GOOGLE RESPONSES TO WRITTEN QUESTIONS FROM THE U.S. SENATE JUDICIARY COMMITTEE

Senator Specter

Do you believe that case-by-case adjudication of competitive issues that arise in the market for broadband internet service would be adequate? What if Congress provided the FTC and DOJ with guidelines for applying the antitrust laws in this market? If Congress were to provide such standards, what would they consist of?

Generally speaking, Google prefers protective rules of general applicability, buttressed by effective enforcement measures, to create a framework within which to consider the many competitive issues that arise in the market for broadband Internet access service. However, there also can be a useful role for a case-by-case adjudication process to deal with antitrust-related disputes, provided that the process is governed by substantive and procedural standards established by Congress.

The Federal Communications Commission (FCC) employs a notice-and comment rulemaking process, pursuant to the dictates of the Administrative Procedures Act (APA). Over the years this APA process has been a useful tool to allow interested parties to participate actively, either individually or through associations or coalitions, in an open, public process. In particular, the APA rulemaking process tends to create clear criteria to govern future commercial activity. Overall, the rulemaking process is an efficient and transparent way for a governmental agency to provide direction to industry.

An adjudication process without specific guidelines from Congress could be problematic as the exclusive means for dealing with alleged marketplace abuses. First, the adjudicatory process typically is limited to the two parties involved, and typically occurs without public knowledge or participation, which precludes the introduction and use of additional viewpoints or evidence. Second, the resulting record reflects one or a few particular alleged acts, which yields a decision of relatively narrow scope and future applicability. Third, some agencies do not publish written complaint decisions for industry to review and incorporate into future market behavior. Fourth, some complaints cannot be appealed to federal court, which limits the ability to correct faulty reasoning or use of evidence. Fifth, and perhaps most important, the adjudicatory process tends to provide little forward guidance to entities unsure about the demarcation between acceptable and unacceptable business practices.

An adjudicatory process can be particularly problematic for potential complainants from the high-technology industry. This market typically comprises a large number of small businesses and entrepreneurs working in a fast-paced, ever-changing environment. Such companies usually do not employ regulatory counsel, or consistently review notices in the Federal Register. In a purely adjudicatory environment, these entities would not be able to rely on associations or coalitions to represent their interests, but instead would need to police market behavior and consider the pros and cons of filing complaints on their own. This process is made more difficult by the fact that by their nature, network-based harms can be difficult to detect, and harder to prove. Complaints also can be quite expensive to pursue, particularly if the alleged violator takes full advantage of motions and discovery procedures. The case-by-case approach also can create considerable marketplace uncertainty, as individual industry participants await guidance from germane cases. Further, the adjudicatory process inherently is not well suited to protect the economic interests of future innovators. How can an inventor assert his or her rights in any situation, if a violation of those rights took away the market opportunity in the first place? This uncertainty over whether one's inventions will be protected after-the-fact in an adjudicatory setting could discourage innovation, especially innovation disruptive to powerful, well-financed companies.

In the context of federal antitrust legislation related to network nondiscrimination, adjudication may be an adequate substitute for rulemaking -- or preferably a complementary element -- but only if Congress puts in place clear statutory guidelines that the Federal Trade Commission and/or the Department of Justice would be required to employ. Google would favor the adoption of the following substantive and procedural standards for antitrust complaints:

- The concept of discrimination must be legislated as an impermissible method of competition. In particular, broadband carriers should be prohibited from discriminating based on the source or ownership of any Internet content, applications, or services.

- All interested parties, including network users or their representatives, should be eligible to file a complaint against a broadband carrier. Limiting the right to a retail subscriber, for example, would remove most of the best-qualified and motivated complainants.

- Once a *prima facie* showing has been made, the broadband carrier then should carry the burden of proof that its practices do not violate the antitrust laws, as it will have all material network and market information in its possession.

- Strict statutory deadlines should be established, so that administrative decisions are rendered quickly and decisively.

- A comprehensive assortment of injunctions and remedies (including damages) should be available to be adopted and enforced by the adjudicators.

- Final decisions should be published in the Federal Register, or other readily-accessible source, so that network users and the general public can be aware of alleged carrier practices and complaint outcomes.

- Parties should be able to appeal final agency decisions.

Senator Kohl

1. The phone companies and cable companies contend that legislation to require "net neutrality" is a "solution in search of a problem" and that we ought to wait to see how the marketplace develops. What is your response? Is it premature for Congress to legislate in this area?

Some have suggested that Congress need not act this year to re-establish nondiscrimination safeguards on the broadband carriers because there are no obvious abusive acts that have been committed so far. That viewpoint completely ignores two salient facts: (1) over 99 percent of Americans take broadband from either a cable or telephone company, so there is no marketplace discipline of abusive behavior; and (2) the current regulatory environment includes soon-to-expire FCC regulatory safeguards, temporary merger conditions, and the carriers' best behavior in the face of pending legislation and FCC transactions. Even in an environment where the carriers' incentives to undertake anticompetitive activities are constrained temporarily, some broadband carriers already have publicly signaled some of their future business plans to engage in discriminatory activities – and also provide some unfortunate real-life examples.

Last summer the FCC eliminated its so-called "Computer Inquiry Rules," which were nondiscrimination safeguards that have applied to the incumbent local exchange carriers (ILECs) for a quarter-century. Those safeguards have governed consumer access to the ILECs' last-mile on-ramps to the Internet, and formed a legal framework that buttressed the open and neutral design of the Internet itself. The FCC's order established a one year sunset, so that the safeguards expire in less than two months – September 2006. For now, at least, the ILECs remain bound by the nondiscrimination safeguards contained in the Computer Rules.[1] Most forms of discriminatory behavior would violate those requirements.

AT&T and Verizon are also subject to conditions put in place last November as part of the FCC's approval of their respective mergers. Both companies committed "for a period of two years to conduct business in a way that comports with the Commission's Internet policy statement," which includes the FCC's four Internet principles. Unfortunately, those four principles – which the Chairman of the FCC has indicated are unenforceable and lack any nondiscrimination standards -- do not provide nearly the same level and degree of protection as the FCC's original, enforceable nondiscrimination safeguards. Nonetheless, those merger conditions do apply to that subset of broadband carriers.

At the present time, both the ILECs and the cable companies have additional strong incentives not to commit brazen acts of discrimination. From the Bell Companies' perspective, favorable video franchise legislation now is being considered actively in

[1] In 2002, the FCC declined to subject the cable companies to the Computer Inquiry rules, but at that point raised the possibility of imposing them in the future should the cable companies engage in discriminatory conduct.

Congress. Any additional abusive activities that come to light would further fuel growing popular outrage about the looming loss of nondiscrimination safeguards.

In addition, two pending transactions at the FCC have raised the possibility of net neutrality-related safeguards. On May 18, 2005, Adelphia Communications, Time Warner Cable, and Comcast Corporation filed a joint application for authority to transfer Adelphia's cable assets to Time Warner and Comcast. A number of ISPs and consumer groups seek to have the asset transfers conditioned on a net neutrality requirement. Further, this past April, AT&T and BellSouth filed an application for FCC approval of their proposed merger transaction. Companies and consumer groups seek to use the pending merger process as a vehicle for addressing concerns about net neutrality. Just yesterday, the FCC formally approved the Adelphia/Time Warner/Comcast transaction, while the proposed AT&T/BellSouth merger remains pending. Obviously in both cases the broadband carriers do not want to provide still further evidence of abuses that could be used as additional justification.

Despite the temporary regulatory and legislative constraints on their market incentives and behavior, the broadband carriers nonetheless have provided the Congress with a clear roadmap for the types of market abuses they intend to perpetrate. The carriers' incentives to discriminate already are manifesting themselves -- both in future business plans and in specific acts of discriminatory conduct -- in at least three types of market power abuses: (1) creating "two" pipes, one a slow public Internet lane, and the other a faster private lane; (2) "double-charging" Web companies for additional broadband capacity and quality of service capabilities; and (3) prioritizing traffic on the Internet based on the source or ownership of content – in short, anticompetitive discrimination.

Over the past eight months, senior Bell Company executives have signaled publicly their clear intention to alter the Internet's very design. They have provided us with far more than just provocative quotes -- they demonstrate concrete business plans that are ready to be enacted once the FCC's Computer Inquiry safeguards expire in September.

<u>Consigning the Internet to the slow lanes</u>

<u>Business Week</u> (February 2, 2006): *"Now, Cerf and his Net compatriots have new ammunition to back up their fears. Documents filed with the Federal Communications Commission show that Verizon Communications (VZ) is setting aside a wide lane on its fiber-optic network for delivering its own television service. According to Marvin Sirbu, an engineering professor at Carnegie Mellon University who examined the documents, more than 80% of Verizon's current capacity is earmarked for carrying its service, while all other traffic jostles in the remainder."*

Verizon documents show that its fiber-based video service is being delivered on a separate wavelength from the other services (roughly 3.5 Gbps of the network's capacity). That will leave only 620 Mbps of bandwidth for all forms of Internet traffic, to be shared by 32 different users on each Broadband Passive Optical Network (BPON) node. The incumbent cable systems already employ similar "two-pipe" network architecture.

AT&T plans to deploy a different broadband network configuration, where all traffic is contained on a single hybrid fiber/copper-based channel that must be shared for all applications. Regardless of the specific engineering involved, however, Google is deeply concerned that the broadband providers have the incentives and the means to create a robust closed private network that consigns Internet content and applications to a relatively slow, bandwidth-starved portion of the broadband connection. Obviously it will be increasingly difficult for providers of Internet-based applications such as video content to compete effectively against the broadband providers in this kind of "two-tiered" broadband network.

<u>Double-charging Web companies</u>

SBC CEO Ed Whitacre, <u>Business Week</u> (Nov. 7, 2005): *"Now what they [Google, Yahoo, MSN] would like to do is use my pipes free, but I ain't going to let them do that because we have spent this capital and we have to have a return on it. So there's going to have to be some mechanism for these people who use these pipes to pay for the portion they're using."*

Verizon's Senior Vice President and Deputy General John Thorne, <u>Washington Post</u> (February 8, 2006): *"[Google] is enjoying a free lunch that should, by any rational account, be the lunch of the facilities providers."*

The Bell Companies have demonstrated an intention to use their bottleneck control to begin levying surcharges on companies that are not their customers. As detailed in Google's response to a question from Senator Feingold, these surcharges would be above and beyond the billions of dollars that Google and other Web companies already spend for network access and infrastructure to provide their content and applications to the Internet. Such surcharges would constitute blatantly discriminatory leveraging of market power and control of underlying transmission facilities under the FCC's existing but soon-to-expire nondiscrimination safeguards.

<u>Providing preferential treatment to certain content and applications</u>

BellSouth CTO William Smith, MarketWatch (Jan. 16, 2006): Smith confirmed that BellSouth *"is pursuing discussions with Internet content companies to levy charges to reliably and speedily deliver their content and services."*

Qwest CEO Richard Notebaert, CNET News.com (March 15, 2006): Notebaert asserts that online companies should be allowed to work out similar deals with network providers in an effort to get a leg up over their competitors. "*Would this give some content providers an advantage over others?" he asked the crowd rhetorically. "Well, yeah. We're all trying to provide a little bit of differentiation for a competitive edge. That's what business is about."*

The Bell Companies also have openly discussed their plans to advantage certain providers of content and applications over others, in exchange for additional payments. According to BellSouth, those plans have advanced enough to constitute active discussions with potential partners. Again, the FCC's expiring safeguards would prohibit such blatant and discriminatory favoritism of a few companies over everybody else.

Despite temporary incentives for the major US broadband carriers not to engage yet in the types of anticompetitive activities described above, a number of other broadband carriers already have taken just that course.

- Just last year, the FCC found that the Madison River Telephone Company was blocking ports used by its DSL customers to access competing VoIP services. Importantly, this decision came <u>before</u> the Commission eliminated the legal basis of common carriage for enforcing nondiscrimination safeguards, so it is unclear whether the FCC still retains any lawful ability to prevent such blocking behavior in the future.

- Shaw Cable in Canada now charges a monthly $10.00 "quality of service enhancement fee" for those cable subscribers wishing to sign up to utilize a competing VoIP service – a fee that Shaw reportedly does not charge its own VoIP service.

- Rogers Cable in Canada recently admitted employing "traffic shaping" technology that gives lower priority to a customer's filesharing, podcasting, and video blogging applications. These restrictions were put in place unilaterally, and without prior notice to broadband subscribers, and apparently were based on the source of the Internet traffic.

- Executives at Deutsche Telekom and Telecom Italia have expressed a desire to levy "double charges" on Google and other Web-oriented companies.

- Entire countries such as Panama and Egypt have demanded that ISPs disable all VoIP services as a means of protecting incumbent monopoly voice carriers.

Finally, it should be pointed out that, by their very nature, discriminatory practices taking place within the broadband carriers' physical and logical networks often can be extremely difficult to detect and report to government authorities. Outside of more overt actions, like blocking all access to a particular website or application, other forms of traffic degradation may have significant negative impact, even as victims are largely unaware of the resulting damage. Thus, it may well be that discriminatory behavior is taking place right now, but outside the scrutiny of the marketplace and would-be regulators.

2. Is Google aware of any deals between broadband providers and internet content companies to give preferential treatment to internet content? If so, please provide examples.

At this time, Google does not have first-hand knowledge of any preferential deals between broadband providers and content companies. Recent press reports do indicate that AT&T has entered into a contractual agreement with Movielink to provide a higher-quality video delivery service than otherwise would be available to other content providers. However, without knowing more about the precise terms of the agreement, it is unclear whether such an arrangement would violate network neutrality. The broadband carriers could employ certain network upgrades, such as the use of local caching or private network backbone links, which in themselves would not implicate net neutrality, because they do not involve discriminatory conduct stemming from the carriers' control over last-mile facilities. The AT&T/Movielink agreement could be such an example.

As explained above, however, it should not be surprising that the domestic broadband carriers are not yet engaging in blatant discriminatory conduct in the current market environment. Further, there already is ample evidence in other countries of broadband providers using their ability and incentive to discriminate against competing providers of VoIP services, and certain types of consumer applications and content.

3. Opponents of net neutrality legislation such as the phone and cable companies argue that they need the ability to manage the networks, and give priority to some applications and not others, in order to keep the internet functioning smoothly. Without this ability, they contend, the growing use of video and other very demanding internet applications may overburden and degrade the internet experience for everyone. They are concerned that net neutrality requirements will hamper their ability to properly manage the internet. What is your response to this argument?

Google does not dispute that the broadband providers should have the ability to manage their networks. The real question comes down to how, and not whether, this management will occur. If the broadband provider utilizes legitimate application and content-neutral practices – such as preventing harmful denial of service (DOS) attacks, or prioritizing all applications of a certain type, such as streaming video – Google supports these reasonable practices. In addition, blocking some traffic based on IP address source because of the prevalence of objective network harms, such as viruses or worms, also would be acceptable. If, on the other hand, network management is used to promulgate discriminatory practices – such as blocking, degrading, or prioritizing certain applications or content based on the source or ownership – Google strongly opposes such practices. Further, nothing in the concept of net neutrality would prevent the broadband providers from managing the security and bandwidth-usage aspects of their own applications and content.

In addition, nearly all legislative proposals to retain network neutrality safeguards include provisions that would exempt reasonable network management practices. Again, Google does not oppose such provisions, so long as they advance the goals of evenhanded network management.

4. Do you believe that strengthened antitrust enforcement is appropriate to address problems that those concerned about net neutrality have identified? Is it sufficient?

Google believes that strengthened antitrust enforcement is appropriate to address problems arising from the broadband providers' pervasive market power. Google also believes that strengthened antitrust enforcement, while essential, by itself is not sufficient.

Ideally there should be two complementary enforcement regimes established by federal law to govern the activities of the broadband providers: (1) antitrust standards and enforcement mechanisms, policed by the Federal Trade Commission and/or Department of Justice; and (2) regulatory safeguards and enforcement mechanisms, overseen by the Federal Communications Commission. The antitrust standards would govern the exercise of pervasive market power by the broadband carriers, while regulatory safeguards would curtail certain market practices by the broadband providers. The two roles together should effectively protect consumers and competition from harmful practices.

5. Do you support repeal of the common carrier exemption from FTC jurisdiction as it relates to telecommunications? Why or why not?

Google does not take a position at this time on the question of repealing the current common carrier exemption from FTC jurisdiction. However, it appears that this question may well be an academic one, at least as applied to broadband Internet access providers. Because the FCC has reclassified broadband Internet access and underlying telecommunications facilities as a unitary information service, and not a common carriage telecommunications service, the FCC appears no longer to have primary jurisdiction over those services. Instead, the FTC now has ample jurisdiction, even under the current common carrier exemption, to investigate and regulate the broadband Internet access market, and employ appropriate enforcement remedies. Indeed, FTC Commissioner William E. Kovacic emphasized this very point in his June 14th testimony before the Senate Judiciary Committee.

Google also agrees with Commissioner Kovacic that, as Congress considers legislation to amend the Communications Act, the FTC's existing authority over activities currently within its jurisdiction should be clearly preserved. Legislation recently passed by the House puts that jurisdiction in doubt.

Senator Feingold

1. Question to the panel, but particularly to Mr. McCormick:

You have taken a position against net neutrality, at least partly on the grounds that you need to collect funds from Internet content providers to pay for further roll-out of Internet and video service. Yet at the same time you have opposed build-out requirements as part of the national video franchise proposed in the House. How is this consistent? There isn't a requirement that the money from content providers be reinvested in underserved areas, is there?

N/A

2. Question to the panel, particularly to Mr. McCormick and Cohen:

You have urged us not to act until there are widespread abuses of your duopoly power – essentially taking the position that net neutrality is premature. Yet we have a long history of putting conditions on mergers to preemptively prevent possible anti-competitive practices. Why shouldn't we follow the model we have set for mergers and place limits where the situation would be clearly susceptible to anti-competitive actions?

Google agrees that the Department of Justice, the Federal Trade Commission, and the Federal Communications Commission all have demonstrated a repeated willingness and resolve to impose pro-consumer conditions on mergers to preempt possible anticompetitive practices. Indeed, as the communications industry has continued to consolidate, government officials have found on numerous occasions that the use of tailored conditions imposed on proposed mergers, acquisitions, and other transactions is an effective and efficient use of the government's role. Congress should continue and build upon that successful legacy by adopting clear standards and enforcement remedies under the nation's antitrust laws.

3. Question to the panel, particularly to Mr. McCormick and Cohen:

I understand that some high speed internet providers are now offering consumers tiered options for higher than normal access speeds at a premium price. These are often marketed to users who use data intensive applications such as on-line interactive games and streaming video. One of your arguments against net neutrality is that you need to be able to charge these high usage application providers. Aren't you arguing that you should be paid twice for the same premium content?

Under the Internet's longstanding charging arrangements, each party pays for its own connection to the Internet, and then is free to utilize that connection in whatever ways are desired. Google believes that consumers should be able to acquire higher speed or performance capacity from the broadband access providers, and then use this capability to reach any service they wish on the Internet. In particular, consumers should be able to purchase tiered arrangements based on the use of bandwidth, latency requirements, or other objective measures. Such arrangements would constitute an appropriate, cost-based practice that compensates the broadband carrier for the additional capabilities provided.

On the other hand, the broadband carriers seek to leverage their bottleneck control over last-mile facilities to levy surcharges on entities who are not their customers, including Internet-based content and applications providers. These surcharges would be in addition to receiving over $20 billion annually from residential consumers to pay for their broadband connections. At the same time, Internet content and applications providers pay the carriers many billions more annually for their own access to the Internet. Attempting to levy additional surcharges on these companies who are not their customers -- above and beyond what they already pay their carriers to access the Internet -- would amount to assessing multiple discriminatory charges.

Internet-based companies spend billions of dollars annually on R&D to create and develop compelling content, applications, and services for American consumers, including news, data, video, music, gaming, and ecommerce services. This massive amount of material typically is deployed on hundreds of thousands of Web servers located around the country. In order for the content and applications to be delivered into the Internet, so it then can be made available to consumers, Web companies must arrange with network operators to: (1) carry the data traffic from company facilities to their Web servers over local telecom lines (sometimes called the "last mile"); (2) carry the data traffic from the Web servers into the Internet over high-speed, high-capacity data lines (sometimes called "special access"); and (3) carry the data traffic over the numerous interconnected networks that make up the Internet (sometimes called the "Internet backbone"). To accomplish these important connectivity and transport functions in a fast and effective manner, Internet companies collectively pay billions of dollars per year to network operators. That money fully compensates the network operators for their network investment. The Internet companies separately spend billions of dollars more for Internet backbone capacity, much of which goes to the Bell companies as well.

Overall, the four Bell companies alone receive some $14 billion annually in revenues from hauling data traffic for Internet content and applications companies, Internet service providers, and other corporate and institutional users of the local network. These sums that Internet companies pay for connectivity and transport of data to and from their servers, and over the Internet backbone networks, are in addition to the $20 billion a year in fees that subscribers pay network operators for broadband access to the Internet.

<u>Senator Brownback</u>

1. How does Google define "network neutrality"?

The concept of net neutrality is straightforward: broadband providers should not be able to discriminate based on the source or ownership of Internet applications or content. The underlying rationale for net neutrality is to promote consumer choice in a highly concentrated broadband Internet access market. Obviously this fundamental concept, like many others, can be expressed by parties in different ways, using different terminology. This has led some to claim that the concept of net neutrality is vague, and even indefinable. Google believes this claim is disingenuous. Perhaps the best one-sentence definition was contained in the Snowe-Dorgan amendment that was offered in the Senate Commerce Committee markup on June 28th. That amendment read that "end users are entitled to services from each broadband Internet access provider that shall not discriminate in their carriage and treatment of Internet traffic based on the source, destination or ownership of such traffic."

2. You stated in your written testimony that "the Internet has thrived because of an overarching regulatory framework mandating nondiscrimination," and that "[i]t is time for Congress to act, by reinstating the long-standing nondiscrimination requirements for the on-ramps to the Internet."

A. *Which governmental entity or entities does Google believe should enforce nondiscrimination requirements of the type described in your testimony?*

Google believes that the Federal Communications Commission should retain regulatory jurisdiction over the practices and activities of the broadband providers, and the Federal Trade Commission and the Department of Justice should retain antitrust jurisdiction over the practices and activities of the broadband providers.

B. *What does Google believe should be the range of remedies for a breach of these requirements?*

Google believes that the range of remedies for a breach of network neutrality requirements should mirror the existing remedies available under the Communications Act (such as financial penalties, damages, and cease-and-desist orders), and the antitrust laws (such as various civil penalties, equitable relief, and structural remedies). Google also believes that the Federal Communications Commission should not be precluded from retaining its existing authority to adopt and enforce regulatory safeguards as part of its general notice-and-comment rulemaking authority.

C. *Given the fundamental objective of our nation's competition laws to maximize consumer welfare, would Google support the extension of nondiscrimination requirements to any entity – whether a network provider, a content provider, or other Internet-related business – which could potentially discriminate or does in fact block, degrade, or otherwise discriminate against a content provider that seeks to transmit its content to consumers?*

This question is based on a flawed premise: that the broadband Internet access market and the Internet-based applications and content markets are the same, and thus should be treated the same for purposes of net neutrality requirements. That premise misapprehends the form and substance of the two markets.

First, the two markets exhibit vastly different degrees of relative market concentration. The Internet marketplace for applications such as search engines, and for content such as news, is robustly competitive and only becoming more so. In the search engine market, for example, consumers can choose from among Google, Yahoo!, MSN, A9, Ask.com, and dozens of other search engines. The news content business is also enormously competitive. In fact, by all accounts, the advent of the commercial Internet in the mid-1990s has dramatically increased the range and depth of news sources. Consumers can also choose from hundreds of options for email service, from a variety of ISPs and Web portals. And, today at least, consumers can choose from among a variety of voice over IP service providers as well.

In sharp contrast, the market for consumer broadband service is highly concentrated. According to the FCC's latest figures, 99.6 percent of Americans get broadband service from either a cable company or a telephone company. Potential alternative networks, such as satellite, wireless, or broadband over powerline (BPL), collectively have only 0.4 percent of the market, a figure that has *declined steadily* since at least 1999. And the two dominant modalities only compete against each other in about half the markets, leaving consumers in the other half with either one broadband supplier or none at al.

Second, the barriers to entry in the two markets are profoundly different. In the search applications market and news content market, entry barriers are virtually nonexistent. A good idea and access to the Internet are all that is necessary to compete vigorously in the online marketplace. For example, MySpace and YouTube did not even exist two years ago; today, they are major forces in the Internet content marketplace. The news content business is also fully contestable, as demonstrated by the explosion of millions of individual blogs, on top of thousands of alternative news sites and hundreds of traditional news sources. By contrast, entry barriers are enormously high in the broadband access market. Replicating the incumbents' last-mile facilities serving consumers is prohibitively expensive. Indeed, this fact alone explains why alternative access technologies have had very limited success in the consumer broadband market.

Third, switching costs are very different as well in the Internet and broadband markets. The time and cost to change search engines is zero. If a consumer decides to use another search application, changing search engine preferences is literally a mouse click away. Similarly, in the news content market, readers can simply purchase another newspaper or news magazine, or switch to another television or radio station, or click onto another of millions of websites. In contrast, the cost of switching broadband service is significant, in those areas of the country where choice is even available. Switching broadband providers requires that a consumer purchase and install new modem equipment, install new landline connections, acquire a new ISP, and sign a new service contract. For those with access to only one provider, of course, there are no competitive options available.

Fourth, the Internet is a highly decentralized and modular network, where users ultimately can dictate what they see and do online. Because of the Internet's end-to-end design, no one entity or group of entities on the Internet can exercise control over the user experience. However, broadband Internet access today constitutes an essential "last-mile" input, without which end users cannot hope to utilize the vast resources of the Web. In Google's view, broadband networks have become communications bottlenecks, which now have the incentive and ability to impose unhealthy barriers between consumers and the freedom of the Internet.

Fifth, the regulatory environment is considerably different. Search already is subject to potential regulation. For example, the FTC has mandated the existence of clear distinctions between unbiased search returns and advertising "sponsored" sites. In contrast, the incumbent broadband providers seek to eliminate all existing consumer safeguards that govern their Internet access services, as well as avoid any regulatory or antitrust oversight of their marketplace activities.

Finally, all providers of news content – from The Wall Street Journal to MSNBC to daily bloggers – operate under the auspices of the First Amendment to the United States

Constitution, and in particular the rights of free speech and free press. Under the guaranteed protections of those constitutional rights, news content providers and aggregators exercise editorial judgments every single day about which news stories to carry, and in what way. The broadband providers are free as well to select, provide, and aggregate their own news content, and to exercise their own judgments free from governmental interference. Network neutrality only provides that the broadband providers cannot use their exclusive control over last-mile network facilities to discriminate with regard to the content and applications they are carrying to and from consumers. The phone companies do not decide the quality of your phone call depending on who you talk to; they should not decide the quality of your Internet experience based on the web sites they prefer.

Thus, the Internet applications and content market is robustly competitive, with low entry barriers, zero switching costs, decentralized controls, FTC oversight, and First Amendment protections. In contrast, the broadband access market is highly concentrated, exhibiting enormous entry barriers, significant switching costs, essential bottleneck inputs, and expiring consumer safeguards.

D. *There have been recent reports that Google, which through its Google News service is greatly expanding its strength in the market for online news aggregation (and may in fact have market power, as that term is interpreted under the antitrust laws), has selectively dropped, omitted, or blocked access to certain news articles and editorial pieces apparently based on its own internal judgment, yet included links to other similarly-situated news articles and editorial pieces. See, for instance, http://newsbusters.org/node/5477; http://michellemalkin.com/archives/001431.htm; and http://newmediajournal.us/staff/sheppard/print/05232006.htm. Are these reports true? If so, would Google consider this to be a violation of the principle of nondiscrimination? Why or why not?*

Google strongly disputes the notion that its news aggregation business somehow differentiates based on the political content or viewpoint of a particular story. Two of the blog posts cited in Question 2.D also put forth the complete falsity that Google has provided financial contributions to the MoveOn organization. While it is beyond the scope of this document to respond to every specific item in these links, Google will address the overarching allegation. We welcome the opportunity to provide a further briefing for you and your staff regarding the operation of our news service.

Google News is an online news service that draws results from a wide range of different news organizations. Because the stories are compiled solely by computer algorithms, they are selected without regard to any particular political viewpoint or ideology, enabling users to see how different organizations might report the same story. This variety of perspectives and viewpoints is unique among online news sites, and Google considers its approach essential in helping users stay informed about the issues that matter most to them.

To determine which sites to include as potential sources of news articles, Google relies on a set of guiding principles, which include whether the source: (1) offers information that is updated regularly; (2) is managed by an organization (not an individual); (3) maintains organizational information on its site; (4) does not include hate speech or pornography; (5) forbids open posting of content without editorial review; and (6) has a website that is technically conducive to inclusion. Blog-formatted sites are reviewed on a case-by-case basis to determine if they meet Google's criteria for a news organization.

Regardless, Google's source inclusion practices are not implicated in any way by the net neutrality debate. As explained in response to Question 2.C above, the broadband Internet access market and the Internet content and applications market are vastly different. Network neutrality is intended to prevent the broadband carriers from leveraging their last-mile bottleneck control in ways that discriminate against certain Internet content and applications. By design, there are no comparable bottlenecks among the content and applications providers on the Internet itself, where the First Amendment guarantees the rights of free speech and free press.

> *E.* *Would Google support the extension of nondiscrimination requirements to itself (and other content providers where relevant) in markets where it may potentially act as a bottleneck for content, such as the markets for searches, news aggregation, email, and the like?*

See response to Question 2.C above.