retail space in the Washington, D.C. metropolitan area would compare retail space throughout the entire metropolitan area” and that the relevant product market is the market for “leasing of retail space, not just retail space at regional malls.”⁷

Furthermore, in March 1995, the FTC and DOJ announced a reform intended to facilitate compliance with the Hart-Scott-Rodino Act (HSR Act). One of the results of the initiative was to amend the HSR Act to exempt from filing requirements some transactions which are unlikely to violate the antitrust laws. The purpose of the exemptions was to remove an unnecessary burden from business and to allow the FTC and DOJ to better focus their scarce resources on transactions that are more likely to cause competitive harm. One of the exemptions specifically covers certain real estate acquisitions, such as the acquisition of retail rental space and warehouses.⁸ The amendment went into effect in 1996.

⁶ Net Realty Holding Trust v. Franconia Props., Inc., No. 82-0318-A, 1983.

⁷ Net Realty Holding Trust v. Franconia Props., Inc., No. 82-0318-A, 1983, paragraphs 31 and 32.

⁸ Sec. 802.2(h): “An acquisition of retail rental space (including shopping centers) or warehouses and assets incidental to the ownership of retail rental space or warehouses shall be exempt from the requirements of the act, except when the retail rental space or warehouse is to be acquired in an acquisition of a business conducted on the real property.”

However, the exemption from HSR filing does not mean that an acquisition is exempted from merger review or enforcement actions. In fact, the FTC and DOJ have been active recently filing cases in opposition to mergers that had already closed and were exempt from HSR filing for one reason or another.

One such example is a recent (November 2010) settlement between the FTC and Simon Property Group, Inc. to divest property and modify tenant leases in order to preserve outlet center competition in parts of southwest Ohio, in Chicago, and in Orlando following Simon's acquisition of Prime Outlets Acquisition Company, LLC.⁹ The FTC's concern was that the transaction would give Simon a monopoly in outlet centers serving the Southwest Ohio market and would allow Simon to prevent or limit new outlet center entry and competition in the Chicago and Orlando local markets.

While the FTC concluded that in Chicago and Orlando, new entry was in principle likely to prevent any increase in rents paid by outlet center tenants, at issue were restrictions common in many of Simon's leases that prevent tenants from opening other stores in outlet centers within a specified distance. As a result of these restrictions, an outlet center developer wanting to open a new outlet center serving either Chicago or Orlando would find it difficult to sign key tenants to leases. As part of the settlement, Simon has agreed to remove radius restrictions for tenants with stores in its outlet centers in these local markets.

2.1.2 European Union

In the EU merger decisions in the real estate sector, the Commission commonly recognized the differences between segments of properties for commercial use and properties for residential use.¹⁰ More recently, other differences between different types of commercial properties have also been highlighted. For example, they could in principle be further segmented according to the customer type into office properties, retail properties (shops), and industrial properties.¹¹

However, in essentially all the cases, there was no need to formally define the markets since even under the narrowest of all the reasonable definitions

⁹ In the matter of Simon Property Group, Inc., a real estate investment trust. Docket No. C-4307, FTC File No. 101 0061.

¹⁰ See e.g., decision in case M.1289 - Harbert Management/DB/Bankers Trust/SPP/Öhman and case M.1637 - DB Investments/SPP/Öhman.

¹¹ See e.g., decision in case M.2825 - Fortis AG SA/Bernheim-Comofi SA, case M.2863 - Morgan Stanley/Olivetti/Telecom Italia/Tiglio or case M.3370 - BNP Paribas/Atis Real International.

considered the mergers would not lead to the creation of a dominant position. In none of the merger cases listed on the EU website was the retail (shopping) market segmented any further. (See more details in appendix A1.1.)

2.1.3 France

The French Competition Authority in its decision on the Unibail/Rodamco merger has analyzed narrower markets within the real estate services sector. More specifically, it divided its analysis of the management of real estate property assets according to the following criteria: the type of real estate services provided, the target customers (individuals vs. businesses, or residential vs. commercial) and the use (offices/shops/other industrial uses).¹²

Analyzing more specifically the segment of real estate used by retail stores, the French Competition Authority has distinguished between space leased at shopping centers (malls) and space leased on the ground floor of busy commercial streets (“en pieds d’immeubles”) as defining two distinct segments of the market.

Furthermore, with respect to leasing space at shopping centers, the French Competition Authority noted that the national industry association differentiates between four different types of shopping centers:

- Small shopping centers (*les petits centers commerciaux* or PCC) with a leasable surface of five to 20,000 square meters and usually 20 to 40 tenants,
- Large shopping centers (*les grands centers commerciaux* or GCC) with a leasable surface of 20 to 40,000 square meters and usually 40 to 80 tenants,
- Regional shopping centers (*les centers commerciaux régionaux* or CCR) with a leasable surface of over 40,000 square meters and usually over 80 tenants,
- Specialized shopping centers (*les centers à thèmes spécialisés* or CCT) with factory outlets or specializing in construction products.

The French Competition Authority analyzed the competitive effects of the merger at the level of PCC, GCC and CCR segments and did not find competitive issues. In its analysis, the authority used three different criteria for calculating market shares, namely (1) the number of shopping centers managed, (2) the area of

¹² This was done with a direct reference to the case M.2863 - Morgan Stanley/Olivetti/Telecom Italia/Tiglio.

shopping centers, and (3) the number of tenants at shopping centers. Although in some local markets, the market shares of the merged companies in some segments as defined above would reach 50 to 60 percent which could in principle raise concerns about dominance, eventually the authority concluded that the transaction was unlikely to create competitive problems and cleared the merger. Specifically, the French Competition Authority highlighted the fact that (1) after the merger the merging parties would still face strong competition from other significant players, (2) some buyers in this market, including tenants with national or international brands, have a strong countervailing bargaining power because they provide center operators with an important and stable volume of commercial business and have a reputation essential to attracting visitors to shopping centers, so they would presumably be immune to attempted rent increases by the centers' operators, and (3) in the areas of concern there was a substantial competitive pressure from retail space in downtown shopping strips. As eventually at all levels of analysis no competitive problems resulting from the merger were identified, the investigation did not require taking a specific decision on market definition.

2.1.4 Poland

In its recent decision on the Unibail-Rodamco/Simon Ivanhoe merger, the Polish Competition Authority also utilized definitions by a national industry association to differentiate between shopping centers. Specifically, the Polish Competition Authority has considered as competitors only the shopping centers which do not differ significantly with respect to the following five characteristics:

- the size of the entire shopping facility (in the decision, at least 40,000 square meters),
- the size of the shopping center's leasing space (in the decision, at least 20,000 square meters after subtracting the area used by the hypermarket),
- number of tenants in the shopping center (in the decision, at least 100),
- tenant mix (arguing that shopping centers with a better tenant mix have an advantage), and
- location (arguing that, e.g., shopping centers located in strategic areas of the city, for instance in the proximity of major transit hubs, have an advantage over those located less conveniently).

Of the 24 shopping centers in Warsaw only 10 met all the thresholds specified in the first three characteristics. Additionally, the Polish Competition Authority excluded from the relevant product market one of the 10 centers based on its geographic location (criterion 5), as it was argued that it was located more than 10

km and more than a 20-minute drive from the center of Warsaw, resulting in a market definition comprising nine of 24 shopping centers overall. For the purposes of the competitive analysis, market shares were calculated based on the Gross Leasable Area (GLA) and on the revenues of the merging parties.

Based on this narrow market definition, the Polish Competition Authority determined that market shares of the merging parties would exceed the 40 percent threshold, which under Polish law creates a legal presumption of dominance. The authority approved the merger under a significant divestiture condition that brought the joint market share of the merging parties below the legal dominance presumption threshold.

2.1.5 Austria

Another recent case involving shopping centers was tried in an Austrian court. A complainant alleged competitive harm due to exclusivity (non-compete) clauses in lease contracts by a large competitor. The restrictions did not allow some of the competitor's tenants to open their stores at the complainant's location.

A court-appointed economic expert defined the relevant product and geographic markets by means of a survey-based SSNIP test and identified about 15 "agglomerations for shopping" in the 50 km range of Salzburg. As a result of the test, it was found that the shopping strips on busy commercial streets constituted credible substitute for shopping centers. Furthermore, besides all the shopping centers in Salzburg, the locations in the center of the city of Salzburg were identified as part of the relevant market, as well as locations in neighboring areas and even some retail rental locations in Germany.

The judge quoted the fact that many of the shopping centers' anchor tenants were present not only in the shopping centers, but also in stand-alone buildings in the center of Salzburg. Given this broad market definition, the defendant was found to have a market share of at most 15.4 percent and the complaint was dismissed in the first instance as failing to meet the *de minimis* threshold necessary for existence of competitive harm.

2.2 Objective of market definition in a merger context

The European Commission characterizes the objective of market definition as follows:

Market definition is a tool to identify and define the boundaries of competition between firms. It serves to establish the framework within which competition policy is applied by the Commission. The main purpose

of market definition is to identify in a systematic way the competitive constraints that the undertakings involved face.¹³

Market definition is often a crucial step in merger cases, although it is not an end in itself. In more complex settings the seeming simplicity of relevant markets and market shares may obscure some important features of the market and market shares may provide an inaccurate assessment of the industry's competitiveness. Therefore, the process of market definition and the interpretation of market shares should not be the final and ultimate goal of the analysis but only part of a more comprehensive economic assessment of a competitive impact of a merger.

When relevant antitrust markets are correctly defined, the next step of a competitive assessment of a merger typically focuses on calculating market shares and their expected changes as a result of the merger. Market shares have a simple and intuitive interpretation: low market shares typically characterize defragmented market with intense competition, while high market shares can be indicative of a concentrated market with weak competition. Unfortunately, often the relation between market shares and the competitive assessment of an industry is weak. In some cases a merger from three to two might not significantly impede competition, while in others a much more moderate increase in concentration may be problematic.

To quantitatively define a relevant antitrust market rigorously and precisely requires a large amount of information and data that is often not easily available. Even when such data is available, the administrative merger deadlines often do not provide enough time to conduct robust econometric estimates of demand systems. Indeed, if such an estimation were conducted, then its results could be used to simulate the effects of the merger directly, without the need to explicitly define markets.

Faced with these constraints and limitations, the competition authorities often define markets based on simplifying assumptions and shortcuts. Failure to understand these limitations and ignoring the important features of the industry may result in market definitions which do not correspond to market realities and may consequently lead to erroneous conclusions and incorrect decisions. In the next section we discuss in a stylized form some features of the shopping center industry that may have an impact on market definition in that sector and show that market definition based on characteristics is rarely appropriate.

¹³ Commission notice on the definition of relevant market for the purposes of community competition law, Official Journal C 372, 09/12/1997, 5–13.

2.3 Relevant economics of shopping centers

2.3.1 Tenant types

Tenants at shopping centers are a heterogeneous group of businesses ranging from large international chains to large national retailers and small local businesses. Shoppers benefit from a mix of retail outlets brought together at a single location. Thus, the presence of one retail outlet typically has a positive externality on other retail outlets by generating additional traffic.¹⁴

Besides complementarities related to consumers saving on search costs, shopping centers and other concentrations of stores may also arise as a result of consumers economizing on transportation costs and engaging in multipurpose shopping trips.

2.3.2 Rent

The theoretical literature shows that in such an environment rational shopping center owners will differentiate their rental rates in order to optimize the mix of stores at the shopping center and thus maximize its profitability. Other things equal, the theory predicts that stores which are able to attract affluent customers to the shopping center - be it because of their products, reputation, brand recognition, size or other characteristics - will tend to pay less, while the remaining retailers, who depend on passing-by traffic (because they are, e.g., smaller or less well-known) will need to pay higher rents.¹⁵

The standard benchmark of rent level used in the industry is the so-called Occupancy Cost Ratio (OCR), which is the ratio of total occupancy cost for the tenant to their sales. This ratio measures the significance of real estate costs in the overall cost structure of the tenant. Typically, tenants within a given benchmarking segment will have very similar OCRs and it is typically difficult for a tenant to be able to sustain an OCR significantly above the average for their segment. Based on the target OCR value, the estimated rental value of the unit to the shopping center can be determined by factoring in the estimated sales per square meter of rental

¹⁴ Retail outlets offering homogeneous products could also induce negative externalities due to more intense price competition. This explains why such stores often have only one representative within a given shopping center, or may even be able to negotiate some form of exclusivity in their contracts to protect their profit margins.

¹⁵ See e.g., Brueckner, J.K. (1993). Inter store externalities and space allocation in shopping centers. *Journal of Real Estate Finance and Economics* 7(1): 5–17, or Wheaton, W.C. (2000). Percentage rent in retail leases: The alignment of landlord-tenant interests. *Real Estate Economics* 28: 185–204.

space and making appropriate adjustments for location and configuration, service charges and marketing costs, etc. Because of these adjustments, even if the target OCRs of different properties are very similar, their estimated rental value may differ significantly. In any event, a shopping center is typically significantly constrained in its ability to raise its rents beyond a given target OCR.

Empirical research into the topic confirms that rental contracts at shopping centers are written to efficiently price the net externality of each store and to align the incentives to induce optimal effort by the developer and each individual store according to the externality of each store's effort.¹⁶ This is in part reflected in OCRs varying across different segments of tenants.

There may be some differences between shopping centers which have a single ownership and management and other shopping clusters which have dispersed ownership. Frictions in contracting may result in a different, inefficient tenant mix at the non-centralized locations such as high streets, because the dispersed owners may not be able to account for all the externalities present. If that is the case, then one may expect from the general lower traffic at these alternative store clusters and other retail store locations, higher rents for stores that would be anchor tenants at shopping centers (because they would not be compensated for externalities they generate for other tenants) and possibly lower rents for non-anchor tenants (since they would not need to pay a premium for the externalities generated by anchor tenants). This stylized analysis suggests that the ability and incentives to switch from shopping centers to other locations may vary by tenant type.

Rents between a shopping center and its tenants are set through complex bilateral negotiations, typically at a shopping center's level. Different regulations or even business customs make it impractical, if not outright impossible, to negotiate contracts at a national or even pan-European level even for the players who have such presence. Both negotiating partners bring something to the table. On the one hand, large international chains have a lot of clout if only due to the traffic and turnover they can bring to the shopping center. On the other hand, a well-located and managed shopping center can be a very desirable location to reach customers in a specific catchment area, which may give the shopping center some bargaining power as well.

As consumers' tastes change over time, it is in the best interest of the shopping center to rotate tenants so that underperforming tenants are gradually removed.

¹⁶ Gould, E.D., B.P. Pashigian, and C.J. Prendergast (2005). Contracts, externalities, and incentives in shopping malls. *Review of Economics and Statistics* 87: 411–422.

Underperforming tenants fail to attract shoppers and may fail in the long run to afford to pay rents reflecting the full estimated rental value of the rental unit. A shopping center could usually do better by replacing them with more trendy tenants who would increase overall traffic at a shopping center, have higher sales (and thus might be able to afford the rents) and attract affluent shoppers to the shopping center, thus increasing sales of (and potentially the variable part of rents paid by) other tenants.

The existence of guaranteed minimum fixed rates also ensures efficient outcomes with respect to tenants' rotation. In the situation of a permanent reduction in its sales, a tenant will not be able to pay the guaranteed minimum rate and it may be in its interest to leave the shopping center on its own initiative allowing the center's operator to replace it with a better performing tenant within the same merchandizing category. Evicting a non-performing or bankrupt tenant can be a costly and long process that both parties would prefer to avoid. On the other hand, with purely linear rents, the decrease in demand would also be shared by the center operator, reducing a tenant's incentive to leave on its own. Finally, in the face of what is deemed a seasonal or temporary decrease in demand (e.g., due to construction at the site), the tenant may be able to achieve a temporary rent discount from the minimum guaranteed rent which could help it withstand the downturn period.

2.3.3 Shopper populations and shopping centers' catchment areas

Rational consumers make their decisions on which shopping destinations to visit, with what frequency, and what to purchase at their destination based on a number of factors, an important one of which is broadly understood to be transportation costs. Because transportation costs depend on a shopper's location relative to his shopping opportunities, this will have an impact on the frequency of shopping trips to various destinations. Moreover, some shopping destinations (among them prominently shopping centers) may offer a wide variety of goods at a (fairly) centralized location,¹⁷ which can encourage consumers to engage in multipurpose shopping trips. Ultimately, the spatial and temporal pattern of shopping trips will depend on the three major components of consumer costs: the cost of goods (prices), the cost of travel and the cost of holding inventory. For example, a shopper may be willing to travel a relatively long distance to shop at a large

¹⁷ Similar concept can be applied at a level of a shopping center, where relative location of different stores will have an impact on shoppers' traffic patterns, and hence ultimately tenants' revenues.

shopping center rather than at a number of smaller shopping centers located closer, either because the large shopping center allows him to save on the overall transportation cost or perhaps it offers lower prices, or both. On the other hand, the same shopper may purchase some products at his relatively expensive neighborhood store, because in this case high transportation and inventory holding costs associated with the visit to a distant supermarket might outweigh the costs of higher prices at a local store.

2.3.4 Putting the two sides together: The shopping center as a platform

A shopping center is a platform which maximizes its value by attracting shoppers who generate revenues and profits for the tenants. As such, a shopping center creates a market somewhat similar to how a newspaper helps to match advertisers and readers or a credit card association facilitates payments between shoppers and merchants. In fact, a lot of the economic literature on shopping centers considers them to be a classical example of a two-sided market.¹⁸

While a shopping center provides amenities for the shoppers (e.g., in the form of parking, restrooms, nice environment, etc.) typically shoppers can use them free of charge. This is meant to increase the attractiveness of the shopping center to the final consumers, to increase the traffic at the shopping center and thus also tenants' revenues and ultimately rents. While nothing prevents a shopping center from charging shoppers for these amenities or even entrance, generally these services are provided to shoppers for free and do not generate any direct revenues for the shopping center. Such price asymmetry is quite common in two-sided markets. For example, some circulars are provided free of charge and are financed by advertisers or some credit cards have no fees to consumers associated with their use and the cost of their usage is fully covered by the merchants.

We assume that the strategy of providing free access to the shopping center for shoppers remains optimal, and hence the only relevant pricing decision that

¹⁸ There may be some ambiguity as to whether shopping centers form a classic two-sided market. As a practical matter, a defining feature of a two-sided market is the presence of an indirect network effect, i.e., a situation in which the value that a participant on one of the sides realizes from the platform grows with the increase in participation on the other side. It is often the subjective assessment of strength of these indirect network effects and the ability of the sides to internalize them through pricing that determines whether it is warranted to characterize a platform or a market as "two-sided" and whether it matters enough to have a substantial impact on the results of economic analysis. We abstract from such considerations, as the network effects and externalities they generate seem to be at the core of shopping centers' business model.

shopping centers need to consider is the level of tenant rents. When setting the rents, shopping center managers will also consider the negative externality of lost customers (e.g., due to vacancies) on other retail outlets.

One important factor when analyzing two-sided markets is the possibility and frequency of “multi-homing”, that is, incidence of individual users using multiple platforms. In some cases multi-homing can be popular (e.g., shoppers using payment/credit cards of different processors), in others it can be less frequent or more costly (e.g., gamers who want to multi-home may require significant investment in the second or third console system). In the context of shopping centers, one can presume that multi-homing is quite popular on both sides of the market: on one hand, the shoppers’ loyalty is quite low, and they usually shop at multiple venues including multiple shopping centers, at merchants located outside of the shopping centers or on merchant streets and through other retail channels such as the Internet or mail-in orders. Each of the retail channels represents a viable alternative and competitive constraint to stores at shopping centers. As regards the tenants of the shopping centers, they also multi-home, in the sense that they typically have multiple outlets located at different shopping centers of different sizes and at other locations, such as busy street intersections, merchant streets, etc.

Observed multi-homing on the part of tenants may be indicative of the fact that shopping centers with different characteristics and other retail rental properties offer them multiple viable alternative locations. This would in general indicate broader substitutability of shopping locations, retail channels and broader relevant product markets. On the other hand, multi-homing on the part of the final consumers (including alternative retail channels such as the Internet or mail-in orders) could be indicative of the high competitive pressures the tenants face, which would limit their ability to pass on any price increases to the final consumers, rendering a hypothetical price increase considered in the SSNIP test also less profitable and hence also potentially resulting in broader markets.

Ultimately, observed multi-homing highlights the limits of a purely characteristics-based approach to product market definition. Generally, there are no products that are distributed exclusively at the shopping centers. The characteristics-based approach ignores the fact that the same tenants may sell the same products to the same customers at different stores located at different types of retail properties, indicating that not only all types of shopping centers, but also other possible locations such as commercial shopping streets or retail parks should be considered to be included in the relevant product market.

3. Limitations of characteristics-based product market definitions

In this section we point out the potential pitfalls of a characteristics-based product market definition referring to the economic characteristics described in the previous chapter.

A characteristics-based approach to market definition is a very tempting shortcut. It may be relatively simple to identify products with similar characteristics and detailed industry classifications may be available to highlight differences between different products. It also seems fairly obvious that products with similar characteristics are likely to be considered close substitutes.

3.1 Substitutes and preferences

However, characteristics alone are typically not enough to define a relevant product market. As the US court phrased it in a milestone market definition decision in the US: “Customer preferences should not make a market, and the issue is not what customers like or prefer, but what they could do if the merged firm raised prices.”¹⁹ Indeed, it may often be the case that products with seemingly very different characteristics can be very close substitutes, for example, when the differences in characteristics are properly compensated for by differences in prices. For example, branded and non-branded goods can in some circumstances be found to be in the same product market and may constrain each other despite significant differences in price. In spite of obvious differences, rail services may successfully constrain the pricing of both air and truck transportation on some traffic routes, and so on. If such alternative products are sufficiently close substitutes they should be included within the same product market, yet if their characteristics are sufficiently different they will not be if market definition is based on product characteristics alone.

3.2 Variety of existing segmentations

The existing industry categorizations define different types of rental retail properties based mostly on a very wide range of characteristics of rental properties, regardless of whether the particular characteristic severely impedes substitutability or not. Common classification criteria include size of the shopping

¹⁹ United States v. Oracle, Inc., 331 F. Supp. 2d 1098 (N.D. Cal. 2004).

center, its design and location, the number and fraction of anchor versus non-anchor tenants or themes (market positioning strategies). However, other characteristics are often also utilized.

No universal shopping center categorization exists and a recent industry research report highlights the need for a more uniform and global classification.²⁰ There are many viable classifications, created by various (public, non-profit and for-profit) organizations that differ in the criteria applied and approaches taken. Often, multiple, incompatible categorizations exist within a single country. The industry report titled “Toward the Global Classification of Shopping Centers” published by James R. DeLisle in 2009 presents some 25 different definitions that have been adopted by various associations or vendors in different countries. Moreover, combining individual classifications and subtypes can result in categorizations that are arbitrarily narrow. The only common features found in all definitions are that shopping centers are purpose-built, centrally managed and planned and developed as a single entity.

Moreover, these industry classifications were created with goals other than market definition in mind. For example, the ICSC (International Council of Shopping Centers) classification groups shopping centers according to size (i.e., neighborhood, community, regional and superregional). It was created and is primarily used as a tool for property valuation by investors and for benchmarking at an international scale. The CNCC (Conseil National des Centres Commerciaux) categorization that the French competition authority used as a basis for its market segmentation was created with similar goals in mind. In such an environment, a market definition based on the existing specific and detailed industry categorization runs the risk of being completely arbitrary.

3.3 Distribution of tenants across segments

In spite of the differences in the characteristics that the industry association and competition authorities emphasize, many of the tenants operating multiple stores often choose locations for their stores in facilities with different characteristics. For example, it is not uncommon to find fashion apparel stores not only in shopping centers of various sizes, but also in retail parks or on main shopping streets in large cities. Similarly, small tenants often locate not only in shopping centers, but also in mini-centers, in the shopping passage area of a super- or hypermarket or at a stand-alone location on busy commercial streets. The fact that such differentiation

²⁰ DeLisle, J.R. (2009). Toward the global classification of shopping centers. White Paper for the International Council of Shopping Centers (ICSC) Research.

of locations for individual retail chains or types of outlets exists, indicates at least in principle the substitutability between locations with different property types.²¹

While the general characteristics of a shopping center may be important, even more important for each individual tenant may be the characteristics of an individual unit within the property that they rent. Most of the rental retail properties offer a varied mix of different unit types (e.g., small, medium and large), which seems to indicate that tenants also have suitable leasing options outside of the shopping centers.

3.4 The missing characteristic: Level of rent

An important flaw in the characteristics-based approach is that it disregards the key feature of a retail rental unit from the tenant's perspective, that is, the price (level of rent).²² In a differentiated product market such as the market for rental retail property, any two sufficiently differentiated goods could be defined as belonging to separate product markets when focusing only on their characteristics and disregarding differences in their prices. As discussed in more detail in section 2.3.2, we understand that it is a widespread industry practice that rents are set in relation to the tenants' revenues, so any differences in revenues generated at different shopping centers that could be attributed to the different underlying characteristics of the shopping center such as its size, location, design, etc., will already be compensated by different rental rates.

A focus on the shopping center's characteristics alone ignores the economic impact of prices. While some locations with similar characteristics and overlapping catchment areas may be more desirable than others, it is also quite likely that the more desirable properties are more expensive to rent (due to the fact that they are

²¹ The fact of operating different stores at locations with different characteristics is only indicative of substitutability. Another possibility is that such locations serve non-overlapping catchment areas and thus are complementary rather than substitutable. We discuss these issues in more depth in section 4.6. Here, we only want to emphasize that the differences in some property characteristics alone are not sufficient to rule out their substitutability, especially given the actual distribution of stores between properties of different types.

²² To be more precise, for a given segment of tenants, we expect their real estate costs (as measured for example by the OCR) across different locations to vary significantly less than as measured by the actual rents, which besides OCR take into account other relevant factors such as sales per square meter of rental space, location and configuration adjustments, etc. In other words, while the OCRs of two similar stores in different locations can be very similar, the actual rents can vary substantially, because of the adjustment factors.

more desirable) and the difference in prices may nullify the differences in desirability. It is a common feature of markets with differentiated products, that consumers eventually become quite indifferent between different price-quality bundles. We are aware of no reasons why the market for rental retail space should be an exception to this rather general rule. Focusing on the characteristics alone and ignoring the price dimension reduces the number of substitutable bundles and results in too narrowly defined markets.

There is another substantial methodological difference between a characteristics-based approach to market definition and more economic approaches based on the SSNIP test (discussed in detail in the following section 4.1). In the case of a SSNIP test, the starting point of the analysis is the narrowest possible market, consisting of a single product, and during the analysis the candidate product markets are gradually extended by adding more and more substitute products to the point where all substitute products are included in the market. In contrast, the characteristics-based market definition takes a very broad market as a starting point, for example, the market for all retail and services spaces, and gradually narrows it down by identifying additional differences in characteristics. Because it is always possible to identify some differences between any two different products, it is relatively easy to erroneously exclude goods that are close substitutes yet have distinct properties. Doing so leads to markets that are defined too narrowly.

3.5 Conclusion

Industry categorizations are too arbitrary and variable across countries to be used as a reliable definition of the product market for competitive purposes. Furthermore, taking into account the tenants' actual location choices could lead to a widening of the relevant product markets by including retail parks, high streets and possibly other locations offering credible substitutes to shopping center locations. Thus, relying solely on product characteristics and disregarding actual substitutability patterns when defining relevant product markets tends to lead to erroneous market definitions that are too narrow.

4. Economics of product market definition for shopping centers

The type of criticism of the characteristics approach that we presented in the previous section is based on well-known economic principles. Why then are approaches based on characteristics still so popular with competition authorities? One possible reason is that a full formal SSNIP test is often difficult to implement. This chapter first describes the general logic of the SSNIP test and then discusses the data limitations that are likely to be relevant in the retail space industry (section 4.1). Next we discuss potential difficulties in modeling the price increase (section 4.2) and various methods of identifying the anticipated response of tenants to a price increase (section 4.3). In section 4.4 we describe how externalities that are relevant in the industry affect the market definition logic. We then propose methods to identify relevant tenant groups (section 4.5) and provide arguments why focusing on anchor tenants will often be a useful conservative approach (section 4.6). Finally, in section 4.7 we discuss the catchment area of a shopping center and touch on issues related to the geographic market definition, while in section 4.8 we briefly discuss some other forms of evidence that can be potentially useful in assessing industry competitiveness.

4.1 The basic SSNIP test

The purpose of the SSNIP test is to identify the smallest collection of goods and services that a hypothetical monopolist must control in order to be able to profitably increase their prices. Such a collection constitutes the relevant market and must include all goods and services that are considered sufficiently close substitutes by the customers. If the substitutes were not all included in the market, then after a hypothetical price increase enough consumers would be lost turning to alternative products to render the price increase unprofitable.

The definition of relevant markets should lead to market shares that are meaningful predictors of changes to market power resulting from a merger. The logic of the SSNIP test avoids the pitfalls identified in chapter 3, that is, it is more likely to achieve the aim of market definition and identify a relevant market that is a market “worth monopolizing.”

If the hypothetical monopolist finds a 5 to 10 percent non-transitory increase in price not profitable, then there must be substitute products that the monopolist’s consumers switch to which need to be included in the relevant product market.

The analysis is repeated (additional products are included in the analysis) so long as the increase in price remains unprofitable.

More specifically, in order to define the relevant product market, the SSNIP test question that needs to be analyzed is: “Which nearby shopping centers (and other real estate properties) must a hypothetical monopolist control in order for it to be profitable to raise the price (rents) by 5 percent to 10 percent?”

Thus, the analysis contains two important elements: (1) identifying the response of customers to the price increase and (2) identifying the effect of this response on the profitability.

Figure 1: Effects of a price increase on profitability

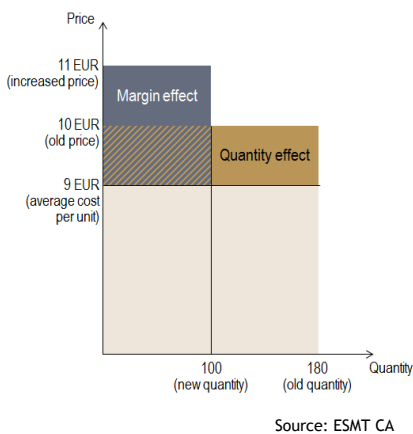


Figure 1 illustrates the logic of the SSNIP test and profit calculation of a hypothetical monopolist. It is assumed that at the original price, the monopolist sells 180 units of the good at a unit price of 10 per unit generating revenues of 1,800. Because the average cost per unit is 9, the average margin per unit is 1 and the monopolist’s profit before the price increase is 180.

A SSNIP test would then consider a hypothetical 5 to 10 percent price increase, for example, from 10 to 11 per unit. Any price increase has two opposite effects:

- **Quantity effect.** Assuming a downward sloping demand, higher prices will lead to lower sales. The quantity effect is the product of the old margin and the change in sales. In the illustrative example in figure 1, following the price increase sales drop from 180 to 100 units. Given that the initial margin per unit was 1, this results in a decrease in profits by 80. The quantity effect is always negative.
- **Margin effect.** Units that continue to be sold after the price increase are now sold at a higher margin. The margin effect is the product of the difference in margins and the post-price-increase quantity. In the illustrative example in figure 1 the margin before the price increase was 1 and is 2 after the price increase. On 100 units sold this generates an additional profit of 100. The margin effect is always positive.

The profitability of the price increase is thus determined by which of the two effects dominates. If the quantity effect is greater than the margin effect then a price increase is unprofitable and the candidate market needs to be expanded to include the closest substitutes of the considered goods. In contrast, if the margin effect exceeds the quantity effect, the hypothetical price increase is profitable and the correct relevant market is defined. In the illustrative example in figure 1, the margin effect (+100) exceeds the quantity effect (-80), so that the price increase is profitable (profit increases from 180 to 200 as a result of a price

increase from 10 to 11). Thus, there would be no need to expand the market further and the market definition based on the SSNIP test would be complete.

4.2 Modeling the price increase

While it is common for many shopping centers to charge non-linear rents consisting of a minimum fixed flat rent in addition to a variable component depending on the tenant revenues, the proportion of the fixed and variable component may vary across shopping centers and over time.²³ The higher the fixed component and the lower the variable component, the more risk is shifted to the tenant. For the most part, however, we will abstract from this feature of the rents and assume that the store's rent is proportional to its revenues, that is, we will interpret the "rent" as a given percentage of the revenues. The rationale for such a simplifying assumption is that (to our understanding) the proportion of the rent to the tenant's revenues (i.e., the OCR discussed in more detail in section 2.3.2) is the main characteristic considered by both the shopping center and the tenants when negotiating a new lease or renegotiating an old one. So from the competitive assessment point of view the relevant question is whether the shopping center is able to permanently and significantly increase the OCR for tenants.²⁴

Once the long-term contracts have been signed, it is nearly impossible to renegotiate the lease to increase the rents. This has two further consequences when applying the SSNIP test logic:

- First, for a large number of the tenants a potential price increase resulting from a merger may only happen years after the transaction. For such tenants the possibility of a price increase will depend on the competitive constraints at that time.
- Second, as a result of the long-term nature of the contracts some rent adjustments at the time of re-negotiation will occur in any event (absent the merger). Thus, the SSNIP test price increase needs to be considered after such anticipated rent adjustments that would occur absent the merger.

²³ The fixed or variable rent components may include additional surcharges for specific services the shopping center provides, which are of limited relevance to the overall argument.

²⁴ Increase in the OCR (holding adjustments for other factors such as location, configuration, etc. constant) would lead to an increase in the actual level of rents.

Evidence on rent adjustments that would occur in any event can be gathered from past rent increases. Moreover, waiting lists can be an indication of the possibility to increase rent also absent a merger.

4.3 Predicting switching

In order to identify the anticipated response of tenants to a price increase (quantity effect) one would ideally estimate demand functions based on past behavior. However, such data is difficult to get in the industry, not least because in the industry at hand owners of retail space tend to (or have to) conclude individually negotiated long-term contracts with tenants. Thus, in this industry we may lack data on frequent transactions that would enable us to apply some empirical techniques in order to predict the anticipated behavior of tenants in light of a hypothetical price increase. However, such difficulties should not lead to abandoning the logic embedded in the SSNIP test.

4.3.1 Tenants' responses to past price changes

Tenants' responses to past price changes reflect the actual behavior of market participants in reaction to price changes and as such they typically carry more weight than answers to questions inquiring about hypothetical behavior in response to price increases. However, unlike in other sectors, such as fast-moving consumer goods, where prices change frequently and a wealth of data from scanner databases is available, in the retail rental industry prices are determined in infrequent bilateral negotiations with unpublished outcomes. Thus, information on past price changes may sometimes be difficult to come by.

However, this approach should not be dismissed, as some documents may exist that would show the limits to what tenants are willing to pay before switching. Moreover, information on past behavior can be generated by questioning tenants on their past behavior and by analyzing the reasons why tenants left in the past.

4.3.2 Events and uncontrolled experiments

Another potentially useful source of evidence is the responses of rents to events that affect either demand or supply. For example, traffic restrictions or renovations at a shopping center could lead to a situation where one shopping mall does not impose a competitive restraint on others. While the duration of such events will likely be too short to allow a measurement of the impact on rents, they could be useful to determine the overlap of shoppers in the relevant catchment areas.

More long-term factors like the opening of a major bridge or a new underground rail line that improves communication between different parts of the city may not only impact on the movement of shoppers but may also allow the measurement of the effect on the level of rents that can be charged by the shopping centers. Similarly, one could consider the impact of entry (opening a new shopping center) on the level of rents at the existing shopping centers.²⁵

Such natural experiments can be informative about the potential to increase prices post-merger. The availability of this type of data will obviously vary from case to case.

4.3.3 Tenants' stated responses to hypothetical price increases

The competition authority could survey tenants asking about their response to hypothetical price increases. For example, the first question could ask: "What would you do if your rent at the shopping center A increased permanently by ten percent?"²⁶

If a sufficiently large number of tenants responded that they would leave the shopping center (e.g., by relocating to other shopping centers with overlapping catchment areas, to other nearby stand-alone locations or by exiting the market altogether) the rent increase by the shopping center would be unprofitable, which would indicate that a single shopping center does not constitute a relevant market for the purposes of the competitive assessment of effects of the merger.²⁷

The next question in the series could then ask, "What would you as a tenant do if your rent at the shopping centers A, B, C and D increased permanently by ten percent?" where shopping centers of interest would share some common characteristics (e.g., large shopping centers or shopping centers of 2nd generation, etc.). If again a sufficiently large number of tenants expressed the intention of

²⁵ Unlike fire, which can be considered an exogenous event, entry decision is likely to be endogenous and hence the conclusions drawn from rent comparisons need to be adjusted accordingly.

²⁶ In a survey it is useful to decide on a specific price increase. This raises the issue of which increase to choose, which is to a large extent arbitrary. Choosing 10% is more conservative from the point of view of the competition authority if the authority puts a high weight on avoiding too narrow market definitions. Most practical surveys that we have seen choose 10%.

²⁷ It can be safely assumed that a relevant market would encompass at least a shopping center. This is because if a price increase of rents at a shopping center was profitable, the shopping center, which sets all the rents for its properties, would not be profit-maximizing in the first place.

leaving in the face of such a rent increase, the probed market could sequentially be broadened in subsequent questions to encompass all shopping centers, all shopping locations within a given geographic area (i.e., including commercial shopping streets, retail parks) and so on.²⁸

Economists have serious reservations regarding responses to such hypothetical questions. The reason is that responses can be biased for strategic reasons, biased because of the non-representativeness of the underlying population of tenants or inaccurate because of the misunderstanding of questions. Moreover, the direction of the bias is not always clear. For example, strategic responses can go both ways:

- Customers may overstate their switching response to a price increase because they wish to signal to the retail space manager that price increases would not be profitable in order to avoid future price increases.
- Respondents that wish to achieve a certain outcome of a competition investigation may understate their switching response to a price increase in order to induce a (too) narrow market definition.

Even if the stated evidence on absolute switching behavior in response to hypothetical price increases may have to be considered with care, stated switching responses can generate useful information on the order of alternatives, which may help ordering the alternative clusters to consider when applying the SSNIP test. Moreover, surveys can generate information on the relative importance tenants put on different characteristics and which locations are considered as substitutes or complements. Finally, as indicated above, a survey can (and should) also be used to collect quantitative and qualitative information on past choices from tenants.

4.3.4 Simulated effects on tenants

An investigation of the tenants' cost function may yield evidence that a small but significant increase in price would render staying at the shopping center unprofitable. It can be assumed that unprofitable tenants will leave the shopping center.

²⁸ Note that in practice shopping centers would avoid empty space and re-rent any such space at a lower rent. This limits the risk of testing the options for potential price increases after a merger and may serve to identify tenant types for which price increases are feasible. In section 4.5 we discuss the importance of distinguishing tenant types.

4.3.5 Conclusion

Each approach to estimating the likely switching in response to a hypothetical price increase has its advantages and disadvantages. In most cases it will therefore be useful to use several methods simultaneously and treat their results as complementary to each other.

4.4 Taking relevant externalities into account

With an estimate of the switching response at hand, the next step in the application of the SSNIP test logic is to calculate the profitability of a price increase. Retail outlets often have positive externalities on each other (which is why we observe their agglomerations). In such an environment an analysis of the profit effect of a “simulated” price increase of a shopping center (where one owner negotiates rents with many tenants) should not only capture the lost rent due to empty retail space but also the reduced rent from other tenants. The rent reduction can be transmitted via a price increase or via the loss of tenants. Both effects tend to widen the geographic and regional markets.

To show this, we describe a stylized theoretical economic framework of the shopping center industry where we perceive a shopping center as a platform attracting consumers (shoppers) and then selling the traffic to the tenants (stores).

4.4.1 Pricing

A shopping center is a platform which maximizes its value by attracting shoppers who then generate revenues for the tenants. While shopping centers provide amenities for the shoppers (e.g., in the form of parking, restrooms, nice environment, etc.), typically, shoppers can use them free of charge. This is meant to increase the attractiveness of the shopping center to the final consumers, to increase the traffic at the shopping center and thus also tenants’ revenues and ultimately rents. Therefore we assume that shoppers do not generate any direct revenues for the shopping center and all the costs of providing amenities to the shoppers are recovered indirectly from tenants as part of the rents.

4.4.2 Shoppers’ demand for tenants’ services

Shoppers create demand for tenants’ goods and services. We assume that the shoppers’ demand is driven by two main parameters:

- **Prices:** of course, quantity demanded is inversely related to the price of the goods and services.

- **Tenant mix:** we assume that the demand for the goods is positively related to the traffic at the shopping center, which is affected by the tenant mix (as well as the shopping center's amenities, marketing efforts, etc.). Shopping centers are organized in order to generate and capture positive externalities as much as possible. These externalities arise as different stores offer products and services complementary to each other. This makes shopping centers focal points to meet diverse consumer needs in a single location and allows consumers to economize on search and transportation costs. Shopping centers can efficiently exploit these externalities by assembling the optimal tenant mix.²⁹ Thus, considering two shopping centers with identical prices to final consumers, we assume that the demand for goods will be higher at a shopping center with a better tenant mix.

4.4.3 Potential for pass-on

Unlike in a more traditional two-sided market setting where the platform owner has the ability to set its price on both sides of the market, we assume that a shopping center continues not to directly charge final consumers (shoppers) and provides them with free amenities.³⁰ Therefore, we assume that for the purposes of the competitive assessment the most relevant price to analyze is the rent paid by the tenants. Even more specifically, of particular interest is the question whether the shopping center is able to permanently and significantly increase the OCR of a group of tenants.

²⁹ Another effect that a shopping center must take into account when choosing an optimal tenant mix is the minimizing negative externalities due to price competition between tenants. Such price competition benefits consumers, but decreases the tenants' profits and the rents that a shopping center can charge. Since consumers also care about prices, a shopping center wants its prices to be generally low (to attract consumers), but not too low (to ensure sufficient profitability). Consumers might accept somewhat higher prices at the shopping center than at alternative locations because shopping centers offer other benefits such as extra amenities, a one-stop shopping opportunity (savings in transportation and search costs), etc.

³⁰ Amenities (such as parking or nice surroundings) that are provided free of charge to the shoppers can be thought of as a negative membership fee and serve to entice the shoppers to visit the shopping center. In the long run, by adjusting the level of free services it provides, the shopping center has some flexibility in setting the price on both sides of the market. However, for the purposes of the competitive assessment, the price set to the tenants is more important.

The effects of a potential SSNIP price increase can take place through a variety of channels. Faced with such a rent increase, the tenant has a number of potential choices:

- **Full pass-on:** The tenant can attempt to pass on the price increase onto its final consumers, in full.
- **No pass-on:** In the other extreme, the price increase may have to be fully absorbed by the tenant either because of a national pricing that is not responsive to the local costs or because of significant competitive pressure from other retail channels, including the Internet.
- **Partial pass-on:** In the intermediate case, the tenant may be able to pass on only part of the rent increase onto its final consumers while absorbing the remaining part.

It is obvious that with no or partial pass-on the profitability of the tenants is reduced. Note that even in the rather hypothetical scenario where the price increase can be fully passed on to the final consumers, tenants are likely to suffer losses. Even though the tenants' margins remain constant in this scenario, their sales volumes will decrease because of the downward sloping demand for their products. Assuming optimal pricing before the increase in the rent, the pass-on will likely reduce the tenants' revenues and profitability.

4.4.4 Effect if a tenant stays (externalities transmitted via pass-on of price increases)

Depending on the size of the losses due to the rent increase, a tenant may decide to leave the shopping mall or stay. As a result of the positive externalities the profit effects of both leaving and staying will be different compared to a standard scenario without externalities.

If a tenant stays and does not pass on the rent increase, the shopping center benefits from the full rent increase. However, there is no immediate consumer harm as the prices (and presumably also quantities) sold in the downstream market remain unchanged.

If a tenant stays and passes on (part of) the rent increase, the profitability calculation of the shopping center is affected in several ways:

- First, if the tenant has priced optimally before the rent increase, the tenant's revenue will likely fall as a result of the price increase.³¹ This lowers the profits resulting from the increase in the rent (to the extent that it is an increase in the percentage of revenues).
- Second, the increase in the prices of the consumer goods that is due to the pass-on will deter some shoppers. However, a reduction in the number of shoppers will reduce the revenues of all tenants in the shopping center. This lowers the profits resulting from the increase in the rent (to the extent that it is an increase in the percentage of revenues).³²

Thus, taking into account the pricing externalities reduces the profitability of a given hypothetical price increase which will tend to lead to broader product and geographic markets.

While there is no monotone relationship between the competitive environment, the level of margins and the ability to pass on cost increases to final consumers, the tenants' ability to pass on rent (or generally cost) increases to their consumers will depend on the competitive environment in which they operate and their margins. More specifically, if some tenants operate on thin margins it may indicate strong competitive pressure from other retail channels, including e-commerce. Since rent increases can be considered an asymmetric cost factor (affecting the shopping center's tenants but not their competitors in other retail channels such as the Internet), the ability to pass on the rent increase to their final consumers may be very limited and the only option may be to leave the shopping center and potentially look for an alternative location within the same general catchment area.

Tenants operating on higher profit margins may be facing less competitive pressure in the downstream market and may be more able to increase their prices. Moreover, due to their high margins they are likely to have a bigger cushion to absorb such a cost increase by reducing their own margins.

4.4.5 Effect if a tenant leaves (externalities transmitted via lost tenants)

³¹ In general this depends on the cost function. With fixed costs only, for example, optimal pricing before the rent increase will have maximized revenue.

³² In response, the shopping center may try to provide more free amenities or to upgrade its facilities to entice shoppers to visit in spite of increased retail prices and vacancies. However, the fact that all successful shopping centers operate at very low vacancy rates and that persistently high vacancy rates often spells doom for a shopping center seems to indicate that it is difficult to overcome excessive vacancies through other means.

If the effect of reduced profitability is sufficiently large and margins after the rent increase drop sufficiently low, the tenant may decide to leave the shopping center altogether. If some tenants leave the shopping center, then its overall desirability decreases (e.g., because the tenants who left do not attract their loyal customers to the shopping center or because the vacancies created reduce the shopping center's appeal among shoppers). Therefore, the externalities make the rent increase less profitable compared to a situation without externalities. The greater the (absolute) values of the effect of the increase in rent on the tenant mix and on the number of shoppers are, the greater the effect of omitting the externalities.

Externalities created by different stores differ with respect to their magnitude leading to differences in the Occupancy Cost Ratio.³³ While in practice shopping centers distinguish a range of tenant types leading to a continuum of Occupancy Cost Ratios, for this exposition it is helpful to follow most of the academic literature on this matter and simplify by distinguishing two types only:

- Anchor (or key) tenants, are a heterogeneous category of tenants who attract shoppers to the shopping center, for example, because of their brand strength and recognition. These tenants are desirable from the shopping center's point of view, because they generate shopper traffic that the shopping center can "resell" to other tenants. One can think of these tenants as (net) sellers of shopper traffic. In order to attract such tenants, shopping centers may offer them various incentives such as lower rents, customizing and retrofitting their space, etc.
- Non-anchor (or regular) tenants, who by themselves do not attract many shoppers (e.g., a coffee shop, a food court vendor, etc.). These tenants can be thought of as (net) buyers of traffic. Non-anchor tenants also generate positive externalities but are net benefactors of the externalities created by anchor tenants.

Anchor tenants are aware of their beneficial effect on the shopping center's revenues and try to negotiate lower Occupancy Cost Ratios. Non-anchor tenants that benefit from the net customer gain may pay premium rents.

It is well established in the theoretical literature and confirmed empirically that these positive externalities matter:

³³ Generally in cross-shopping-center comparisons anchor tenants are characterized by low Occupancy Cost Ratios. However in some exceptional examples, such as for movie theatre tenants, their expected revenues can be so low relative to other tenants, that within a shopping center it may be more appropriate to focus on the absolute level of rent per square meter rather than OCR.

- For example, Gould, Pashigian and Prendergast demonstrate that in the USA shopping centers' rent contracts are written to internalize externalities through both an efficient allocation and pricing of space, and through an efficient allocation of incentives across stores. Using a data set of mall tenant contracts covering 2,500 shopping malls in the USA they show that the rental contracts are written to efficiently price the net externality of each store and to align the incentives to induce optimal effort by the developer and each mall store according to the externality of each store's effort.³⁴
- In another paper Gould and Pashigian quantify the differences in rents paid by anchor and non-anchor stores. Their main finding is that anchor tenants receive a per foot rent subsidy of at least 72 percent relative to rents paid by non-anchor stores. Moreover, they also find that anchor tenants' rents per square foot are lower in larger shopping centers than in smaller ones, although anchor tenants' sales per square foot are the same in both types of shopping centers. Finally, they also find that the sales and rent per square foot of other mall stores are higher in larger shopping centers than in smaller shopping centers. All these results are consistent with shopping center landlords efficiently pricing the externalities and with the fact that externalities are larger in larger shopping centers.³⁵
- Similar results are obtained by Wheaton (2000) who analyzes the role of the component of the rents which is proportional to a tenant's revenues in aligning incentives of landlords and tenants.³⁶ He finds that the percentage of revenues paid as rent varies widely across tenant stores, is inversely related to the sales externalities generated by each store, and cannot be explained by factors such as risk sharing and tenant effort issues. Instead, he argues that the primary role of the variable component of rent as a percentage of a tenant's revenues is to give the correct incentive to landlords - rather than the reverse. In other words, variable rent ensures that with sales externalities, landlords do not act opportunistically and have the interest of existing tenants in mind when expanding, altering or re-renting space at a shopping center.

³⁴ See e.g., Gould, E.D., B.P. Pashigian, and C.J. Prendergast (2005). Contracts, externalities, and incentives in shopping malls. *Review of Economics and Statistics* 87: 411–422.

³⁵ Pashigian, B.P., and E.D. Gould (1998). Internalizing externalities: The pricing of space in shopping malls. *Journal of Law and Economics* 41(1): 115–42.

³⁶ Wheaton, W.C. (2000). Percentage rent in retail leases: The alignment of landlord-tenant interests. *Real Estate Economics* 28: 185–204.

- In another paper, Gatzlaff, Sirmans and Diskin (1994) model a situation of an anchor tenant loss. Such a loss results in a decline in consumer drawing power of the shopping center, which in turn reduces the ability to generate sales for all the remaining tenants. In effect, the rent rates that the landlord is able to receive also decrease. Based on empirical analysis of data from small and moderately sized shopping centers in Florida and Georgia they found that in response to the loss of an anchor tenant the rental rates of non-anchor tenants are estimated to decline by approximately 25 percent.³⁷ One might expect an effect of similar magnitude for large shopping centers as well. This result indicates that it seems extremely unlikely, if not outright impossible, for a shopping center to increase its profits while at the same time having lost an anchor tenant.

4.4.6 Conclusion

Retail outlets often generate positive externalities on each other (which is why we observe their concentrations). In such an environment a “simulated” price increase of a shopping center (where one owner negotiates rents with many tenants) should not only capture the lost rent due to empty retail space but also the reduced rent from other tenants. Accounting for these effects tends to widen product markets.

The only case in which the externalities do not matter for the market definition is when the externality is zero. This can happen if none of the tenants leave in the face of the rent increase and additionally they do not pass on the rent increase onto the prices for shoppers. In all other cases, ignoring the additional effects related to externalities in the profitability equation will result in overestimating the profitability of a rent increase and thus in a market definition that would unequivocally be too narrow relative to market realities.

4.5 Tenant diversity

In the previous sections we made the argument that an application of a SSNIP test for a given tenant is likely to include in the market definition a greater number of rental locations than a characteristics-based approach would have. We also argued that ignoring positive externalities inherent in the shopping centers’ business model could similarly bias the results of a simple SSNIP test leading to defining relevant markets that are too narrow.

³⁷ Gatzlaff, D.H., G.S. Sirmans, and B.A. Diskin (1994). The effect of anchor tenant loss on shopping center rents. *Journal of Real Estate Research* 9(1): 99–110.

In this section we explore the impact of tenant diversity on market definition. In essence, we find that, in some situations, it may be necessary to define relevant product markets separately for different tenant types. This may or may not lead to narrower relevant product markets compared to an approach that aggregates all tenant types.

Tenants are a heterogeneous group of businesses ranging from large international chains, through national retailers of different sizes to small local businesses. The very business of shopping center managers is to find an optimal mix of tenants and to negotiate rents that reflect the revenue potential of a given tenant, taking into account the positive effect on traffic in the shopping center. Moreover, different tenants look for rental units with different characteristics (e.g., with respect to the size of the unit) and it may be very difficult and costly if not impossible to reconfigure the shopping center (e.g., to split a larger unit into multiple smaller units). All this implies that there are practical limits to substituting tenants of different types and that price indicators like the OCR or the rent may vary by groups of tenants.

To the extent that shopping centers are in fact able to distinguish between different groups of tenants and price them differently for the retail space, it may be necessary to consider the implications of a price increase for each of such groups separately.³⁸

While conceptually clean and in line with the EC and US guidelines on market definition³⁹ such an approach may sometimes be difficult to implement in practice as tenants differ along many dimensions, which may make it difficult to identify an agreed, clear classification of tenant types.

While the appropriate approach would have to be developed on a case-by-case basis, we believe that it is likely that in a number of cases one can address a potential need to segment the market by focusing on the relevant market of anchor tenants, which generates significant positive net externalities. Our main point is that because shopping centers allow tenants to at least partially capture the value of the externalities they create, as the magnitude of the externalities generated by a tenant increases it becomes more and more desirable for them to locate at a

³⁸ Note that in the industry at hand the identification of customer groups can also be based on a trial-and-error approach to the extent that space can be re-used if tenants leave.

³⁹ US horizontal merger guidelines, U.S. Department of Justice and the Federal Trade Commission, paragraph 4.1.4., <http://www.ftc.gov/os/2010/08/100819hmg.pdf> (accessed June 29, 2011) and Commission notice on the definition of relevant market for the purposes of community competition law, Official Journal C 372, 09/12/1997, 5–13.

shopping center, which may limit their substitution options relative to non-anchor tenants. Thus, by focusing on anchor tenants with significant externalities one is likely to adopt a “conservative” approach. In the following chapter we develop a number of conditions which can be used in a merger proceeding to decide whether this is a practical approach.

4.6 Focus on anchor tenants

In some cases it may be appropriate to focus on the regional and product market definition for anchor tenants in order to conservatively screen the potential effects of a merger. This will be correct if the following conditions hold:

- The ability to increase prices to non-anchor tenants is limited. As they can easily be substituted and because they generate limited positive externalities, they are likely to have little to no bargaining power vis-à-vis the shopping center, so the shopping center is able to extract all their rents pre-merger.
- These stores could not increase their prices due to the price competition from similar stores at the locations outside of the shopping center which constrains their pricing, and staying at the shopping center would become unprofitable, since there are no more rents to extract, so faced with a rent increase, these stores would simply leave the shopping center.
- There is relative abundance of such vendors in many locations outside of the shopping centers, such as busy shopping streets and intersections, retail space on ground floors of office buildings, etc. Clearly, such locations may not offer the same intensity of traffic as locations at a shopping center (and may hence be materially different in their characteristics), but we would expect the rents at such locations to be correspondingly lower, to compensate for lower traffic and to roughly maintain similar profitability.

Thus, we find it unlikely that a market for non-anchor tenants could be reasonably restricted only to retail space at shopping centers, but would likely also need to encompass a much broader range of retail locations.

If these conditions hold, it would be right to focus on anchor tenants. Anchor tenants are likely to have bargaining power vis-à-vis shopping centers and thus earn positive economic profits. When considering the market definition for anchor tenants, the following characteristics are likely to matter:

- Some large national or multinational chains which are the most common anchor tenants sell their products under a uniform price policy, that is, prices of the same products in different stores are identical. They also often conduct national advertising campaigns with national sales prices. This policy is usually justified to prevent unnecessary competition between individual stores of the same operator and to reduce the uncertainty and potential search costs of the final consumers. Such a national pricing policy may restrict the ability to increase the prices of final goods in individual stores when the level of rent on the lease of the store has been increased.
- At the shopping centers anchor tenants are compensated for the externalities they generate and are thus able to pay on average lower rents. Thus, moving outside of a shopping center is potentially a less desirable prospect for such tenants, since at alternative locations such as busy shopping streets, these tenants may not be able to be rewarded for the traffic they generate and may need to pay higher rents. Nevertheless, since anchor tenants are (by definition) to a large extent able to generate their own traffic, they may be able to pursue other business strategies, such as locating in more peripheral or suburban locations, where land and hence rents are lower.

An interesting piece of evidence quoted by the judge in the Austrian case was the fact that many anchor customers were present not only at shopping centers, but also in the main shopping strips in the city center. This was considered to be a proof of substitutability between the two types of locations (for this type of tenants) and lead to the inclusion of the city centers in the relevant product market.

Thus, in order to determine the attractiveness of other types of locations for (anchor) tenants it may be useful to collect data on the presence of different types of vendors at each type of locations. For example, a type of evidence that could be useful in assessing the substitutability of rental space would be (for a given tenant) what fraction of its stores (or another measure such as traffic or revenues) is located at shopping centers (and in particular at merging shopping centers) relative to the overall number of stores (or traffic or revenues). For example, if a given group of tenants operated 10 stores in a metropolitan area, of which five were at shopping centers and of which three were at the shopping centers of merging parties that would indicate a post-merger market share of 30 percent.

While the existence of stores by the same retail chain in locations of different format may be highly indicative of their substitutability, it does not necessarily need to be the case. To provide a stylized counterexample, if shoppers visiting the

shopping centers were totally different to shoppers visiting the commercial strip at the city center (the visitorship of the two real estate properties would not overlap at all), then different stores would attract different consumers and thus could be independent/complementary rather than substitutable, to the same extent that the competition authorities typically consider stores in different agglomerations as belonging to different (geographic) markets because their catchment areas do not overlap.

Therefore to fully tackle that issue, it may need to be necessary for the competition authority to collect additional evidence on shoppers' behavior:

- **Significant overlap:** In individual cases we have seen evidence that most shoppers typically visit retail locations of all formats, perhaps depending on the specific purpose of the trip, etc. This would seem to indicate that as long as the geographical extent of the catchment areas overlap, all stores within these boundaries are likely to be considered substitutes rather than complements and included in the same market. However such shopping patterns may depend on the specific case and may need to be analyzed individually. Because shopping centers routinely analyze and quantify their catchment area, the penetration rate and the conversion rate (i.e., how many people are in the market, how many will visit the center and what total sales volume can be expected) the competition authorities could request that information and use it to determine the extent of substitutability or complementarity of different locations. One could also ask the tenants to provide a similar type of information as part of the conducted survey.
- **No overlap:** Another possible outcome of the analysis of the catchment areas is that they do not overlap, in which case all individual locations would be complementary rather than substitutable and thus in principle would constitute separate relevant markets. In the merger context, such narrow markets would not need to be problematic, given that with such narrow markets, the merger would not increase the shopping centers' market power. To give a more specific example, if there were two shopping centers in the city with non-overlapping catchment areas, then even pre-merger it would be necessary for a retailer to locate in both centers to reach all the shoppers within the city. In other words, even pre-merger each shopping center would have a monopoly power over their part of the city and the merger would not increase the market power of shopping centers over these tenants.
- **Mixed evidence:** Thus the most problematic cases are likely to arise when catchment areas overlap only partially. In such a situation, shopping

centers are not fully substitutable, because if the retailer were to leave one of them the shoppers within the overlap of the catchment areas could still shop at the other location. On the other hand, since the catchment areas would not fully overlap, the exit would also mean losing some consumers who could no longer be reached. The full assessment would need to take into account which of the two effects dominates, which depends on the extent of the overlap of catchment areas. Similar conclusions apply if there are particular groups of shoppers that can be reached only by a specific retail format (e.g., if some shoppers only visit shopping centers but never commercial strips).

4.7 The catchment area and geographic market definition

While the transactions (lease/rental contracts) between shopping centers and their tenants are conducted in a business-to-business market, they are concluded with specific expectations regarding retail customers in mind. The specific terms of the rental contract will depend on the (expected) intensity of the traffic at a shopping center and a particular rental unit within the shopping center, the (expected) sales per rental area and other metrics related to retail consumers behavior. Thus the analysis of the market definition cannot completely disregard that side of the market.

One advantage of shopping clusters over stand-alone retail outlets is that they attract a large number of visitors due to their large size and variety of stores. By combining various services, agglomerations become focal points for shopping and entertainment, providing shoppers with the possibility of one-stop, multipurpose shopping and thus saving consumers search costs. Thus, such agglomerations are typically thought to have a broader catchment area with a larger population of shoppers than offered by other locations with less variety. Generalizing this further, a larger agglomeration may have a broader catchment area than a smaller one.

Retailers located outside of an agglomeration will also attract some population. The size and geographic scope of the catchment area of individual retailers is likely to depend on a number of characteristics.

- Large, specialized stores might have sufficiently strong brand recognition, consumer loyalty or often such low prices that even if they locate a single store within a metropolitan area out in a relatively unattractive location in the suburbs (which has the benefit of lower real estate costs than a

more central location), it may nevertheless expect to attract the shoppers from the whole metropolitan area in spite of the significant transportation costs of the peripheral location.

- On the other hand, small businesses without much brand recognition (e.g., coffee or tobacco shops) are unlikely to attract consumers from afar and thus if located individually, their catchment areas are likely to be very limited.

Of course there are many intermediate possibilities, for example, the catchment area of large department store chains, if located individually, may cover a few kilometers, so while larger it is still only a relatively tiny fraction of the agglomeration size. When located outside of the shopping centers, anchor tenants are likely to have a wider catchment area than non-anchor tenants.

The catchment area of a shopping center is to a large extent dependent on the identity of its tenants. Potential tenants with large catchment areas and populations (i.e., anchor tenants) are more valuable, since they attract traffic to the shopping center helping it to broaden its own catchment area and population. Their outside option of setting up operations outside of the shopping center could also be better, because they generate their own traffic and in some cases may not rely as much on traffic drawn by other tenants. So they seem to have a relatively strong bargaining position and if they decide to locate at a shopping center they can be expected to negotiate better than average rent conditions.

Similarly, small tenants, whose catchment area outside of a shopping center would be small, benefit most from the overall traffic generated by the shopping center and their rents may be expected to include premiums. A strategy of locating at a shopping center may still be equally as profitable as choosing a stand-alone location outside of the shopping center, because the higher rent at the shopping center may be compensated by additional revenues due to increased traffic there.

In fact, it is common for catchment areas of different shopping centers and other locations to overlap. This is illustrated by the fact that even within relatively short time frames most of the shoppers tend to visit multiple shopping venues. This suggests that in order to reach a particular shopper each vendor has a number of different options in terms of localization (although of course some of these options may be generally more desirable than others). In this sense, different locations can be thought of as highly substitutable. In contrast, if the catchment areas of two store locations do not overlap at all they would typically be considered independent (or complements) rather than substitutes and would be properly defined as located in separate geographic markets.

The larger the overlap, the stronger the competitive pressure put on each other. One can take such differences into account when calculating market shares, for example, by weighing market shares according to the overlap.

Note that there may also be situations in which no overlap of catchment areas is required. An example of such a case is given when a large international retail chain would like to enter a given geographic area (e.g., a country) and in order to do so it would be sufficient for it to cover only part of the population (e.g., open stores in three of the five largest cities). Such a strategy could be motivated by a number of frictions such as capital or budget constraints, financial market imperfections, risk management, indivisibility of labor, etc.⁴⁰ Under such a scenario, non-overlapping catchment areas (e.g., in different city agglomerations) would be substitutable rather than independent or complementary, as their presence in any right combination of them would give the retailer coverage, thus meeting its expectations/requirements. In the presence of convincing evidence documenting such frictions, the geographic market for a specific tenant type may need to be broader than an individual agglomeration.

4.8 Other relevant evidence: Price/margin and concentration

The idea of a price (or margin) concentration study is to examine an industry and investigate how price varies as a function of seller concentration. The comparison can be made either across different geographical markets (cross-sectional) or in the same market over time. Of course, there may be many other factors affecting prices and margins in different markets, all of which need to be properly accounted for using an appropriate statistical technique.

Price (or margin) concentration studies can be informative for merger analysis as a lack of correlation between high concentration in a given relevant market and high prices indicates that an increase in concentration may not be of concern. By testing the relationship for different market definitions one can attempt to identify the appropriate one.

⁴⁰ Without such frictions one would expect opening new stores wherever this is profitable, which would imply that stores serving non-overlapping catchment areas are not substitutable.

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Appendix: Summary of relevant decisions

A1.1 EU cases

A1.1.1 EU cases concerning economic activity (NACE) L68 – Real estate activities

**Table 1: List of merger cases concerning economic activity (NACE) L68:
Real estate activities**

Case code	Title	Notification date	Simpl proc	Last decision date	Deadline date
M.273	HONG KONG LAND / TRAFALGAR HOUSE	09-10-92	N	16-10-92	13-11-92
M.1289	HARBERT MANAGEMENT / DB / BANKERS TRUST / SPP / ÖHMAN	05-08-98	N	31-08-98	07-09-98
M.1637	DB INVESTMENTS / SPP / ÖHMAN	09-07-99	N	11-08-99	13-08-99
M.1937	SKANDIA LIFE / DILIGENTIA	04-04-00	N	11-05-00	12-05-00
M.2025	GE CAPITAL / BTPS / MEPC	06-29-00	N	27-07-00	01-08-00
M.2086	DEUTSCHE BANK / HAMBURGISCHE IMMOBILIEN HANDLUNG / DLI	07-27-00	N	28-08-00	29-08-00
M.2090	LIVERPOOL VICTORIA FRIENDLY SOCIETY / AC VENTURES / JV	03-11-00	Y	06-12-00	06-12-00
M.2258	TELECOM ITALIA / BENI STABILI / LEHMAN BROTHERS	08-12-00	Y	18-12-00	22-01-01
M.2825	FORTIS AG SA / BERNHEIM-COMOFI SA	11-6-02	N	09-07-02	12-07-02
M.3290	GENERAL ELECTRIC / SOPHIA	03-11-03	Y	01-12-03	04-12-03
M.3317	RATOS / LEHMANN BROTHERS / FASTIGHETSTORNET	03-11-03	Y	01-12-03	04-12-03
M.3370	BNP PARIBAS / ARI	10-02-04	N	09-03-04	11-03-04
M.3489	GOLDMAN SACHS / CERBERUS / GWS BERLIN	06-23-04	Y	07-22-04	07-29-04
M.3668	DIFA / INVESTKREDIT / JV	06-01-05	Y	03-02-05	10-02-05
M.3774	PIRELLI / DB REAL ESTATE / INVESTITORI ASSOCIATI / LA RINASCENTE-UIPM	23-03-05	Y	27-04-05	02-05-05
M.3966	PIRELLI RE / BANCA INTESA / IFIL / MARCEGAGLIA / SI / IT	23-09-05	Y	28-10-05	28-10-05
M.4095	DEUTSCHE TELEKOM / CORPUS / MORGAN STANLEY / SIREO	17-02-06	Y	23-03-06	24-03-06

Case code	Title	Notification date	Simpl proc	Last decision date	Deadline date
M.4148	NOUVEAUX CONSTRUCTEURS / GOLDMAN SACHS GROUP / DEUTSCHE BANK / LONE STAR / ZAPF	28-02-06	Y	30-03-06	04-04-06
M.4264	CERBERUS / GMAC	14-09-06	Y	19-10-06	19-10-06
M.4277	AXA REIM / AREA / RDC / NEWCO	26-06-06	Y	28-07-06	01-08-06
M.4411	AXA IMD / INVESTKREDIT / EUROPOLIS	06-10-06	Y	14-11-06	14-11-06
M.4639	GABETTI PROPERTY SOLUTIONS / MARCEGAGLIA / PIRELLI REAL ESTATE / ITALIA TURISMO	03-07-07	Y	31-07-07	07-08-07
M.4656	DEUTSCHE BANK / AVIVA / BLACKSTONE / VITUS	02-05-07	Y	12-06-07	12-06-07
M.4657	SALZGITTER / KW / RSE	21-05-07	Y	25-06-07	26-06-07
M.4802	TISHMAN SPEYER / LEHMAN BROTHERS/ ARCHSTONE-SMITH	29-08-07	Y	02-10-07	03-10-07
M.4906	CPI EUROPE FUND / CORPUS / REAL ESTATE PORTFOLIO	24-09-07	Y	10-29-07	29-10-07
M.5184	ARCAPITA / FREIGHTLINER	18-06-08	Y	18-07-08	24-07-08
M.5203	EZW / GAZELEY	06-06-08	Y	27-06-08	11-07-08
M.5246	GOLDMAN SACHS / LEG AND WESTPHALIAN COMPANIES	01-07-08	Y	06-08-08	06-08-08
M.5645	CPI CEE / GAZIT MIDAS / ATRIUM EUROPEAN REAL ESTATE	16-10-09	Y	11-18-09	23-11-09
M.5885	ALTAREA / PREDICA / ABP / ALDETA	20-05-10	Y	6-22-10	25-06-10
M.6020	ACS / HOCHTIEF	03-12-10	N	01-14-11	18-01-11
M.6168	RBI / EFG EURO BANK / JV	20-05-11	N		29-06-11
M.6227	CAISSE DES DEPOTS ET CONSIGNATIONS / PREDICA / SCOR / SCI BRP1	12-05-11	Y	06-15-11	21-06-11

Source: European Commission, Competition: Making markets work better, <http://ec.europa.eu/competition/elojade/isef/index.cfm> (accessed June 29 2011).

In most cases the simplified procedure was applied. In remaining cases, markets are generally defined broadly:

M.1289 - Harbert Management/DB/Bankers Trust/SPP/Öhman and M.1637 - DB Investments/SPP/Öhman: “The operation involves the Swedish sector for real estate. In this respect, the acquired companies own, manage, acquire, sell and lease real estate properties. **With respect to the product market definition, such a market may be divided into two segments, notably properties for commercial use and properties for residential use.** However, the exact definition of the

product markets may be left open since, even on the narrowest possible option, the operation will not have any appreciable competitive impact.”

M.1937 - Skandia Life/Diligentia: “A previous Commission decision in the real estate sector in Sweden (Case No IV/M.1637 - DB Investments/SPP/Öhman of 11.8.1999) considered that real estate may be divided between properties for commercial use and those for residential use, but left the product market definition open, given the lack of competition problems at any of the alternative levels. The geographic market definition was also left open in the said case, for the same reason of lack of competition concerns, even at the level of local geographic areas, such as municipalities. In the present case, the precise definition of both the relevant product market and geographic market can, likewise, be left open due to the lack of any affected market at any of the alternative levels.”

M.2025 - GE Capital/BTPS/MEPC: No explicit reference to product market definition (“No affected markets”).

M.2086 - Deutsche Bank/Hamburgische Immobilienhandlung/DLI: “The concentration concerns the real estate sector. In previous decisions the Commission identified two segments of this sector: properties for commercial and for residential use. The joint venture will be active in properties for commercial use. [...] Like in the previous cases, it is not necessary to further delineate the relevant product markets because in all alternative market definitions considered, effective competition would not be significantly impeded in the EEA or any substantial part of that area.”

M.2825 - Fortis AG SA/Bernheim-Comofi SA: “As noted on the Decision M.2110 - Deutsche Bank/SEI/JV the real estate market might be subdivided into two smaller markets: properties for commercial use (offices, shops and industrial properties) and properties for commercial residential use (housing).”

M.3370 - BNP Paribas/Atis Real International: “La Commission a laissé ouverte la définition des marchés dans des cas touchant au secteur de l’immobilier. Cependant, les marchés de l’immobilier ont généralement été étudiés en opérant une distinction entre les services destinés aux entreprises et ceux destinés aux particuliers. De plus, il ressort de la pratique de la Commission et du Ministère français de l’économie et des finances, qu’une distinction plus fine pourrait être opérée dans l’immobilier d’entreprise entre les locaux à usage de bureaux, de commerce ou industriels. Enfin, la Commission a également procédé dans des précédentes décisions à une délimitation plus fine par type de services, par exemple promotion immobilière, gestion d’immeubles ou activités foncières.”

COMP/M.6020 - ACS/HOCHTIEF: “The Commission has considered the possibility to distinguish between the following product markets in real estate services: (i) real estate development and (ii) real estate management services.” (with reference to M2825 decision.)

A1.1.2 EU cases concerning economic activity (NACE) L68.02 - Renting and operating of own or leased real estate

**Table 2: List of merger cases concerning economic activity (NACE) L68.02:
Renting and operating of own or leased real estate**

Case code	Title	Notification date	Simpl proc	Last decision date	Deadline date
M.929	DIA / VEBA IMMOBILIEN / DEUTSCHBAU	22-05-97	N	23-06-97	23-06-97
M.1242	PARIBAS / ECUREUIL-VIE / ICD	31-07-98	N	31-08-98	09-03-98
M.2674	SONAE / CNP-ASSURANCES / LL PORTO RETAIL JV	20-11-01	Y	20-12-01	21-12-01
M.2678	SONAE / CNP-ASSURANCES / INPARSA JV	20-11-01	Y	20-12-01	21-12-01
M.2863	MORGAN STANLEY / OLIVETTI / TELECOM ITALIA / TIGLIO	29-07-02	N	30-08-02	09-02-02
M.3644	VITERRA / DEUTSCHBAU	15-11-04	Y	17-12-04	20-12-04
M.3647	WESTLB / DAL	16-12-04	Y	27-01-05	28-01-05
M.3718	IFIL / INTESA / MARCEGAGLIA / SVILUPPO ITALIA / SIT	17-02-05	Y	21-03-05	29-03-05
M.5065	AXA / CDC / Hotels ACCOR	20-02-08	Y	27-03-08	31-03-08
M.5246	GOLDMAN SACHS / LEG AND WESTPHALIAN COMPANIES	07-01-08	Y	08-06-08	08-06-08
M.5260	BNP PARIBAS / CHOMETTE / GE / CAPITAL FRANCE HOTEL	16-07-08	Y	21-08-08	22-08-08
M.5284	KLEPIERRE / ABP / STEEN & STRÖM	25-08-08	Y	23-09-08	29-09-08
M.5307	ACCUEIL PARTENAIRES / CDC / RHVS 1% LOGEMENT / SGRHVS	16-10-08	Y	13-11-08	20-11-08
M.5336	ALLIANZ / GENERALI / TOPTORONY AND SHAZA / JV	09-10-08	Y	10.10.2008	15-10-08
M.5389	AEROPORTS DE PARIS / THE NUANCE GROUP	21-11-08	N	22-12-08	01-07-09
M.5400	LCR / EXEL / ARGENT	17-11-08	Y	16-12-08	22-12-08
M.5610	PREDICA / SFL / PARHOLDING	25-08-09	Y	29-09-09	29-09-09
M.5625	BRITISH LAND / BLACKSTONE / BROADGATE ESTATE	18-09-09	Y	16-10-09	23-10-09
M.5645	CPI CEE / GAZIT MIDAS / ATRIUM EUROPEAN REAL ESTATE	16-10-09	Y	18-11-09	23-11-09

Case code	Title	Notification date	Simpl proc	Last decision date	Deadline date
M.5654	BROOKFIELD / BBI	10-09-09	Y	11-05-09	16-11-09
M.5683	BROOKFIELD / BBI / DBCT	14-10-09	Y	13-11-09	19-11-09
M.5780	ALLIANZ / ING / ALLEE CENTER	21-01-10	Y	17-02-10	25-02-10
M.5885	ALTAREA / PREDICA / ABP / ALDETA	20-05-10	Y	22-06-10	25-06-10
M.5893	ALLIANZ / CORIO / PORTA DI ROMA	07-08-10	Y	08-06-10	13-08-10
M.5965	BROOKFIELD / PRIME	14-09-10	Y	14-10-10	19-10-10
M.6052	LONDON & CONTINENTAL RAILWAYS / LEND LEASE EUROPE / STRATFORD CITY BUSINESS DISTRICT	25-11-10	Y	01-07-11	01-10-11
M.6070	PREDICA / GENERALI VIE / EUROPE AVENUE	14-12-10	Y	25-01-11	27-01-11

Source: European Commission.

In almost all cases the simplified procedure is applied. Exceptions:

M.929 - DIA/VEBA Immobilien/Deutschbau: “Die anmeldenden Parteien erklären, daß der Markt für die Vermietung von Wohnungen der sachlich relevante Markt ist. Eine weitere Abgrenzung des sachlich relevanten Marktes etwa nach mietpreisgebundenen und freifinanzierten Wohnungen, nach Wohnungsgrößen und -ausstattungen oder sonstigen Kriterien ist jedoch nicht notwendig, weil in allen untersuchten alternativen Märkten wirksamer Wettbewerb weder im EWR noch in einem wesentlichen Teil dieses Gebiets erheblich behindert würde.”

M.1242 - Paribas/Ecureuil-Vie/ICD: “Les parties notifiantes déclarent que le marché des produits en cause est celui de la location immobilière à usage commercial. Il n'est pas nécessaire de définir les marchés des produits en cause avec plus de précision car, sur tous les autres marchés considérés, l'opération prévue n'aurait pas pour effet d'entraver la concurrence de manière significative dans l'EEE ou une partie substantielle de celui-ci.”

M.2863 - Morgan Stanley/Olivetti/Telecom Italia/Tiglio: L'operazione di concentrazione notificata produrrà effetti nei settori della vendita e della locazione di immobili. Dalle indagini risulta che dal punto di vista della domanda si può distinguere non solo tra compravendita e locazione di immobili ad uso terziario o ad uso residenziale, ma anche, all'interno della categoria degli immobili ad uso terziario, tra locazione e compravendita di immobili ad uso ufficio, ad uso negozio o ad uso industriale. Dal punto di vista dei clienti, infatti, appare determinante l'uso specifico che può essere fatto dell'immobile acquistato o preso in locazione.

Una precisa delimitazione del mercato non appare tuttavia necessaria ai fini della presente decisione posto che, anche ricorrendo alla definizione più ristretta del mercato del prodotto rilevante, l'operazione in questione non contribuirebbe a creare o rafforzare alcuna posizione dominante.⁴¹

M.5389 - Aéroports de Paris - The Nuance Group: “Le marché amont des concessions pour la fourniture de services de vente de détail en aéroport”

A1.2 Selected cases and positions of EU national authorities

A1.2.1 UK

On April 6, 2011, the UK's commercial real estate property sector will become subject to UK competition law because of the revocation of the Land Agreements Exclusion Order which has exempted most types of commercial property agreements (e.g., exclusionary clauses in lease agreements) from competition laws.

Draft guidelines on the change: “In many cases it is also necessary to consider the competitive conditions in the market for land itself. This can be important to determine the availability of suitable land for the use in question when assessing the impact of a restriction over a particular piece of land. Determining what land is suitable (and over what geographic area) will itself depend on the scope of the related market. For example, a particular plot of land in a town may be the only site suitable for a distribution center, but at the same time it may be one of several sites in the town suitable for an office building.”

ME/1615/04: CWG Acquisition Ltd of Canary Wharf Group plc: “CWG argues that the relevant product market in this case is commercial real estate excluding housing. Our third party enquiries suggest that all areas of commercial real estate are competitive and un-concentrated with many different players and our

⁴¹ “The concentration notified will produce effects in the sectors of the sales and renting of real estate. From the investigation it emerges that from the point of view of demand one can distinguish not only between sales and renting of real estate for tertiary or residential use, but also - within the tertiary use - between renting and sales of real estate for office, shop, or industrial purposes. Indeed, from the point of view of customers, it seems to be very important the specific use of the real estate (purchased or rented). A precise market definition however does not appear necessary for the present decision given that even using the most narrow product market definition this operation does not contribute to the creation or the strengthening of any dominant position.”

assessment shows that even on a narrow product market segmented by commercial property type, such as office, retail, and industrial, no competition concerns arise in respect of this particular transaction. As a result, it is not necessary to conclude definitively on product market definition in this case.”

A1.2.2 Germany

Bericht des Bundeskartellamtes über seine Tätigkeit in den Jahren 2005/2006 (on page 162): “Das Bundeskartellamt unterscheidet dabei zwischen den sachlich relevanten Märkten für gewerbliche Immobilien und Wohnungen.“

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About ESMT

ESMT European School of Management and Technology was founded in October 2002 by 25 leading global companies and institutions. The international business school offers Full-time MBA and Executive MBA programs, as well as executive education in the form of open enrollment and customized programs. The business school works closely together with ESMT Competition Analysis, which provides research-oriented consulting services in the areas of competition and regulation. ESMT is a state-accredited private business school based in Berlin, Germany, with an additional location in Schloss Gracht near Cologne.

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