



Effects of the AT&T-Time Warner Transaction on Competition in the Premium Channels Industry

White Paper for the U.S. Department of Justice

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I. Introduction

Like other vertical transactions in the communications and media marketplace, AT&T Inc.'s ("AT&T") proposed acquisition ("the proposed transaction") of Time Warner Inc. ("TW") has the potential to give the merged firm both the incentive and the ability to enhance its market power and harm consumers by foreclosing rivals. We have been asked by Starz¹ to assess this issue as it relates specifically to premium channels, of which there are currently three significant competitors: HBO (owned by TW), Starz and Showtime.

Our analysis shows there is a significant likelihood that the transaction would provide the merged firm with both the incentive and the ability to foreclose Starz and other premium channels and, by so doing, drive up their costs. The result would be to lessen competition for premium channels, and potentially in both the upstream and downstream markets in which premium channels operate. Further, barriers to entry in the premium-channel industry would prevent timely entry that might otherwise mitigate the resulting competitive harms, allowing the merged firm to raise prices and earn supracompetitive profits as a result of foreclosure. Thus, consumers would pay higher prices for premium channels, and would have access to less high quality content. Economists and antitrust authorities have recognized these potential harms in similar transactions in the past, and have sought to avoid them either by placing conditions on the merged firm to prevent foreclosure or blocking the transaction altogether. Our assessment of the competitive effects of the proposed transaction suggests such remedies could be appropriate in this case as well.

The remainder of this white paper is organized as follows. Section II presents an overview of the market for video content, focusing on the role played by premium channels, the nature of the vertical value chain in which they operate, and the positions of the merging firms. Section III reviews the economic evidence as it relates to foreclosure in vertical transactions and discusses some of the transactions in which enforcement authorities have identified a significant threat to competition. Section IV presents our analysis of the competitive effects of the proposed transaction, including its effects on the market for premium channels, potential secondary effects on upstream and downstream markets, and effects on consumers. Section V presents a brief summary.

II. The Transaction's Effect on Market Structure

The value chain for the production and distribution of professional video programming consists of three levels: film studios produce content in the form of television shows and movies; television networks aggregate content; and, distributors deliver content to consumers.² All three layers exhibit economies of scale, high fixed costs, and product differentiation, meaning that virtually all suppliers have the ability to set prices above marginal costs and engage in competitive price

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² See, e.g., the Department of Justice's analysis of Comcast's acquisition of NBCUniversal. Department of Justice. Complaint, filed in the District Court for the District of Columbia. Case No. 1:11-cv-00106 (2011) at 9-15. (available at http://corporate.comcast.com/images/modified.final_judgment.pdf) (hereafter *Comcast-NBCU Complaint*).

discrimination. Further, the products at each layer are strongly complementary with those at other layers, so that suppliers at each level depend on suppliers at other layers for complementary inputs. The three levels are to some extent already vertically integrated; for example, Comcast owns NBCUniversal, and Time Warner owns both Warner Brothers (the movie studio) and HBO. The proposed transaction would bring together the largest movie studio (Warner Brothers), the largest premium channel (HBO), and the largest multichannel video programming distributor (“MVPD”) (AT&T) in a single vertically integrated firm crossing over all three layers.

The first section below describes the main participants at each level of the premium channel value chain. The second section describes the merging firms. The third section discusses the vertical relationships between the three levels.

A. Market Participants

As indicated above, the video programming market is comprised of film *studios*, *networks* and *distributors*.

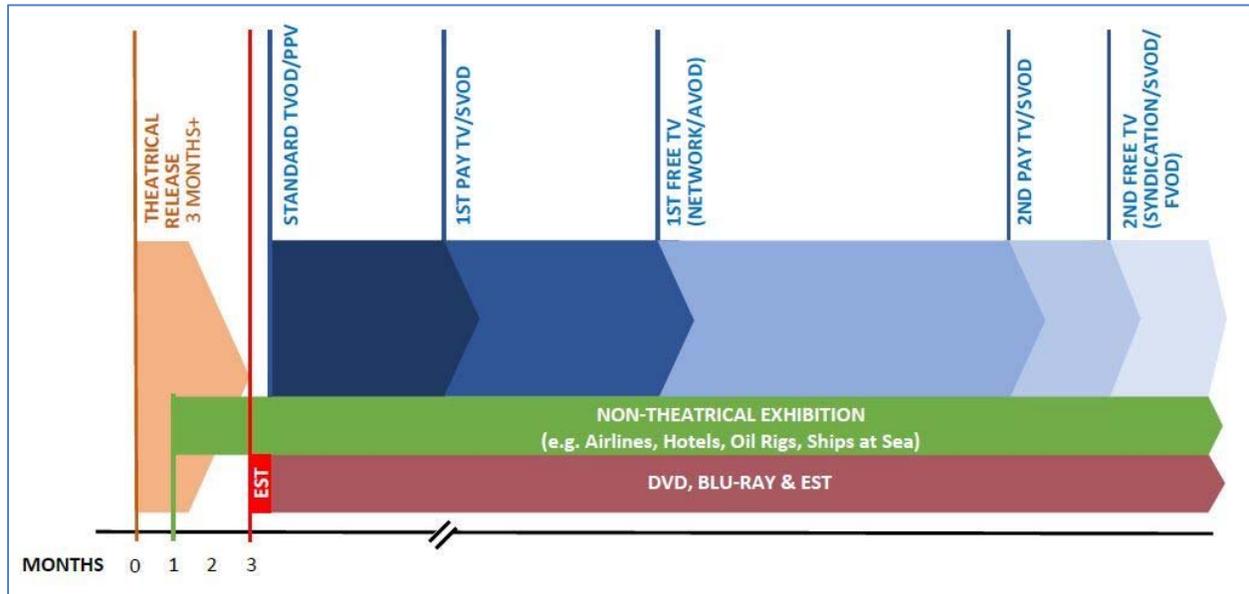
Studios produce television shows and movies and typically control how and when this content is distributed. Studios sequentially license this content to different distribution channels, a strategy which is referred to as “windowing.” Studios typically allow movies to be shown in premium channels after they have been released in theaters, DVD and video-on-demand (“VOD”), but before they have been licensed to basic cable networks or broadcast networks.³ For example, Sony has an exclusive agreement with Starz to license movies released by several of Sony’s studios until 2021.⁴ Windowing is an essential component of the competitive price discrimination strategy that allows studios to maximize the revenue generated by their content and recover the substantial fixed costs of production.⁵ The distribution windows for movies are depicted in Figure 1.

³ See, e.g., Federal Communications Commission, *Annual Assessment of the Status of Competition in the Market for the Delivery of Video Programming* (2016) at ¶134. (available at http://transition.fcc.gov/Daily_Releases/Daily_Business/2016/db0506/DA-16-510A1.pdf).

⁴ See Form 10-K for the Fiscal Year Ended March 31, 2017, Lions Gate Entertainment Corp., (2017) at 19 (available at <https://www.lionsgate.com/uploads/sec/7-12092680-1495767637.rtf>) (“Starz Networks has an exclusive long-term output licensing agreement with Sony for all qualifying movies released theatrically in the U.S. by studios owned by Sony through December 31, 2021. The Sony agreement, which began in 2001, includes all titles released under the Columbia, Screen Gems, Sony Pictures Classics and TriStar labels. Starz Networks does not license movies produced by Sony Pictures Animation. Under this agreement, Starz Networks has valuable exclusive rights to air new movies on linear television services, on-demand or online during two separate windows over a period of approximately three to seven years from their initial theatrical release. Generally, except on a VOD or pay-per-view basis, no other linear service, online streaming or other video service may air or stream these recent releases during Starz Networks’ windows, and no other premium subscription service may air or stream these releases between the two windows.”) (hereafter *Lionsgate 2017 10-K*).

⁵ See e.g., Bruce M. Owen and Steven S. Wildman, *Video Economics* (Harvard University Press, 1992) at 26-38.

**Figure 1:
Distribution Windows**



Source: Lionsgate 2017 10-K at 11. Note: Premium channels are referred to as “1st Pay TV/SVOD,” where “SVOD” stands for “Subscription Video-on-Demand.”

The largest film studios are referred to as the “big six” and include Time Warner, 21st Century Fox, Sony, Walt Disney, NBCUniversal and Viacom. Lionsgate is the next largest film studio and the largest of the so-called “mini-majors.” Time Warner and Lionsgate are vertically integrated with premium channels. NBCUniversal is the only major film studio that is vertically integrated with an MVPD (Comcast). As shown in Table 1, Time Warner is the largest studio, with 2016 revenues of \$13 billion, compared with \$2.76 billion for Lionsgate.

**Table 1:
Revenues and Profits of Major U.S. Film Studios (\$billions)**

Parent Company	Total Revenue	Domestic Gross	Profits
Time Warner	\$ 13.000	\$ 1.902	1.700
Walt Disney	9.200	3.001	2.500
21st Century Fox	8.500	1.520	1.300
Sony	8.000	0.944	0.440
NBCUniversal	6.400	1.605	0.697
Viacom	2.800	0.877	-0.364
Lionsgate	2.758	0.665	0.192

Source: Hollywood Reporter, Box Office Mojo, Lionsgate 2017 10K.

Television networks aggregate content into a linear feed that may include television shows, movies and advertisements. Television networks fall into three main categories: broadcast networks; basic cable networks; and, premium cable networks.

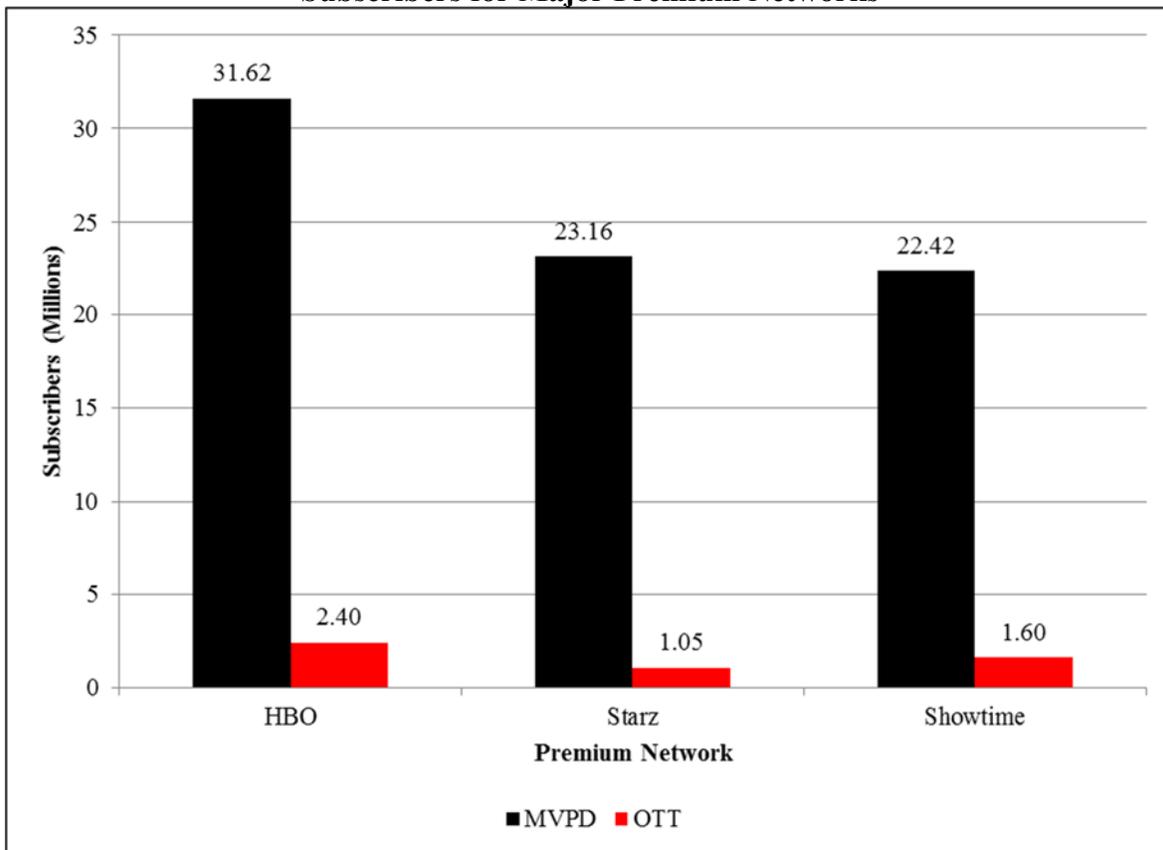
Broadcast networks, the largest of which are ABC, CBS, FOX and NBC, license their programming to television stations that broadcast it over the air as well as retransmit it to video

programming distributors. Advertising fees represent the bulk of broadcast networks' revenues, and many stations also earn retransmission consent fees from distributors.

Basic cable networks, such as AMC, the Discovery Channel, and HGTV, sell their feeds to distributors and do not broadcast it over the air. Basic cable networks "derive roughly half their revenues from licensing fees paid by distributors and the other half from advertising fees."⁶

Like basic cable networks, premium cable networks license content to distributors. The major premium networks are HBO, Showtime and Starz. Less popular premium networks include Cinemax, Epix and The Movie Channel. As shown in Figure 2, HBO is the largest of the three major premium networks, with approximately 34 million subscribers, compared with approximately 24 million for each of Starz and Showtime.

**Figure 2:
Subscribers for Major Premium Networks**



Source: SNL Kagan Premium Channel Census (2017)

From the perspective of consumers, premium networks differ from broadcast and basic networks in several important ways. First, as shown in Figure 1 above, feature films run on premium networks months or years before they run on broadcast and basic networks. In addition, premium networks offer an increasing amount of exclusive original programming, such as HBO's *Game of Thrones*.

⁶ See *Comcast-NBCU Complaint* at 11-12.

Thrones, Starz's *Power*, and Showtime's *Homeland*. Second, content on premium channels is not interrupted by commercials and is not edited for time or content. Third, retail prices for premium networks range from \$10 and \$18 per month per network, an amount which is added to their bill either on a "per channel" or ("a la carte") basis or in the form of an explicit upcharge for a bundled package.⁷ Broadcast and basic cable channels, by contrast, are not typically offered a la carte and the effective prices charged to consumers (an average of \$0.46 per month for each broadcast and basic network) are much lower than for premium channels.⁸

Because they are distinct from other networks from the perspective of consumers, premium networks play different roles from other networks in the business strategies of both upstream content creators and downstream distributors. For content creators, as noted above, premium channels constitute a distinct element of their windowing strategies, facilitating competitive price discrimination and allowing for the recovery of fixed costs. It is thus not surprising that there is significant vertical integration between studios and premium networks: TW owns HBO and Cinemax; Lionsgate Entertainment owns Starz, Starz Encore and Movieplex; and CBS owns Showtime, The Movie Channel and Flix.⁹ For MVPDs, premium channels play a key role in marketing and product differentiation strategies. For all of these reasons, industry analysts, the premium channels themselves, basic cable networks and content distributors all recognize premium channels as a distinct product category.¹⁰

Distributors deliver video programming to consumers. Traditional distributors – the MVPDs – include cable companies (e.g., Comcast), telephone companies (e.g. AT&T and Verizon), broadband service providers (e.g., Google Fiber, RCN), and direct broadcast satellite companies (e.g., Dish Network and DirecTV, which is owned by AT&T). All MVPDs provide packages that include multiple video channels, and many MVPDs also provide other services, such as telephone, internet, and VOD. Nearly 100 million U.S. customers subscribe to a traditional MVPD.

⁷ See, e.g.: DirecTV pricing at <https://www.directv.com/premiums/hbo> and <https://www.directv.com/premiums/starz>; AT&T U-verse pricing at <http://uverse.com/network/hbo?r=aHR0cHM6Ly93d3cuZ29vZ2x1LmNvbS8=> and <http://uverse.com/network/starz?r=aHR0cHM6Ly93d3cuZ29vZ2x1LmNvbS8=>; Comcast XFINITY pricing at <https://www.xfinity.com/Corporate/Learn/DigitalCable/premium-channels.html>; Spectrum pricing at <https://www.spectrum.com/cable-tv.html>; DISH Network pricing at <https://www.mydish.com/2017rates>; Verizon FIOS pricing at <https://www.verizon.com/supportresources/pdf/Fios-TV-Rates-and-Packages.pdf>.

⁸ See Federal Communications Commission, *Annual Assessment of the Status of Competition in the Market for the Delivery of Video Programming* (2017) at ¶67. (available at https://apps.fcc.gov/edocs_public/attachmatch/DA-17-71A1_Rcd.pdf) (hereafter *18th MVPD Report*)

⁹ CBS owns CBS Films, a minor film studio. See <https://www.cbcorporation.com/portfolio/cbs-films/>. It was previously owned by Viacom, but the two firms split in 2006. Public reports indicate the firms had discussions about recombining in late 2016, but those talks did not come to fruition. See e.g., <http://www.cnbc.com/2016/12/12/shari-redstone-withdraws-cbs-viacom-merger-proposal.html>.

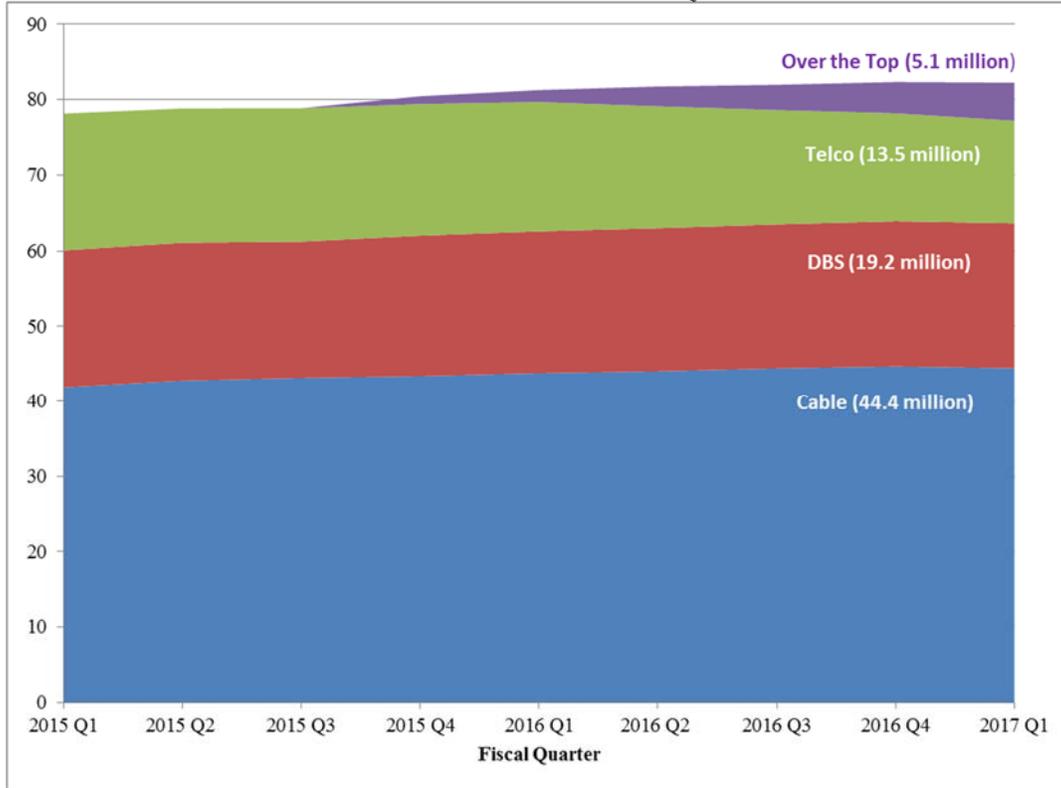
¹⁰ We have not assessed whether premium channels formally constitute a relevant antitrust market, nor is it necessary to do so. The important question for assessing the competitive effects of the proposed transaction is whether Starz and Showtime serve as a significant competitive constraint on HBO such that an increase in their costs resulting from foreclosure by AT&T would enhance HBO's market power.

MVPDs are the most important distribution channel for premium networks, accounting for 94 percent of total premium subscribers. Customers can add premium channels to basic channel packages individually (e.g., only HBO) or as part of a premium bundle (e.g., HBO, Starz, and Showtime). Premium channels receive licensing revenues from MVPDs for permission to distribute their content. These payments are typically structured either as a flat fee per subscriber or as a fixed fee that does not depend on the number of subscribers.¹¹ For example, Comcast may pay HBO \$5 for each Comcast customer that subscribes to HBO. The prices charged to consumers, either for individual premium channels or for bundles that include one or more premium channels, are set by the MVPDs. Premium networks may offer promotional incentives to MVPDs, but MVPDs determine the extent to which these incentives are passed on to subscribers in the form of lower prices.

In recent years, online video programming distributors (“OVDs”), such as Amazon, Hulu, and Netflix, have emerged as another form of video distribution. OVDs deliver programming over the internet. OVD programming includes feature films and series that originally aired on television networks as well as original series and movies. Premium channels have experimented with distributing their content over OVDs in a number of ways. For example, live streams of HBO, Showtime and Starz are available as a paid add-on to Amazon’s Channel service. In addition, some television networks, including the three major premium channels, have made efforts to deliver content directly to consumers using the Internet. As shown in Figure 3, while over the top distribution is growing, it still accounts for only about six percent of the combined subscribership for the three major premium channels, HBO, Starz and Showtime.

¹¹ See, e.g., *Lionsgate 2017 10-K* at 5.

**Figure 3:
Premium Channel Subscribers by Platform**



Source: SNL Kagan Premium Channel Census (2017)

B. The Merging Firms

In October 2016, AT&T announced that it had agreed to acquire TW in a deal valued at \$108.7 billion.¹²

AT&T became the nation’s largest MVPD in 2015 when it acquired DirecTV, combining its 5.6 million wireline video subscribers with DirecTV’s 19.8 million satellite subscribers.¹³ Table 2 shows that, as of the first quarter of 2017, AT&T serves 25.8 percent of U.S. MVPD subscribers, making it the largest MVPD in terms of subscriber share.¹⁴ Unlike Comcast and other wireline MVPDs, AT&T’s satellite distribution technology reaches nearly 100 percent of U.S. households. In acquiring DirecTV, AT&T also acquired ownership interests in video programming services, including the Game Show Network, the MLB Network and Root Sports.¹⁵

¹² See AT&T Newsroom, “AT&T to Acquire Time Warner” (October 22, 2016) (available at http://about.att.com/story/att_to_acquire_time_warner.html).

¹³ See *18th MVPD Report* at ¶68.

¹⁴ Comcast, at 23.2 percent, is the second largest; Spectrum (formerly Charter) is third with 17.7 percent,

¹⁵ See *18th MVPD Report* at Appendices B and C.

**Table 2:
Share of US Video Subscribers by MVPD**

MVPD Competitor	US Video Subscribers	
	Number	Share of Total
		----(Percent)----
DirecTV	21,012,000	21.7 %
AT&T	4,048,000	4.2
AT&T/DirecTV	25,060,000	25.8 %
Comcast	22,549,000	23.2 %
Spectrum	17,147,000	17.7
DISH Network	13,528,000	13.9
Verizon	4,681,000	4.8
Cox Communications	3,929,000	4.0
Cablevision	2,518,000	2.6
Other Competitors	7,631,725	7.9
All Competitors	97,043,725	100.0 %

Source: SNL Kagan, U.S. Multichannel Video Market Share Trends, Q1 2017.

In addition to distributing video programming as an MVPD, AT&T also operates a wireline broadband network with 14.2 million subscribers, making it the third-largest provider of wireline broadband access in the U.S. after Comcast and Charter Communications,¹⁶ and is the second-largest mobile broadband carrier in the U.S., with a 32 percent market share.¹⁷ Mobile broadband networks are an increasingly important form of video distribution, including long-form content like that carried by premium video channels.¹⁸ AT&T began emphasizing its mobile video offerings after completing its DirecTV acquisition, offering a “Data Free TV” service for AT&T mobile subscribers who also subscribe to DirecTV.¹⁹ More recently, it has begun offering customers who subscribe to its unlimited wireless data plans a free subscription to HBO.²⁰

Finally, AT&T also operates a global Internet backbone network which it uses to serve its wireless and wireline last-mile networks as well as providing business data services to small businesses and enterprise customers throughout the U.S. – including other wireless carriers and MVPDs.²¹

¹⁶ <http://www.fiercetelecom.com/telecom/at-t-centurylink-verizon-s-results-marred-broadband-losses-sizing-up-top-telcos-q2-2016> and <https://www.statista.com/statistics/217348/us-broadband-internet-susscribers-by-cable-provider/>.

¹⁷ <https://www.statista.com/statistics/199359/market-share-of-wireless-carriers-in-the-us-by-subscriptions/>

¹⁸ See e.g., <http://www.ooyala.com/about/press/long-form-video-now-most-popular-content-regardless-screen>.

¹⁹ http://about.att.com/story/att_offers_three_ways_to_stream_premium_video_content.html.

²⁰ <https://techcrunch.com/2017/04/05/atts-unlimited-plus-wireless-plan-now-includes-free-hbo/>.

²¹ Form 10-K for the Fiscal Year Ended December 31, 2016, AT&T Inc. (2017) at 6. (available at <https://otp.tools.investis.com/clients/us/atnt/SEC/sec-show.aspx?FilingId=11869124&Cik=0000732717&Type=PDF&hasPdf=1>)

TW is comprised of three divisions: HBO, the largest premium cable network with 49 million domestic subscribers (including both HBO and its sister network, Cinemax);²² Warner Bros. Entertainment, the world's largest film and television studio, whose films grossed nearly \$5 billion in global box office receipts in 2016;²³ and Turner, which owns basic cable networks including CNN, TBS and TNT that reach over 90 million U.S. households.²⁴ TW also holds a 50-percent interest in the CW, a U.S. broadcast television network.²⁵ Taken together, TW's businesses generated 2016 revenues of \$29.3 billion;²⁶ at year end, it had approximately 25,000 employees.²⁷ TW emphasizes the synergies among its three main divisions, stating in its 10-K that "Time Warner's businesses work together to leverage their strong brands, distinctive intellectual property and global scale to produce and distribute content that resonates deeply with consumers."²⁸

C. Effect of the Proposed Transaction on Market Relationships

As shown in Figure 4 below, by combining Warner Brothers, HBO and DirecTV, the proposed transaction would create the only major vertically integrated firm spanning all three levels of the premium channel value chain – content creation (studios), content aggregation (premium channels) and distribution (including broadband and wireless as well as traditional MVPD service). The merged firm would own the largest film studio, the largest premium channel, the largest MVPD and the second largest mobile broadband network in the U.S.

²² Form 10-K for the Fiscal Year Ended December 31, 2016, Time Warner Inc. (2017) at 9. (available at http://media.corporate-ir.net/media_files/priv/ccbn/event_help/smalldownload/pdf.gif) (hereafter *TW 10-K*)

²³ *TW 10-K* at 10.

²⁴ *TW 10-K* at 5-7.

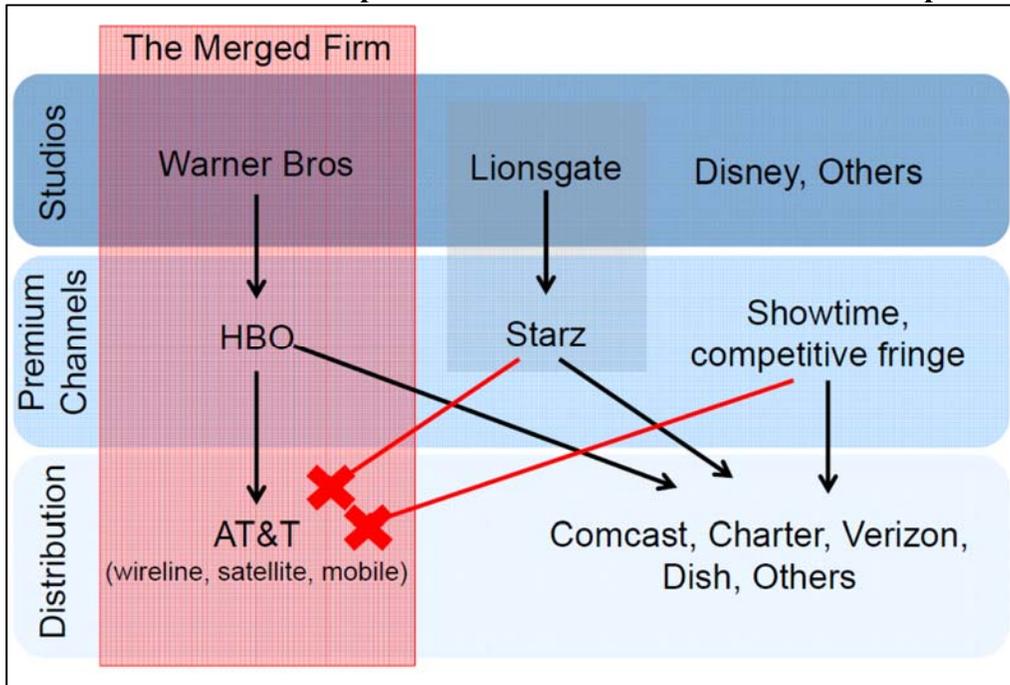
²⁵ *TW 10-K* at 14.

²⁶ *TW 10-K* at 41.

²⁷ *TW 10-K* at 2.

²⁸ *TW 10-K* at 1.

**Figure 4:
The Effect of the Proposed Transaction on Market Relationships**



The potential effect of this change on market conduct arises in part from the nature of the business relations (and underlying economic complementarities) among the components of the video content ecosystem. Specifically, because premium channels reach the vast majority of their customers through MVPDs, marketing efforts by MVPDs play a critical role in adding new subscribers and retaining existing subscribers. MVPDs market premium channels through their customer service representatives (“CSRs”), their websites and other advertising (e.g., commercials), often offering them “free” as incentives for new subscribers or renewals.²⁹ By changing their marketing activities, MVPDs can steer their customers toward certain premium channels and away from others. For example, when a customer calls a CSR to change her subscription package, the CSR may follow a script that promotes a default package including particular premium channels and excluding others.

Because MVPDs market, manage and bill premium channels directly to consumers, with no direct engagement by premium channels, Starz does not know the identity of its MVPD subscribers, nor have any way of reaching them directly in the face of MVPD foreclosure.

Today, MVPDs are not vertically integrated with premium channels and thus have incentives to promote each premium channel based on its downstream profitability (i.e., the difference between the retail price that the MVPD receives and the wholesale price that the MVPD pays to the premium channel).³⁰ By changing the vertical relationship between AT&T and HBO, at the margin

²⁹ See *18th MVPD Report* at ¶45.

³⁰ MVPDs’ current promotional and pricing incentives include their interest in preserving competition among premium channels.

the proposed transaction would change AT&T's marketing incentives because AT&T now would consider the effect of its marketing activities on its downstream profits (as it does today) as well as on both the short-term and long-term upstream profitability of HBO (which it does not do today). Specifically, AT&T would consider the long-run benefits of weakening the ability of Starz and Showtime to constrain HBO's market power against any short-run losses resulting from reduced profits from Starz and Showtime subscriptions. The long-run payoff of such a strategy would be to allow AT&T to charge higher prices for HBO its own subscribers, to other MVPDs, and ultimately to their subscribers.

III. Assessing the Competitive Effects of Vertical Transactions

The potential for vertical transactions to create or enhance the merged firms' incentives and ability to foreclose competitors by raising rivals costs is generally accepted in economic theory, supported by empirical research, and recognized in antitrust doctrine.³¹ This section explains the economic framework and evidence relating to vertical foreclosure and reviews relevant transactions in which antitrust authorities have raised concerns about vertical effects.

A. The Economics of Vertical Foreclosure

Vertical mergers potentially can harm competition and consumer welfare in several ways, including facilitating coordination, reducing potential competition (e.g., eliminating the threat of entry by one of the merging firms into the market of the other), and allowing the merged firms to evade regulation.³² One primary focus of modern foreclosure theory is the possibility that the vertically integrated firm will have the ability and incentive to raise rivals' costs by using its position in an upstream or downstream market to disadvantage non-vertically integrated competitors. Such exclusion can involve denying (or disadvantaging) the rivals' access to upstream inputs or complements, or to downstream buyers.³³ Regardless of the specific mechanism, the intended effect of the anticompetitive conduct is to raise rivals' costs either directly (by forcing them to pay higher quality-adjusted input prices) or indirectly (by denying them economies of

³¹ Modern foreclosure theory is generally attributed to the "post-Chicago" school but is now generally accepted. See e.g., Herbert Hovenkamp, "Post-Chicago Antitrust: A Review and Critique," *Columbia Bus. Law Rev.* 257 (2001) at 318-325. (available at http://heinonline.org/HOL/Page?handle=hein.journals/colb2001&div=14&g_sent=1&collection=journals) (hereafter *Hovenkamp 2001*)

³² Of course, vertical mergers can and often do generate substantial economic benefits. For a complete discussion, see generally Steven C. Salop and Daniel P. Culley, "Potential Competitive Effects of Vertical Mergers: A How-To Guide for Practitioners," *Georgetown University Law Center* (2014). (available at <http://scholarship.law.georgetown.edu/cgi/viewcontent.cgi?article=2404&context=facpub>) (hereafter *Salop and Culley 2014*); see also Massimo Motta, *Competition Policy: Theory and Practice* (Cambridge University Press, 2009) at Chapter 6.

³³ See e.g., Christodoulos Stefanadis, "Downstream Vertical Foreclosure and Upstream Innovation," *The Journal of Industrial Economic* 45;4 (1997) at 445-456. (hereafter *Stefanadis 1997*)

scale and scope).³⁴ Vertical mergers raise concerns about raising rivals costs when three closely related criteria are satisfied.

First, the vertically integrated firm must have the *ability* to foreclose effectively. Large size, high market share, low costs, high capacity, or bargaining power, for example, can increase the ability to foreclose access to either inputs or customers. These characteristics enable the vertically integrated firm to place its non-merged rivals at a competitive disadvantage. As Church discusses, “(i) the larger the market share of the downstream firm that integrates; (ii) the greater the cost differential downstream post-integration; and (iii) the more significant economies of scale upstream (fixed costs of entry), the more likely it is that a vertical merger has the ability to foreclose and impact the profits of an entrant.”³⁵ Church refers to these enabling circumstances in the context of various specific theoretical frameworks, including those of Rasmussen, Ramseyer, and Wiley,³⁶ Segal and Whinston,³⁷ and Stefanadis.³⁸ These frameworks differ with respect to the assumptions made on the degree and type of competition in the upstream and downstream market, but all assume economies of scale at least at one stage of the value chain.³⁹

The ability to foreclose can exist with respect to downstream or upstream competitors, or both. High market share or capacity of the downstream firm and broad access to a large customer base, for example, can enable the downstream entity of a merged firm to reduce or stop purchases from competitors upstream (upstream foreclosure).⁴⁰ High market share or capacity upstream on the other hand can enable the upstream part of the merged firm to stop selling its products to the non-merged downstream competitors (downstream foreclosure).⁴¹

Second, the merged firm must have the *incentive* to foreclose, i.e., the benefits to the merged firm of foreclosing must outweigh the costs of doing so. The costs of foreclosure are the lost profits from sales that are foregone as a result of foreclosure. The benefits include additional profits from being able to charge higher prices to the existing customer base, the profits from new customers

³⁴ See Steven C. Salop and David T. Scheffman, "Raising Rivals' Costs," *The American Economic Review* 73;2 (1983) at 267-271. Salop and Scheffman show that strategies to raise rivals' costs do not necessarily require classical market power, explain that such strategies can be profitable for the merged entity even if the rival does not exit from the market, and demonstrate that "cost-increasing strategies tend to cause price increases, which are welfare reducing."

³⁵ Jeffrey R Church, *The Impact of Vertical and Conglomerate Mergers on Competition* (2004). (available at: http://works.bepress.com/jeffrey_church/13/). (hereafter *Church 2004*)

³⁶ E.B. Rasmussen, J. M. Ramseyer, and J. S. Wiley, Jr., "Naked Exclusion," *The American Economic Review* 81 (1991) at 1137-45.

³⁷ I. R. Segal and M. D. Whinston, "Naked Exclusion: Comment," *The American Economic Review* 90 (2000) at 296-309.

³⁸ Christodoulos Stefanadis, "Selective Contracts, Foreclosure, and the Chicago School View." *Journal of Law and Economics* 41 (1998) at 429-50.

³⁹ The models Church (2004) discusses include models in which the downstream market is competitive, duopolistic, or oligopolistic. See *Church 2004*.

⁴⁰ See e.g., *Stefanadis 1997*.

⁴¹ See e.g., *Stefanadis 1997*.

who switch from the foreclosed company to the merged firm, and perhaps in the longer-run the deterrence of potential entry.

Incentives to foreclose are increased in the presence of economies of scale or scope, which benefit the foreclosing firm by lowering its costs (and increasing its margins) as it gains share. Network effects can also incentivize foreclosure. The more customers an integrated downstream firm has and can acquire, for example, the more attractive it becomes for producers of complementary products to affiliate with the downstream platform. The presence of economies of scale and scope also increases the incentive to foreclose by raising rivals' average costs and thus reducing their ability to compete on price. At the extreme, foreclosure can deny competitors or potential competitors the ability to achieve the minimum efficient scale of operation: Entry can be prevented altogether "if an entrant is not able to capture sufficient market share downstream."⁴²

Third, relatedly, there must be *competitive effects*. While the vertically integrated firm benefits from increased sales to a growing customer base, the non-integrated firms face the reverse: a smaller customer base, higher marginal and/or average costs, and reduced incentives to invest. By raising the marginal and/or average costs of rivals, the integrated firm can force them to raise prices, reducing the competitive constraints they impose on the integrated firm, or even force rivals to exit.⁴³ For the integrated firm, the higher prices facilitated by reduced competitive constraints imply quasi rents or monopoly profits.⁴⁴ As Hovenkamp explains, the ultimate effect of vertical mergers that facilitate foreclosure is to put rivals in a position where their "profit maximizing price is higher after the merger than it was before. The integrating firm can then raise its own price as well."⁴⁵

Figure 5 illustrates how foreclosure affects a competitive firm (Firm A) that has decreasing average costs in a differentiated industry. Before foreclosure, the firm faces the demand curve labeled D_1 and charges a price of P_1 determined by the intersection of D_1 and the firm's long-run average cost.⁴⁶ Foreclosure from some customers has the effect of shifting the firm's demand curve inward from D_1 to D_2 so that the firm can sell fewer units at a given price. With the new demand curve, the firm has to increase its price to P_2 in order to cover long-run average cost.

⁴² See *Church 2004* at xix.

⁴³ See also *Church 2004*.

⁴⁴ See generally Michael H. Riordan and Steven C. Salop "Evaluating Vertical Mergers: A Post-Chicago Approach," *Antitrust Law Journal* 63 (1995) at 513–568; Christopher M. Snyder, "Empirical Studies of Vertical Foreclosure," *Industry Economics Conference Papers and Proceedings* 95/23 (1995) at 98-127; Michael A. Salinger "Vertical Mergers and Market Foreclosure," *The Quarterly Journal of Economics* 103/2 (1988) at 345-356; Patrick Bolton and Michael D. Whinston. "Incomplete Contracts, Vertical Integration, and Supply Assurance," *The Review of Economic Studies* 60/1 (1993) at 121-148; and Oliver Hart and Jean Tirole "Vertical Integration and Market Foreclosure," *Brookings Papers on Economic Activity* (1990) at 205–276.

⁴⁵ See *Hovenkamp 2001*.

⁴⁶ Equilibrium price equals long-run average cost in the economic model of firm behavior called monopolistic competition. This model involves competition by differentiated firms that can freely enter and exit. If price falls below long-run average cost, firms will exit, driving price up, while prices above long-run average cost attract entry, driving price down. See Robert S. Pindyck and Daniel L. Rubinfeld, *Microeconomics*, 6th ed. (Pearson Prentice Hall, 2005) at 436-439.

**Figure 5:
Effect of Foreclosure on Foreclosed Firm**

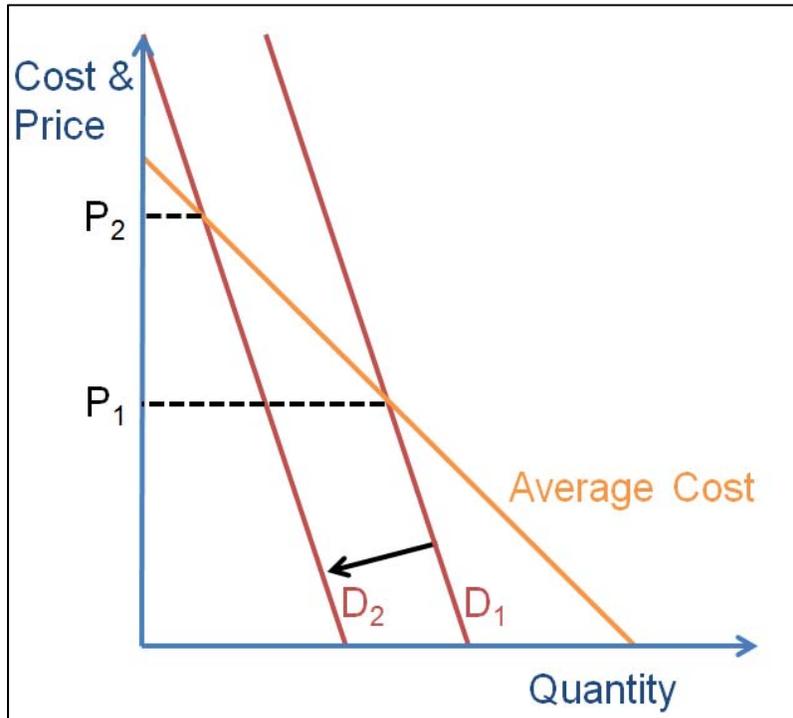
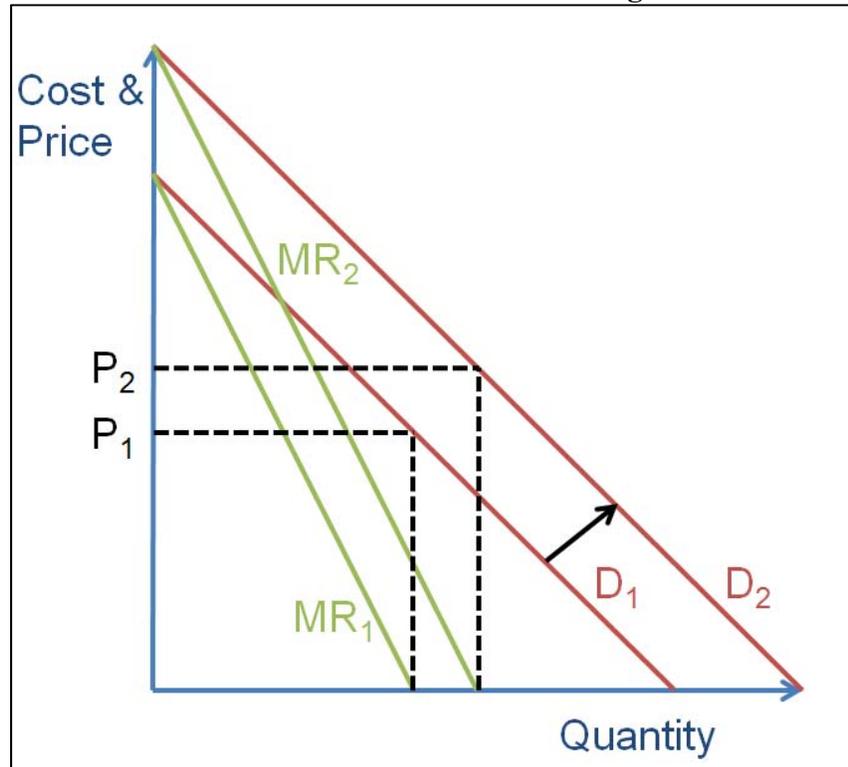


Figure 6 illustrates how the upstream segment of the foreclosing firm (Firm B) benefits from foreclosure. Before foreclosure, the firm faces the demand curve labeled D_1 and chooses the price P_1 such that the firm's marginal revenue (shown by the line labeled MR_1) equals its marginal cost, which we assume to equal zero.⁴⁷ By foreclosing Firm A and increasing Firm A's cost and price, Firm B is able to shift out its own demand curve from D_1 to D_2 . As a result, Firm B's marginal revenue curve also shifts out from MR_1 to MR_2 . Firm B will choose the new higher price of P_2 such that marginal revenue equals marginal cost. Consumers are harmed because they face higher prices from both Firm A and Firm B.

⁴⁷ The same type of results would also hold with positive marginal costs.

**Figure 6:
Effect of Foreclosure on Foreclosing Firm**



Importantly, foreclosure strategies do not need to completely foreclose rivals to have harmful competitive effects. As Salop and Culley explain, “Foreclosure is substantial if it significantly increases the costs or restricts the output of the targeted victim, and its ability to expand in a cost-efficient way. Foreclosure thus can be substantial even if the rivals remain viable and even if they can achieve minimum efficient scale of production.”⁴⁸

Empirical research on vertical relationships in media markets confirms the potential for foreclosure. For example, Waterman and Weiss (1996) find that vertical integration between multiple-system operators (“MSOs”) and pay channels in the late 1980s market (when Time, Inc. and Viacom owned both pay channels and MVPDs) resulted in both reduced carriage and reduced subscribership for unaffiliated pay channels.⁴⁹ Similarly, Suzuki (2009) finds that the merger

⁴⁸ See *Salop and Culley 2014* at 14. Conversely, as Salop and Culley also note, “even if the simple foreclosure rate is high, rivals may not be significantly disadvantaged in the market if they have sufficient cost effective alternatives.” See also *Hovenkamp 2001* at 324 (“[I]n the post-Chicago literature ‘foreclosure’ generally means raising rivals’ costs, not outright market exclusion. Rivals are simply placed in a position where their profit-maximizing price is higher after the merger than it was before. The integrating firm can then raise its own prices as well.”)

⁴⁹ Waterman and Weiss find that vertical integration between pay cable programming networks and cable systems has substantial effects on final market outcomes. They show that integrated cable systems tend to carry their affiliated networks more frequently and rival networks less frequently than did the average nonintegrated system. The authors also find that, accounting for differences in carriage, integrated systems tended to ‘favor’ their affiliated

between Time Warner and Turner Broadcasting resulted in foreclosure of unaffiliated content.⁵⁰ Chipty (2001) reaches a similar conclusion, though she attributes the foreclosure primarily to efficiency effects.⁵¹

B. Enforcement Activity Involving Vertical Mergers in Communications Markets

U.S. enforcement agencies have long embraced vertical foreclosure theories, including and especially in cases involving mergers in communications and media markets – several of which have involved Time Warner. Salop and Culley identify 48 vertical enforcement actions by U.S. agencies between 1994 and 2015, including AT&T/McCaw Cellular (1994), TCI/Liberty Media (1994), Thomson Corp./West Publishing (1996), Time Warner/Turner Broadcasting (1997), AOL/Time Warner (2002), and Comcast/NBCU (2011).⁵² More recent transactions that have raised vertical concerns include Comcast-TWC-Charter (2015), AT&T-DirecTV (2015), and Charter-TWC-Brighthouse (2016).⁵³ As the following examples indicate, the circumstances that have raised concerns in these cases bear significant similarities to the proposed AT&T-Time Warner transaction.

The 1997 merger of Time Warner and Turner Broadcasting had both horizontal and vertical aspects, and raised issues of both upstream and downstream foreclosure. Specifically, the FTC raised concerns that Time Warner Cable, as both a leading producer of cable programming and one of the largest MVPDs could refuse to carry Fox News or MSNBC (two upstream suppliers), which were competitors to Turner's CNN network, and/or raise the price of Time Warner and Turner cable programming to rival MVPDs. The Consent Decree required Time Warner to not bundle its

networks in terms of price and marketing. See David Waterman and Andrew A. Weiss, “The Effects Of Vertical Integration Between Cable Television Systems and Pay Cable Networks,” *Journal of Econometrics* 72/1 (1996), at 357-395. (available at [http://dx.doi.org/10.1016/0304-4076\(94\)01726-3](http://dx.doi.org/10.1016/0304-4076(94)01726-3))

⁵⁰ Suzuki conducts an event study on the vertical merger between Turner Broadcasting and Time Warner in the cable television industry. The author assesses the effects of the merger on Time Warner’s final prices, subscriptions, and carriage and marketing decisions. The analysis finds that foreclosure in Time Warner markets is observed for the non-integrated rival channels upstream. Second, the Turner Broadcasting channels that increased market shares because of this merger appeared to be foreclosed by cable distributor Time Warner prior to the merger. Efficiency gains from the merger were not passed on to consumers. See Ayako Suzuki, “Market Foreclosure and Vertical Merger: A Case Study of the Vertical Merger Between Turner Broadcasting and Time Warner,” *International Journal of Industrial Organization* 27;4 (2009) at 532-543. These effects occurred despite conditions placed on the merger as a condition of approval; see discussion *infra*.

⁵¹ See also Tasneem Chipty, "Vertical Integration, Market Foreclosure, and Consumer Welfare in the Cable Television Industry," *The American Economic Review* 91/3 (2001) at 428-453.

⁵² Steven C. Salop and Daniel P. Culley, "Vertical Merger Enforcement Actions: 1994–2015," *Georgetown Law Faculty Publications and Other Works* 1529 (2015). (available at <http://scholarship.law.georgetown.edu/facpub/1529>) (hereafter *Salop and Culley 2015*).

⁵³ For a discussion of these, see Jeffrey A. Eisenach, “US Merger Enforcement in the Information Technology Sector,” in Roger Blair and Daniel Sokol, Eds., *Handbook of Antitrust, Intellectual Property and High Tech* (Cambridge University Press, 2017) at 445-466.

own programming with Turner programming, to offer Turner programming to rival MVPDs at its pre-merger price, and to carry at least one rival network to CNN on Time Warner's cable systems.⁵⁴

The 2011 merger of Comcast and NBCU was primarily a vertical transaction involving the acquisition by what was then the nation's largest MVPD of one of its largest providers of video content. The main concern was that the merged firm would have increased ability and incentives to: a) raise prices for its video programming to disadvantage its MVPD rivals; and, b) hinder the development of rival online offerings and competition from OVDs.⁵⁵ To address the competitive concerns, significant conduct remedies were imposed, including requiring the merged firm to make content available to competing cable companies and OVDs on non-discriminatory terms, and preventing Comcast from discriminating against OVDs' traffic in its provision of broadband services.⁵⁶

Vertical issues were again of concern when Comcast sought to purchase Time Warner Cable (TWC), a transaction that also involved a structured divestiture to Charter Communications. While the transaction was primarily horizontal, combining the largest U.S. MVPD with the fourth largest (Time Warner Cable), the main competition concerns were vertical, revolving around Comcast's ownership of programming (NBCU). Thus, despite the fact that the companies did not compete in the downstream market for video distribution (because they served different geographic areas), the reviewing agencies opposed the transaction due mainly to concerns that the merger would have strengthened Comcast's ability to raise the costs of OVDs.⁵⁷ The parties ultimately withdrew their application.

The Charter-TWC transaction involved the acquisition by Charter Communications – then the nation's sixth largest MVPD – of the fourth largest, TWC. While the transaction was essentially horizontal (though again the companies served different geographic areas), the agencies' primary concerns again revolved around vertical issues, i.e., that the combined firm would have an increased incentive and ability to discriminate against actual and potential competitors, primarily OVDs.⁵⁸ The agencies imposed stringent conditions, preventing New Charter from engaging in a

⁵⁴ See *Salop and Culley 2015*.

⁵⁵ See the FCC's order in Comcast-NBCUniversal. Federal Communications Commission. Memorandum Opinion and Order, Applications of Comcast Corporation, General Electric Company and NBC Universal, Inc. Before the Federal Communications Commission. MB Docket No. 10-56 (2011) at ¶3. (available at https://apps.fcc.gov/edocs_public/attachmatch/FCC-11-4A1.pdf) (hereafter *Comcast-NBCU Order*)

⁵⁶ Scott Sher, and Kellie Kemp, "A Comparative Analysis of the Use of Merger Remedies in Technology Industries," *CPI Antitrust Chronicle* (2014) and Steven C. Salop and Daniel P. Culley, "Revising the US Vertical Merger Guidelines: Policy Issues and an Interim Guide for Practitioners," *The Journal of Antitrust Enforcement* 4/1 (2016) at 1-41.

⁵⁷ Renata Hesse, Remarks at Global Competition Review (2016). (available at <https://www.justice.gov/opa/speech/principal-deputy-assistant-attorney-general-renata-b-hesse-delivers-remarks-global>),

⁵⁸ The FCC found that "Because of New Charter's increased MVPD and broadband footprint, and its increased number of homes passed, it will capture a greater share of the benefits that would accrue to MVPDs should New Charter take actions that reduce the competitive viability of OVDs. For the reasons stated above, we find that New Charter is likely to have a greater incentive to take such actions following the transaction." See the FCC's order on Charter-TWC. Federal Communications Commission. Memorandum Opinion and Order, Applications of Charter

variety of practices they believed to be potentially anticompetitive, including imposing data caps on broadband services, charging interconnection fees to OVDs and other online content providers, and entering into contracts with content providers limiting OVD's access to content.⁵⁹

The issue of OVD foreclosure also arose in the agencies' review of AT&T's acquisition of DirecTV. The merger involved both horizontal and vertical aspects, with the primary vertical dimension involving the combination of AT&T's broadband business with DirecTV's video business. The agencies expressed concerns that the transaction would enhance the firms' incentives to "hamper competition from online video content or online video distribution services," and imposed restrictions preventing "discriminatory usage-based allowances" and requiring mandatory review of its interconnection agreements with OVDs.⁶⁰

While each of these transactions is unique, they all share three common themes: (1) They involve media markets like the ones at issue here, where product differentiation, economies of scale and scope, and complementarities among inputs from competing firms raise the likelihood that foreclosure strategies can succeed; (2) the enforcement agencies concluded that the proposed transactions did indeed increase the incentive and ability of the merging firms to engage in conduct that would raise the costs of actual or potential rivals and result in consumer harm; and (3) the agencies either disapproved the transaction or conditioned their approval on material but practical conduct remedies.

IV. Competitive Effects of the Proposed Transaction

Like the transactions described above, the acquisition of TW by AT&T directly affects both the ability and the incentive of the combined firm to engage in anticompetitive conduct which would both harm competition and reduce consumer welfare. Indeed, the potential for anticompetitive effects exists in all three of the sectors that comprise the premium channel value chain. The primary effects would be most likely to occur in the premium channel sector itself, where AT&T would very likely have both the ability and the incentive to deny or diminish the ability of HBO's competitors (primarily Starz and Showtime) to reach the 25.8 percent of MVPD subscribers who currently receive their video content from AT&T. Secondary (but still significant) effects could also occur downstream to the extent AT&T used HBO's enhanced market power to disadvantage its MVPD competitors. Competitive effects could also arise upstream, if AT&T chose to impede the ability of studios which compete with Warner Brothers to engage effectively in premium

Communications, Inc., Time Warner Cable Inc., and Advance/Newhouse Partnership. Before the Federal Communications Commission. MB Docket No. 15-149 (2016) at ¶47. (available at https://transition.fcc.gov/Daily_Releases/Daily_Business/2016/db0510/FCC-16-59A1.pdf) (hereafter *Charter-TWC Order*)

⁵⁹ See *Charter-TWC Order* at ¶¶9-11.

⁶⁰ See the FCC's order on AT&T-DirecTV. Federal Communications Commission. Memorandum Opinion and Order, Applications of AT&T Inc. and DIRECTV. MB Docket No. 14-90 (2015). (available at https://apps.fcc.gov/edocs_public/attachmatch/FCC-15-94A1_Rcd.pdf)

content windowing. The potential effects of the transaction in each of these three sectors are described below.⁶¹

A. Competitive Effects on the Premium Channels Sector

This section assesses: (1) the post-merger firm's ability to foreclose Starz (and, by extension, Showtime) from a significant portion of its customer base; (2) whether the effect of such foreclosure would significantly reduce Starz's effectiveness as a competitor to other premium channels; and, (3) how a reduction in Starz's competitiveness would affect the market power of other premium channels (i.e., HBO). Based on these three factors, we also evaluate whether the post-merger firm would have the incentive to engage in anticompetitive foreclosure of Starz.

1. AT&T's Ability to Foreclose

A prerequisite for anticompetitive customer foreclosure is that the vertically integrated firm must have the ability to foreclose the upstream firm from a significant share of customers.⁶² This section demonstrates that AT&T has that ability as it relates to Starz.

At the extreme, AT&T could completely foreclose Starz by discontinuing carriage. This would make it impossible for Starz to reach customers through AT&T's MVPD platform. AT&T could also restrict Starz's access to AT&T's customers through less drastic measures, including increasing the subscription rate for packages that include Starz or decreasing AT&T's marketing of Starz, including efforts by its customer service representatives. Both of these methods would be effective at reducing Starz's subscriber base. For example, an internal Starz survey shows that increasing the subscription price for Starz while holding the price of other premium channels constant would reduce the number of Starz subscribers and increase the number of subscriptions to HBO and Showtime. When Starz was renegotiating its affiliate agreement with DirecTV in 2014, DirecTV withdrew its marketing support for Starz. Without DirecTV's support, the monthly number of DirecTV customers that added a Starz subscription ultimately declined by █ percent.

Foreclosure by AT&T would affect a substantial fraction of Starz's business. AT&T subscribers represent approximately █ percent of Starz's customer base and █ percent of all MVPD subscribers.⁶³ These numbers exceed downstream market shares in several prior cases that have raised customer foreclosure concerns. For example, the FCC concluded that foreclosure of Bloomberg TV from Comcast's 24 percent of MVPD subscribers would be anticompetitive.⁶⁴ Similarly, the FTC concluded that foreclosure of rivals to CNN from Time Warner Cable's 17

⁶¹ In conducting our analysis, we rely primarily on publicly available data, supplemented to a limited extent by internal data provided by Starz. We do not have access to competitor information (e.g., from AT&T or TW) which would further illuminate several key issues.

⁶² As noted above, the question of what is "significant" turns on whether the foreclosure has a sufficient impact on rivals to lessen their ability to discipline prices.

⁶³ Internal Starz data show that AT&T and DirecTV together accounted for █ million Starz subscribers in March of 2017. See █. In the same month, SNL Kagan estimated that Starz had 24.2 million total paid subscribers. See SNL Kagan, *Premium Channel Census* (2017).

⁶⁴ See *Comcast-NBCU Order* at ¶116.

percent of MVPD subscribers would be anticompetitive.⁶⁵ In both of these cases, the government imposed behavioral remedies to prevent customer foreclosure. While foreclosure shares are not determinative of competitive effects, these examples show that the scope for potential foreclosure in the current transaction is consistent with (indeed, exceeds) thresholds applied in prior media market transactions.

Starz could attempt to circumvent AT&T's foreclosure strategy in two ways. First, Starz could attempt to induce AT&T customers to switch to another MVPD. Second, Starz could attempt to serve these customers through its OTT service or in a partnership with an OVD. The available evidence suggests that neither of these tactics is likely to be effective.

MVPD subscribers are unlikely to switch providers in order to receive Starz. According to a February 2017 survey conducted by SNL Kagan, 26 percent of MVPD households have never switched providers, and another 42 percent have been with their current provider for over two years.⁶⁶ Only 18 percent of households have switched providers within the last year. The most common reasons for switching relate to price and quality of service. The ability to get channels not offered by the previous provider is only the seventh most common reason for switching, mentioned by just 14 percent of switchers. As noted above, when DirecTV withdrew marketing support for Starz during a contract dispute, the Starz sign-up rate declined precipitously. There is no evidence, however, that DirecTV subscribership suffered.

Bypassing AT&T through OTT or OVD distribution is also unlikely to be successful. As noted above in Figure 2, despite significant efforts to move subscribers to its OTT service, Starz has only been able to enroll approximately one million combined OTT and OVD subscribers compared to the more than 23 million MVPD subscribers who receive Starz through MVPDs. Indeed, in March 2017, more than ██████████ as many subscribers received Starz through AT&T alone than through an OTT or OVD service.⁶⁷ There are several possible reasons for this outcome, including the likelihood that MVPDs can acquire customers for Starz at significantly lower cost than Starz can on its own, and the fact that Starz's ability to expand its OTT customer base is impeded by affiliate agreements between Starz and several major MVPDs that prevent it from offering its OTT service at a lower price than the typical MVPD package. Starz's ability to market to its current AT&T subscriber base is further limited because it does not know the identities of these subscribers. Taken together, these facts suggest that Starz would not be able successfully to bypass any significant level of AT&T foreclosure by going "over the top."⁶⁸

⁶⁵ See the FTC's complaint in Time Warner-TBS. Federal Trade Commission. Complaint, In the Matter of Time Warner Inc., Turner Broadcasting System, Inc., Tele-Communications, Inc., Liberty Media Corporation. Docket No. C-3709 (1997) at ¶5. (available at <https://www.ftc.gov/sites/default/files/documents/cases/1997/02/c3709cmp.pdf>)

⁶⁶ Keith Nissen, "US Consumers Switching Multichannel Service Providers Remarkably Steady," SNL Kagan, June 13, 2017.

⁶⁷ See ██████████.

⁶⁸ It is also significant that Starz does not currently have a direct relationship with, or even know the identities of, its MVPD subscribers, all of whom contract for their Starz service through their MVPDs.

2. Effects of Foreclosure on Starz

Foreclosure of AT&T customers would have a significant effect on Starz's ability to compete as a premium channel. In the 2017 fiscal year, Starz generated \$1,374.8 million in revenue and earned \$473.7 million in profits.⁶⁹ Approximately \$[REDACTED] million of this revenue came from AT&T.⁷⁰ With the exception of marketing support paid to its affiliates, virtually all of Starz's costs are fixed with respect to the number of customers. Thus, if Starz maintained its current level of spending (including on licensed and original content) while losing all revenue from AT&T, its annual profits would fall to approximately \$[REDACTED] million, while its annual segment costs would fall to approximately \$[REDACTED] million (a reduction of only [REDACTED]). In other words, its segment operating margin (profit as a percentage of costs) would be approximately [REDACTED] percent, which is far lower than the weighted average cost of capital of 9.0 percent for television broadcasting station companies.⁷¹ The segment operating margins must also help defray significant corporate expenses that Lionsgate does not allocate to the segment level, which included \$115.2 million in interest expenses, \$92.5 million in corporate general and administrative expenses, and \$75.5 million in share-based compensation expenses, among other things.

Losing AT&T's subscribers would also increase Starz's average cost per subscriber by approximately [REDACTED] percent.⁷² If Starz acts as a price taker that sets price equal to its long-run average cost, then the increase in average cost would require Starz to increase the fees that it charges to MVPDs to stay in business. MVPDs would in turn pass a portion of these increased fees on to consumers in the form of higher subscription rates as they have done with other increases in programming costs.⁷³ Higher subscription rates for Starz (and other premium channels) would harm consumers.

By driving Starz's operating margin below its weighted average cost of capital, complete foreclosure by AT&T would make exiting the Starz business an attractive option for Lionsgate at current levels of content spending, thereby eliminating altogether the competitive pressure that Starz currently exerts on HBO and other premium channels.⁷⁴

Alternatively, Lionsgate could seek to achieve an acceptable return by reducing its level of spending on content. This would reduce the quality and/or quantity of Starz's content and thus also

⁶⁹ *Lionsgate 2017 10-K* at 74.

⁷⁰ Based on internal Starz financial data.

⁷¹ Average SIC composite weighted average cost of capital for SIC 4833 (television broadcasting station) based on eight measures calculated by Duff & Phelps. Duff & Phelps, *2017 Valuation Handbook – U.S. Industry Cost of Capital* (Wiley, 2017).

⁷² Calculated as [REDACTED].

⁷³ "MVPDs have used different strategies to deal with increased programming costs. A common strategy involves raising prices for video packages. SNL Kagan notes that MVPDs have raised the prices of video packages 3 to 4 percent annually since 2004, but explains that recent price increases have fallen behind programming costs, which rose 7.1 percent in 2013, 6.8 percent in 2014, and 8.1 percent in 2015." *18th MVPD Report* at ¶48.

⁷⁴ See *Lionsgate 2017 10-K* at 19 ("For the fiscal year ended March 31, 2017, revenue earned under affiliation agreements with AT&T (including DIRECTV) accounted for at least 10% of Lionsgate's revenue, on a pro forma basis as if the Starz Merger and our segment reorganization occurred on April 1, 2016.")

weaken Starz's competitive position in the premium industry and its ability to discipline the quality-adjusted prices of competitors, including HBO.

Even if AT&T did not completely foreclose Starz, a significant reduction in the number of AT&T customers who subscribe to Starz would still affect Starz's pricing and/or its spending on content. Lionsgate views spending on content as an investment and uses a discounted cash flow methodology to value such investments. By reducing both the number of existing subscribers that could be retained and the number of new subscribers that could be gained, significant foreclosure by AT&T would lower Starz's return on investments in content. At lower returns it is likely that some investments that would be profitable today would no longer be profitable after the proposed transaction.

3. AT&T's Incentive to Foreclose

To assess whether AT&T would have the incentive to foreclose Starz, we need to compare AT&T's costs and benefits of foreclosure. As a first approximation, the costs are equal to the profits that AT&T would forego by selling fewer Starz packages to its customers, while the benefits are equal to the additional profit from selling HBO on AT&T and to other MVPDs that could be earned as a result of enhanced market power.

In March 2017, Starz estimates that AT&T earned approximately \$[REDACTED] million in revenues from selling subscriptions to Starz and Encore and paid Starz approximately \$[REDACTED] million in net fees, resulting in a profit of approximately \$[REDACTED] million.⁷⁵ Thus AT&T would lose \$[REDACTED] million in monthly profits from Starz packages were it to completely foreclose Starz.

In order to offset these losses, AT&T would need to increase its monthly profits by \$[REDACTED] million or more. Such an increase could come from the ability to charge higher prices for HBO, or from increasing subscribership and/or prices for HBO's companion channel, Cinemax, which currently has about 15 million subscribers.

Based on its combined domestic subscriber base of 49 million, AT&T could fully recoup the foregone profits from foreclosing Starz by increasing average monthly profits per subscriber for HBO and Cinemax by \$[REDACTED], which is equivalent to approximately [REDACTED] percent of the blended average list price.⁷⁶ If HBO/Cinemax was able to significantly increase its customer base as a result of foreclosing Starz (e.g., by switching Starz customers to Cinemax), it could recoup the costs with much smaller price increases. For example, if the two networks gained a combined total of two million additional customers (less than 10 percent of Starz's subscriber base) and earned monthly profits of \$5 for each of these new customers, then AT&T would only need to increase monthly profits per subscriber for existing customers by \$[REDACTED]. We do not have access to the financial information from HBO or the information on switching rates between Starz and HBO maintained

⁷⁵ Estimates based on Starz's estimates of average subscription rates received by AT&T and DirecTV for Starz and Encore subscriptions as well as subscriber counts and effective rates reported in [REDACTED].

⁷⁶ Based on a typical monthly list price of \$15 for HBO and \$10 for Cinemax and the SNL Kagan's estimates of subscribers for each network as of March 2017, a weighted average list price for the networks is \$13.43.

by AT&T and other MVPDs that is needed for a precise assessment of recoupment. However, given the modest price increases and customer gains that would be required and the apparent closeness of competition between Starz and HBO, it seems likely that AT&T could recoup the cost of foreclosing Starz. The DOJ case team investigating this transaction has access to proprietary information from HBO, AT&T and other MVPDs and should make its own assessment of these incentives.⁷⁷

The evidence also suggests that AT&T's foreclosure strategy would not be defeated by new entry, at least not within a relevant time period. The premium channel industry is characterized by significant barriers to entry, including the need to build consumer acceptance and to procure licenses to premium content, which typically are subject to long-term exclusive licensing agreements.⁷⁸ There have been numerous efforts to launch new premium channels in recent years, none of which have succeeded.⁷⁹ Most recently, beginning in 2009, Lionsgate partnered with MGM and Viacom in an attempt to create a fourth premium channel called Epix. As a recent analyst report explained, despite being "uniquely positioned to exploit the studios' theatrical content...Epix has still faced an uphill battle to gain distribution and build subscribers since launch."⁸⁰ Eight years after launch, Epix has only 8.8 million subscribers compared with nearly 34 million for HBO and 24 million for Starz.⁸¹ Further, if the proposed transaction were consummated, new entrants would face the additional hurdle of AT&T's foreclosure strategies.

Taken together, this evidence indicates that AT&T could reasonably expect to recoup any lost profits associated with its foreclosure strategy.⁸² Importantly, increases in the fees that AT&T

⁷⁷ As noted below, AT&T could also benefit from its ability to use HBO's enhanced market power to foreclose rivals in the MVPD market. These secondary benefits also need to be considered in assessing AT&T's incentives.

⁷⁸ As noted above, Starz has an exclusive agreement with Sony for the distribution of its feature films which lasts through 2021. And while Netflix is not a premium channel, it also faced the challenge of long-term contracts when it sought to license Disney content. In 2012, Netflix outbid Starz for exclusive "premium window" access to Disney feature films in 2012, but the deal did not become effective until 2016. See <http://money.cnn.com/2012/12/04/technology/netflix-disney/index.html>. It appears that no comparable agreements (i.e., between major studios and OVDs for premium window content) have been signed since.

⁷⁹ See e.g., Boyar Research, "Starz" (2014) at 24 ("In our view, there are significant barriers to entry into the premium pay TV industry. These include the difficulty of gaining distribution and marketing relationships; large upfront programming investment requirements necessary to support a premium subscription service, which typically includes premier film rights; and the importance of consumer brand recognition in building a subscriber base. For decades, the U.S. premium pay TV field has essentially consisted of HBO, Showtime, and Starz alongside their respective secondary networks including Cinemax, The Movie Channel and Flix. Other premium pay TV network start-ups over the years were primarily launched by the incumbents and failed to gain traction (e.g., Spotlight, Home Theatre Network) or eventually converted to lower-tier, ad-supported networks like Sundance.") (hereafter *Boyar Report*).

⁸⁰ See *Boyar Report* at 24. Epix's profitability has been buoyed by content licensing deals with Netflix and Amazon and the Company recently gained carriage with Time Warner Cable, but Epix has still faced an uphill battle to gain distribution and build subscribers since launch.")

⁸¹ SNL Kagan Premium Channel Census (2017)

⁸² One argument that may be advanced in defense of the proposed transaction is that it would eliminate double marginalization. There are several reasons why this argument cannot overcome the potential for anticompetitive effects we have identified.

earns from licensing HBO as a result of foreclosure would likely be passed on to a significant extent by MVPDs in the form of higher subscription rates, thereby directly harming consumers.

B. Competitive Effects in the Distribution Market

The transaction would also potentially enable the combined firm to reduce competition in the downstream market for video distribution. This could be accomplished by either withholding content (including HBO as well as basic cable networks such as CNN and TBS) from rival distributors altogether or by increasing the licensing fees that rival distributors must pay to carry this content. Either action would raise the costs and weaken the competitive position of rival distributors and enable the combined firm to increase its prices in the downstream market to the detriment of consumers. If the merged firm's costs do not change, the transaction could also create an incentive, at the margin, for AT&T to engage in this behavior if doing so would divert some of the rival MVPDs' customers to AT&T.⁸³

The Division and FCC raised analogous concerns in the Comcast/NBCU merger, arguing that that transaction would have given Comcast the incentive and ability to harm competition by withholding NBCU programming from rival distributors, as well as in Time Warner-Turner. In order to prevent this anticompetitive input foreclosure, Comcast/NBCU was required to license of all its programming to rival MVPDs and OVDs.⁸⁴

First, the elimination of double marginalization only applies to AT&T, and so would not affect pricing incentives for HBO on other MVPDs, which likely account for more than two-thirds of HBO's subscribers.

Second, any potential benefits arising from double marginalization do not require AT&T to foreclose. This means that a merger where AT&T is allowed to integrate with HBO and foreclose competitors is worse for consumers than a merger where AT&T is allowed to integrate with HBO but is prevented from foreclosing competitors. Remedies should be used to prevent foreclosure, even if hypothetically a merger with foreclosure gives an outcome that is on net better than pre-merger conditions. That is because a merger without foreclosure would be better still. Conduct remedies are appropriate when a merger allows the merged firm to achieve efficiencies but would also give rise to behavior that harms competition. The DOJ recognizes that "tailored conduct remedies designed to prevent conduct that might harm consumers while still allowing the efficiencies that may come from the merger to be realized" may be appropriate under these circumstances.

Such targeted behavioral remedies have been imposed in previous vertical mergers. For example, in Comcast/NBCU the DOJ and FCC required several behavioral conditions, including a condition that would prevent discrimination against rival business news networks, such as Bloomberg TV.

Third, it is not clear that there is currently double marginalization. In Comcast/NBCU, the government found that there was limited scope for efficiencies because existing contract structures between Comcast and NBCU were in place that potentially overcame double marginalization. For the current proposed transaction, there would be no scope for elimination of double marginalization if AT&T currently pays HBO a fixed fee that is not based on the number of subscribers. Under such a contract structure, the marginal cost to AT&T of adding another HBO subscriber would be 0, and could not be further reduced by the proposed transaction. DOJ staff should evaluate the agreement between AT&T and HBO to evaluate the scope for marginal cost efficiencies. DOJ staff should also consider whether such efficiencies could be achieved contractually rather than by the proposed transaction.

⁸³ See, e.g., Serge Moresi and Steven C. Salop, "vGUPPI: Scoring Unilateral Pricing Incentives in Vertical Mergers," *Antitrust Law Rev.* 79 (2013) at 185-214.

⁸⁴ See the Department of Justice's competitive impact statement on Comcast's acquisition of NBCUniversal. Department of Justice. Competitive Impact Statement, filed in the District Court for the District of Columbia. Case

C. Competitive Effects in the Content Creation Market

Finally, the proposed transaction also has the potential to harm competition in the upstream market for content creation by enhancing the ability of TW to foreclose studio competitors to Warner Brothers from access to the premium channel window by virtue of HBO's increased market share. While premium channel distribution accounts for a relatively small share of movie studio revenues,⁸⁵ as noted above a small foreclosure share does not necessarily indicate foreclosure would be either ineffective or unprofitable. The fact that major studios, including MGM and Lions Gate, have expended substantial efforts to attempt (albeit unsuccessfully) to sponsor new entry into the premium channels industry, as discussed above, suggests that the importance of this distribution channel is significant and that the same mechanism described above – foreclosure leading to increased average costs for already smaller competitors, thus giving the larger, vertically integrated competitor the power to raise downstream prices – could operate in the upstream content market.

V. Conclusion

The conditions under which vertical transactions can create the incentive and ability for the merged firm to raise rivals' costs through foreclosure are well understood. While we do not have access to the company confidential data necessary to fully evaluate the proposed transaction, the evidence and analysis presented in this paper establishes a *prima facie* case that, by combining the largest MVPD with the largest premium channel, the proposed transaction would cause the combined AT&T-Time Warner to foreclose the ability of Starz and Showtime (and other potential premium channel competitors) to reach consumers, thereby raising their costs and enhancing HBO's market power. Consumers would pay higher prices and have less choice for high quality movies and other premium channel content. The anticompetitive effects could also extend both downstream, into the MPVD market, and upstream, into the market for video content. Faced with comparable circumstances in the past, the agencies have acted to prevent such harms to competition and consumers.

No. 1:11-cv-00106 (2011) at pp. 30, 40. (available at <https://www.justice.gov/atr/case-document/competitive-impact-statement-72>)

⁸⁵ According to SNL Kagan, premium window revenues account for approximately four percent of studio revenues. SNL Kagan, *State of Home Entertainment* 2016 Edition (February 2017).

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