

Merger Control in Hi-Tech Industry: China Practice and Developments

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Fangda Partners

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Table of Contents

- 1. China Merger Control Enforcement: Overview and Recent Developments**
- 2. China Merger Control Enforcement in Hi-Tech Industry: Key Aspects**
- 3. Foreign Tech Companies: How to Best Cope with the China Merger Review Process**

China Merger Control Enforcement - Overview

Year	Number of Cases		
	Unconditional Clearance	Conditional Clearance	Prohibited
2008	16	1	0
2009	72	4	1
2010	113	1	0
2011	164	4	0
2012	158	6	0
2013	211	4	0
2014	236	4	1
2015 (till September)	232	1	0

- From August 2008 to September 2015, MOFCOM received 1380 cases, accepted 1296 cases and concluded 1222 cases.
- From January to September 2015, MOFCOM received 244 cases and concluded 236 cases, representing a 43% increase compared to the same period in 2014.
- MOFCOM issued a total of 25 conditional clearance decisions (3 cases involving structural remedies (12%), 16 cases involving behavioral remedies (64%) and 6 involving hybrid remedies (24%))

China Merger Control Enforcement - Latest Developments

- New legislation
 - Revised remedy rules entered into effect in January 2015
 - Revising the merger rules

- Simplified review procedure
 - Less information required
 - Now “simple cases” account for 95%
 - Most of simple cases cleared within Phase I
 - Total review timeline 2-3 months

- Optimized review mechanism
 - Shorter pre-acceptance period
 - One case team throughout the pre- and post- acceptance period
 - Industry based case allocation

- Investigations against failure to fulfil filing obligation
 - Until September 2015, 52 cases were investigated, 35 cases were concluded, 15 cases were sanctioned, 5 sanction decisions were publically announced

China Merger Control Enforcement - Latest Developments(cont'd)

- Modified remedies in previous remedy decisions, among which three decisions are related to companies in the Hi-Tech industry:
 - Google/Motorola Mobility (2012), January 2015
 - InBev/AB (2008), August 2015
 - Western Digital (“WD”)/Hitachi (2012), October 2015
 - Seagate/Samsung (2012), October 2015

China Merger Control Enforcement in Hi-Tech Industry-- Key Aspects

- Market definition
 - Demand and supply side substitutability
 - Introduction of technology market
 - Innovation market was not separately defined but innovation has been considered when assessing the competition effects
 - SSNIP test is rarely used by MOFCOM
- Analysis of competition restraints
 - Theories of harm (foreclosure effect, leverage effect)
 - Quantitative analysis (Market share analysis, HHI)
 - Countervailing buying power
 - Market entry and innovation
- Remedies
 - Structural: business/assets divestiture
 - Behavioral: including hold-separate; FRAND commitments; fair treatment etc.
 - Hybrid remedies: a combination of structural and behavioral remedies

MOFCOM may take different approaches from those taken by the EU and US authorities

China Merger Control Enforcement in Hi-Tech Industry ***-- Conditional Clearance Decisions (as of October 2015)***

Case	Industry	Year	Nature of the case/main issues	Remedies
Seagate/Samsung	IT	2011	Horizontal overlap in the hard disk drive market	Behavioral: hold-separate (discharged in 2015)
WD/Hitachi	IT	2012	Horizontal overlap in the hard disk drive market	Hybrid: assets divestiture and hold-separate (partially discharged in 2015)
Google/Motorola Mobility	IT	2012	Android's dominance in the Chinese smart phone OS market; licensing of Motorola Mobility's patents; vertical integration	Behavioral: keep Android as a free and open source; non-discrimination (discharged in 2015); FRAND commitments
UTC/Goodrich	Aircraft power system	2012	Horizontal overlap in the electric power systems market	Structural: business divestiture
Wal-Mart/Yihaodian	Retail and TELCOM	2012	VIE issue; vertical integration	Behavioral: not to engage in the VATS business through the VIE arrangement
ARM/G&D/Gemalto (JV)	IT	2012	IP licensing; vertical integration	Behavioral: non-discrimination
MediaTek/MSTAR	IT	2013	Horizontal overlap in the LCD TV control chip market	Behavioral: hold-separate
Thermo Fisher / Life Tech	Bio-tech	2014	Horizontal overlap in 59 product markets	Hybrid: business divestiture; commitment to reduce price and continue to supply
Microsoft/Nokia	IT	2014	Strong market power in the SEPs licensing market; vertical integration	Behavioral: FRAND commitments
Nokia Oyj/Alcatel Lucent	IT	2015	Horizontal overlap in the SEPs licensing market	Behavioral: FRAND commitments

China Merger Control Enforcement in Hi-Tech Industry

-- Review Timeline

Case	Submission	Acceptance	Clearance	Days from submission to acceptance	Days from acceptance to clearance
Seagate/ Samsung	2011/05/19	2011/06/13	2011/12/12	25	182
WD/Hitachi	2011/04/02 2011/11/1 (withdraw)	2011/05/10 2011/11/07	2012/03/02	38	297*
Google/ Motorola Mobility	2011/09/30	2011/11/21	2012/05/19	52	180
UTC/ Goodrich	2011/12/12	2012/02/06	2012/06/15	56	130
Wal-Mart/ Yihaodian	2011/12/16	2012/02/16	2012/08/13	62	179
ARM/G&D/Gema Ito (JV)	2012/05/04	2012/06/28	2012/12/06	55	161
MediaTek/ MSTAR	2012/07/06 2013/02/22 (withdraw)	2012/09/04 2013/03/12	2013/08/26	60	356*
Thermo Fisher / Life Tech	2013/07/03	2013/08/27	2014/01/14	55	140
Microsoft/ Nokia	2013/09/13	2013/10/10	2014/04/08	27	180
Nokia Oyj/Alcatel Lucent	2015/04/21	2015/06/15	2015/10/19	55	126

* Number of days includes the period for withdrawal and refiling.

China Merger Control Enforcement in Hi-Tech Industry

-- China vs. EU/US

- Of the 10 published remedy cases in respect of the Hi-Tech industry, 8 cases were reviewed concurrently by the antitrust agencies in China, the US and the EU.
- In three MOFCOM remedy cases, remedies in China broadly coincided in scope with those imposed by the EU Commission and FTC, namely: *UTC/Goodrich*; *ARM/G&D/Gemalto (JV)* and *Thermo Fisher/Life Tech*.
- In the other five remedy cases, MOFCOM either imposed remedies while the same case was unconditionally cleared in EU and/or the US, or imposed additional conditions i.e. *Seagate/Samsung*; *WD/Hitachi*; *Google/Motorola*; *Microsoft/Nokia* and *Nokia Oyj/Alcatel Lucent*

MOFCOM's increased confidence in taking a divergent approach from other authorities

Competition Concerns and Remedies (1) : Microsoft/Nokia

- EU and the US: unconditional clearance
- China: cleared with remedies
 - **Concerns**
 - Microsoft's market control power in the upstream SEPs license market
 - The concentration may give rise to potential issue of patent abuse by Nokia
 - Lack of countervailing buying power
 - Patent licensing being a key barrier to entry for smartphone manufacturers
 - **Remedies**
 - Microsoft to honor its FRAND commitments for SEPs and not to require reciprocal licensing from licensees unless the licensee holds SEPs for the same industry
 - Nokia to honor its FRAND commitments for its retained SEPs

Competition Concerns and Remedies (1) : Microsoft/Nokia (cont'd)

- Comments
 - The first time (also an unusual step of) implementing restrictions on the post-closing conduct of the seller, Nokia.
- Similar Cases on SEP issues:
 - Google / Motorola Mobility
 - Nokia Oyj/Alcatel-Lucent

Competition Concerns and Remedies (2) :

Seagate / Samsung and WD / Hitachi

- EU and the US: unconditionally cleared the Seagate/Samsung case and cleared WD/Hitachi case with remedy to divest the essential production assets for 3.5-inch HDD
- China: cleared with hybrid remedies:
 - **Concerns**
 - Highly concentrated global hard disk drive market
 - Innovation is vital for staying competitive in the market; restricting or eliminating competition may reduce competitors' willingness of innovation
 - Lack of countervailing buying power
 - Entry barriers exist
 - **Remedies**
 - Seagate/Samsung: one-year hold-separate arrangement
 - WD/Hitachi: divestiture of Hitachi's assets for 3.5-inch HDD and a 2-year hold-separate arrangement

Competition Concerns and Remedies (2) :

Seagate / Samsung and WD / Hitachi (cont'd)

- **Comments:**
 - This unique behavioral remedy indicates MOFCOM's greater willingness to intervene in markets through ongoing monitoring, as opposed to antitrust enforcement authorities in more mature markets

- **Revisions to the Remedies (October 2015):**
 - Seagate: discharge of the hold-separate obligation
 - WD: partially discharge of the hold-separate obligation in respect of R&D and production, whilst the brands of WD and HGST and the sales of their respective hard drive products shall remain independent

Competition Concerns and Remedies (3) :

Wal-Mart / Yihaodian

- EU and the US: filing is not required
- China: cleared with structural remedies:
 - **Concerns**
 - Wal-Mart “leading player” in brick and mortar retail market—may be able to leverage strengths into online direct retail and value added telecoms services (“VATS”).
 - **Remedies**
 - Wal-Mart is not allowed to control the VATS business operated by Yihaodian through a variable interest entity (“VIE”) structure

Competition Concerns and Remedies (3) :

Wal-Mart / Yihaodian (cont'd)

- Comments:
 - Insufficient competition analysis and market share data to support the decision from the competition perspective
 - Regulatory issues, however were addressed in the MOFCOM decision i.e. foreign companies is subject to foreign ownership restrictions in conducting VATS business in China
 - The first time that MOFCOM has specifically addressed the VIE issue in a formal ruling and its explicit disapproval for a foreign company to control the VATS business through a VIE structure.

China Merger Control Enforcement in Hi-Tech Industry – Status Quo

- Few MOFCOM officials have technical background
- More explanations and clarifications on the relevant product and technology markets may be requested for high-profile and challenging cases
- Technical experts and economists may need to be engaged to assist with MOFCOM's review
- Decisions can be affected by various non-competition considerations e.g. industrial concerns
- Lack of thorough assessment from competition perspective and supporting data in MOFCOM's published decisions

China Merger Control Enforcement in Hi-Tech Industry –Future Prospects

- The need to have more thorough analysis
- The need to analyze emerging industries (TMT/Internet)
 - More filings in these industries after the VIE issue is resolved
 - Relatively concentrated market
 - Difficulties in defining relevant market
 - Lack of market data
- Industrial policies may still have a significant influence on MOFCOM decisions.

Foreign Tech Companies: How to Best Cope with China Merger Review Process

- Budget sufficient time for Chinese merger review
- Reader-friendly descriptions of the parties' business and relevant products, technologies etc.
- Third party research reports to support the market definition and analysis (e.g. market share data)
- Anticipate the “unexpected”
 - SEP issues
 - Complaints by Chinese competitors/customers/ potential licensee
 - Additional/different remedies
- Manage relevant stakeholders throughout the review process
 - MIIT
 - Relevant industry associations
 - Press

Thanks for your time!



Q & A

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Where Are We Going and Are We There Yet?

Merger Enforcement under Obama and
Implications for the Tech Sector

Beau Buffier
Global Antitrust Group Co-Head

Silicon Valley Antitrust Seminar
November 13, 2015



Outline

- Bush v. Obama: Impressions and Statistics
- Tech Mergers: Future competition, Innovation, Disruption
- Where Do We Go From Here?

Some Perceptions of the Bush (II) Years

- Antitrust not a priority
- Tech industry appeared to get a “free pass”



U.S. Department of Justice Antitrust Division

- Appeared unwilling to litigate after *Oracle/Peoplesoft* defeat
- Perceived to have lost its nerve in *Maytag/Whirlpool* and *XM/Sirius*



U.S. Federal Trade Commission

- Unsuccessful in multiple hospital merger challenges
- “Cookie cutter” approach in many industries (e.g., pharma, chemicals)
- *Whole Foods/Wild Oats* debacle

Candidate Barack Obama - 2007



“Regrettably, the current administration has what may be the weakest record of antitrust enforcement of any administration in the last half century.

- Between 1996 and 2000, the FTC and DOJ together challenged on average more than 70 mergers per year on the grounds that they would harm consumer welfare.
- In contrast, between 2001 and 2006, the FTC and DOJ on average only challenged 33.

As president, I will direct my administration to reinvigorate antitrust enforcement.”

*Statement of Senator Barack Obama for the AAI, Sept. 27,
2007*

Institutional and Policy Changes at the FTC and DOJ (2009-2015)

- More enforcement-oriented officials installed, but constrained by
 - The Courts
 - Bureaucratic inertia
 - Lack of suitable merger cases after the financial crisis
- 2010 Horizontal Merger Guidelines
 - Former Guidelines restricted the Agencies in court
 - New, more flexible guidelines introduced
- Both agencies retooled their litigation capabilities
 - Hired experienced litigators from private practice
 - Emphasis on trial-readiness
 - FTC and DOJ have each won significant litigation victories

Recent Prominent Cases Challenged, Abandoned or Restructured

- | | |
|------------------------------------|---|
| ▪ Applied Materials/Tokyo Electron | <input type="checkbox"/> Abandoned |
| ▪ ATT/T-Mobile | <input type="checkbox"/> Challenged and abandoned |
| ▪ TWC/Comcast | <input type="checkbox"/> Abandoned |
| ▪ National Cinemedia/Screenvision | <input type="checkbox"/> Challenged and abandoned |
| ▪ US Airways/American | <input type="checkbox"/> Challenged and settled |
| ▪ FTC Hospital Cases | <input type="checkbox"/> Challenged and won |
| ▪ Sysco/US Foods | <input type="checkbox"/> Challenged and won |
| ▪ Electrolux/GE Appliances | <input type="checkbox"/> Challenge pending |
| ▪ Integrated Device Technology/PLX | <input type="checkbox"/> Challenged and abandoned |
| ▪ H&R Block/TaxACT | <input type="checkbox"/> Challenged and won |
| ▪ Nasdaq/NYSE | <input type="checkbox"/> Abandoned |
| ▪ AB Inbev/Modelo | <input type="checkbox"/> Challenged and settled |

Headlines

DOJ Suit to Block
AT&T/T-Mobile Merger
Signals Tougher
Antitrust Stance
by Obama

Bloomberg

Bloomberg, Sep. 7, 2011

As Mergers Multiply,
U.S. Antitrust Cops
Raise Their Game

THE WALL STREET JOURNAL.

Wall Street Journal, Jul. 2, 2015

Sysco Case Shows
Antitrust Enforcement
Remains Strong For
M&A, Not So Much
Elsewhere

Forbes

Forbes, Jun. 24, 2015

DOJ Girds for Strict
Review of Any Health-
Insurer Mergers

THE WALL STREET JOURNAL.

Wall Street Journal, Jun. 28, 2015

Electrolux Path to GE
Appliance Deal Runs
Into U.S. Lawsuit

Bloomberg

Bloomberg, Jul. 1, 2015

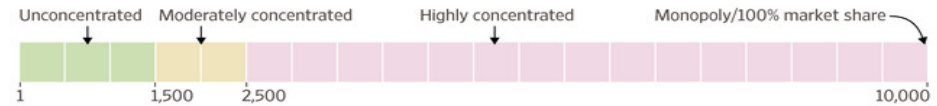
WSJ – Wave of Megadeals Tests Antitrust Limits in U.S. (Oct. 18, 2015)

Measuring Concentration

The **Herfindahl-Hirschman Index (HHI)** is a widely accepted measure of market concentration.

The Department of Justice and the Federal Trade Commission use it to determine the effects of a merger on an industry.

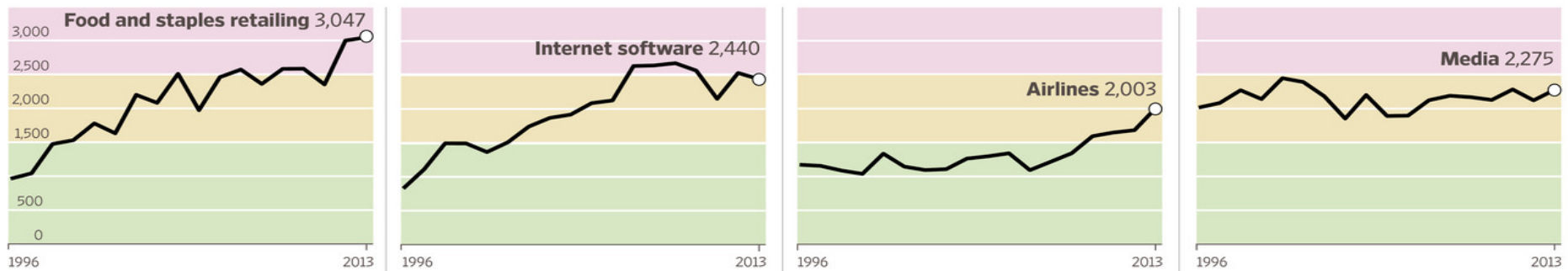
Theoretical range: 1 to 10,000
The DOJ and FTC have the following general guidelines for measuring market concentration.



A Company-Specific Approach

Researchers at USC developed an HHI score that is based on the combined mix of products and services a company sells. Gerard Hoberg and Gordon Phillips used securities filings to determine the specific markets in which each U.S.-based public company competes and calculated an HHI score. That differs from regulators, who typically measure concentration by studying a single market's participants.

Median custom HHI for companies primarily operating in each industry over time



2013 HHI's for select companies

Safeway	4,114
Rite Aid	2,759
Wal-mart Stores	2,391

Facebook	3,106
Twitter	2,895
Google	1,940

Southwest Airlines	2,081
United Continental	1,717
American Airlines	1,707

Live Nation Entertainment	4,534
Clear Channel Outdoor	2,894
DreamWorks Animation	2,461

Safeway, which was recently acquired by Albertsons, is one of a handful of large grocery chains that lead many markets, while Wal-Mart Stores—though huge—competes across many more lines of products, in some cases against significant competition. Rite Aid, like other large drug-store chains, has grown in part through mergers and acquisitions.

Even as the number of Internet companies has soared, many have stayed focused on specific markets, which they have come to lead, as with Twitter and Facebook. Even though Google dominates the search business, it competes in multiple industries, reflecting a lower overall HHI.

Although major U.S. airlines have consolidated significantly in recent years, they often compete head-to-head, keeping their individual HHIs lower. Airlines argue that competition remains strong, but the U.S. Justice Department is investigating pricing practices and allegations of anticompetitive behavior.

Within the media industry, several large companies have carved out leading market positions, including in advertising and live events.

Source: Department of Justice; Gerard Hoberg and Gordon Phillips, University of Southern California; S&P Capital IQ

NY Times Editorial – Oct. 31, 2015

The New York Times | <http://nyti.ms/1kiH2ml>

SundayReview | EDITORIAL

How Mergers Damage the Economy

By **THE EDITORIAL BOARD** OCT. 31, 2015

In many industries, like airlines, telecommunications, health care and beer, mergers and acquisitions have increased the market power of big corporations in the last several decades. That has hurt consumers and is probably exacerbating income inequality, new research shows.

A recent paper by two economists, Jason Furman and Peter Orszag, says that consolidation might have contributed to the trend of some businesses earning “super-normal returns” that are about 10 times as large as the median returns, up from three times in the early 1990s. This trend may have driven the rise in income inequality by increasing the income of executives and shareholders of those businesses relative to everybody else.

Washington Post Editorial – Nov. 11, 2015

The Washington Post

Opinions

We need a new trust-busting movement in America

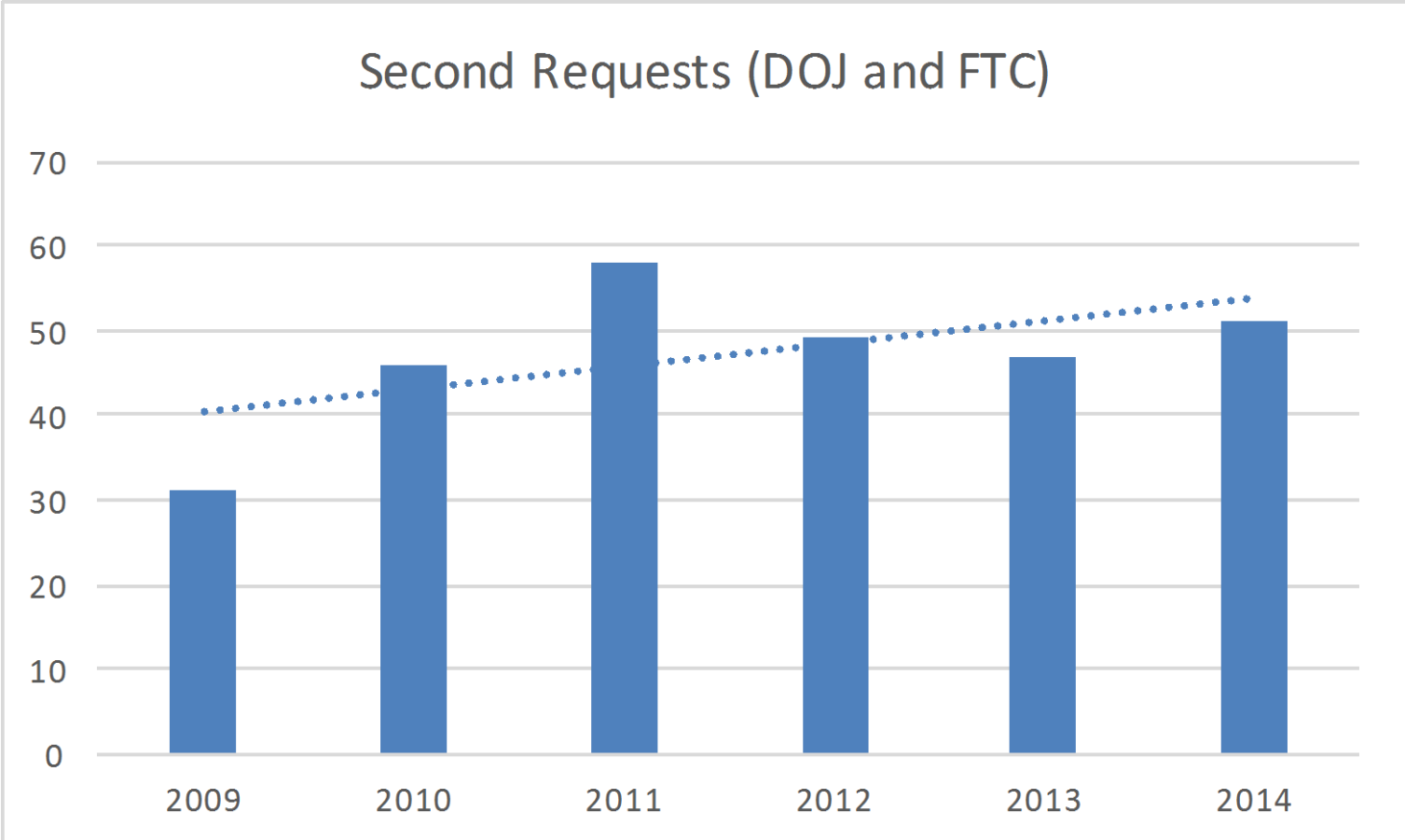


By [Harold Meyerson](#) Opinion writer November 11 at 8:35 PM

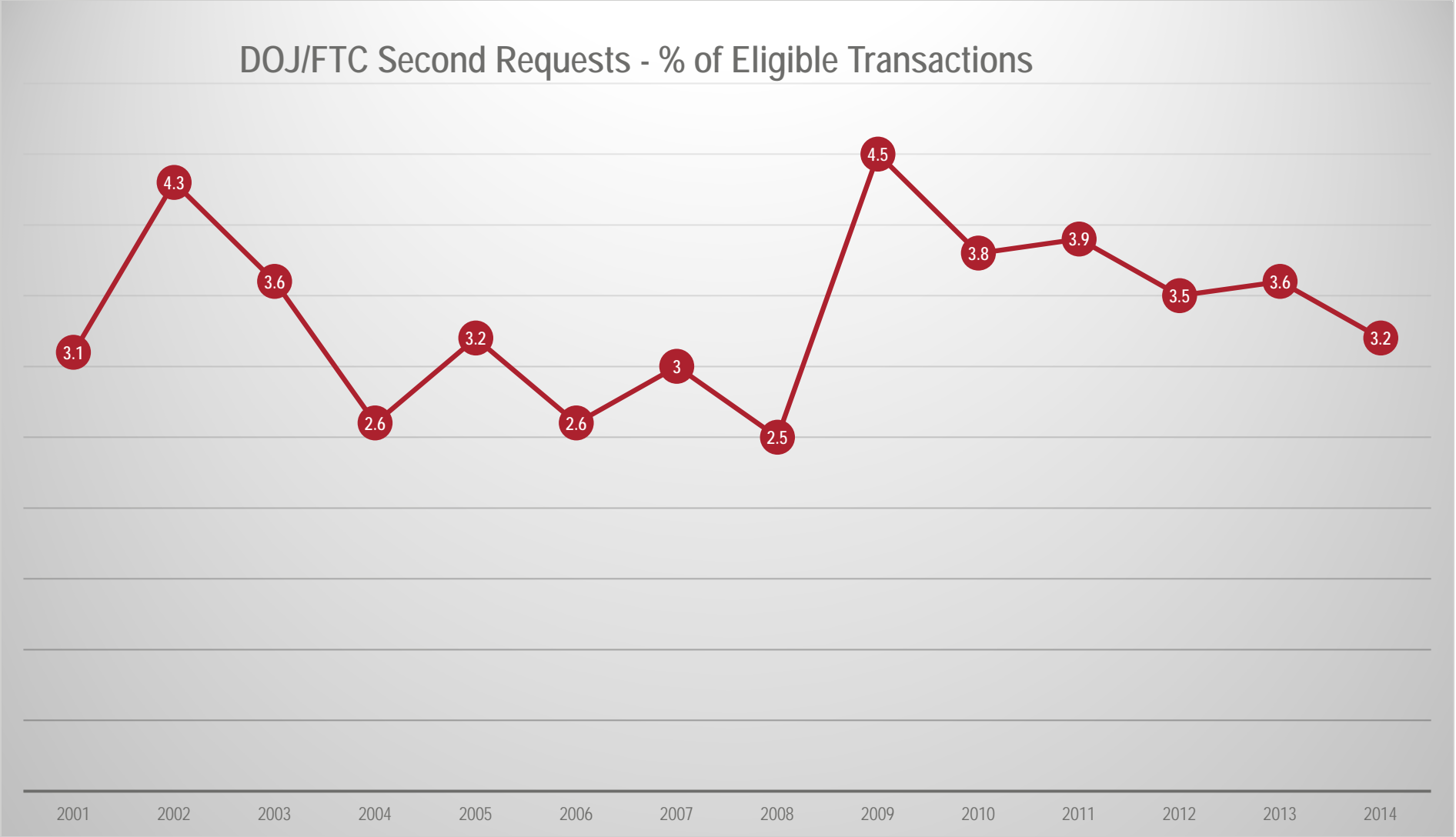
Like immense amoebas on the prowl, America's already huge corporations are combining like nobody's business. In recent months, [Walgreens bought Rite Aid](#), uniting two of the nation's three largest drugstore chains; in beerland, [Molson Coors is buying Miller](#); mega-health insurers Aetna and Anthem, respectively, [bought mega-health insurers Humana and Cigna](#); [Heinz bought Kraft](#), good news for those who take ketchup with their cheese; and [American Airlines](#) completed its absorption of US Airways, reducing the number of major U.S. airlines to four, which now [control 70 percent](#) of the air travel market. On

A Closer Look at the Numbers

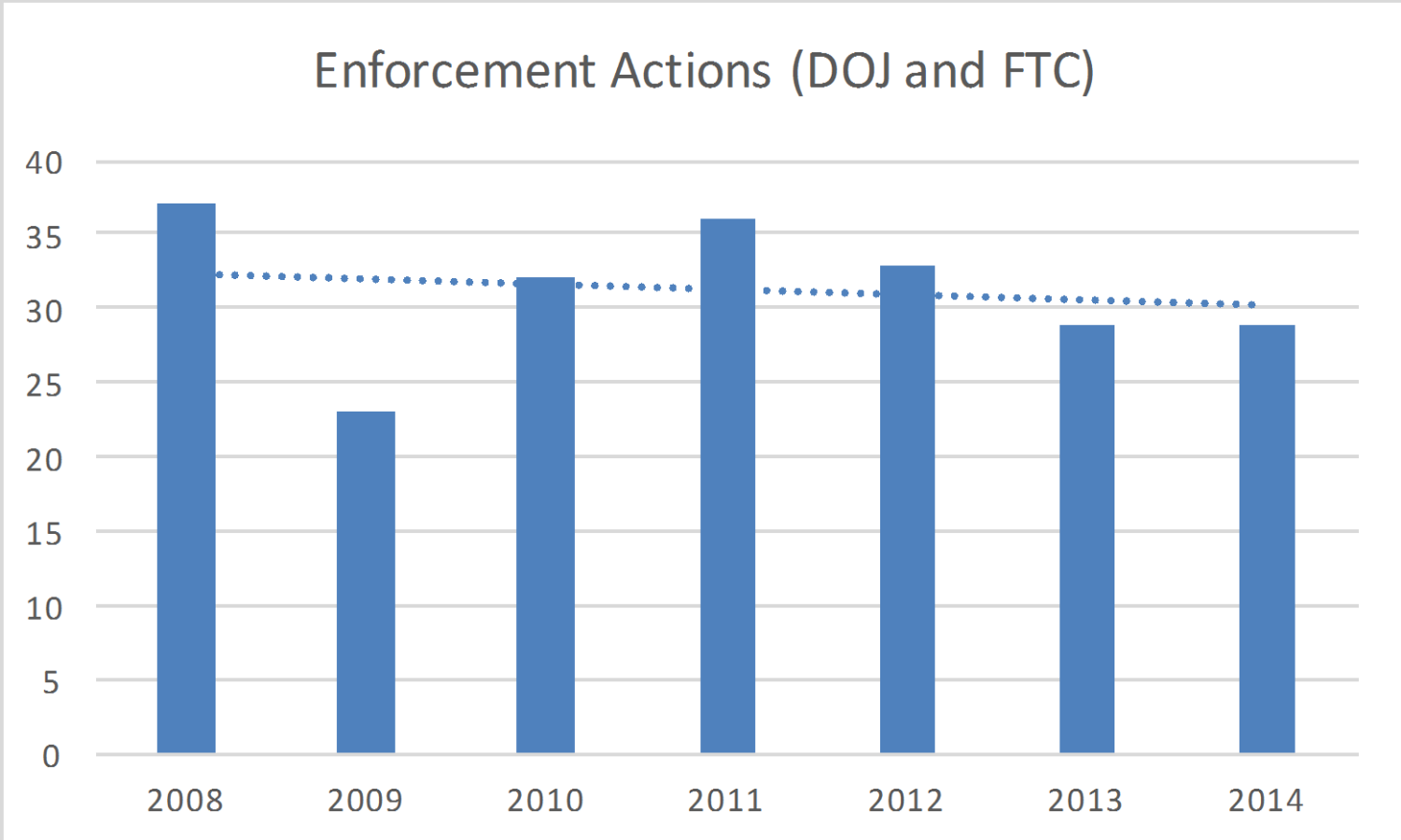
(Slightly) More Second Requests Being Issued



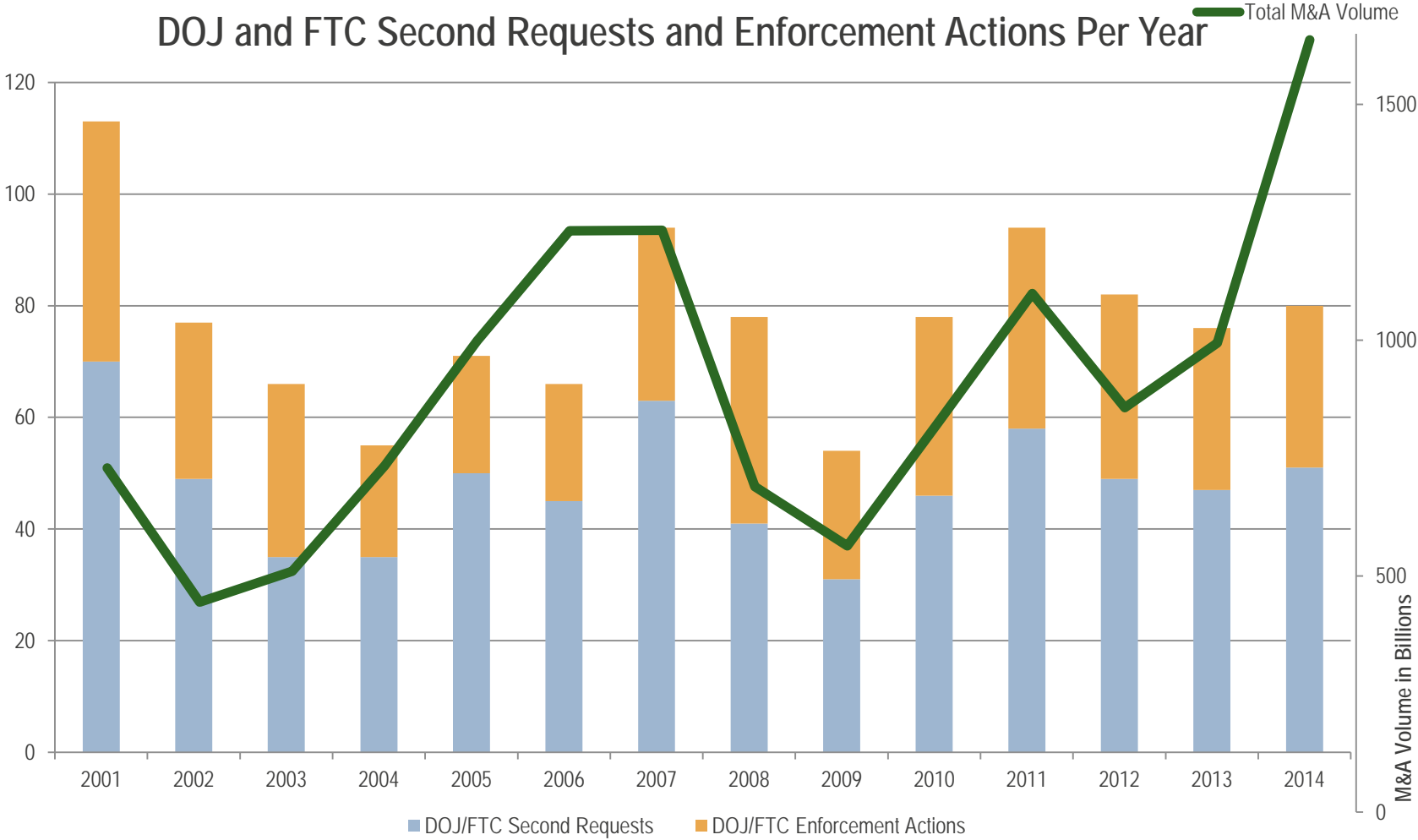
Second Requests – Modest Change in % Terms



Total Enforcement Actions are Flat

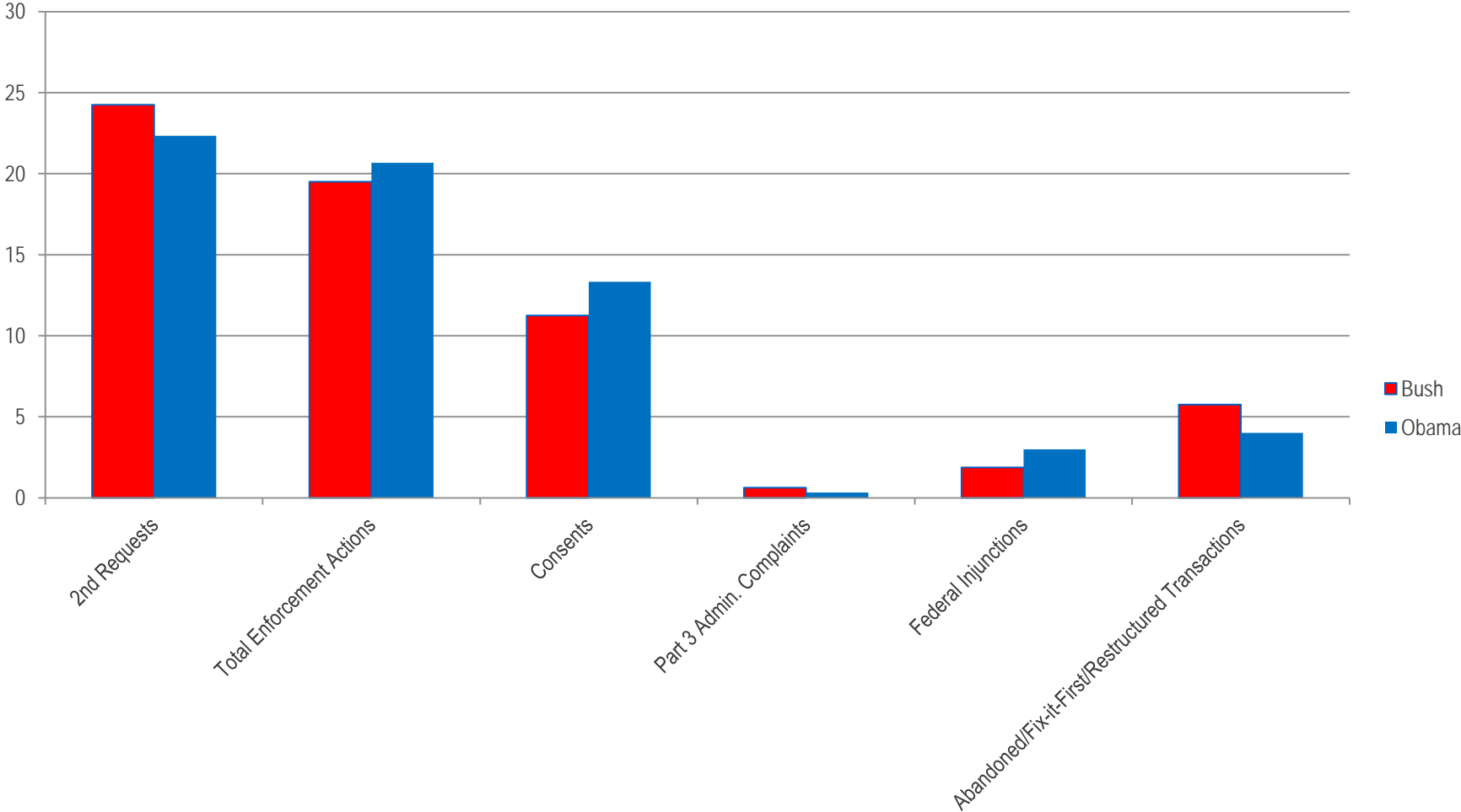


So What Determines Enforcement Activity?



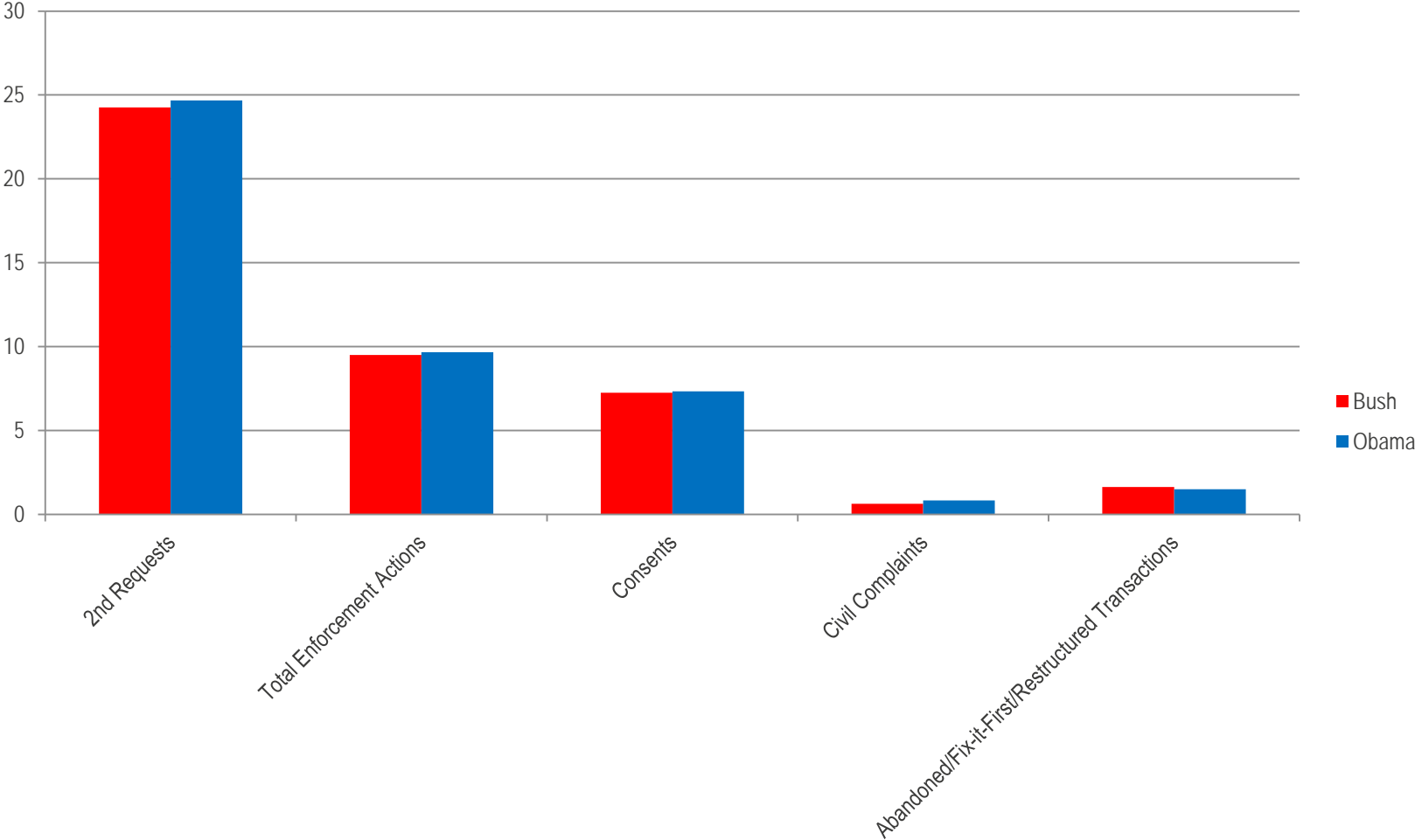
FTC Enforcement Actions: Obama v. Bush

FTC Enforcement Actions By Presidential Term (Yearly Average)



DOJ Enforcement Actions: Obama v. Bush

DOJ Enforcement Actions By Presidential Term (Yearly Average)

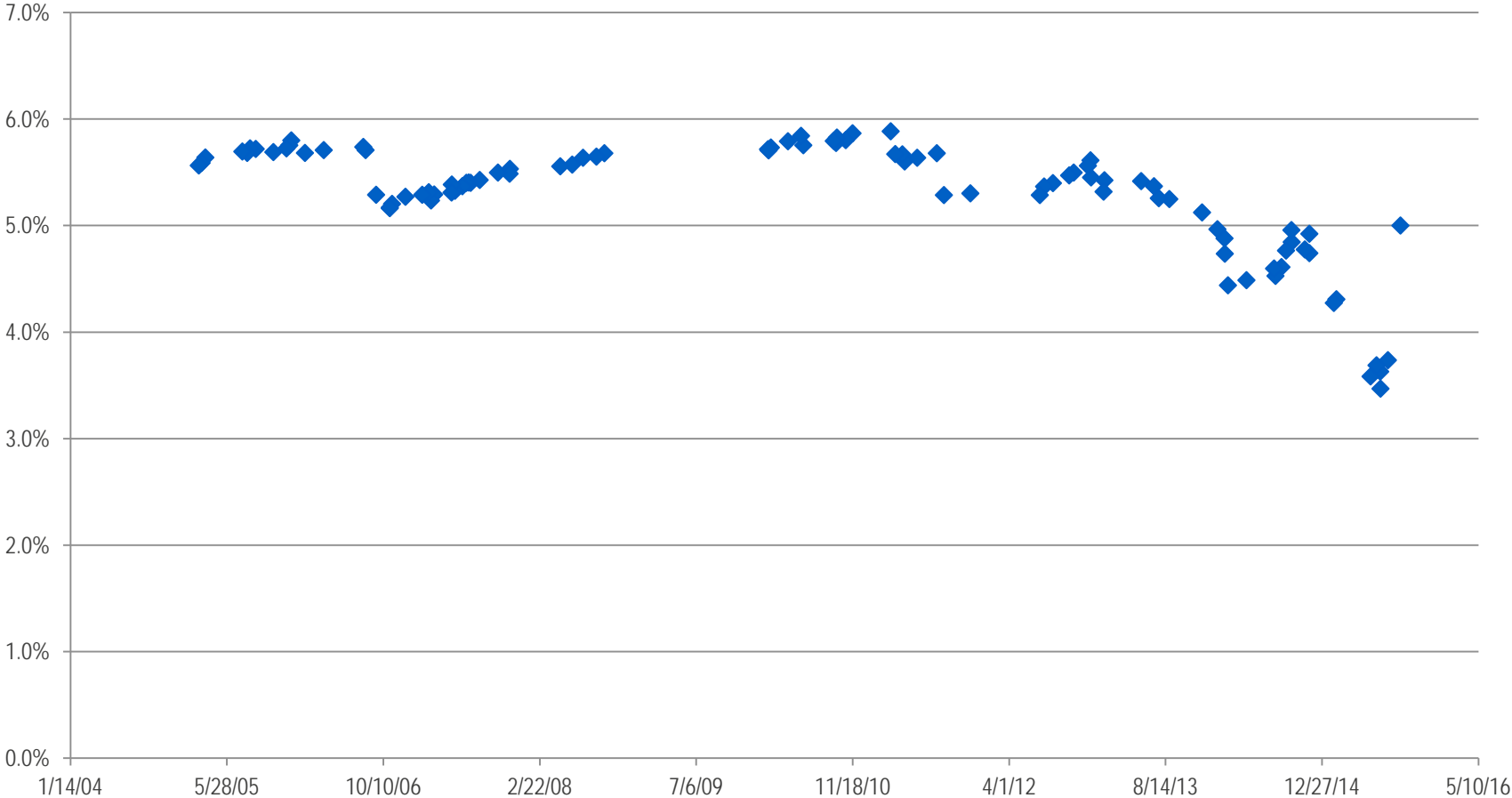


Comcast/TimeWarner – Caught in the Shifting Winds?



Do Deal Terms Reflect Increased Antitrust Risk?

Weighted Average Antitrust Reverse Breakup Fee As Percentage of Transaction Value over Time



Observations

- Merger enforcement is relatively bipartisan
 - Decisions must be based on sound economics and strong evidence
 - Unilateral effects cases continue to dominate enforcement
- Emergence of “broader” theories of harm not susceptible to traditional fixes
 - AT&T/T-Mobile
 - Comcast/TimeWarner
 - USAir/American
 - Applied Materials/Tokyo Electron
 - Electrolux/GE Appliances
- Agencies now more prepared to litigate with a track-record of victories
 - Appear more prepared to challenge “big-ticket” transactions
 - But changes are still mostly at the margins
- Is there a last-mover disadvantage in some consolidated industries?

Merger Enforcement in Dynamic Industries

Features of High-Tech Industries

- Price often not the primary form of rivalry
 - Firms compete on features, functionality, service, variety, quality
 - Innovation produces more consumer welfare than static competition
- Dynamic markets
 - Historical market shares may not be indicative of future competition
 - Business model hybridization and experimentation
 - Unpredictable technological inflection points
 - Innovation from unexpected sources
 - May observe large first-mover advantages
- Classical models of competition do not (easily) account for
 - Platforms and “stacks” of complementary technologies
 - Two-sided markets
 - Positive network externalities

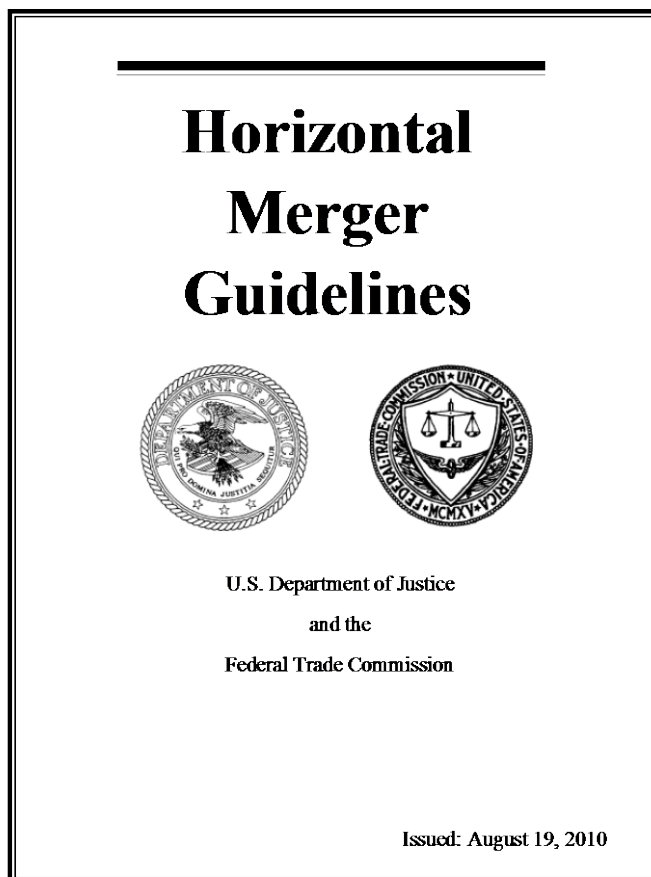
Implications for Merger Review in the Tech Sector

- Focus on price effects and static models of competition will often be insufficient
 - Market dynamics require more complex explanatory models
 - Robust data series frequently unavailable
 - Agency decision-making driven more by secondary evidence
- Should this prompt a light-touch to merger regulation in the high-tech sector?
 - Type I error (over-enforcement) costs may be higher if innovation is curtailed
 - Type II error (under-enforcement) costs may be lower
- Current attitude of U.S. agencies
 - More innovative activity is better than less
 - Innovation leads to more competition and more competition leads to innovation
 - Merger review is forward-looking and predictive

The agencies are not taking a hands-off approach!!

Unilateral Effects on Incentives to Innovate

- Unilateral effects asks whether a merger between Firm A and Firm B will
 - Result in incentives to reduce innovative activity
 - Result in product delay or suppression of new products



2010 Guidelines § 6.4

The Agencies may consider whether a merger is likely to diminish innovation competition by encouraging the merged firm to curtail its innovative efforts below the level that would prevail in the absence of the merger

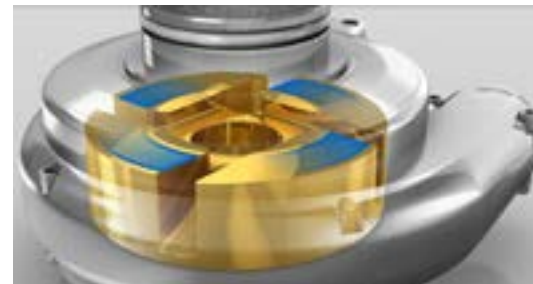
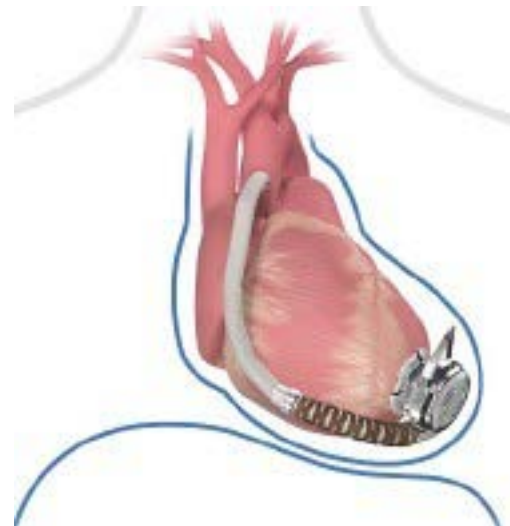
That curtailment of innovation could take the form of reduced incentive to continue with an existing product development effort or reduced incentive to initiate development of new products

Unilateral Effects – Elimination of Actual Potential Competition

- 2010 Horizontal Merger Guidelines
 - Defined potential competition as a type of horizontal merger concern
 - Little guidance on how to assess potential competition cases
- This has been a fertile area for the agencies in healthcare and technology transactions
 - *Thoratec/Heartware* (FTC, 2009)
 - *Steris/Synergy* (FTC, 2015)
 - *Applied Materials/Tokyo Electron* (DOJ, 2015)

Thoratec/Heartware (FTC): Textbook Potential Competition?

- Treatments for advanced heart failure:
99% pharmaceutical, 1% mechanical
 - Thoratec: pioneer with the only approved LVADs (Heartmate II)
 - Heartware: In early clinical trials with its HVAD
 - Other companies were earlier in the FDA process
- Transaction Rationale
 - De-risk development, accelerate FDA approval and increase output of HVAD
 - Increase acceptance of disruptive technology against drug therapy standard of care



Thoratec/Heartware – FTC Complaint

0910064		
UNITED STATES OF AMERICA BEFORE THE FEDERAL TRADE COMMISSION		
COMMISSIONERS:	Jon Leibowitz, Chairman Pamela Jones Harbour William E. Kovacic J. Thomas Rosch	
<hr/>		
In the Matter of)	
Thoratec Corporation,)	
a corporation,)	
and)	Docket No. 9339
HeartWare International, Inc.,)	
a corporation.)	
<u>COMPLAINT</u>		
<p>Pursuant to the provisions of the Federal Trade Commission Act and the Clayton Act, and by virtue of the authority vested in it by said Acts, the Federal Trade Commission, having reason to believe that Respondents Thoratec Corporation (“Thoratec”) and HeartWare International, Inc. (“HeartWare”) have entered into an agreement, in violation of Section 5 of the Federal Trade Commission Act, as amended, 15 U.S.C. § 45, for the acquisition of HeartWare by Thoratec, which acquisition, if consummated, would violate Section 7 of the Clayton Act, as amended, 15 U.S.C. § 18, and Section 5 of the FTC Act, and it appearing to the Commission that a proceeding by it in respect thereof would be in the public interest, hereby issues its complaint, stating its charges as follows:</p>		
SUMMARY		
<p>1. Thoratec’s proposed \$282 million acquisition of HeartWare threatens to eliminate the one company poised to seriously challenge Thoratec’s monopoly of the U.S. left ventricular assist device (“LVAD”) market. LVADs are a life-sustaining technology for treating end-stage heart failure patients who have failed other courses of treatment and are likely to die while waiting for a donor heart or are ineligible for a heart transplant.</p>		

Thoratec had a monopoly in the LVAD market – drug therapy not a constraint

Without the transaction, the HVAD would launch and compete closely with Thoratec

No others were likely to enter the market for LVADs in a reasonable time

Heartware’s impending entry had already forced Thoratec to innovate

Competition would produce lower prices and enhanced features for consumers

Thoratec/Heartware (2)

- Criticisms of the FTC Challenge
 - FTC discounted the uncertainties of a high-risk development program
 - Assumed – without any support – that new entry would lower prices
 - Applied a different standard of proof to the efficiencies from the merger
- Enforcers' Response
 - Not a block to enforcement if the precise competitive impacts will be difficult or impossible to model
 - The agencies are not required to calculate an expected price increase in order to challenge a transaction
 - The agencies can consider the totality of the evidence and infer competitive effects

Steris/Synergy (FTC): Nothing wrong with the theory ...

- October 2014: proposed merger of 2nd and 3rd largest sterilization companies in the world
 - Steris was the largest of 2 providers of gamma sterilization in the US
 - Synergy had gamma sterilization outside the US, but no offering in the US
- FTC's investigation focused on Synergy's plans to enter the US with x-ray sterilization
 - Complaint alleges X-ray would have been highly disruptive to incumbent technology
 - Synergy internal documents said it expected to win incumbents' highest value customers
 - FTC concern: the merger would eliminate disruptive new technology

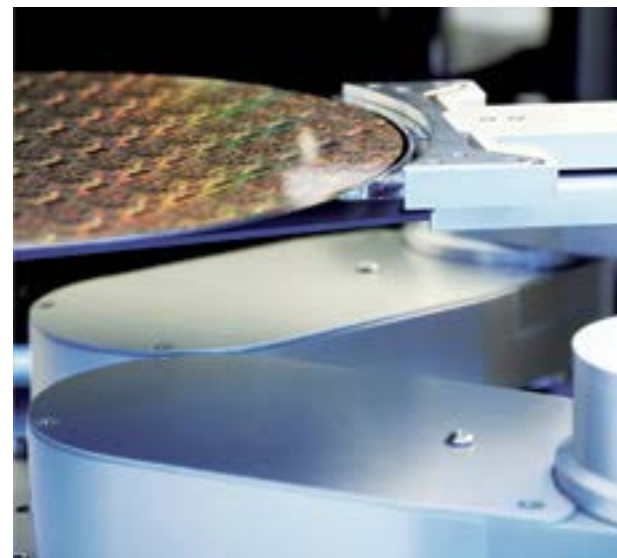


Steris/Synergy (2)

- District Court Decision
 - Accepted potential competition theory for the purposes of the hearing
 - Key factual issue was whether Synergy would have entered without the merger
 - Evidence showed that financial, technical and customer acceptance hurdles would likely not be overcome
- Litigation defeat is unlikely to significantly alter FTC approach to potential competition cases
 - FTC theory was viable
 - Outcome illustrates the evidential challenges in predicting future “effects”
 - Missed opportunity for courts to clarify the scope of the potential competition doctrine

Applied Materials/Tokyo Electron (DOJ): A Cautionary Tale

- Announced September 2013
 - Proposed merger of the number 1 and 3 semiconductor equipment manufacturers
 - Positioned as a response to shift to mobile, display as well as new semiconductor materials
 - Parties claimed transaction would increase innovation
- Largely complementary equipment
 - Present in many of the same semiconductor processes (*e.g.*, etching)
 - But each company tended to specialize in tools designed for a different stage of each process
- Required competition approvals in U.S., China, Japan and other jurisdictions



Applied Materials/Tokyo Electron (2)

- Parties quickly offered a divestiture to remedy limited horizontal overlaps
- But investigation shifted to broader concerns
 - Overlaps on pipeline products and technological convergence made it more likely the companies would compete in the future; and
 - There was significant R&D competition for equipment for next-generation semiconductors which was not matched by other suppliers
- These problems could not be solved through divestiture
 - DOJ believed that a limited product line divestiture could not deliver the “cross-unit fertilization” that was central to innovation in the industry
 - Complexity of divestiture and lack of track-record from ICNJ troubled customers
- In April 2015, having failed to comply with the Second Requests, the parties abandoned the deal

Zillow/Trulia (FTC)

- Merger of #1 and #2 home-related information sites
- Disruptive challenge to traditional media and brokerage model



77%

share of comScore
online real estate
unique users*

9%

share of NAR agents

4%

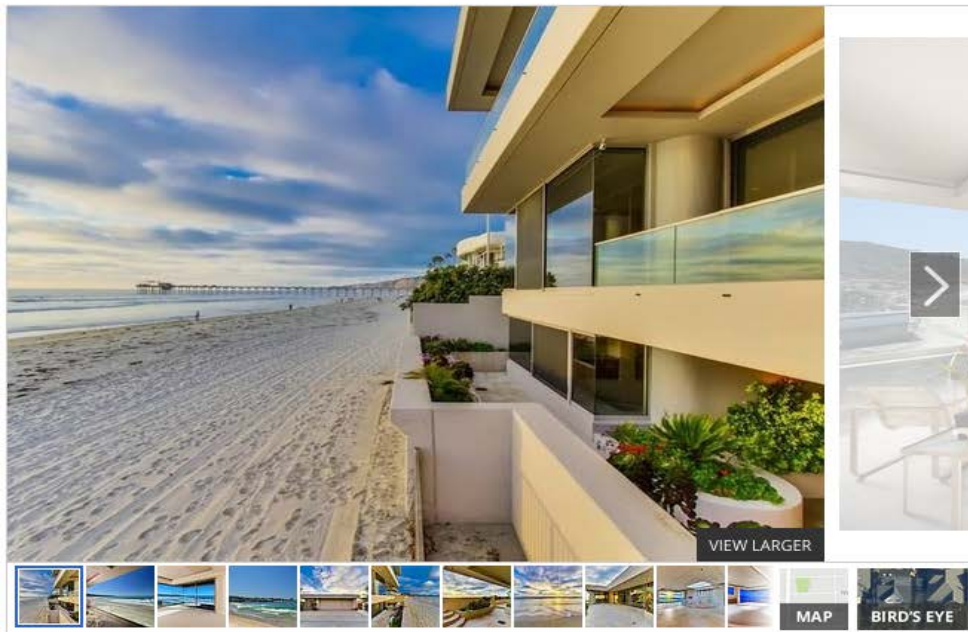
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advertising spend

Zillow Premier Agent

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8542 El Paseo Grande,
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Zestimate®: \$11,703,814

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-  **Heather Kafele** PREMIER AGENT
★★★★★ (62)
37 Recent sales
(619) 272-6434
-  **Graeme Hunter** PREMIER AGENT
★★★★★ (42)
30 Recent sales
(858) 888-9143
-  **Lawrence Wu** PREMIER AGENT
★★★★★ (28)
25 Recent sales
(858) 869-0221

I am interested in information on financing

Listing agent
(seller's agent)

Panel of agents that
have paid to appear
next to listings

Pricing algorithmically
determined per
zip code

Advertising is sold by
number of views
"impressions"

Listing information is owned
and provided by the
Broker—not Zillow

Listing provided by

Heidi Hurst, [RE/MAX Professionals](#) (253) 232-5100, source: RE/MAX Pacific Northwest

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Trulia

Trulia Buy Sell Rent Mortgage Find an Agent More Saved Homes Saved Searches bbuffer

La Jolla, CA 0 SAVED Q Get Prequalified Save Share

Previous | Next | For Sale > CA > La Jolla > 92037 > Hidden Valley > 7455 Hillside Dr

\$17,900,000
Est. Mortgage: \$86,525 / mo (Mortgage)
Get Equifax® Credit Score

- Lawrence Wu** (858) 551-6630 ★★★★★ (0) PRO LISTING AGENT
- Graeme Hunter** (619) 870-1978 ★★★★★ (43) PRO
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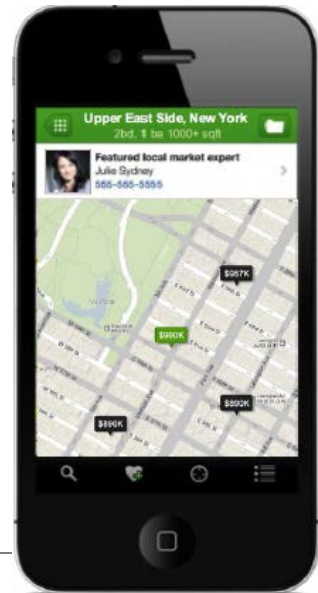
bbuffer
bbuffer@mac.com
Phone
Hi, I found your listing on Trulia. Please send me more information about 7455 Hillside Dr, La Jolla, CA 92037. Thank you.
 Get Pre-Approved
Request Info
By sending, you agree to Trulia's [Terms of Use](#) & [Privacy Policy](#).

FOR SALE
7455 Hillside Dr
La Jolla, CA 92037 (Hidden Valley) See your commute times

- Single-Family Home
- 6 Bedrooms
- 6 full, 1 partial Bathrooms
- 9,200 sqft
- \$1,946/sqft
- Lot size: 0.43 acres
- Built in 2006
- 21 Days on Trulia

Photos (25) View Map
Broker: Berkshire Hathaway HomeService

Trulia features agents who have purchased a “share of voice” in the zip code, in addition to the listing broker



Similar functionality through mobile app

Initial “Beliefs” of FTC

- The market is online real estate portals
 - Digital Property Group/Zoopla (UK OFT, 2011)
- This is a simple unilateral effects case
 - Zillow and Trulia look identical, have high traffic shares and compete closely
 - Everyone else looks different
 - High margins in online businesses mean that only small diversion is needed for upward pricing pressure
- Two-sided markets
 - Scale effects
 - Market tipping/winner takes all
- FTC investigation
 - Effects of merger on pricing to agents; targeted price increases
 - Innovation incentives: FTC concerned that “the parties closely tracked one another in terms of site features”

Would the merged firm reduce impressions or innovation?

- Strong incentives to innovate (and provide quality content) post-merger
 - Imperative to grow consumer traffic against many other sites and apps
 - Internalization of spillover effects from innovation
 - Threat of disruption from Redfin, Movoto, Facebook, Linked-In
 - Need to innovate to attract listings from brokers
- No incentive to reduce impressions post-merger
 - Impressions growth was not a zero-sum game
 - Generating more impressions did not lower prices
 - Cost for the merged firm to create impressions was lower than the price
- Merged firm could not cost-cut its way to profitability by reducing innovation

So Where do We Go From Here?

Questions?



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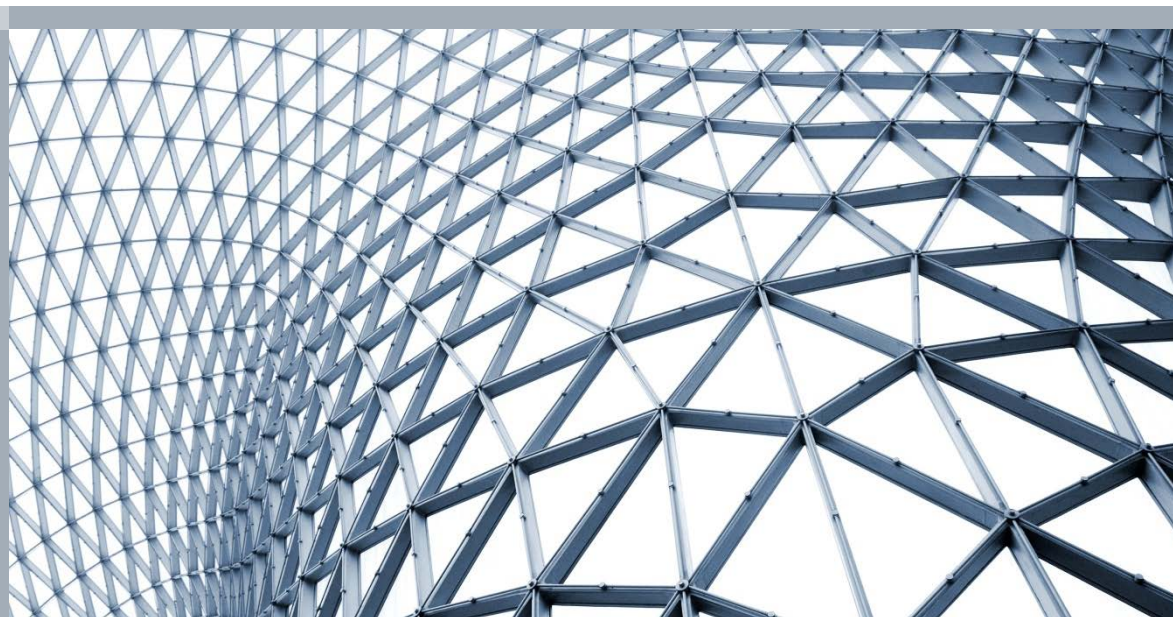
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Directors' Roundtable Menlo Park

Two antitrust issues affecting tech company operations in the
European Union

James R Webber

Partner



Two European antitrust developments affecting operations

1. **Use of the State aid rules to attack corporate tax arrangements.**
 - Many tech firms in the crosshairs: Apple, Amazon, Google, Uber;
 - Tech firms expanded into EU using (relatively) low tax jurisdictions – especially Ireland, Netherlands, UK and Luxembourg
2. **Distribution practices for content, goods online and online services.**
 - How are platforms treated in Europe?
 - Can I use MFN or price parity provisions in Europe?
 - Can I license content in the EU on an exclusive territorial basis?
 - What might the “Digital Single Market” initiative mean? Should I do anything?

Tax Investigations – Why?

- Overt political motivation:
 - The previous European Commission responding to popular pressure – *do something constructive* - other than imposing massive austerity on southern Europe!
 - Commission staff have tried for decades to reduce tax competition in the EU.
 - Harmonisation of tax rates – to remove tax competition – is now effectively impossible.

- State aid gives the Commission extraordinary executive power
 - But it is poorly suited to the task
 - Cannot prevent tax competition or companies making rational decisions based on tax
 - Can only prevent the State offering subsidies to *specific* businesses
 - Never before used in normal operation of the a Member State's tax regime – only against special rates, reliefs etc.

Tax Investigations – What?

- Tax rulings
 - Focus now on tax rulings that “artificially reduce a company’s tax burden”
 - Other State aid investigations into patent box tax structures have been suspended pending outcome of OECD negotiations on common terms
- What amounts to “artificially reduce”
 - Commission focuses on transfer pricing arrangements. Two decided cases against Starbucks and Fiat/Chrysler:
 - Fiat: The Commission decided that the tax ruling in favour of Fiat Finance:
 - Used assumptions that were economically unjustifiable (seemingly measured against how a bank would be treated) to depress capital of Fiat Finance
 - Remuneration applied to depressed capital was far below market rates
 - Commission found Fiat’s taxable profits in Luxembourg were 20 times lower than they should have been
 - Ordered Luxembourg to collect the back tax owed

Tax Investigations – What?

- Starbucks, the Commission found:
 - Starbucks NL paid excessive royalties to a UK company holding coffee roasting IP/knowhow. This company was not vulnerable to UK corporation tax. 'Excessive' measured against the OECD transfer pricing arm's length rules
 - Starbucks NL paid excessive price for green beans to Starbucks Swiss trading co.
- Effect of both was to depress profit at the NL entity – which was authorised by a tax ruling from the Dutch tax authorities
- Next steps:
 - Apple, Amazon are the next cases up although large numbers of cases are in the wings
 - Consider:
 - Re-assessing existing tax rulings against OECD guidance, especially around transfer pricing;
 - Ensuring consistency in transfer pricing practice amongst group. A big factor in the Starbucks case was the license fees appeared anomalous compared to the rest of its business
 - New 'transparency' arrangement between EU Governments involve automatic reporting of tax rulings to other Member States. This is designed to increase 'peer pressure' on tax authorities when issuing tax rulings and increases likelihood of detection

Distribution in the EU

- **Background**

- Distribution law derives almost entirely from EU law but in practice has been delegated to the Member States since at least 2010 when the current rules were adopted.
- Commission now has little idea about what terms are being used in distribution agreements.
- Current rules are focussed on the distribution of branded goods and heavily shaped by European makers of branded goods.
- Distribution disrupters (e.g. eBay, Google, Amazon, Booking.com, Airbnb) were absent or much less effective opposite the Commission in 2010 when rules were established
- Distribution rules have mixed objectives – antitrust and non-antitrust policy goals particularly enhancement of the single market.
- Result is a patchwork of detailed, confusing rules, inconsistently applied which are poorly suited to challenges and opportunities of online distribution

Distribution in the EU

- **Some questions**
 - How do the distribution rules treat online platforms in Europe?
 - Can I use MFN or price parity provisions in Europe?
 - Can I still distribute content in the EU on an exclusive territorial basis?
 - What might the “Digital Single Market” initiative mean? Should I do anything?

Platforms: How are platforms categorized?

- Platforms selling own products
 - Outside antitrust rules on agreements since all decisions are either unilateral or B2C
 - Caught by unilateral conduct rules – but need to prove dominance and abuse
- Platforms selling products/services of others
 - EU antitrust law has long held a distinction between agents and distributors.
 - Terms of agreements between agents and principals outside reach of antitrust
 - Agents do not:
 - take contract or credit risk on sales.
 - undertake specific investment to support a principal's products
 - Many online platforms would seem to meet these criteria
 - No case or Guidance that directly addresses this question for online platforms
- 'Pure' Platforms
 - Offering venue services for buyers and sellers (Airbnb, Uber)– B2B but do the agreements with market participants contain any restrictions on competition?

Platforms: Can you restrict sales on or via platforms?

In the agreements that brand owners / suppliers have with their resellers – can they restrict sales via online platforms?

- EU distribution guidance confusing about what restrictions can be used about resale on online platforms
 - Brand owners allowed to restrict sales on online platforms where customers visit reseller through a third party platform (e.g. an eBay shop or Amazon Marketplace)
 - Brand owners can apply criteria restricting online sales (inc. via platforms) provided these are “overall equivalent” to those applying to bricks and mortar sales.
 - No cases at EU level (and very few at national level) define what these concepts mean.
 - In practice brand owners have taken the opportunity to define criteria that reduce sales via online platforms and direct towards retailers’ own websites or bricks and mortar shops.

Distribution in the EU: Can I use 'Most Favoured Nation' or Price Parity Clauses?

- MFNs stipulate that a seller will offer its goods/service to the counterparty on terms that are as good as the best terms offered to third parties. Price parity clauses prevent a seller from selling for a lower price.
- Antitrust tension between:
 - Benefits : reduced search time, increases consumer confidence in 'best deal', avoids free riding; vs.
 - Possible competitive harm: price rigidity due to increased costs of discounting, unmet marginal demand
- **Divergent approaches**
 - Demonstrated in the *Online Hotel Bookings* case where regulators in at least 10 EU member states opened investigations into MFN/price parity agreements in between hotels and online travel agents:
 - *Germany*: Found an antitrust violation and ordered removal of the clauses.
 - *UK, Sweden*: Settled the case. No finding of violation of antitrust rules.
 - *France, Italy*: Settled the case. Legislator has now overruled the antitrust authority and prohibited this.
 - *Greece, Denmark*: Dropped probes following settlements in other jurisdictions.
 - Do price comparison websites will now need different terms with their suppliers in each of Germany, UK, France, Italy?
 - If your business needs MFN provisions these will need careful consideration in the EU

Distribution in the EU: Can I license content on a territorial exclusive basis

- **Issue**
 - EU copyright law permits licensing online content on an exclusive national basis. Why would entering into such agreements be an infringement of the antitrust rules?
- **Background**
 - EU copyright law has long allowed absolute territorial exclusivity for the “making available right” – the basis of online content distribution
 - European Commission however does not like the consequences, especially as audio-visual devices became portable. Commissioner Vestager: *“I, for one, cannot understand why I can watch my favourite Danish channels on my tablet in Copenhagen – a service I paid for – but I can't when I am in Brussels.”*
- **Cross-Border Pay-TV/ e-commerce inquiry**
 - Attacking the Hollywood studios for absolute territorial licensing agreements which contain geo-filtering provisions. The Commission is seeking to make a distinction between geo-filtering which is considered an unlawful “additional” restriction; whereas ‘exclusive’ licensing is still nominally permitted.
 - Case will form the basis for broader attacks on similar provisions the Commission is trying to uncover through its e-commerce sector inquiry.
 - Commission’s position seems to be – you can license exclusively but you can’t have any provisions that enforce that exclusivity.

Distribution in the EU: The Digital Single Market – should I be doing anything?

- What is going on?
 - Wide ranging effort to try and resolve many of these problems
- Pros to engagement with the Commission
 - Commission has a weak understanding of how online markets work; an awareness of that fact and (on some topics at least) a willingness to learn
 - Large lobbies of incumbents / those seeking regulatory assistance might otherwise set the agenda
 - Successful DSM strategy should make it easier to do business and grow in the EU
- Cons
 - Cost (time, money, distraction)
 - Commission has a fixed view on certain topics, especially territorial restraints. These are the focal point of the e-commerce antitrust inquiry. Nothing to be gained in providing them with evidence to use against you.
- It is a choice – even if you get sent a questionnaire a response is unlikely to be mandatory

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Antitrust in High-Technology Markets: ***Ten Challenges for Regulators and the Courts***

Lawrence Wu, Ph.D.

President

The Directors Roundtable

The Impact of Antitrust on Dealmaking & Operations in the US, EU & China

Menlo Park, California

November 13, 2015

High-Tech Antitrust: Challenges for Regulators and the Courts



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1. Understanding the allegedly anticompetitive conduct
 - **Complex markets... and correspondingly complex business models**

High-Tech Antitrust: Challenges for Regulators and the Courts



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2. Accounting for the dynamics that shape how high-tech markets move and evolve

- **Network effects and market forces that could lead to market tipping**

High-Tech Antitrust: Challenges for Regulators and the Courts



3. Doing a forward-looking analysis with little or no backward-looking data
 - **Where's the data?**

High-Tech Antitrust: Challenges for Regulators and the Courts



4. Understanding pricing when pricing is not easy to understand or measure
 - **How do you compare prices when competing firms have different business models and products?**

High-Tech Antitrust: Challenges for Regulators and the Courts



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5. Avoid focusing on price when the real competitive interaction is about innovation, new product introductions, and new features
 - **Output effects are just as important as price effects**

High-Tech Antitrust: Challenges for Regulators and the Courts



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6. Understanding market power when market shares aren't reliable
 - **Can future innovation or disruption dislodge the market leader?**

High-Tech Antitrust: Challenges for Regulators and the Courts



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7. Balancing the good against the bad
 - **The need to weigh the procompetitive benefits of a transaction or the conduct at issue against the alleged anticompetitive effects**

High-Tech Antitrust: Challenges for Regulators and the Courts



8. Making decisions under uncertainty
 - **Dealing with Type I and Type II errors**

High-Tech Antitrust: Challenges for Regulators and the Courts



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9. Finding a remedy that works
 - **Solving the problem without stifling innovation**

High-Tech Antitrust: Challenges for Regulators and the Courts



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10. Protecting competition for the benefit of consumers

- **Complaints from the innovator and disruptor**
- **Complaints from incumbents**
- **What about consumers?**



U B E R



T E S L A



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