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ROUNDTABLE ON COMPETITION IN ROAD FUEL

-- Note by the United States --

This note is submitted by the United States to the Competition Committee FOR DISCUSSION under Item IX at its forthcoming meeting to be held on 19-20 June 2013.

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ROUNDTABLE ON COMPETITION IN ROAD FUEL

-- Note by the United States --

1. This paper responds to the Competition Committee Chair's letter of April 3, 2013, inviting submissions for the Competition Committee's upcoming roundtable on competition in road fuel. The U.S. Federal Trade Commission ("Commission" or "FTC") and the Antitrust Division of the U.S. Department of Justice ("DOJ") (collectively, "the Agencies") are pleased to provide our perspective on competition issues in petroleum markets, derived in part from the Agencies' antitrust enforcement work in the petroleum sector, and to supply references to a number of studies and reports the Agencies have conducted that help explain competitive conditions in several of those markets.

2. Due to the importance of gasoline and other refined petroleum products in consumers' budgets and the economy as a whole, the prices of these products are of acute interest to the public and to policymakers. Over the years, the Agencies have used a variety of tools to promote competition in downstream petroleum markets, including conducting extensive research and preparing studies, investigating and prosecuting suspected antitrust violations, and engaging in advocacy before federal, state, and local policymakers.[1]

1. Reports and Research

3. Since its inception, the FTC has studied competitive conditions in the petroleum sector,[2] issuing dozens of reports that serve two basic goals: to inform public policy concerning competition in the petroleum industry, and to make more transparent how the Commission analyzes mergers and other business conduct in this sector. In some instances, the Commission studies issues of interest to policymakers in response to specific or recurring requests. For example, the FTC reports to the U.S. Congress twice a year on its activities in the oil and natural gas industries, and annually on levels of concentration in the fuel ethanol industry.[3] The FTC also performs studies on its own initiative, building

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1 The Commission's work in petroleum and natural gas markets is compiled on its website at www.ftc.gov/ftc/oilgas/index.html.

2 The significance of the petroleum industry has been reflected in the FTC's competition policy work since Congress enacted the Federal Trade Commission Act in 1914. For example, in the first 10 years of its operations, the Commission reported several times on public policy issues in this sector. *See, e.g.,* Federal Trade Commission, Advance in the Price of Petroleum Products: Report in Response to House Resolution No. 501 (June 1, 1920); Federal Trade Commission, Report on the Pacific Coast Petroleum Industry, Parts I and II (Apr. 7, 1921, and Nov. 28, 1921); Federal Trade Commission, Report on Foreign Ownership in the Petroleum Industry (Feb. 12, 1923).

3 Federal Trade Commission, Report of the Federal Trade Commission on Activities in the Oil and Natural Gas Industries (Dec. 2012) (semi-annual report to Congressional appropriations committees summarizing FTC's recent activities in oil and natural gas in the enforcement of antitrust laws and the FTC's market manipulation rule, competition advocacy, consumer alerts, Congressionally mandated reports, and the agency's Gasoline and Diesel Price Monitoring Program), *available at* www.ftc.gov/os/2012/12/1212energyreport.pdf. In November 2012, the FTC released its eighth annual Report on Ethanol Market Concentration, *available at* www.ftc.gov/reports/ethanol/2012ethanolreport.pdf.

on experience the agency has gained in enforcement matters,[4] through original research, and from public conferences and workshops.

4. Through careful research, industry monitoring, and investigations, the Commission seeks to understand current petroleum industry developments and to identify obstacles to competition, whether arising from private behavior or from public policies. The petroleum industry's performance is shaped by the interaction of extraordinarily complex, rapidly changing commercial arrangements and an elaborate set of public regulatory commands. A well-informed understanding of these factors is essential if antitrust enforcement actions are to benefit consumers.

1.1 Understanding Factors Driving Road Fuel Pricing

5. Because consumers, businesses, and governments have difficulty reducing fuel usage in the short term, U.S. policymakers have long attempted to understand what factors drive fuel price fluctuations, especially for gasoline. The FTC has published several important reports on demand and supply conditions that affect gasoline pricing, including studies of general trends in pricing[5] as well as market reactions to unique disruptions such as hurricanes.[6]

6. In their most recent report on gasoline pricing, economists at the FTC concluded in 2011 that crude oil prices continue to be the main driver of gasoline prices in the United States.[7] They noted that recent research suggests that the Organization of the Petroleum Exporting Countries ("OPEC") has some ability to influence crude oil prices through its decisions to limit output and assign production quotas.[8]

Other Commission reports on competition in petroleum markets can be found at www.ftc.gov/ftc/oilgas/competn_reports.htm.

4 *See*, *e.g.*, Federal Trade Commission, The Petroleum Industry: Mergers, Structural Change, and Antitrust Enforcement (2004), *available at* www.ftc.gov/os/2004/08/040813mergersinpetrolberpt.pdf.

5 *See* Federal Trade Commission, Bureau of Economics, Gasoline Price Changes and the Petroleum Industry: An Update (2011) (hereinafter 2011 Gasoline Price Report), *available at* www.ftc.gov/os/2011/09/110901gasolinepricereport.pdf; Federal Trade Commission, Gasoline Price Changes: The Dynamic of Supply, Demand, and Competition 7 (2005), *available at* www.ftc.gov/reports/gasprices05/050705gaspricesrpt.pdf.

6 Federal Trade Commission, Report on Spring/Summer 2006 Nationwide Gasoline Price Increases 3, *available at* www.ftc.gov/reports/gasprices06/P040101Gas06increase.pdf; *see* also Federal Trade Commission, Investigation of Gasoline Price Manipulation and Post-Katrina Gasoline Prices Increases, *available at* www.ftc.gov/ftc/oilgas/competn_reports.htm.

7 2011 Gasoline Price Report, *supra* note 5, at 5.

8 *Id*. at 14. Private parties have attempted to bring price-fixing cases against OPEC, but have been unsuccessful. For example, a labor union sued OPEC for violating Section 1 of the Sherman Act by fixing the price of oil. *International Association of Machinists (IAM) v. OPEC,* 477 F. Supp. 553 (C.D. Cal. 1979), *aff'd,* 649 F.2d 1354 (9th Cir. 1981), *cert. denied,* 454 U.S. 1163 (1982). In *IAM*, both a federal District Court and the Court of Appeals for Ninth Circuit declined to apply the antitrust laws against OPEC, but for different reasons. The District Court held that OPEC was protected by sovereign immunity, as codified in the Foreign Sovereign Immunities Act of 1976. 28 U.S.C. secs. 1602 et seq. The Court of Appeals instead relied on the act of state doctrine, which "declares that a United States Court will not adjudicate a politically sensitive dispute which would require the court to judge the legality of the sovereign act of a foreign state." *IAM*, 649 F.2d at 1358. The Court of Appeals also noted that sovereign nations have the right to choose the means of allocating and profiting from their natural resources. *Id*, at 1361. More recently, in *Spectrum Stores, Inc. v. Citgo, Petroleum Corp.*, 632 F.3d 938 (5th Cir. 2011), *cert. denied*, 132 S. Ct. 366 (2011) and *cert. denied*, 132 S. Ct. 367 (2011), the Fifth Circuit Court of

7. Other factors have played a significant role in gasoline price changes since 2005, such as the temporary loss of refinery capacity and disruptions of major pipelines due to Hurricanes Rita and Katrina in 2005, which led to large gasoline price spikes nationwide. Gasoline prices also increased significantly, relative to crude oil prices, in mid-2006 and mid-2007 due to several factors including increased demand, higher ethanol prices, reduced refining capabilities, and the lingering effects of the 2005 hurricanes. Prices fell during the 2008 recession and generally remained low, relative to crude prices, between 2008 and autumn of 2010.

1.2 Asymmetric Pass-through (aka "Rockets and Feathers")

8. Since 2005, economists have conducted additional research on how crude oil and gasoline prices adjust over time. Specifically, they have examined whether retail gasoline prices react more quickly when prices are going up than when they are going down – a phenomenon popularly known as "rockets and feathers" (and more formally referred to as "asymmetric price adjustment" or "asymmetric pass-through").[9]

9. The causes of asymmetric pass-through in retail to wholesale price relationships are not fully understood. Researchers have suggested a number of potential causes. The explanation currently with the most support is that consumers search for lower-cost gasoline more intensively when prices are rising than when they are falling. As a result, gas station owners do not face as much competitive pressure as prices fall and are less compelled to reduce price. Although there is some evidence that consumer search intensity differs between when prices are increasing and when they are decreasing, it is unclear why search costs vary across cities, resulting in varying degrees of price asymmetry.[10]

10. The 2011 Gasoline Price Report also examines another phenomenon known as "price cycling" – unusual gasoline price change patterns seen in certain geographic areas. Price cycling is a recurring "saw-tooth" pattern of retail price movements characterized by periods of a relatively small number of large price increases, followed by a period of more numerous, but smaller, price decreases. The causes of price cycling are also not fully understood. Several studies explore the relationship between cycles and market structure. Small, independent retail stations (*i.e.*, those not owned or affiliated with a petroleum refiner) and large, refiner-affiliated stations both appear to play a role in explaining the presence of cycling. A number of studies that consider U.S. data find that cycling in the Midwestern part of the country may be explained in part by the greater presence of independent, non-refiner, firms in that region, or by price leadership from two large retailers.[11]

11. Researchers continue to make progress in understanding asymmetric pass-through and cycling, though many questions remain unanswered. Additional research using station-level prices and attributes, such as brand affiliation and ownership structure, may shed additional light on the causes and consequences of asymmetric pass-through. More work is also needed on why wholesale-to-retail asymmetries differ across geographic regions. With regard to cycling, there is tension between the hypothesis that cycling results from price leadership or market power and the fact that average prices

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Appeals affirmed dismissal of a private price-fixing action against American subsidiaries of state-owned oil companies of OPEC nations on the basis of the act of state and the political question doctrines. *Spectrum Stores*, 632 F.3d at 956.

9 For a review of extant research, *see* Matthew Chesnes, Asymmetric Pass-Through in U.S. Gasoline Prices, FTC Bureau of Economics Working Paper No. 302 (June 2010), *available at* www.ftc.gov/be/workpapers/wp302.pdf.

10 2011 Gasoline Price Report at ii, 35-45.

11 *Id*. at 43.

appear equal in cycling and non-cycling cities (or even lower in cycling cities). Some research has shown that asymmetric pass-through is greater in the parts of the country where price cycles exist, suggesting that more attention should be devoted to the interaction between asymmetric pass-through and cycling.[12]

1.3 Industry Structure and Merger Retrospectives

12. The prices of gasoline and other refined petroleum products are also affected by costs and competitive conditions at the refinery level. The 2011 Gasoline Price Report concluded that after a series of very large petroleum mergers and joint ventures between 1996 and 2003, refinery concentration in the United States has stabilized, leaving most national, regional, or state markets with low to moderate levels of concentration.[13]

13. In 2004-2005, two separate transactions increased refinery concentration in the greater Philadelphia area: Sunoco's acquisition of El Paso's Eagle Point refinery and Valero's acquisition of Premcor. The FTC declined to intervene in either transaction, and FTC economists retrospectively examined the mergers' possible effects on wholesale and retail gasoline and diesel prices from the Sunoco/El Paso and Valero/Premcor transactions. The study concluded that the transactions were largely competitively neutral. Some unbranded wholesale prices may have increased after the mergers, but this result was not robust across controls and other assumptions.[14] Previous retrospectives of other petroleum mergers reached similar conclusions.[15]

2. Enforcement

2.1 Merger Enforcement Is Key to Maintaining Competition in U.S. Petroleum Markets

14. The Commission investigates every substantial petroleum industry merger. Many transactions, particularly smaller ones, raise no competitive concerns and require no enforcement intervention. A case-by-case analysis, following the approach set out in the Agencies' Horizontal Merger Guidelines, is necessary to find the relevant markets in which the merger might lessen competition, to assess the likelihood and significance of possible competitive harm, and to fashion remedies to guard against harm to competition and consumers in those relevant markets. It is important to note that mergers can be, and often are, efficiency-enhancing and procompetitive. As in other industries, FTC merger enforcement orders often permit the merging firms to achieve the economic benefits of the transaction while curing the potential anticompetitive effects through divestiture to a third party.

15. The FTC has played an important role in the restructuring of the petroleum industry over the past 20 years, during which period certain forces unique to petroleum markets have transformed the industry. Technological, economic, and regulatory developments have increased reliance on a smaller number of larger, more sophisticated refineries that can process different kinds of crude oil more efficiently. The development of crude oil spot and futures markets has reduced the risks of acquiring crude oil through market transactions – as opposed to owning crude oil extraction and production assets – and thus has

12 *Id*. at 44-45.

13 *Id*. at 26.

14 *See* Louis Silvia and Christopher T. Taylor, *Petroleum Mergers and Competition in the Northeast United States*, 20:1 INT'L J. ECON. OF BUS. 97 (Feb. 2013).

15 John Simpson and Christopher T. Taylor, *Do Gasoline Mergers Affect Consumer Prices? The Marathon Ashland and Ultramar Diamond Shamrock Transaction*, 51 J.L. & ECON. 135 (2008); Christopher T. Taylor, Nicholas M. Kreisle, and Paul R. Zimmerman, *Vertical Relationships and Competition in Retail Gasoline Markets: Empirical Evidence from Contract Changes in Southern California: Comment*, 100 AM. ECON. REV. 1269 (2010).

contributed to a decline in vertical integration between crude oil production and refining among the major oil companies. A number of major integrated firms have restructured to concentrate on one or more segments of the industry, and a number of unintegrated refiners or retailers have entered.[16]

16. Collectively, mergers have raised competitive concerns at all levels of the petroleum industry, but most FTC enforcement actions have targeted downstream activities – refining, refined products pipelines, terminals, and marketing.[17] The competitive concern generally has centered on how the merger would enable the merged firm to engage in unilateral conduct or inter-firm coordination to raise prices in a market for products that it sells to the next level of the industry (*e.g.*, refined products sold to wholesalers, or wholesale products sold to retailers). A key element in assessing the potential for adverse competitive effects is to determine the alternatives available to customers, including whether more distant suppliers are viable options.

17. Since 1981, the FTC has challenged 23 proposed petroleum mergers based on concerns that the combination would have resulted in a significant reduction in competition and harmed consumers in one or more downstream petroleum markets.[18] Although some of the mergers were abandoned or blocked as a result of FTC or court action, in most cases the FTC required the merging companies to divest substantial assets in the markets in which competitive harm was likely to occur in order to preserve competition while still allowing realization of the mergers' efficiencies.

2.2 Collusion and Market Monitoring for Early Detection of Pricing Trends

18. Collusion does occur in petroleum markets. Since 1970, the DOJ has brought 23 criminal cases involving price-fixing conspiracies in local gasoline and diesel fuel markets, in over a dozen states. These cases resulted in convictions of 22 individuals and 55 companies. The Division filed its most recent gasoline price-fixing case in 2008.[19]

19. Much concern about gasoline and diesel pricing focuses on developing a data screen to identify pricing "anomalies" as potential indicators of tacit or overt collusion. In a program unique to petroleum markets, the FTC actively monitors wholesale and retail prices of gasoline and diesel fuel in an effort to keep up with pricing trends in the markets. This project tracks retail gasoline and diesel prices in some 360 cities across the U.S. and wholesale prices in 20 major U.S. urban areas. The FTC's Bureau of Economics staff regularly receives and reviews data from a private oil price data collection company, as well as information from the U.S. Department of Energy and other relevant information. FTC staff uses an

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16 *See* Prepared Statement of the Federal Trade Commission on Petroleum Industry Consolidation before the Joint Economic Committee of the United States Congress (May 23, 2007), *available at* www.ftc.gov/os/testimony/070523PetroleumIndustryConsolidation.pdf.

17 In the 2000 merger of BP and ARCO, the FTC obtained divestitures to preserve competition involving a number of crude oil markets in Alaska and Oklahoma. FTC Press Release, FTC Clears Merger of BP Amoco and Atlantic Richfield Company, *available at* www.ftc.gov/opa/2000/04/bpamoco1.shtm.

18 For FTC enforcement actions since 1996, *see* the Competition Enforcement Database, *available at* www.ftc.gov/bc/caselist/industry/cases/energy/EnergyPetroleum.pdf. For prior actions, *see* FTC Merger Enforcement Action in the Petroleum Industry Since 1981, *available at* www.ftc.gov/ftc/oilgas/charts/merger_enforce_actions.pdf. Four additional transactions were abandoned, due in part to antitrust concerns.

19 *See* Press Release, U.S. Dep't of Justice, Convenience Store Company and Individual Charged with Retail Gasoline Price Fixing in Oklahoma (Sept. 19, 2008), *available at* www.justice.gov/atr/public/press_releases/2008/237430.htm; Press Release, U.S. Dep't of Justice, Tennessee Oil Company and its President Charged with Gasoline Price Fixing (July 21, 1993), *available at* www.justice.gov/atr/public/press_releases/1993/211645.htm.

econometric model to determine whether current retail and wholesale prices each week are anomalous compared to historical data.

20. The Monitoring Project alerts FTC staff to unusual changes in gasoline and diesel prices so that further inquiry can be undertaken expeditiously. It is important to understand that these price changes do not indicate the existence of anticompetitive conduct. Instead, they suggest only that something has changed. Most frequently, they occur because of changes in market forces, such as a temporary supply disruption caused by unplanned refinery outages. When unusual price changes do not appear to result from market-driven causes, staff consults with the Energy Information Administration of the Department of Energy. FTC staff also contacts the offices of the appropriate state Attorneys General to discuss the anomaly and appropriate potential actions, including opening an investigation.

21. The Agencies belong to a multi-agency Oil and Gas Price Fraud Working Group that the Attorney General established pursuant to President Obama's request in the spring of 2011. Members of the Working Group meet in person or communicate through other means to share information about their activities in the energy markets. These interagency communications are helpful to the member agencies as they individually formulate and pursue law enforcement and other programs involving petroleum and other energy products.

2.3 Policing Anticompetitive Conduct in Petroleum Markets

22. The FTC also investigates potentially anticompetitive exclusionary conduct in petroleum markets. For example, in March 2003, the FTC issued an administrative complaint alleging that Union Oil Company of California (Unocal) illegally subverted the California Air Resources Board's (CARB) regulatory standard-setting procedures relating to low-emissions reformulated gasoline (RFG).[20] The complaint alleged that Unocal misrepresented to both CARB and industry participants that some of its emissions research was non-proprietary and in the public domain, at the same time it was pursuing a patent that would allow it to charge royalties if CARB used its emissions information. The complaint further alleged that Unocal's conduct allowed it to acquire monopoly power over the technology used to produce and supply California "summer-time" RFG, a low-emissions fuel mandated for sale in the state from March through October, potentially costing California consumers five cents per gallon more in gasoline prices. In 2005, the Commission resolved the matter through an order requiring the respondents to stop enforcing the RFG patents that lay at the heart of the litigation and to release all relevant patents to the public. That outcome saved consumers $500 million a year, according to Commission estimates.[21]

3. Competition Advocacy

23. Advocating for competition is an important part of the Agencies' missions. This advocacy takes a number of forms, including providing testimony or comments on proposed federal and state legislation and regulations, advising Executive Branch components on competition issues, and advocating for competition principles in public fora. The FTC also responds to requests from policymakers to address the impact of proposals to more closely regulate petroleum markets. For example, the FTC staff has provided

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20 In the Matter of Union Oil Co. of California, FTC Docket No. 9305, *available at* www.ftc.gov/os/adjpro/d9305/index.shtm

21 Statement of the Commission (June 10, 2005), In the Matter of Union Oil Company of California, Dkt. No. 9305, available at www.ftc.gov/os/adjpro/d9305/050610statement9305.pdf. *See also* Prepared remarks of Chairman Deborah Platt Majoras, FTC Conference on Energy Markets in the 21st Century (April 10, 2007), *available at* www.ftc.gov/speeches/majoras/070410energycoferenceremarks.pdf

comments on proposals to eliminate divorcement of retail assets from upstream suppliers;[22] to permit retailers to meet competitive prices by charging prices that are below cost;[23] and to set or regulate retail or wholesale prices for gasoline or diesel fuel.[24] As in other industries, the FTC relies on its competition advocacy efforts to reduce the risk that the federal, state, or local governments will pursue policies in petroleum markets that could impede competition.

22 Letter from FTC Staff to Councilmember Mary M. Cheh, Chairperson, Committee on Public Services and Consumer Affairs, Regarding the District of Columbia's Retail Service Station Act's divorcement provision (June 2007), *available at* www.ftc.gov/os/2007/06/V070011divorcement.pdf.

23 Letter from FTC Staff to the Honorable Raymond J. Lesniak, Senator, New Jersey State Senate, Concerning New Jersey State Bill 484 to Allow Gasoline Retailers to Set Prices Below Cost to Meet Competition (Sept. 2010), *available at* www.ftc.gov/os/2010/09/100928gasolineretailers.pdf.

24 FTC Staff Comment to The Honorable Christopher R. Stone, Representative, State of Connecticut House of Representatives, Regarding Connecticut Senate Bill 1136, Which Would Regulate Retail and Wholesale Petroleum Pricing (May 2007), *available at* www.ftc.gov/be/V070008.pdf.