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Cement merger: Schwenk/Opterra

15 November 2018

16th ACE Conference, Bologna

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Why is Schwenk/Opterra interesting?

New FCO-method to define the relevant geographic market (and continuing emphasis on market shares)

- Focus on past deliveries
- Focus on areas with presence/overlap
- Higher market shares than previous method

New remedy proposal to divest a virtual cement plant (which was rejected based on the market test)

Agenda

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Geographic market definition in cement

Two characteristics of cement markets…

- Distance matters: Low value and heavy weight make transport cost relevant and drive delivered prices up
- Customer location matters: E.g. customers east of the plant may choose among different suppliers than those west of the plant

…should influence the role of geographic market definition: aggregate market shares should only be a screen for further analysis

- Market conditions will likely not be homogenous but vary by location
- Any market definition method will have some element of arbitrariness

Reality differs: market shares are used as a general "currency" (see presumption threshold of 40%, press releases etc.)

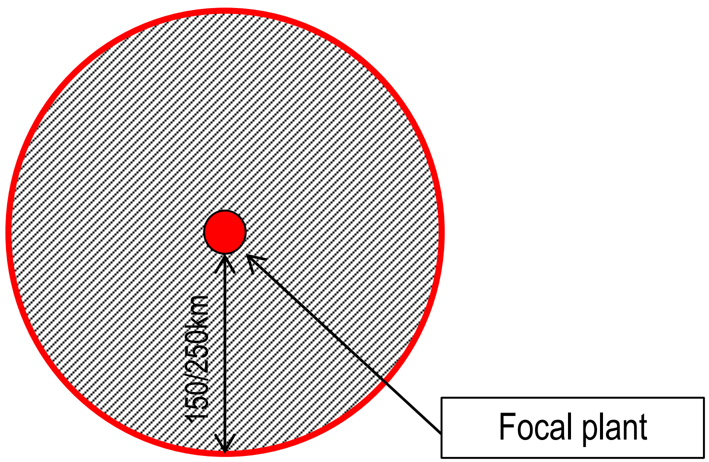
Geographic market definition for screening

The European Commission approach for grey cement

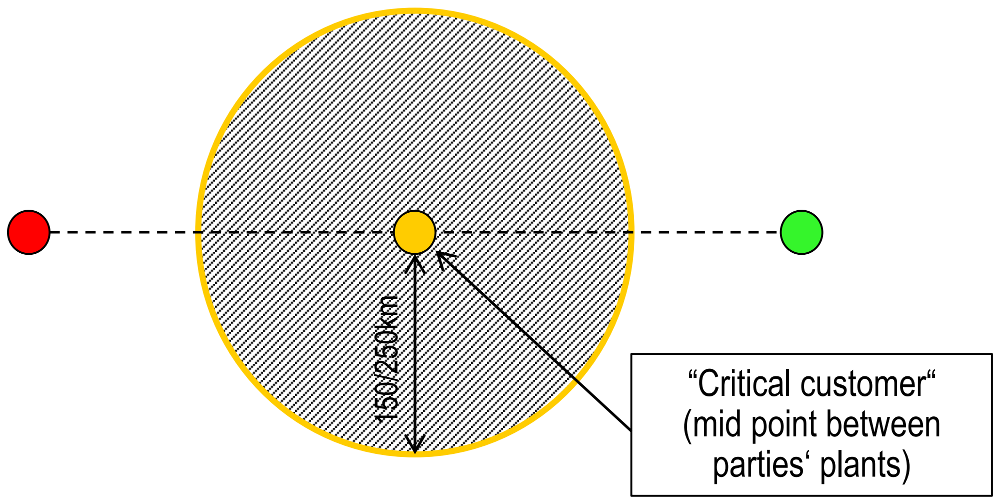
- 150km/250km as the crow flies around the affected cement plants of the merging parties or the location of a critical customer (approximated by the midpoint between the plants)
- 150km/250km reflects a typical delivery radius around a plant in which 70% and 90% of the volume is sold
- Possible improvement: use polygone to reflect isochrones (to reflect driving conditions)

(Precedents: Holcim/Lafarge, Holcim/Cemex West, HeidelbergCement/Italcementi, DDC/Cemex Croatia) [add dates]

Plant based view



Customer based view



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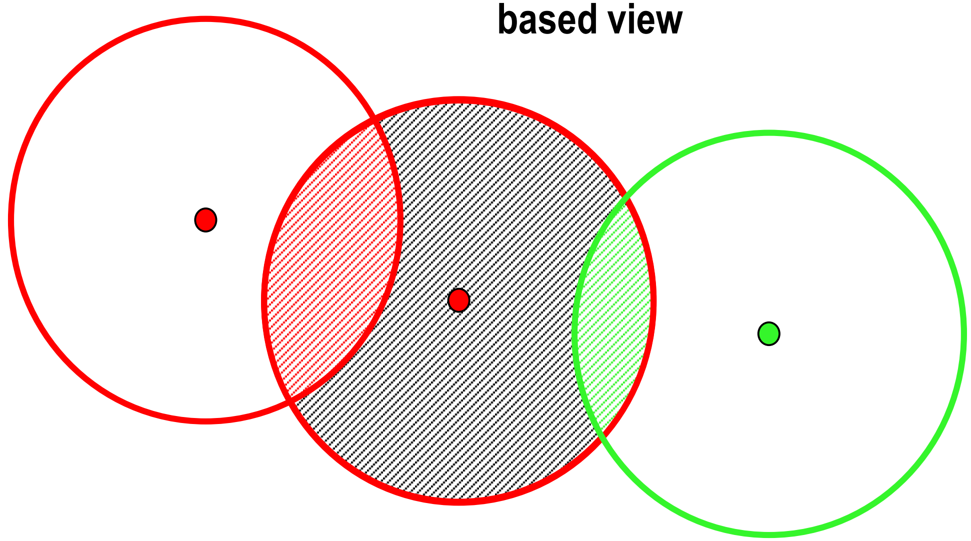
Market share measurement for screening

The European Commission approach:

- Capacity market shares: weighing production capacity according to the area in the relevant geographic market (nominal or economic capacity)
- Market shares based on past sales: identifying sales into the relevant market (potentially estimating the total market by estimates of cement consumption)

Illustrative example: Plant based view



Capacities in the plant centred market (fictive example):
Firm A: 100% x 1000 kt + 15% * 500 kt = 1075 kt
Firm B: 10% x 2000 kt = 200 kt
Gesamtmarkt = 1075 kt + 200 kt = 1275 kt

Market shares:
Firm A: 1075 kt / 1275 kt = 84.3%
Firm B: 200 kt / 1275 kt = 15.7%

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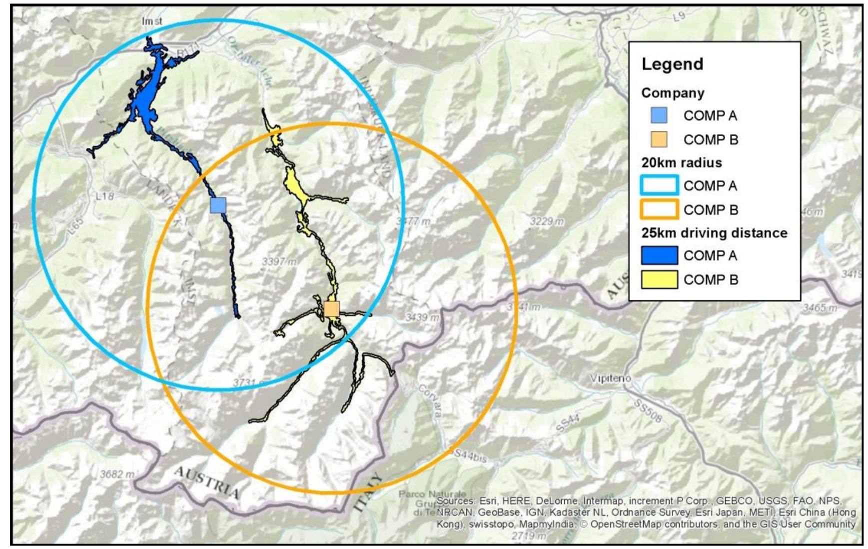
A potential pitfall of the “as the crow flies” approach

Consider a mountainous area

- Overlap suggest by the crow
- There is no overlap if transport costs are considered

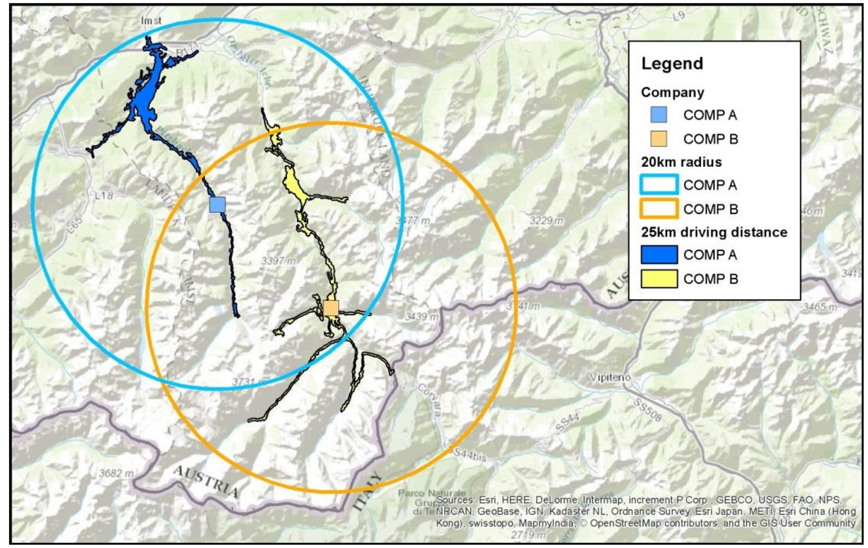


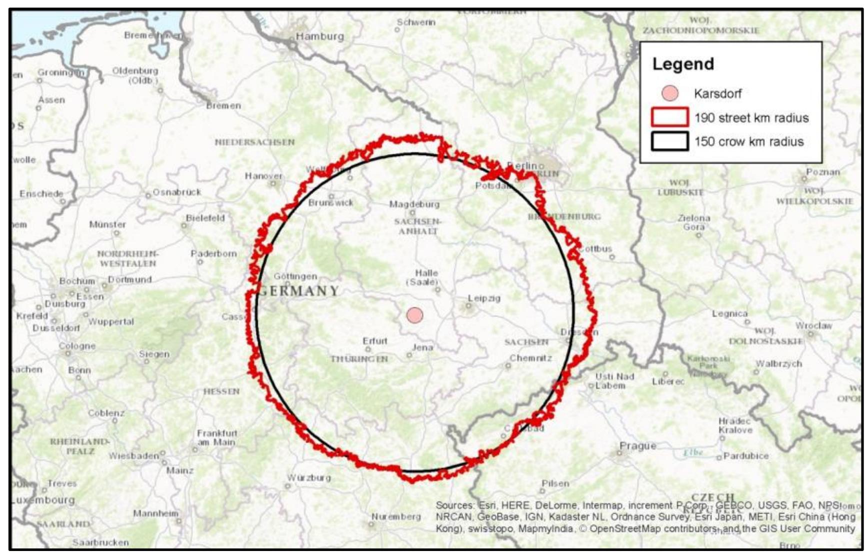
A potential pitfall of the “as the crow flies” approach

Consider a mountainous area

- Overlap suggest by the crow
- While no overlap if transport costs are considered

- Can be addressed by looking at isochrones…
- …and it is not really an issue in the middle of Germany





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Application to Schwenk/Opterra

Analysis of actual distances broadly confirms EC standard assumptions

- 70% of Sales around 150km
- 90% of sales around 200km

Capacity and volume shares in a 27% to 44% range for these markets (plants/mid points)

- Nominal capacity shares for all relevant markets (plants or midpoint) below 40% (below 27% for a 200km radius and below 22% for a 250km radius) (Economic capacity shares are even lower)
- Sales shares for all relevant markets below 44% (below 31% for a 200km radius and below 23% for a 250km radius; Midpoint approach and 190 Street-km polygon (≈150 crow km): market share 36%)

Compare this to 60-65% volume shares reported by the FCO and you see a difference

Criticism of the EC approach by the FCO

The aim of geographic market definition is to identify areas where customers are "directly affected" by the merger…

…and the EC method is crude because

- Many customers unaffected (affected) by the merger may (not) be included in the market
- Unclear where to centre circles
- Market shares often very sensitive to changes in radius

Is the FCO method better?

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Description of the FCO approach

See presentation by Arndt Christiansen

Key points for discussion

- Only include “mini-areas” where there is proof of past delivery (last year? Last three years?)
- Deviate from this rule if and only if there is evidence of deliveries beyond (“enclosed by overlap areas”)

FCO approach: issues for discussion

- **Key understanding of how competition works in the cement market**
  - What do I learn from observed deliveries?
  - What do I learn form proximity?
- **Suitability as a screening device or a tool for a detailed competitive assessment**
  - Does it overcome the aggregation problems associated with market def. in regionally differentiated markets?
  - Easy to implement (also by merging parties)?
- **Consistency of its elements and with past decisions**
  - Typically higher market shares of the merging parties than with established methods?
  - How to deal with inconsistencies within?

Basic understanding of competition in cement

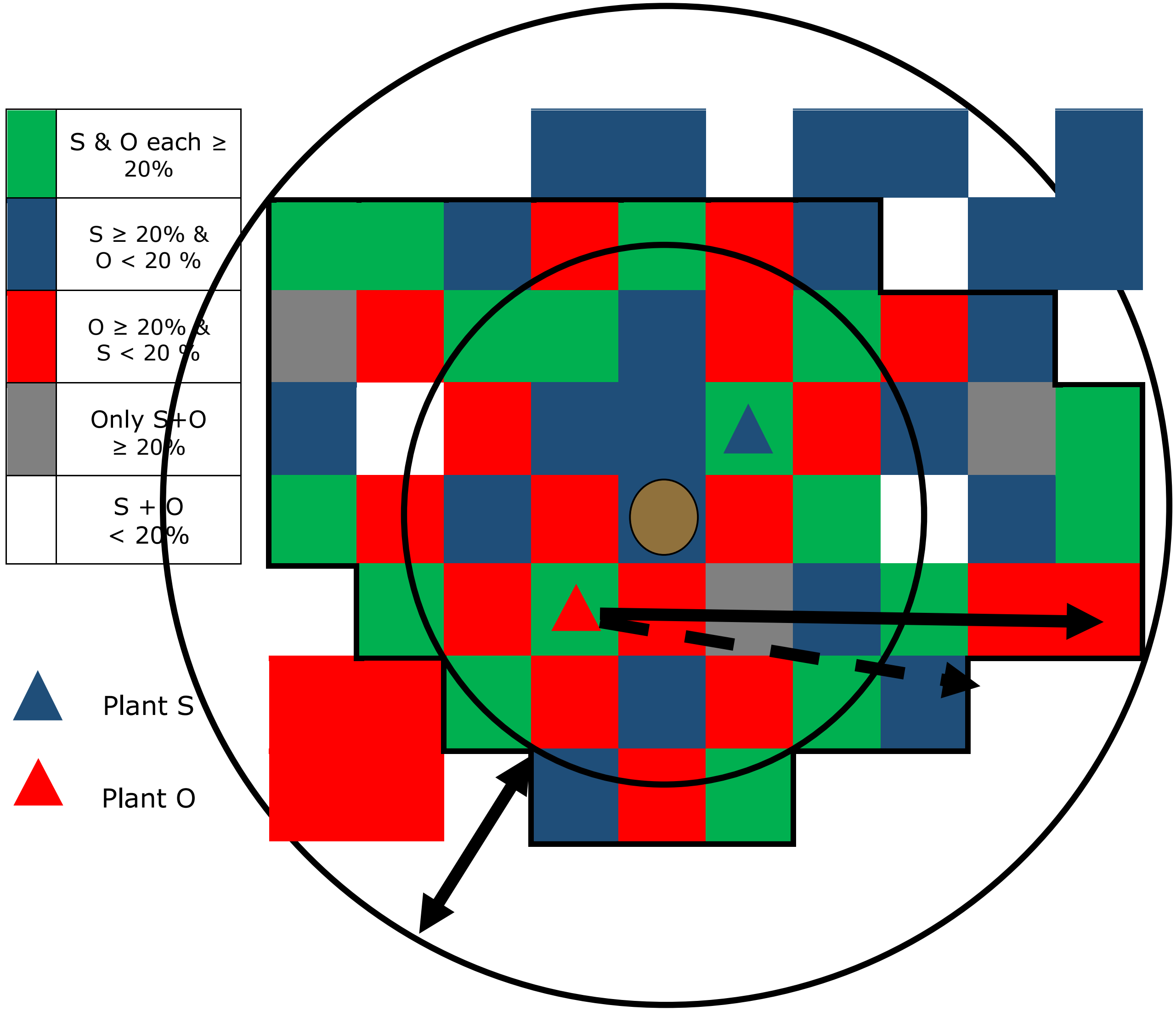
How do firms compete?

- Customers usually conclude yearly contracts for a plant with one or two suppliers
- They ask for quotes from several potential bidders and/or use the threat of switching in negotiations
- Larger customers sometimes procure for several plants at the same time
- The (road) distance between customer and supplier plants is a relevant driver of the delivered costs

Some relevant consequences

- Firms can and do differentiate prices by location (and potentially other factors)
- It is decisive that customers have sufficient credible potential suppliers/bidders to work with
- The quantity or market share "east of" a supplier plant may be no indication of the market position for a customer "west of" a supplier plant ("aggregation problem") – what matters for competition is the likelihood of an aggressive bid
- Other things equal, a firm closer to the customer is more likely to bid aggressively than a firm farther away (i.e. there is no reason for "geographic bundling" due to bundled deliveries (except if terminals are involved) or regional marketing)

Understanding of competition: Illustration



- Relevance as credible bidder will depend mostly on distance
- White spots may emerge because…
  - …there are large contracts with a rival
  - …the market area is small with few customers and a random choice of third party suppliers
  - …many suppliers compete in the relevant areas

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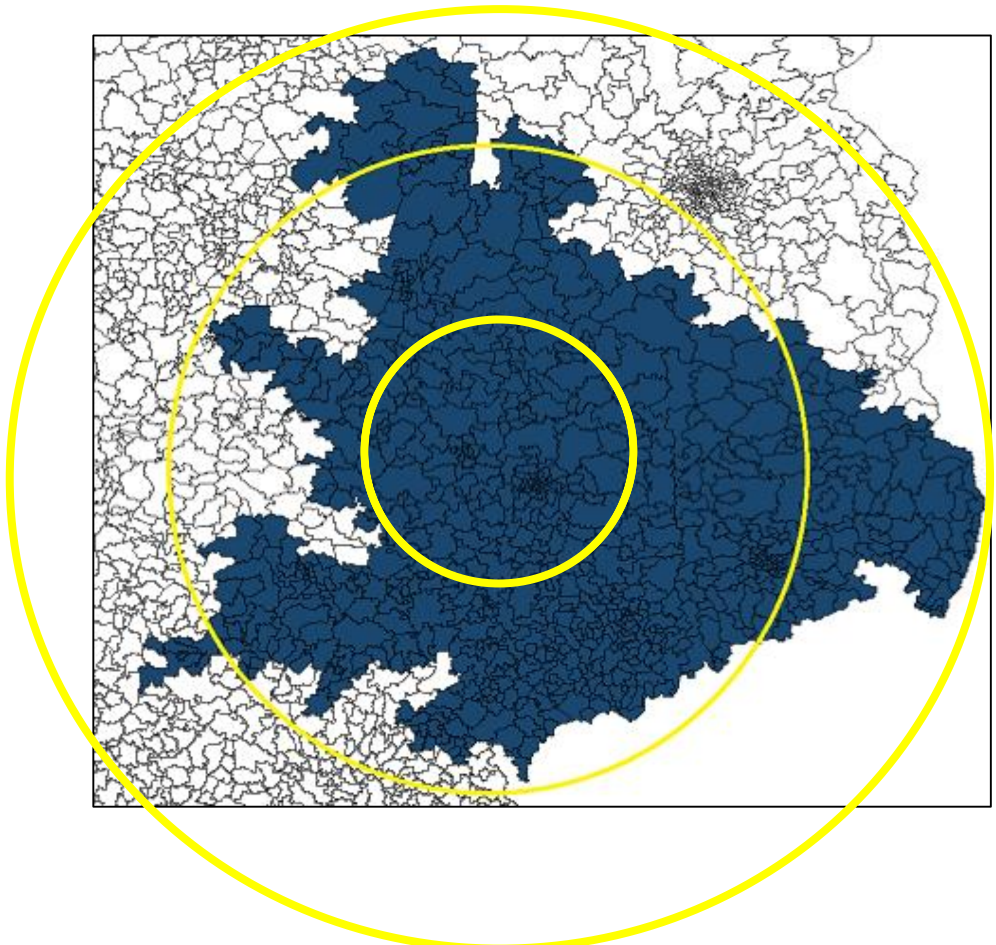
Area where Karsdorf can/does compete

- Outer ring: indication of area where Karsdorf can excert competitive pressure
- Middle ring: 150km around Karsdorf
- Closest area where according to the FCO method Karsdorf does not compete



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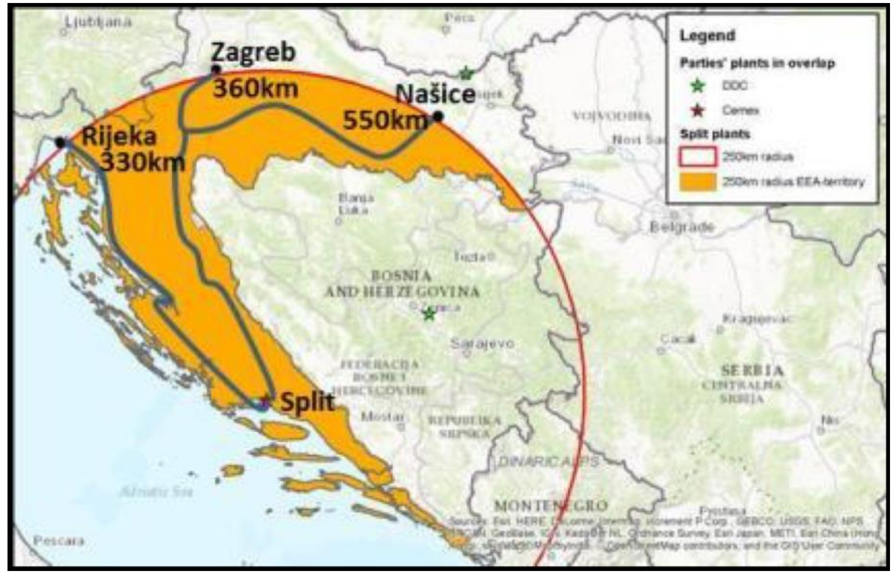
An EC example of the aggregation issue

- *The Commission considers that in the case at hand the **appropriate radius for the circular catchment areas around the Parties' plants should be 250 km geodesic distance**. This conclusion is based on the data of the Parties and other suppliers regarding delivery distances by rail and road in Croatia*
- *Combined sales market shares of the Parties amount to [50-60] % for the modified Split catchment*
- *Combined capacity shares ranged between [40-50] % and [50-60] %*
- *Because of **geographic variations within the relevant catchment areas, the market share of the merged entity in the southern region of Croatia, Dalmatia, is significantly higher** at [70-80]-[80-90] %.*
- Case M.7878 — HeidelbergCement/Schwenk/Cemex Hungary/Cemex Croatia 2017, Para 31ff; emphasis added



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Does the FCO approach overcome the aggregation issue?

The aggregation issue affects all attempts to define relevant geographic markets in which there is strong regional differentiation

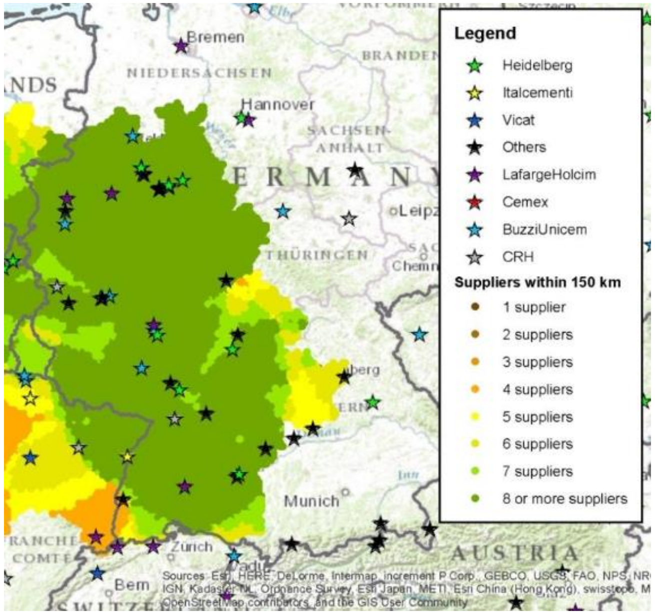
It is not resolved in the FCO approach

Alternative approach: heat map (see EC example on the right)

- Shows number of suppliers in a 150km range
- For each location where there is overlap (using the 150km)

(This approach also raises issues: what if the area with very few suppliers is very small?)

Other methods exist – just an example



Case M.7744 - Heidelbergcement / Italcementi, p. 28

FCO approach: Is it easy to implement?

- Requires very granular data on deliveries by “mini region”
- Outcome sensitive to definition of “past deliveries” and the size of the “mini-regions” and their location
- Can only be precisely implemented by authority (requires info on deliveries into mini-regions) – no legal certainty

More a Phase II than a screening instrument – not sure we want to define markets in Phase II, given the aggregation issue

FCO approach: consistency of its elements and with established methods

The full test includes a „trade“ plausibility check (Elzinga Hogarty test)

- When would it not be “plausible”? (cut off points?)
- What happens if the result gives conflicting evidence?
- Why should this matter (except for connecting it to past methods)?

The method will typically yield higher market shares than the EC approach and previous FCO approaches

- This should not matter too much if it was just for screening purposes
- However, in reality it makes a difference
- Key element in the competitive assessment according to the presentation by the FCO:
  - Press release first page: “Post merger Schwenk KG, which already has a cement plant in Bernburg (Saxony-Anhalt), **would have achieved a market share of around 60 per cent.”**
    https://www.bundeskartellamt.de/SharedDocs/Publikation/EN/Pressemitteilungen/2017/16_11_2017_Schwenk_Opterra.pdf?__blob=publicationFile&v=2 accessed 8 Nov 2018
  - Differences in measurement are NOT communicated: one single currency
  - Legal impact due to presumptions

A general point: is it right to put so much emphasis on aggregated market shares in geogr. differentiated markets?

A way out?

Why not go back to the screening approach developed by the EC…

…and then switch focus to an analysis of competitive effects

- Build on what matters for competition: number of bidders and number of potential bidders
- Measure outcome: not in terms of volume delivered but in terms of prices
- Identify closeness of competition using classical tools for tender markets
- Use overlap analysis to identify critical customers or areas
- Study potential bidders for these customers after the merger (and whether they have capacity or quality issues)
- Resources are much better spent on this rather than defining markets which will contain apples and bananas (in terms of competitive landscape)

Background: Virtual Plants as remedy

Idea: structure incentives such that the remedy taker acts like an owner of a plant…

…if a physical divestment of a plant is undesirable and a contract can be clearly specified

Remedy in electricity beginning with the merger of EDF and ENBW 2001…

- “EDF undertakes to make available to competitors access to in total 6000 MW generation capacities located in France, 5 000 MW in the form of virtual power plants (VPP)” Case No COMP/M.1853 – EDF/EnBW 2001 para 93

…and in telecoms, e.g. the merger of Telefónica (O2) and E-Plus 2014

Similar characteristics in the Schwenk/Opterra case

The remedy and market test

The proposed remedy was designed to have the taker act like a plant owner…

- Offer a virtual cement plant ("Zementwerksscheibe") of 500kt
- Fixed payment for the capacity which lowers variable costs to variable production costs
- Contract provides access to all grades of cement without an end date

…with additional safeguards

- Transfer of customers with 450kt demand
- Offer by Schwenk to provide relief (from other plants) in case of delivery bottlenecks (from other plants)
- A prohibition to put the remedy taker in any situation that makes him worse off than the seller

The remedy and market test

Market test

Decision relies on the view of customers

"Almost all the customers surveyed considered the plant slice option inadequate or inappropriate to compensate for the adverse impact on competition. They thought that the acquirer of the plant slice would be virtually dependent on Schwenk in the future and that the two companies would coordinate conduct between themselves. Many of the companies also pointed out the risks involved in a contractual arrangement." (FCO press release 16 Nov 2017)

- It is not clear what the basis of the concerns is – anything that could not have been assessed by the FCO?
- Is this just "views" and "assessments" or did they provide reasons for the concerns
- FCO may have been in a better position to judge itself (and it did clear for the market test)

For discussion: role of "views" and "assessments" (as opposed to expertise) in such cases