

Application of Unilateral Effects in the Review Process of Concentrations of Undertakings

Anti-Monopoly Bureau, MOFCOM
20 March 2017

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Overview

- Collection and Application of economic evidence that supports unilateral effects
 - Analytical Framework of Unilateral Effects
 - Efficiency Analysis in assessment of Unilateral Effects
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Application of Collection of Economic Evidence that Supports Unilateral Effects

Unilateral effects

Application of unilateral effects

Collection of evidence that supports unilateral effects

Unilateral Effects

- Unilateral effects, also known as non-coordinated effects, refers to the fact that the merged firms may gain more market power, so as to unilaterally raise the product price, and as a consequence, will obtain the ability, incentive and possibility to unilaterally eliminate and constrain competition.
 - The Article 4 of “Interim Provisions on the Assessment of Competitive Effects of Concentrations of Undertakings” stipulates: when assessing the possibility of negative impacts on competitions caused by a concentration of undertakings, the first step is to investigate whether the concentration of undertakings would generate or enhance the undertakings’ ability, incentive and possibility to eliminate or constrain competition.
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Application of Unilateral Effects

- ❑ The unilateral effect is the primary factor that MOFCOM will consider when assessing anti-competitive impacts caused by horizontal concentrations of undertakings
 - ❑ In all the following cases, the unilateral effects become an important factor for imposing of the restrictive conditions: Abbot Laboratories/St Jude Medical, AB Inbev/SAB Miller, NXP / Freescale Semiconductor,
 - ❑ The Article 4 of “Interim Provisions on the Assessment of Competitive Effects of Concentrations of Undertakings” stipulates: when assessing the possibility of anti-competitive impacts caused by a concentration of undertakings, the first step is to investigate whether the concentration of undertakings would generate or enhance the undertakings’ ability, incentive and possibility to eliminate or constrain competition.
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Collection of Evidence that Supports Unilateral Effects

- ❑ Evidence that can support unilateral effects mainly includes: market share, market concentration and actually state of competition in the relevant market, the ease of entry, etc.
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Collection of Evidence that Supports Unilateral Effects

- 1. Market Share
 - Data on market share usually come from relevant statistics offices (such as State Statistics Bureau), trade associations (International, as well as national) or a high-profile independent third-party , etc.
 - In case that data on some particular products cannot be obtained from the above-mentioned sources, the applicant may provide estimated data, with detailed explanations on, among others, the origin of the data, the calculation methods.
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Collection of Evidence that Supports Unilateral Effects

- 2. Market concentration
 - The calculation is usually based on market share data
 - 3. Actual state of competition on the relevant market
 - In particular, the buyer power on the relevant market, brand dependency, R&D, etc are need to be considered.
 - 4. The Ease of Entry– main focus on the principal factors of production, sale channel, technology strength, critical facilities, etc.
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Analytical Framework of Unilateral Effects

- 1. Structural analysis
 - 2. Merger simulation
 - 3. UUP test (upward pricing pressure test)
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Analytical Framework of Unilateral Effects

- 1. Structural Approach
 - Structural Approach starts from defining the relevant market, followed by an projection on whether the related concentration would produce unilateral effects, based on comparison of the HHI index of pre- and post merger or the changes of concentration ratio.
 - This method is widely adopted by national authorities worldwide and mainly consists of the following steps:
 - Step 1: Defining the relevant market
 - Step 2: Calculating the market share and market concentration level
 - Step 3: Assessing anti-competitive effects
 - Step 4: Assessing efficiency defence and failing firm defence etc.
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Analytical Framework of Unilateral Effects

- Structural approach and 3 analytical tools:
 - (1) Hypothetical Monopolist test (SSNIP Test) : When a hypothetical monopolist moderately raises the price of the concerned product (to 5-10%) for a certain period of time (usually 1 year), its the customers would therefore switch to other substitute goods. The market of these substitute goods will be regarded as the same as that of the product in question, and the product in question and the substitute goods are in competition. Otherwise, the markets will not be regarded as the same.
 - (2) HHI - equals the sum of the squares of the market shares of each individual firm on the relevant market
 - (3) CRn index - equals the sum of market shares of N undertakings on the all relevant markets
- Quantitative analysis is absent in this approach, which is overly-dependent on the market definition. The Structural approach is not suitable for reviewing the concentrations of undertakings with differentiated products, and has, thus received critics.

Analytical Framework of Unilateral Effects

- Application of the structural approach
 - **Acquisition of St Jude Medical by Abbott Laboratories**
 - In 2015, in China, the market share of small-hole Vessel Closure Devices (VCDs) of Abbot Laboratories accounts for 71.3% and Jude Medical 23.9%. The total share exceeds 95%
 - Before the transaction, the HHI index, measuring the market concentration amounted to 5678, and after 9086, an increase of 3408. The concentration on the relevant market was already high before the merger. The transaction would increase such concentration and further strengthen the market power of Abbot Laboratories

Analytical Framework of Unilateral Effects

□ Application of structural approach

Merger between Mstar Semiconductor and Media Tek (2013)

Before the merger, the market concentration index of main control chips of LCD TV in the mainland China was high, at 4533. The post-merger HHI is 6500, an increase of 1962. This transaction has significantly changed the market structure of the main control chips of LCD TV on the mainland's China market.

Analytical Framework of Unilateral Effects

□ Application of structural approach

Acquisition of Life Technologies by Thermo Fisher Scientific (2014)

A research of the HHI indices of 59 related product markets indicates that the post-merger HHI of 13 product markets exceeds 1500, an increase of more than 100. This shows that the concentration level of these 13 products are rather high and the index increase caused by the merger is also high. A further investigation is needed.

Analytical Framework of Unilateral Effects

- Application of the structural approach
- **Acquisition of the entire entity Freescale Semiconductor by NXP Semiconductors (2015)**
- Situations of RF-power-transistor markets worldwide are similar, including China, i.e. few competitors and high concentration. The largest 8 competitors on the world market take up more than 90% of the global market share.
- In terms of the market share, Freescale Semiconductor is the number one in the world and followed by NXP Semiconductors. The combined market share reaches 54%, leaving the other competitors far behind, lacking effective competitive restraints.
- Both companies apply the technology of LDMOS and Gallium nitride in the production process (mainstream technology). The products made from these 2 technologies are estimated to take up 84% of the market share in 2012, and 92% in 2018.
- **The overall assessment shows** that the NXP Semiconductors will obtain the incentives and ability to independently eliminate and restrict competition.

Analytical Framework of Unilateral Effects

- 2. Merger simulation
 - Establishing a specific demand system to compare the price before and after the concentration, so as to assess the unilateral effects. The price elasticities of demand and cross-price elasticities can be calculated, based on consumer demands, with a simulation of the demand function. The purpose is to test the substitutability of the relevant products; to calculate the profit-maximizing prices and marginal costs, by using the historical prices and data on sales before the concentration; to simulate and analyse the price and sales volume after the concentration, and subsequently to make comparison.

Analytical Framework of Unilateral Effects

□ 2. Application merger simulation

- Recently, our Bureau has adopted the merger simulation to assess an important case involving homogeneous products
 - Taking into account of the features of a market with homogeneous products (homogeneity, small spread of product prices), the review team applied the Cournot duopoly model to simulate the merger. The result showed that the prices of relevant products would increase 5-12% after the merger and provided a solid support for the review.
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Analytical Framework of Unilateral Effects

□ 3. UPP test (test for upward pricing pressure)

- The UPP test is to measure the direct competitiveness of one product of one merging party vis-à-vis another product of the other merging party, by assessing the diversion ratio. In another word, the test is to determine the ratio of sales of product A that would lost to that of the product B, following by a price increase of the product A, so as to assess the unilateral effects.
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Efficiency Analysis in Unilateral Effects

”**Improve the economic efficiency**” is one of the major legislative objectives of the China’s Anti-monopoly Law.

Impact of concentrations of undertakings on efficiency is an important factor in competition assessment. Positive impact can be used as an important ground of defence.

Efficiency Analysis in Unilateral Effects

Interim Provisions on the Assessment of Competitive Effects of Concentrations of Undertakings

- Art. 9: Concentrations of undertakings may improve economic efficiency, achieve economies of scale and scope, cut down the product costs and enhance product diversification, so as to bring positive impacts on consumers’ benefits.
 - Art. 12 When assessing concentrations of undertakings, except for the above-mentioned factors, the following factors also need to be considered: impact of concentration on the public interests and economic efficiency, whether the involved undertakings are at the verge of bankruptcy, whether the countervailing buyer power exists
 - Art. 13: **If the undertaking concerned can prove that the advantages of such concentration obviously outweigh the disadvantages**, the MOFCOM may adopt the decision not to prohibit such concentration.
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Efficiency Analysis in Unilateral Effects

- Anyhow, “**the undertaking concerned can prove that the advantages of such concentration obviously outweigh the disadvantages**”, these efficiencies should be certain, and merger specific, as well as can be materialized in a reasonable time and pass on to consumers
 - As in other jurisdictions, efficiency defence has rather strict applicable conditions. At present, no case is ever successful through efficiency defence.
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Thank you

Anti-Monopoly Bureau, MOFCOM