Stay Tuned: Whether Cloud-Based Service Providers Can Have Their Copyrighted Cake and Eat It Too

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COMMENT

STAY TUNED:
 WHETHER CLOUD-BASED SERVICE PROVIDERS CAN HAVE THEIR COPYRIGHTED CAKE AND EAT IT TOO

Amanda Asaro*

Copyright owners have the exclusive right to perform their works publicly and the ability to license their work to others who want to share that right. Subsections 106(4) and (5) of the Copyright Act govern this exclusive public performance right, but neither subsection elaborates on what constitutes a performance made “to the public” versus one that remains private. This lack of clarity has made it difficult for courts to apply the Copyright Act consistently, especially in the face of changing technology.

Companies like Aereo, Inc. and AereoKiller, Inc. developed novel ways to transmit content over the internet to be viewed instantly by their subscribers and declined to procure the licenses that would have been required if these transmissions were being made “to the public.” However, while these companies claimed that their activities were outside of the purview of § 106(4) and (5), their rivals, copyright owners, and the U.S. Supreme Court disagreed. Likening Aereo to a cable company for purposes of § 106(4) and (5), the Supreme Court determined that the company would need to pay for the material it streamed. Perhaps more problematic for Aereo (and other similar companies) is the fact that the Court declined to categorize Aereo as an actual cable company, such that it would qualify to pay compulsory licensing fees—the more affordable option given to cable companies under § 111—to copyright holders.

This Comment shows that, while the Court correctly ruled that companies like Aereo and AereoKiller should pay for the content transmitted, its failure to address whether Aereo is a cable company could frustrate innovation to the detriment of the public. It suggests, therefore, that these companies should be required to pay for the content that they

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transmit in the same way that cable companies do until Congress develops another system.

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INTRODUCTION

Gone are the days of the 1990s when people carried Discmans to work while they played their newly purchased compact discs. Almost gone are the days of the iPod Classics playing music paid for with iTunes gift cards. Now, people walk to work and to school clutching their iPhones and iPads, streaming music through Pandora, Spotify, and iTunes Radio on the go. When people get home, they have a full array of television shows at their fingertips through premium cable subscriptions that provide a plethora of specialty channels, some of which they have already recorded with their DVRs so that they can fast forward through commercials. Then, the “On Demand” option allows people to order the latest movies and shows. If all else fails, a backup Netflix or Hulu subscription may provide some solace.

In the age of Netflix, Pandora, and iTunes, streaming content over the internet seems like an acceptable, cost-effective way to provide content to subscribers. With subscriptions to many music or cable services, users may easily listen to, watch, and record programs. In a world where nearly every form of entertainment is accessible at a person’s fingertips—and even on the go—what could go wrong? From a consumer’s perspective, not much. For a paltry $7.99 per month Netflix subscription, for instance, a consumer gains access to over 9000 programs. In certain instances, providers of these programs do not face problems either. In Netflix’s case, the company pays Disney, Miramax, and the rest of the entertainment companies that own the copyrights to the much-coveted films and television programs so that it has the rights to stream every film and program to subscribers.

Copyright law has protected copyright holders in certain instances by requiring companies like Netflix to obtain licenses before streaming content over the internet to its users. However, other copyright holders would assert that copyright law has failed to protect them from innovative companies that have developed technology beyond what Congress, in 1976, contemplated during the Copyright Act’s last major revision. Cloud-based service providers, such as Aereo, Inc. and AereoKiller, Inc., which

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5. See id.
7. See generally WNET, Thirteen v. Aereo, Inc., 712 F.3d 676 (2d Cir. 2013).
developed systems to stream content over the internet to be viewed in real
time without first obtaining permission, illustrate this notion. Based out of
New York City and Los Angeles, respectively, these companies allow
subscribers to view live or slightly delayed streams of over-the-air television to internet-connected devices without requiring the subscribers to
have a separate cable subscription.10 Subscribers may order shows with
any internet-connected device, like a laptop computer or smartphone, and
for $8 per month, have the ability to stream up to twenty hours of live television (or, for $12 per month, up to sixty hours of live television) to any
device they choose.11

While it may appear to the average consumer that yet another type of entertainment service is available to provide their desired content on the go, the implications may be more severe from the cable broadcasters’ perspective.12 As companies like Aereo and AereoKiller stream content without paying for the licenses and attract more consumers, cable broadcasters—and those who own the copyrights for the programs being streamed—stand to lose customers who can access the same content elsewhere for a much lower price.

In the same way that Netflix pays Disney and Miramax to access their copyrighted works, cable companies pay copyright holders to transmit their copyrighted works to subscribers.13 Until June 2014, when the U.S. Supreme Court decided against Aereo and in favor of copyright holding networks in *American Broadcasting Companies, Inc. v. Aereo, Inc. (Aereo II)*,14 Aereo and AereoKiller did not pay copyright holders for access to these materials but rather were able to stream the same locally broadcasted programs by catching the cable broadcasters’ signals and retransmitting them to subscribers.15 While Aereo and AereoKiller are limited in the programs that they can offer viewers to those that are broadcasted locally, they did not pay for the content that they stream, and therefore they were able to provide relatively inexpensive access to the same programs provided through a more expensive cable subscription.16 Aereo and AereoKiller argued that § 106(4) of the Copyright Act, which prohibits companies from “performing” copyrighted content “publicly” without first obtaining permission and paying a fee, did not apply to what they alleged was “private” streaming.17 They contended that they were simply providing technology that allowed consumers to do what they are legally entitled to

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11. Id.
13. See Orden, supra note 2.
15. See id. at 2503.
16. See id.
do: access free and legally accessible over-the-air television broadcasts using an antenna.\textsuperscript{18} Prior to the Court's decision, both companies had been able to avoid paying fees to cable broadcasters or to other copyright holders.\textsuperscript{19} Suits against Aereo and AereoKiller highlight the challenges of policing traditional copyright protections in a time of sophisticated and growing technologies and how the courts have struggled to do so.

According to the \textit{New York Times}, the use of Aereo and copycat services had the potential to cost networks like ABC more than $2 billion per year in retransmission fee revenues—an amount projected to grow to $6 billion per year by 2018.\textsuperscript{20} While these companies threatened the cable broadcast business model, business models must often evolve in the face of technology. Arguably more dangerous is that, even in its recent decision in \textit{Aereo II}, the Court declined to opine on how its holding would influence similar technologies and did not provide a clear standard for what constitutes a public performance—something that companies developing new technologies surely would like to follow.

This Comment assesses how courts have determined whether an online service provider, at the request of an individual subscriber, may transmit copyright-protected, but publicly available content over the internet to be viewed in real time by the requesting individual subscriber. Part I provides a brief overview of the copyright doctrine, explaining its origins and how it has developed in response to technology. Part I also examines the concept of "public performance," with a specific focus on the "Transmit Clause," and provides an overview of compulsory licensing schemes and why they were adopted.

Part II focuses on the Court's interpretation of public performance in \textit{Aereo II}. This part focuses on the majority's reliance on legislative history and the reasoning behind the 1976 Copyright Act amendments to impart meaning to "public performance." It then discusses the dissenting opinion and how, despite noting the majority's shortcomings, the dissent similarly failed to provide a clear standard for what activities constitute a public performance.

Part III discusses how the Court correctly applied the Copyright Act in \textit{Aereo II}, but how its failure to address whether Aereo, Inc. is a cable company is problematic. It proposes that Congress adopt a compulsory licensing scheme specific to cloud-based service providers. In the meantime, however, this Comment argues that it is within the Court's discretion to apply the Act so as to advance its dual purposes: to contribute to the public's benefit and to foster creativity and innovation.

\textsuperscript{18} See \textit{WNET, Thirteen}, 712 F.3d at 682; \textit{BarryDriller}, 915 F. Supp. 2d at 1143; \textit{Am. Broad. Cos.}, 874 F. Supp. 2d at 375.

\textsuperscript{19} See \textit{WNET, Thirteen}, 712 F.3d at 682; \textit{BarryDriller}, 915 F. Supp. 2d at 1143; \textit{Am. Broad. Cos.}, 874 F. Supp. 2d at 375.

I. THE DEVELOPMENT OF COPYRIGHT PROTECTIONS

This part describes the historical and statutory framework for evaluating the Copyright Act of 1976\(^{21}\) before considering how recent courts have interpreted the public performance doctrine. Part I.A describes the historical roots of copyright protections, with a specific focus on the birth of the public performance right. Part I.B explains how the public performance right has changed over time. Part I.C then introduces how courts have interpreted the public performance doctrine recently and provides an overview of the technologies used by cable companies and cloud-based service providers to transmit content to their subscribers.

A. Copyright Protections and the History of the Public Performance Right

Part I.A briefly introduces the nature of copyrights and what they confer to copyright holders. Then, this section discusses the framework for analyzing copyright issues, noting how courts have considered the purpose of copyright laws and how Congress has amended copyright law to account for technological improvements.

1. The Nature of Copyrights and the Rights Conferred to Copyright Holders

Copyrights are exclusive rights granted to the creator of an original work.\(^{22}\) These rights exist only for original works that are fixed in a tangible medium of expression, such as in a book or on a computer’s hard drive.\(^{23}\) So long as these works are fixed in some physical medium, protection extends to literary works; musical works; dramatic works; pantomimes and choreographic works; pictorial, graphic, and sculptural works; motion pictures and other audiovisual works; sound recordings; and architectural works.\(^{24}\) However, the copyright protections also apply outside of the original medium of expression.\(^{25}\) Section 102 of the Copyright Act provides that copyrights apply to any medium of expression that is “now known or later developed,” as long as these works can be “perceived, reproduced, or otherwise communicated.”\(^{26}\) Thus, the current copyright doctrine in the United States would apply an author’s copyright protection to his expressions captured in an electronic book, regardless of whether that author conceptualized his expressions in a hard copy of the book ten years before the advent of electronic books.\(^{27}\)

\(^{21}\) Unless otherwise stated, references to “the Copyright Act” are made to the Copyright Act of 1976.

\(^{22}\) 4 WILLIAM F. PATRY, PATRY ON COPYRIGHT § 14.3 (2011).


\(^{24}\) Id.

\(^{25}\) Id.

\(^{26}\) Id.

\(^{27}\) 4 PATRY, supra note 22, § 14:102.
Copyright ownership confers the exclusive rights to reproduce, adapt, distribute, publicly perform, and publicly display the works, with limited exceptions. Furthermore, copyright owners have the exclusive statutory authority to exercise control over the copying and use of their work for a specific period of time, at which point the copyright expires and the work enters the public domain. Until that time, however, the copyright owners can generally determine who may perform their work and financially benefit from performing their work.

One of these exclusive rights—the right to publicly perform one’s work—has become the subject of intense debate as of late, as services like those provided by Aereo and AereoKiller spread to users across the United States. Together, § 106(4) and (5) of the Copyright Act are commonly referred to as the “Public Performance” clauses, and § 106(5) is commonly referred to as the “Transmit Clause.” These subsections provide:

[T]he owner of copyright under this title has the exclusive rights to do and to authorize any of the following: . . . (4) in the case of literary, musical, dramatic, and choreographic works, pantomimes, and motion pictures and other audiovisual works, to perform the copyrighted work publicly; (5) in the case of literary, musical, dramatic, and choreographic works, pantomimes, and pictorial, graphic, sculptural works, including the individual images of motion picture or other audiovisual work, to display the copyrighted work publicly.

However, the public performance rights and the other exclusive rights are subject to limited exceptions, which are delineated in §§ 107 to 118 of the Copyright Act. One such limit is “fair use,” which is commonly raised as a defense for failing to first obtain permission from a copyright holder when a person uses copyrighted material for educational activities, literary and social criticism, parody, and other activities protected by the First Amendment. Other limitations on a copyright holder’s exclusive rights include: reproduction of one copy of a copyrighted work for libraries or archives, transfer of a lawful copy of a work by the owner of that copy, secondary transmissions, ephemeral recordings, copies or adaptations of

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28. 17 U.S.C. § 106. For purposes of this Comment, unless otherwise stated, the term “exclusive rights” will refer to a copyright owner’s rights to (1) reproduction; (2) adaptation; (3) distribution to the public; (4) performance in public; and (5) display in public.
29. 4 PATRY, supra note 22, § 10.2. For further information on the limits on exclusive rights and relevant case law interpreting these limitations, see Catherine K. Harris, Pathfinder to U.S. Copyright Law, 2 PERSP.: TEACHING LEGAL RES. & WRITING 32 (1993).
30. See 4 PATRY, supra note 22, § 7.33.
31. Id.
32. See Gesmer, supra note 12.
35. See Harris, supra note 29.
37. Id. § 109.
38. Id. § 111. Secondary transmissions refer to transmissions made from a primary transmission. See 4 PATRY, supra note 22, § 14:69. An example of a secondary transmission is when hotel management relays the signals transmitted by a broadcast station (a primary
computer programs,40 and specific types of performances and displays.41 Unless one of these exceptions applies, a person must first obtain permission from the copyright holder to use the original work. A prima facie case for infringement requires that a party establish (1) ownership of a valid copyright, and (2) that the defendant violated an exclusive right conferred by that ownership.42

2. The Constitutional and Copyright Law Framework for Analyzing Current Copyright Issues

This section discusses the constitutional and copyright law framework for analyzing current copyright issues. It describes the purposes and policies that have been considered when applying copyright law. It also notes how advances in technology have required amendments to copyright law.

a. The Purpose of Copyright Law

To analyze complex copyright issues, courts have often considered how certain interpretations would (or would not) further or frustrate the purposes of copyright law.43 Legal scholars and U.S. courts have noted that copyright law seeks to “stimulate artistic creativity” to contribute to the public good.44 This goal supports long-term benefits and the Framers’ original goal for adopting copyright law: “to promote the progress of science and useful arts.”45 A second, and arguably lesser, purpose of copyright law is to protect artists and creators of unique works in the short

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41. Id. § 110. This section discusses ten specific circumstances that constitute limits to a copyright holder’s exclusive rights: classroom activities; instructional broadcasting; religious services; nonprofit performances of nondramatic literary works and musical works; store receivers (limited reception on home-type receivers involving no admission charge); performances at state fairs; record store receivers; performances by or for handicapped persons; performances by fraternal organization; and performances of nondramatic literary and musical works. Id.
43. See, e.g., id.
44. Lisa A. Zakolski, 18 AM. JUR. 2D Copyright and Literary Property § 2 (2012) (stating that the primary reason for copyright protection is to contribute to the public good and to spur artistic creativity); see also Twentieth Century Music Corp. v. Aiken, 422 U.S. 151, 156 (1975) (“The immediate effect of our copyright law is to secure a fair return for an ‘author’s’ creative labor. But the ultimate aim is, by this incentive, to stimulate artistic creativity for the general public good.”).
By granting to authors and inventors the “exclusive Right to their respective writings and Discoveries” for a limited period of time, copyright law protects those authors and inventors.\textsuperscript{47} However, as the Supreme Court has stated, “copyright law, like the patent statutes, makes reward to the owner a secondary consideration.”\textsuperscript{48} Copyright law also is “intended . . . to grant valuable, enforceable rights to authors [and] publishers . . . without burdensome requirements . . . [and] to afford greater encouragement in the production of literary or artistic works of lasting benefit to benefit the world.”\textsuperscript{49} Though an economic benefit results from copyright law, a greater benefit is that copyright protection encourages people to continue to act as artists and creators by allowing them to personally gain from their labor.\textsuperscript{50} As stated by the Court, “copyright law protects authors’ interest as a means to an end; protection is not an end in and of itself.”\textsuperscript{51}

### b. Amendments to Copyright Law

**Stemming from Advances in Technology**

Though the latest definition of “copyright” comes from the Copyright Act of 1976, the Framers of the Constitution considered the legal concept of copyright.\textsuperscript{52} Current copyright law is derived from a constitutional grant of authority to Congress “to promote the Progress of Sciences and useful Arts, by securing for limited Times to Authors and Inventors the exclusive Right to their respective Writings and Discoveries.”\textsuperscript{53} Although the Framers undoubtedly did not contemplate whether copyright infringement occurred when someone other than a copyright holder streamed content over the internet, they did give Congress the authority to regulate copyright protection and perhaps implicitly recognized that situations might arise that would require copyright protections to change.\textsuperscript{54} Since the Copyright Clause was first adopted in the eighteenth century,\textsuperscript{55} Congress has amended it several times to account for advances in technology that reached beyond

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\textsuperscript{47} \textit{Id.} at 843 n.7 (citing \textsc{William F. Patry, Patry on Copyright} § 3.3 (2012)); see also Diane L. Kilpatrick-Lee, \textit{Criminal Copyright Law: Preventing a Clear Danger to the U.S. Economy or Clearly Preventing the Original Purpose of Copyright Law?}, 14 U. BALTIMORE INTELL. PROP. L.J. 87, 93–94 (2005).


\textsuperscript{49} \textit{Id.} at 219 (quoting Washingtonian Pub. Co. v. Pearson, 306 U.S. 30, 36 (1939)).

\textsuperscript{50} See Kilpatrick-Lee, \textit{supra} note 47, at 88.


\textsuperscript{52} See Lukes, \textit{supra} note 46, at 842–44 (discussing the adoption of copyright law in the United States).

\textsuperscript{53} U.S. CONST. art. I, § 8, cl. 8.

\textsuperscript{54} \textit{Id.}

\textsuperscript{55} See generally Harris, \textit{supra} note 29.
the scope of the existing protections.56 For example, the Copyright Act was amended to cover new forms of expression—like music recordings—that stemmed from the changing technology.57

B. An Introduction to Public Performance

While public performance protections were ultimately expanded to consider implications arising from the advent of cable television and music websites, the public performance right has changed over time.58 In 1856, Congress granted creators a public performance right, and authors of “dramatic compositions” were given the sole right “to act, perform, or represent their work or cause it to be acted, performed, or represented.”59 This protection was extended to musical compositions in 1897.60 While copyright law continued to develop alongside technology, it often was the subject of debate by those who thought it—and the public performance right in particular—was not developing quickly enough.61 For example, after composers were given a public performance right, they sought a judicial remedy against manufacturing companies who began to reproduce their sounds and distribute them through piano rolls.62 Unable to account for this change in technology, the 1856 Copyright Act was replaced with the 1909 Copyright Act, which established a compulsory mechanical

56. Id. at 7. Congress first exercised its copyright power by enacting the Copyright Act of 1790, which granted authors the exclusive right to publish and vend maps, charts, and books for a term of fourteen years with a fourteen-year renewal option. Id. In 1802, prints were afforded copyright protection. Id. The Copyright Act of 1831 extended the term for copyright protection to twenty-eight years with a fourteen-year renewal option, and it also added musical compositions to the list of protected materials. Id. In 1865, the Copyright Act was amended to include photographs to the list of protected materials. Id. Then, Congress amended the Copyright Act again in 1909 to extend the renewal period to twenty-eight years. Id. Motion pictures were added to the Copyright Act in 1912, and sound recordings were added in 1971. Id.

57. See id.

58. See id.

59. Id. (quoting Act of Aug. 18, 1856, ch. 169, 11 Stat. 138 (supplemental to Act to Amend the Several Acts Respecting Copyright)). Prior to 1856, the Copyright Act provided protection only against reproduction and redistribution of copyrighted works. Id.

60. Id.

61. See Kurt E. Kruckeberg, Copyright “Band-Aids” and the Future of Reform, 34 SEATTLE U. L. REV. 1545, 1546–50 (2011). For a further discussion on how to interpret the public performance doctrine, see National Cable Television Ass’n, Inc. v. Broadcasting Music, Inc., 772 F. Supp. 614, 651 (D.D.C. 1991) (“The term ‘public performance’ was meant to be read broadly” and “it would strain logic to conclude that Congress would have intended the degree of copyright protection to turn on the mere method by which television signals are transmitted to the public.”).

62. See Kruckeberg, supra note 61, at 1549. A piano roll is a music storage medium used to operate a player piano, a piano player, or reproducing piano. Id. A piano roll is a continuous roll of paper with perforations punched into it. Id. The perforations represent note control data. Id. The roll moves over a reading system known as a “tracker bar” and the playing cycle for each musical note is triggered when a perforation crosses the bar and is read. Id.; see also Timothy A. Cohan, Ghost in the Attic: The Notice of Intention to Use and the Compulsory License in the Digital Era, 33 COLUM. J.L. & ARTS 499, 503 (2010); Peter Dicola & Matthew Sag, An Information-Gathering Approach to Copyright Policy, 34 CARDOZO L. REV. 173, 191 (2012).
license for reproductions of music. Such a license allowed piano-roll manufacturers to use copyrighted works without obtaining permission from the copyright holder but required the manufacturer to pay the copyright holder a statutorily determined fee for the use. Despite instituting this licensing scheme, Congress’s power was limited by constant innovation and an inability to keep up with technology. Thus, the judiciary was forced to step in to address unanticipated situations.

One such instance occurred when the Court interpreted the 1909 Copyright Act’s provision of an exclusive right to publicly perform a musical composition. Noting that “the art of radio broadcasting was unknown at the time the Copyright Act of 1909 was passed,” the Supreme Court was called upon to consider whether a hotel proprietor broadcasting a radio signal over loudspeakers to public rooms constituted a public performance. In its analysis, the Court looked to whether the hotel guests received the underlying copyrighted work—the song—in a public place. The hotel proprietor argued that he was not engaging in a “performance,” as he urged that the “performance” at issue was the original transmission from the radio station, but the Court did not find this argument persuasive. Rather than looking to the specific transmissions of copyrighted content, the Court found the public’s access to the underlying work, made possible by the hotel, was sufficient to constitute copyright infringement.

While the Court was able to interpret the 1909 Copyright Act to protect copyright holders from unanticipated technological developments, the law simply could not be expanded to cover every innovative way to share copyrighted content. In the 1960s, fifty years before systems like Aereo threatened the success of cable providers, the growth of cable television systems raised new copyright concerns specifically for content providers who maintained the exclusive rights to certain programs. While most U.S. households received locally broadcasted programming—which did not threaten these content providers—more remote and mountainous communities could not receive the same signals because of their geographic locations. Cable systems provided a solution: by receiving the broadcast

63. See Kruckeberg, supra note 61, at 1546.
64. Id. at 1549–50.
65. Id.
66. See id. at 1550 (discussing how the judiciary had to apply the 1909 Copyright Act because the legislature could not anticipate not-yet invented technologies). For instance, because the development of the “word roll,” a piano roll with lyrics printed next to the roll’s perforations, was unanticipated by the negotiators of the 1909 Act, the judiciary had to determine whether the inclusion of lyrics on a piano roll constituted infringement of the lyricist’s copyright under the language of the 1909 Act. Id.
68. Id. at 196.
69. Id.
70. Id. at 196–97.
73. See WPIX, Inc. v. IPI, Inc., 691 F.3d 275, 281 (2d Cir. 2012).
signals and retransmitting them via coaxial cables, the cable companies provided their subscribers with that otherwise unseen locally broadcast programming.\textsuperscript{74} Over time and with increased technology, cable companies were able to deliver both distant and local broadcasting channels.\textsuperscript{75} To observe the transmitted content, subscribers would simply tune their televisions to certain frequencies allocated to each channel.

After copyright holders asserted their exclusionary rights against cable operators in two separate suits, Congress revised the 1909 Copyright Act in 1976.\textsuperscript{76} In the 1976 amendments, Congress gave rights against cable operators to copyright holders when cable operators retransmitted a broadcast to the public.\textsuperscript{77} The 1976 revision to the Copyright Act contemplates these retransmissions in the public performance clauses.\textsuperscript{78}

Like the earlier versions of the Copyright Act, the Copyright Act of 1976—the current framework for copyright law in the United States—was a response to changing technology.\textsuperscript{79} However, the Copyright Act of 1976 has been criticized for being too narrow instead of a “simple, broad, and flexible provision” that might “stand the test of time.”\textsuperscript{80} Its failure to define

\textsuperscript{74} See id.
\textsuperscript{76} See Kim, supra note 72, at 277. In \textit{Fortnightly Corp. v. United Artists Television, Inc.}, 392 U.S. 390 (1968), owners of copyrights in motion pictures alleged that Fortnightly, the owner of community antenna television (CATV) systems, violated their exclusive right of public performance. \textit{Id.} at 393. Fortnightly’s CATV systems retransmitted signals from television stations that had obtained licenses for certain copyrighted movies. \textit{Id.} Fortnightly did not, however, obtain licenses with the copyright owners and some of the licenses held by the stations expressly prohibited CATV systems from broadcasting their content. \textit{Id.} at 396–97. The Supreme Court drew a distinction between the broadcasters that actively performed a service and the passive viewers who were “passive beneficiaries.” \textit{Id.} at 395–402. Comparing Fortnightly to passive viewers, the Court held that the defendant was not liable under the 1909 Copyright Act because CATV systems merely carried unedited programming chosen by the broadcasters; they did not “perform” the retransmission of the content. \textit{Id.} at 401–02. Six years later, when copyright holders of television programs brought suit against CATV systems for intercepting broadcast transmissions and retransmitting them, the Court found for the defendant cable operator again. See \textit{Teleprompter Corp. v. Columbia Broad. Sys., Inc.}, 415 U.S. 394, 408 (1974). The Court held that the retransmission of signals did not violate a content provider’s copyright, as the importation of distant signals from one place to another did not constitute a performance under the 1909 Act. \textit{Id.}
\textsuperscript{77} Kim, supra note 72, at 277.
\textsuperscript{79} See Kruckeberg, supra note 61, at 1546–60.
\textsuperscript{80} See id. at 1551–53. In discussing the Copyright Act’s inability to account for undeveloped technology, Kruckeberg discusses the concept of public performance protection as it applies to music, and how the definition of “public performance” has led to inconsistent treatment for seemingly similar activities. \textit{Id.} He explains that, before the Digital Performance Act of 1995 (DPA), sound recordings were not extended public performance protection. \textit{Id.} Before the DPA, public performance rights were reserved only in the musical composition underlying the recording. \textit{Id.} The DPA extended sole rights for public performance “by means of a digital audio transmission” to copyright holders of sound recordings. \textit{Id.} Thus, while web-based radio services providing digital audio transmission had to license the use of songs from both copyright holders of the sound recording and the copyright holder of the musical composition, regular radio broadcasters needed only to license use from the copyright holder of the musical composition. \textit{Id.}
important statutory language has also led to further criticism because it left key terms ambiguous. For instance, the 1976 Copyright Act does not define “public” for purposes of the public performance clause. To interpret the public performance clauses, courts have turned to the legislative history of the 1976 Copyright Act to support their interpretations.

When companies do transmit a copyrighted work to the public, they are required to obtain a license before doing so. In the case of television, cable companies that retransmit broadcast television pay licensing fees to the broadcasters. This compulsory licensing scheme, which requires cable television systems to obtain a license (rather than express permission of the owners) before retransmitting programming embodied in broadcast signals, was adopted to account for cable operators’ use of copyrighted works and their retransmissions. When cable television began to grow in the 1950s, broadcasters viewed cable systems with apparent favor, as the cable systems allowed viewers to receive otherwise unavailable signals, and an increased viewership lead to increased revenue from advertising. Copyright owners reacted similarly, as the license fee that copyright owners received from stations also considered the viewer market statistics and advertising income, which contributed to increased license fees being paid to copyright owners. However, copyright owners ultimately became dissatisfied when cable operators began to import distant signals containing local, non-network program for two reasons. First, the advertisers supporting these new, distant programs were not interested in advertising on non-local markets, and thus they were not spending money that would go directly to copyright owners as it once had. Second, larger cable operators who could import signals from a distance threatened the success of local broadcasters, the content of which was undesired on the national market. As cable viewership increased, it came at the expense of local

82. Id.
84. See BarryDriller, 915 F. Supp. 2d at 1143–44.
85. See id. at 1140 (discussing licensing fees).
86. Fred H. Cate, Cable Television and the Compulsory Copyright License, 42 FED. COMM. L.J. 191 (1990); see also Fortnightly Corp. v. United Artists Television, Inc., 392 U.S. 390, 400 (1968); David E. Leibowitz, The Sequential Distribution of Television Programming in a Dynamic Marketplace, 34 CATH. U. L. REV. 671, 680 (1985) (discussing that the compulsory licensing scheme’s adoption came after the Supreme Court examined the copyright liability of cable operators under the 1909 Copyright Act and held that passive retransmission of copyrighted content did not constitute an infringement under the 1909 Act in Fortnightly Corp. v. United Artists).
88. See Cate, supra note 86, at 193.
89. Id. at 194–95.
90. Id. at 194.
91. Id. at 195.
broadcasts because copyright owners themselves (1) lost income from local broadcast companies that were either flailing or out of business, and (2) suffered from the uncompensated use of their copyrighted works by a wider audience.\(^{92}\)

Concluding that it would be impractical and burdensome to require every cable system to negotiate separately with every copyright owner whose work was being publicly performed through retransmission by a cable system, Congress established the compulsory licensing scheme to address broadcasters’ and copyright owners’ concerns.\(^{93}\) The compulsory licensing scheme allows the copyright owner to license the use of her rights against payment set by law or by negotiation,\(^{94}\) and addresses “public performances.”\(^{95}\) Under a compulsory license, cable operators must submit Statements of Account and Royalties to the U.S. Copyright Office twice every year.\(^{96}\) The Copyright Office then examines the statements, deducts operating costs, and deposits the balance in the U.S. Treasury for distribution to the copyright owners.\(^{97}\) Royalty rates are set by the Copyright Royalty Tribunal.\(^{98}\)

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92. Id. 193, 195 (discussing a study that observed that copyright owners resorted to regaining control of their product by withdrawing their programs from over-the-air broadcast stations in order to prevent cable providers from carrying them, and even paid cable systems not to carry their programs); Leslie A. Swackhamer, Cable-Copyright: The Corruption of Consensus, 6 HASTINGS COMM. & ENT. L.J. 283, 288 (1983).
3. H.R. REP. NO. 94-1476, at 63 (1976); see also Cole, supra note 75, at 235 (discussing Congress’s decision to pass the Satellite Home Viewer Act to address the retransmissions made by satellite carriers and to create a compulsory license for the transmissions by these carriers for private viewing by owners of satellite dishes).
5. 17 U.S.C. § 111(b)–(c) (2012). The act provides that “the secondary transmission to the public of a performance or display of a work embodied in a primary transmission is actionable as an act of infringement under section 501, and is fully subject to the remedies provided by sections 502 through 506, if the primary transmission is not made for reception by the public at large but is controlled and limited to reception by particular members of the public.” Id. § 111(b). For more information on the fees paid, see id. § 111(d). In addition to this compulsory license scheme, Congress created (or retained) other compulsory licenses: the statutory mechanical royalty, the jukebox royalty, and the educational broadcasting royalty. See generally Frederick F. Greenman, Jr. & Alvin Deutsch, The Copyright Royalty Tribunal and the Statutory Mechanical Royalty: History and Prospect, 1 CARDozo ARTS & ENT. L.J. 1 (1982).
6. See Leibowitz, supra note 86, at 681–82.
7. Id. Royalties generally are calculated on the basis of cable carriage of distant non-network programming, although the secondary transmission of all broadcast signals is subject to compulsory licensing. Id. at 682. As Leibowitz explains:

In assessing liability under the compulsory licensing system, Congress determined that copyright owners of broadcast programming, retransmitted by cable within the station’s local service area, did not threaten economically the copyright owner. Similarly, Congress noted that copyright owners of programming distributed by national television networks are paid on the basis of nationwide coverage and, therefore, are not injured by cable retransmission.

Id.

C. An Introduction to Current Technology and the Recent Battles Between Technological Innovators and Copyright Holders

As improvements in cable television challenged the grasp of the Copyright Act prior to the amendments in 1976, evolving technology does the same to the current Copyright Act. The following section provides an overview of specific technological systems that have been used by cable operators and content streamers and introduces lawsuits alleging that the systems violate the Transmit Clause of the Copyright Act.

1. Cablevision and the RS-DVR System

In 2008, Cartoon Network, the owner of copyrights in various movies and television programs, brought a suit for declaratory judgment that Cablevision, a cable operator, infringed its copyrights through the use of a remote storage digital video recorder (RS-DVR) system.99 The Second Circuit in Cartoon Network LP, LLLP v. CSC Holdings, Inc. (Cablevision)100 held that Cablevision’s proposed RS-DVR system would not directly infringe the copyrights in broadcast programs as the transmissions were not made “to the public.”101

In so holding, the Cablevision court looked specifically to the nature of the novel RS-DVR system, which allowed individual Cablevision customers to record cable programming and receive playback through “the cloud.”102 While a typical digital video recorder (DVR) stores recorded programming on an internal hard drive rather than on a cassette, the RS-DVR allows users who do not have a stand-alone DVR to record cable programming on central hard drives housed and maintained by Cablevision at a remote location.103 Customers may receive playback of those programs through their home television sets, using their standard cable box equipped with RS-DVR software.104

Cablevision aggregates television programming from content providers, the various broadcast and cable channels that produce or provide individual programs and then transmits those programs into subscribers’ homes through a coaxial cable.105 Cablevision gathers the contents of various channels into a single stream of data, processes this stream, and transmits the data to its customers in real time.106

In essence, if 1000 Cablevision customers recorded Game Seven of the World Series, Cablevision would create 1000 copies—one for each

99. Cartoon Network LP, LLLP v. CSC Holdings, Inc. (Cablevision), 536 F.3d 121, 123 (2d Cir. 2008).
100. 536 F.3d 121 (2d Cir. 2008).
101. Id. at 139. The Second Circuit also ruled on fixation and volition issues, which are not addressed in this Comment.
102. Id. at 124.
103. Id.
104. Id.
105. Id.
106. Id.
If a customer wanted to rewatch the program or rewind it, Cablevision would transmit the specific copy created for that customer and no one else could access that particular copy, thus making each copy “individual.”

2. Aereo I, BarryDriller, and the Streaming Technology

In *American Broadcasting Companies, Inc. v. Aereo, Inc.*, the Southern District of New York denied the request of broadcasters and content owners to issue a preliminary injunction requiring Aereo, a cloud-based service provider, to stop streaming copyrighted content to its subscribers. Relying on Cablevision’s reasoning, the court held that a single copy–based transmission used by Aereo to one of its subscribers was not a public performance, despite the ability for many viewers to see the same underlying work through the Aereo system. The holding was affirmed by the Second Circuit in *WNET, Thirteen v. Aereo, Inc.* (collectively with the Southern District’s holding, “Aereo I”).

Faced with a similar set of facts in December 2012, the Central District of California in *Fox Television Stations, Inc. v. BarryDriller Content Systems PLC* granted a preliminary injunction ordering AereoKiller, a Los Angeles–based cloud service provider that allowed subscribers to view television in real time over the internet, to shut down its services. The court held that AereoKiller’s transmission of the content likely was an infringement on the plaintiff’s public performance right.
Despite reaching opposite conclusions, the Aereo I and BarryDriller courts, like the Cablevision court, started their analyses the same way: they looked to the specific technology being used to stream content. The systems used by Aereo and AereoKiller allowed users to access “free,” over-the-air broadcast television on any internet-connected device, like a computer, laptop, or smartphone. As Aereo and AereoKiller allowed their users to access programming over the internet rather than through a cable connection, a separate cable subscription was not needed. After logging into their accounts, Aereo and AereoKiller subscribers could choose to either watch or record a program from a list of programs currently being aired or that would be aired at a later time. Users could also elect to record a program currently being broadcast on cable or scheduled to be broadcast later and could watch it at any point once the recording process started.

Upon receiving a user’s request, Aereo and AereoKiller sent a unique transmission to that user after the request was processed by its complex antenna system and stored briefly in user-specific directories. Even if

117. See Gesmer, supra note 12, at 2.
120. Id.; see also Gesmer, supra note 12, at 2–3.
122. Id. When a user decides to “watch” a show from Aereo or AereoKiller, the web browser sends a request to Aereo’s application server, which then sends a request and information about the user and the requested television program to Aereo’s antenna server. Id. The antenna server allocates resources to the user, depending on whether the user is a “static” or a “dynamic” subscriber. Id. Static users have a set of previously selected antennas assigned to them, while dynamic users are randomly assigned an antenna each time they use the Aereo system. Id. Although one user may use a previously used antenna, no two users share a single antenna at the same time. Id. Moreover, the data obtained by a particular antenna while allocated to a particular user is not “shared” with or accessible by any other Aereo user. Id. Once resources are allocated to the requesting user, the antenna server sends a “tune” request that directs the user’s antenna to “tune into” a particular frequency band to access the desired program. Id. The antenna server also sends a request to the streaming server that creates a unique directory, assigned to the user, for storing the data received by the antennas and processed by the assigned transcoder. Id. Upon the creation of the directory, an electrical signal is sent from the antenna, processed and converted into data packets, and then sent to the transcoder, which encodes it in a form to be transmitted over the internet. Id. The data is then sent to the streaming server, where it is saved on a hard disk to a file in the previously created directory and, once saved, is read from that file into a “RAM memory buffer,” which sends the data to the user over the internet once a sufficient amount of data has accumulated. Id. As additional data is received from the antenna, that data continues to be saved to the hard disk and then read into the RAM memory buffer to be transmitted to the user. Id. The RAM memory buffer contains only a small amount of data that is continuously replaced as it is sent to the user and new packets of data are fed into the buffer. Id. For the most part, the same process occurs when the user elects to “record” instead of “watch.” When users choose the “record” function, however, the file saved to the hard disk is tagged as permanent and automatically retained. Id. Each of Aereo’s antennas consists of a pair of metal loops; eighty antennas are packed on one end of a circuit board, with a metal rail that separates the area with the antenna elements from an area housing the electronic components used to operate the antennas and send the signals. Id. These circuit boards are stored parallel to one another. Id. The metal rail fits closely together with these
two users selected the same program to watch or record at the same time, each user’s request would be processed by a different antenna, stored in a different directory, and transmitted separately.\textsuperscript{123} For instance, if 1000 Aereo customers wanted to watch Game Seven of the World Series as it is broadcast on FOX, the Aereo subscribers would need to “watch” the program via its website.\textsuperscript{124} Aereo’s antenna system would receive the requests, data would be stored for several seconds on Aereo’s servers, and then the data would be transmitted to subscribers.\textsuperscript{125} If another 1000 subscribers chose to “record” the program, then 1000 other antennas would receive a signal, store data on Aereo’s servers in 1000 separate directories, and be available for each subscriber’s request later.\textsuperscript{126} Aereo would transmit the specific copy recorded for each customer, and no one would receive a transmission of the same copy.\textsuperscript{127} As the systems used by Aereo and AereoKiller are materially the same, AereoKiller would undergo the same process to transmit Game Seven of the World Series to its customers.\textsuperscript{128}

\textbf{a. The Aereo I Court’s Decision}

About four years after \textit{Cablevision}, copyright holders brought suit alleging that Aereo, a provider of live internet broadcasts, publicly performed their copyrighted content.\textsuperscript{129} Aereo’s system, as discussed in Part I, allowed a user to watch broadcast television through any internet-connected device by logging into her Aereo account and selecting a desired program to watch or record.\textsuperscript{130} Aereo suggested that its system is very similar to the RS-DVR system discussed in \textit{Cablevision} from a user’s perspective: users of both the RS-DVR system and Aereo’s services may access programming that has been previously broadcasted.\textsuperscript{131} When users choose to “watch” or “record” certain programs, Aereo’s web browser sends a request to Aereo’s antenna server, which then allocates an antenna and transcoder to the user, and then sends a “tune” request that directs the user’s antenna to “tune into” a particular broadcast frequency to obtain the desired program.\textsuperscript{132} Like the RS-DVR system, Aereo’s system sends a unique signal to its user who elects to “watch” a program, and the system stores the data to be accessed only by the individual user who elects to

\begin{footnotesize}
\begin{enumerate}
\item See Gesmer, supra note 12, at 5.
\item Id.
\item Id.
\item Id.
\item Id.
\item Id.
\item Id.
\item Id.
\item Id.
\item Id. at 377.
\item Id.
\item Id. at 378.
\end{enumerate}
\end{footnotesize}
“record” a program. Either way, the individual subscriber making the request is the only recipient of the data and signal sent.

Due to the similarities between the RS-DVR system contemplated by Cablevision and the services provided by Aereo, both of which allowed users to access previously recorded programming, the Aereo I court found itself bound by Cablevision’s reasoning. Specifically, the Aereo I court employed the following analysis, as endorsed by Cablevision: (1) the Transmit Clause directs courts to consider the potential audience of the individual transmission, including whether there is a limit to the potential audience capable of receiving the transmission, and (2) generally, private transmissions, or transmissions not capable of being received by the public, should not be aggregated when conducting a public performance analysis.

In evaluating the potential audience of the transmissions by the Aereo systems, the Aereo I court analogized the Aereo system to Cablevision’s RS-DVR system. In the first part of its analysis, the court concluded that Aereo’s system and Cablevision’s RS-DVR system were “materially identical” for three reasons. First, Aereo’s system created a distinct copy of each program requested by a subscriber and saved it to a directory on Aereo’s hard disks that was assigned to a specific user. Second, after the user requested this programming, Aereo transmitted unique signals, which ultimately translate into a unique copy to be viewed by the requesting user. Third, the transmission was sent only to the requesting user and no other subscriber could access the copy. The Cablevision court had concluded that the RS-DVR transmissions were not made “to the public” because the system created unique copies and transmitted the unique copies to the particular Cablevision customer. Similarly, the Aereo court also relied on the uniqueness of each copy and the subsequent unique transmission to the requesting subscriber to conclude that its transmission was made to specific individuals. Accordingly, the court held that Aereo’s transmissions were not made “to the public.”

In the second part of its analysis, the Aereo I court focused on another point employed by the Cablevision court: that Aereo’s system, like Cablevision’s, allowed its subscribers to do what otherwise could be accomplished using a VCR or standard DVR system. From the users’ perspective, Aereo’s system merely allowed them to do the same thing that

133. Id. at 377. For a fuller discussion of the technology in use by Aereo, see supra Part I.C.2.
136. Id. at 378.
137. WNET, Thirteen, 712 F.3d at 690.
138. Id.
139. Id.
140. Id. at 377. For a fuller discussion of the technology in use by Aereo, see supra Part I.C.2.
141. Id. The Cablevision court noted that “[t]o the customer, however, the processes of recording and playback on the RS-DVR are similar to that of a standard set-top DVR.” Cartoon Network LP, LLLP v. CSC Holdings, Inc., 536 F.3d 121, 125–26 (2d Cir. 2008).
they could do with a DVR or Slingbox—access free over-the-air broadcasts on an internet-connected device.\textsuperscript{142} As the \textit{Cablevision} court stressed that the RS-DVR system accomplished the same end as did other, non-infringing systems that did not transmit “to the public,” the \textit{Aereo I} court similarly noted that Aereo’s system mirrored a non-infringing Slingbox or DVR.\textsuperscript{143}

Next, the court looked to the nature of the transmission itself and concluded that the transmissions should not be aggregated in determining whether a public performance had occurred.\textsuperscript{144} Relying on \textit{Cablevision}, the court noted that a public performance did not occur simply because a number of people—every Aereo subscriber or perhaps even “the public”—may have been able to watch the same television \textit{program}.\textsuperscript{145} The \textit{Cablevision} court stressed that the appropriate inquiry for a Transmit Clause analysis is the potential audience of the particular \textit{transmission} in question, not the potential audience of the underlying work or the \textit{performance}.\textsuperscript{146} Though the copyright holders offered a related argument—that the court should look to how Aereo’s transmissions originate from the original broadcast signal rather than Aereo-created signals to find that Aereo made a public performance—the court rejected this reasoning. Instead, the court concluded that the argument was merely another way of stating that the public’s ability to watch the show was dispositive of the transmission being made to the public.\textsuperscript{147}

The Second Circuit also noted that it was bound by \textit{Cablevision}’s decision not to aggregate the transmissions made by the content providers and those made by Cablevision.\textsuperscript{148} The district court in \textit{Aereo} distinguished between the systems of Cablevision and Aereo, noting that Aereo made copies of programs through separate streams of data.\textsuperscript{149} By contrast, the RS-DVR system in Cablevision used a single stream of data to create multiple copies.\textsuperscript{150} Because the \textit{Cablevision} court refused to accept the copyright holder’s argument that Cablevision publicly performed a work when it split and retransmitted the incoming program stream, the \textit{Aereo I} court applied the same logic to conclude that Aereo’s system also did not publicly perform in violation of § 106(4). In so holding, the district court stressed that Aereo’s case was more compelling than Cablevision’s: if Cablevision was permitted to create signals from the same data source without infringing on the copyright holders’ public performance rights, then

\begin{itemize}
\item 142. \textit{WNET, Thirteen}, 712 F.3d at 682; \textit{Am. Broad. Cos.}, 874 F. Supp. 2d at 375.
\item 143. \textit{Am. Broad. Cos.}, 874 F. Supp. 2d at 386–87.
\item 144. \textit{Id.} at 387.
\item 145. \textit{Id.}
\item 146. \textit{WNET, Thirteen}, 712 F.3d at 691.
\item 147. \textit{Am. Broad. Cos.}, 874 F. Supp. 2d at 386–87.
\item 148. \textit{WNET, Thirteen}, 712 F.3d at 695.
\item 149. \textit{Am. Broad. Cos.}, 874 F. Supp. 2d at 387.
\item 150. Cartoon Network LP, LLLP v. CSC Holdings, Inc., 536 F.3d 121, 124 (2d Cir. 2008).
\end{itemize}
surely Aereo’s system of creating signals from different data sources also would not infringe on those rights either.151

b. The BarryDriller Court’s Decision

In December 2012, a federal judge in California granted a preliminary injunction ordering AereoKiller, a Los Angeles–based cloud service provider that allowed subscribers to view television in real time over the internet, to shut down its services.152 Under essentially the same facts contemplated by the Cablevision and Aereo I courts, the court in Fox Television Stations, Inc. v. BarryDriller Content Systems, PLC held that AereoKiller’s transmission of the content was likely an infringement of the plaintiff’s public performance right.153 In its analysis, the BarryDriller court expressly rejected the Second Circuit’s reasoning, as established in Cablevision and subsequently employed in Aereo I, for the following reasons: (1) the statutory language of the Transmit Clause was subject to multiple interpretations; (2) binding Ninth Circuit precedent conflicted with Second Circuit precedent; and (3) arguments relied on by Cablevision and Aereo had been rejected by Congress when it amended the Copyright Act in 1976.154

Like the Cablevision and Aereo courts, the BarryDriller court started its analysis by examining the statutory language in the Transmit Clause.155 It looked to Cablevision’s holding, noting that the Second Circuit “reasoned that unless the transmission itself is public, the transmitter has not infringed the public performance right.”156 However, the BarryDriller court noted that Cablevision’s interpretation of the Transmit Clause “[was] not the only possible reading of the statute” and that the statutory language itself does not require that a public performance be received from the same transmission.157 Rather, the BarryDriller court noted that the statute was concerned with the performance of the copyrighted work, regardless of the copy from which the transmission of the work was made:

The statute provides that the right to transmit is exclusive “whether the members of the public capable of receiving the performance or display receive it in the same place or in separate places and at the same time or at different times.” 17 U.S.C. § 101. Again, the concern is with the performance of the copyrighted work, irrespective of which copy of the work the transmission is made from. Very few people gather around their oscilloscopes to admire the sinusoidal waves of a television broadcast transmission. People are interested in watching the performance of the

153. Id. at 1141–44. See generally Gesmer, supra note 12.
154. BarryDriller, 915 F. Supp. 2d at 1146 (“Defendants’ unique-copy transmission argument based on Cablevision and Aereo is not binding in the Ninth Circuit.”).
155. Id. at 1143.
156. Id. at 1144 (emphasis added).
157. Id. at 1145 (“Thus, Cablevision’s focus on the uniqueness of the individual copy from which a transmission is made is not commanded by the statute.”).
work. And it is the public performance of the copyrighted work with which the Copyright Act, by its express language, is concerned. Thus, Cablevision’s focus on the uniqueness of the individual copy from which a transmission is made is not commanded by the statute.158

In noting that Cablevision’s core argument—the “unique copy transmission argument” based on its interpretation of the statute—was unsupported by the Copyright Act, the BarryDriller court called into question the case law relied on by Cablevision and Aereo.159

Lastly, the BarryDriller court dismissed another argument expressed in Cablevision and Aereo, reasoning that Congress already had rejected it. In Cablevision, the court noted that the RS-DVR system merely provided a service equivalent to what individuals could lawfully do themselves with a VCR or a standard DVR.160 However, the court in BarryDriller noted that Congress had rejected this mode of reasoning, as evidenced by its amendments to the Copyright Act after previously endorsing the idea that a commercial provider was not infringing on an exclusive right if an individual could lawfully do the same act.161 The BarryDriller court noted that Congress acted in response to Fortnightly Corp. v. United Artists Television, Inc.,162 which held that the use of antenna systems by cable companies to broadcast content did not constitute a public performance because the action would not be a public performance if an individual erected an antenna on a hill, strung a cable to his house, and installed amplifying equipment.163 Noting that “cable systems are commercial enterprises whose basic retransmission operations are based on the carriage of copyrighted program material and . . . copyright royalties should be paid by cable operators to the creators of such programs,” Congress amended the Copyright Act to require cable companies to pay license fees to access locally broadcasted content, despite the fact that individuals could access

158. Id. at 1144–45 (noting that, “like Cablevision and this case, [the Supreme Court] was concerned with a copyright in the work that was broadcast.”) The court also noted that, in Buck v. Jewel-LaSalle Realty Co., 283 U.S. 191, 196 (1931), a case upon which Cablevision relied, “[t]he Supreme Court was not concerned about the ‘performance of the performance’—instead, it held that using a radio to perform the copyrighted song infringed the exclusive right to perform the song (not to perform the performance of the song).” BarryDriller, 915 F. Supp. 2d at 1144.
159. Id. at 1145; see also WNET, Thirteen v. Aereo, Inc., 712 F.3d 676, 690 (2d Cir. 2013) (Chin, J., dissenting). In his dissent, Judge Chin noted that Cablevision’s holding that Cablevision’s transmissions were not public “makes no sense.” Id. at 697. He explained that, under the theory endorsed by Cablevision and Aereo, Aereo could retransmit the Super Bowl “live” to 50,000 subscribers and yet, merely because Aereo assigned individual antennas to each subscriber and transmitted a unique recorded copy of the broadcast, Aereo actually made 50,000 private, non-infringing performances. Id. at 697. However, as Judge Chin stated: “These are very much public performances.” Id.; see also WPIX, Inc. v. IVI, Inc., 691 F.3d 275, 283 (2d Cir. 2012) (discussing how the public would be affected by changes in the television industry stemming from a convoluted interpretation of the Transmit Clause).
160. WNET, Thirteen, 712 F.3d at 691.
162. 392 U.S. 390, 400 (1968). For a further discussion of Fortnightly, see supra note 76 and accompanying text.
163. Fortnightly, 392 U.S. at 400.
the same content by using their own antenna. AereoKiller subscribers could also access broadcasted content if they were to use a personal antenna system instead of their AereoKiller subscription, but the BarryDriller court rejected this contention based on Congress’s desire to ban “commercial enterprises” from conducting activities that could legally be done by individuals.

c. The Aereo II Court’s Decision

On June 25, 2014, the Supreme Court issued a ruling against Aereo in American Broadcasting Companies, Inc. v. Aereo, Inc. (Aereo II), finding that its individual transmissions to individual users constituted a public performance for purposes of copyright infringement. In its reasoning, the majority focused primarily on the congressional intent behind the passing of the Copyright Act of 1976. Accordingly, it likened Aereo’s services to those of the cable companies that the amendments to the Copyright Act sought to address. Neither the majority nor dissent addressed whether Aereo would actually qualify as a cable system under the statute, however, which left unclear whether Aereo could qualify to pay for § 111’s compulsory license.

II. The Solution Poses Another Problem: The Aereo II Court’s Decision

As stated in Part I, the public performance doctrine came under intense scrutiny due to the streaming activities of Aereo and AereoKiller. Part II of this Comment discusses the majority’s analysis and the dissent in Aereo II, particularly focusing on the Court’s decision not to address whether Aereo qualifies as a cable company.


165. See BarryDriller, 915 F. Supp. 2d at 1146; see also WNET, Thirteen, 712 F.3d at 696. Judge Chin categorized Congress’s amendments in the 1976 Copyright Act as a response by Congress “to reach new technologies like this one that are designed solely to exploit someone else’s copyrighted work,” and therefore applied the Transmit Clause in a way that barred Aereo from an activity he deemed to be exploiting a copyrighted work in the same way that cable broadcasters exploited local broadcasters prior to the 1976 Copyright Act. WNET, Thirteen, 712 F.3d at 699.


167. Id. at 2509.

168. Id.

169. See id.


A. The Majority Opinion in Aereo II

In determining whether Aereo infringed copyright holders’ right to “perform” their copyrighted works “publicly,” the Court considered first whether Aereo performed at all merely by supplying equipment and content to subscribers.\(^{172}\) In holding that Aereo performed, the Court considered: (1) the language adopted by the 1976 Copyright Act; (2) Congress’s purposes in amending the Copyright Act in 1976 and adding the Transmit Clause, and (3) Aereo’s likeness to cable companies targeted by these amendments.

The Court first looked to the language of §§ 106(4) and 101 to determine whether Aereo transmits a performance when a subscriber watches a program using an Aereo system.\(^{173}\) Noting that “[t]o perform . . . a work ‘publicly means . . . to transmit . . . a performance . . . of the work . . . to the public . . . ,” the Court found that the language did not clearly state when an entity performs or whether it performs merely by providing equipment and allowing others to select the content that this equipment transmits.\(^{174}\) As a result, the Court declined to conclude whether Aereo’s equipment merely responded to subscriber requests or whether it affirmatively performed in a way that would violate the statute.\(^{175}\)

Next, the Court looked to Congress’s reasoning for adopting the 1976 amendments to the Copyright Act. As other courts did in their analyses,\(^{176}\) the Court noted that Congress responded to the Court’s decisions in \textit{Fortnightly} and \textit{Teleprompter Corp. v. Columbia Broadcasting System, Inc.},\(^{177}\) in which the Court held that community antenna television (CATV) providers did not “perform” in violation of the then-current statute.\(^{178}\) Reasoning that CATV systems simply carried whatever programs they received, unlike broadcasters that chose the content to transmit, the \textit{Fortnightly} and \textit{Teleprompter} Courts saw the CATV providers as viewers rather than performers.\(^{179}\)

The \textit{Aereo II} Court noted that Congress amended the Copyright Act largely to reject the Court’s holdings in \textit{Fortnightly} and \textit{Teleprompter}, and perhaps specifically to address the lines drawn by the Court between the viewer and the performer.\(^{180}\) The amended statute provides that to “perform” an audiovisual work means “to show its images in any sequence or to make the sounds accompanying it audible,” thus suggesting that both the viewer and the broadcaster of a television program perform.\(^{181}\) The Court supported its stance with legislative history: “[A] broadcasting network is performing when it transmits [a singer’s performance of a song]

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172. \textit{Aereo II}, 134 S. Ct. at 2503.
173. \textit{Id.} at 2504.
174. \textit{Id.}
175. \textit{Id.}
176. \textit{See supra} note 76 and accompanying text.
178. \textit{Aereo II}, 134 S. Ct. at 2505.
179. \textit{Id.}
180. \textit{Id.} at 2505–06.
181. \textit{Id.}
and any individual is performing whenever he or she . . . communicates the performance by turning on a receiving set."\textsuperscript{182} The Court then looked to the Transmit Clause, noting that Congress intended the language to cover cable system activities like those of the CATV systems in \textit{Fortnightly} and \textit{Teleprompter}.\textsuperscript{183}

Before ending its “performance” analysis, the Court likened Aereo to the CATV companies that Congress amended the Copyright Act to reach.\textsuperscript{184} Reasoning that Aereo “sells a service that allows subscribers to watch television programs,” and, much like the CATV providers in \textit{Fortnightly} and \textit{Teleprompter}, allows its users to select the content to watch, it effectively performed like a cable company.\textsuperscript{185}

After determining that Aereo performed, the Court considered what Aereo performed and whether it did so publicly. In holding that Aereo transmitted content to the public, the Court again looked to the language of the Transmit Clause and buttressed its reading with legislative history and Aereo’s likeness to cable companies.

To determine what performance Aereo transmitted, the Court looked to § 101’s language. The Court noted that, under the Act, “to transmit a performance . . . is to communicate it by any device or process whereby images or sounds are received beyond the place from which they are sent,” and to perform an audiovisual work means “to show its images in any sequence or to make the sounds accompanying it audible.”\textsuperscript{186} Accepting Aereo’s contention that it transmitted a new performance of a work instead of retransmitting the prior underlying broadcast, the Court nevertheless concluded that Aereo transmits a performance whenever one of its subscribers watches a program.\textsuperscript{187}

Moreover, though it noted that Aereo’s technology did separate it from traditional cable companies to a degree, the similarities were sufficient to overcome crafty technological contrivances: “We do not see how this single difference, invisible to subscriber and broadcaster alike, could transform a system that is for all practical purposes a traditional cable system into ‘a copy shop that provides its patrons with a library card.’”\textsuperscript{188} The Court also noted that Aereo’s commercial objectives were the same as those of the cable companies targeted by the 1976 amendments.\textsuperscript{189}

The Court then considered whether these individual performances were made to the public. Quickly dismissing Aereo’s argument that its

\begin{footnotesize}
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\item \textsuperscript{182} \textit{Id.} (quoting H. R. REP. NO. 94-1476, at 63 (1976)).
\item \textsuperscript{183} \textit{Id.} at 2506 (“The Clause thus makes clear that an entity that acts like a CATV system itself performs, even if when doing so, it simply enhances viewers’ ability to receive broadcast television signals.”).
\item \textsuperscript{184} \textit{Id.}
\item \textsuperscript{185} \textit{Id.}
\item \textsuperscript{186} \textit{Id.} at 2508 (citing 17 U.S.C. § 101).
\item \textsuperscript{187} \textit{Id.}
\item \textsuperscript{188} \textit{Id.} at 2507 (noting that Aereo subscribers select the content to be rerouted and streamed to their devices, whereas traditional cable subscribers tuned to frequencies where content had been made available already).
\item \textsuperscript{189} \textit{Id.}
\end{itemize}
\end{footnotesize}
individual transmissions circumvented the public performance question, the Court noted that a transmission could be made through a set of actions.\textsuperscript{190} The Court focused on the fact that the Transmit Clause provides that a performance could be made to the public “whether the members of the public capable of receiving the performance . . . receive it . . . at the same time or at different times,” which makes it possible for performance to be made through one or several discrete communications.\textsuperscript{191} Furthermore, the Court noted that technological innovation allowing for simultaneous individual transmissions did not eviscerate the statutory protection.\textsuperscript{192}

The Court then noted that the subscribers to whom Aereo transmitted programs constituted “the public” for purposes of the statute.\textsuperscript{193} While the Act does not define the public, the Court noted, it does state that an entity performs publicly when it performs at “any place where a substantial number of persons outside of a normal circle of a family and its social acquaintances is gathered.”\textsuperscript{194} Moreover, the Transmit Clause language provides that an entity may perform publicly regardless of whether the members of the public receive it in the “same place or in separate places and at the same time or at different times.”\textsuperscript{195} Taken together, the Court reasoned, these provisions support the finding that Aereo transmitted to the public every time its subscribers requested programming.\textsuperscript{196}

Before concluding, the majority addressed Aereo’s concern that the opinion might affect new technologies and limited its holding to the online retransmission of broadcast signals.\textsuperscript{197} The majority answered: “Congress, while intending the Transmit Clause to apply broadly to cable companies and their equivalents, did not intend to discourage or to control the emergence or use of different kinds of technologies.”\textsuperscript{198} The Court carefully explained the limitations of its holding. First, different providers only would be deemed to perform if they, too, transmitted contemporaneously perceptible images and sounds.\textsuperscript{199} Second, its holding applied only when copyrighted material was transmitted to the public.\textsuperscript{200} In declining to opine on how its holding would apply to technologies not squarely presented, the Court stated that it would wait for such a case and,

\begin{itemize}
\item \textsuperscript{190} Id.
\item \textsuperscript{191} Id. at 2509 (citing 17 U.S.C. § 101).
\item \textsuperscript{192} Id. (noting that “an entity may transmit a performance through one or several transmissions, where the performance is of the same work” and that “whether Aereo transmits from the same or separate copies, it performs the same work”).
\item \textsuperscript{193} Id. at 2509–10.
\item \textsuperscript{194} Id. (citing 17 U.S.C. § 101).
\item \textsuperscript{195} Id. at 2510 (citing 17 U.S.C. § 101).
\item \textsuperscript{196} Id.
\item \textsuperscript{197} Id.
\item \textsuperscript{198} Id.
\item \textsuperscript{199} Id.
\item \textsuperscript{200} Id. at 2510–11 (“And we have not considered whether the public performance right is infringed when the user of a service pays primarily for something other than the transmission of copyrighted works, such as the remote storage of content.”).
\end{itemize}
in the meantime, commercial actors and interested entities were free to seek action from Congress.\footnote{201}

\subsection*{B. The Aereo II Dissent}

In dissent, Justice Scalia alleged that the majority distorted the Copyright Act. Like the majority, the dissent first considered whether Aereo “perform[ed]” at all.\footnote{202} Instead of adopting the majority’s improvised “looks-like-cable-TV” standard, the dissent framed its analysis by considering the differences between direct and secondary liability—a distinction which would channel the claims into the correct analytical track.\footnote{203} Noting that the networks claimed that Aereo directly infringed their public performance right, the dissent explained that Aereo could be held directly liable only if it “engaged in volitional conduct that violate[d] the Act”\footnote{204} and if Aereo itself “trespassed on the exclusive domain of the copyright owner.”\footnote{205}

To illustrate the volitional conduct requirement, the dissent considered whether Aereo’s services were more similar to those of a copy shop than a video-on-demand or cable service.\footnote{206} A copy shop, it stated, provides a photocopier to patrons, who ultimately choose the content to duplicate.\footnote{207} The patron—not the copy shop—chooses the content and activates the copier; the copy shop simply responds to the patron’s requests.\footnote{208} Because the copy shop does not select the content, it cannot be held directly liable if the customer were to make a copy of copyrighted material.\footnote{209} Video-on-demand services, by contrast, choose the content to provide (though they do respond automatically to user input like a copier does), and thus should be analyzed under a direct infringement framework.\footnote{210}

The dissent then characterized Aereo’s activities.\footnote{211} Admitting that Aereo was neither a copy shop nor a video-on-demand service, the dissent labeled Aereo “a copy shop that provides its patrons with a library card,” stressing that Aereo provides access to content, which the subscribers select.\footnote{212} Importantly, the dissent noted, Aereo does not provide a
prearranged list of movies or shows—it just assigns an antenna, which intercepts freely available content, to each subscriber. Because Aereo does not choose the content, Aereo does not engage in any volitional conduct and thus does not “perform,” which was sufficient to end the dissent’s analysis on whether Aereo performed publicly.

After concluding that Aereo did not directly infringe the networks’ public performance right, the dissent continued to critique the majority’s “looks-like-cable-TV” standard. In particular, the dissent considered how the majority’s reasoning glossed over key differences between Aereo and the CATV systems in *Fortnightly* and *Teleprompter*, which led to the unfounded conclusion that Aereo should come within the realm of the 1976 Copyright Act. Cable companies, the dissent noted, were “curators of content”—that is, they selected and imported signals and made programming available to subscribers. Aereo did not.

C. A Dissent to the Dissent

While the majority in *Aereo II* declined to address how its decision would impact other forms of technology, as the dissent pointed out, its analysis provided no criteria for when its new “looks-like-cable-TV” standard applies. The dissent considered that the majority may have suggested its new standard should apply when companies provide access to live cable television, but then considered how the standard could be circumvented easily by implementing a time-delay function into its streaming. The dissent also cautioned against the standard being interpreted more broadly, perhaps to capture companies that store live television broadcasts at a user’s discretion, as such a standard would capture many service providers that “obviously do not perform.”

Instead of adopting the majority’s standard and noting that this technology was not contemplated during the amendments to the 1976 Copyright Act, the dissent again stressed that, if the Court wanted to adopt a rule, it should have adopted a framework modeled on whether an entity engages in volitional conduct that infringes the public performance right, rather than whether it looks like a cable television service. However, the dissent’s application of this test similarly falls short because it treats Aereo like a passive actor.

213. *See id.*
214. *See id.*
215. *See id.* at 2515.
216. *See id.*
217. *See id.* at 2515–16.
218. *See id.* at 2516.
219. *See id.* (“Making matters worse, the Court provides no criteria for determining when its cable-TV-lookalike rule applies. Must a defendant offer access to live television to qualify?”).
220. *See id.*
221. *See id.* at 2517.
222. *See id.*
The dissent focuses primarily on the fact that Aereo does not choose the content it provides as a means of distinguishing it from cable companies. Likening Aereo to a copy shop that gives its patrons library cards, the dissent explains that Aereo can be used to obtain whatever broadcasts are already freely available—an interpretation that treats the subscriber as the performer because she chooses the content. However, while Aereo customers presumably could access the same locally broadcast content themselves by installing their own antenna, Congress rejected the equivalency of companies and individuals, noting that “cable systems are commercial enterprises whose basic retransmission operations are based on the carriage of copyrighted program material,” which required them to pay copyright royalties. Moreover, courts have noted that a commercial entity cannot “stand in the shoes” of its customers and benefit from arguments that they might have. Thus, Aereo should not be permitted to claim that it provides the system by which its subscribers can access freely available content in an effort to avoid a protection designed to account for their activities.

Like the majority, the dissent failed to provide a clear and workable standard that the courts should employ going forward. Instead, it cautioned that Congress was in the best position to revise the Copyright Act to account for changing technology.

III. A PROPOSAL ON HOW TO SOLVE THE PUBLIC PERFORMANCE CONUNDRUM

As discussed above, the Aereo II Court’s decision leaves technology companies without a clear standard for determining whether they are performing publicly in violation of the Copyright Act. This part examines the shortcomings of the Aereo II Court’s opinion, focusing on how the Court could have provided clearer guidance on the public performance doctrine. Part III.A analyzes alternative arguments that were not employed by the Aereo II Court. Part III.B argues why the Aereo II Court’s holding was correct because it better satisfies copyright’s dual purposes. Part III.C proposes that the adoption of a compulsory licensing scheme for content transmitted by cloud-based service providers like Aereo and AereoKiller is not unduly burdensome for innovative companies and is therefore an appropriate remedy to adopt.

223. See supra note 164 and accompanying text.
224. See supra notes 76, 164 and accompanying text.
225. See Aereo II, 134 S. Ct. at 2517–18.
226. See id. at 2518.
227. See supra Part II.C. Since Aereo I was decided, a local television station owner in Massachusetts brought a lawsuit against Aereo, Inc., but his motion for a preliminary injunction against Aereo was denied. See Hearst Stations Inc. v. Aereo, Inc., 977 F. Supp. 2d 32 (D. Mass. 2013). By contrast, the D.C. District Court granted a preliminary injunction against FilmOn X LLC, which provides streaming services, like Aereo and AereoKiller, and DVR services, like Cablevision. See Fox Television Stations, Inc. v. FilmOn X LLC, 966 F. Supp. 2d 30 (D.D.C. 2013).
A. The Aereo II Court’s Shortcomings

As the Aereo II dissent noted, the majority’s opinion effectively created a new standard for cloud-based service providers that undoubtedly will be difficult to apply in the future.\(^{228}\) Though the Court was careful to limit its holding to Aereo’s technology,\(^{229}\) it is unclear how the “looks-like-cable-TV” standard will apply to future technologies that potentially engage in public performances.

Though the dissent criticized the majority’s use of congressional records to interpret the Copyright Act, the legislative history evinces intent to capture future technology.\(^{230}\) Like the services provided by RS-DVR and cloud streaming, copyright law has struggled with technological innovations since its inception and likely will never keep pace with technology.\(^{231}\) In light of this constant struggle, the policy stressed in the legislative history of the 1976 Copyright Act was afforded an appropriate amount of weight in Aereo II to underscore the idea that, when a copyright statute is subject to multiple interpretations, the balance between technologically innovative companies and copyright holders should weigh in favor of the copyright holders. Though courts had not explicitly endorsed this idea in the copyright context, they have declined to allow parties to capitalize on ambiguities in statutory language as a way to skirt liability in areas where the law was designed to protect copyright holders.\(^{232}\)

However, the majority glossed over the fact that, while technology will undoubtedly continue to outpace the law, it should not be condoned when it clearly has been developed to circumvent the law that cannot catch up. Though the Aereo II Court did not discuss this notion, the Court has endorsed this idea to an extent in prior cases, opining that the novelty of the means used by an innovative company did not diminish the Court’s duty to afford full public performance protection in a musical context.\(^{233}\) Moreover, though not in the context of cloud service providers, courts have noted that “it would strain logic” to base public performance protection “on the mere method by which television signals are transmitted to the public.”\(^{234}\) It would go against these courts, then, to allow companies like Aereo to circumvent copyright law by technology, which Judge Chin aptly

\(^{228}\) See supra notes 216–18 and accompanying text.

\(^{229}\) See supra notes 199–201 and accompanying text.

\(^{230}\) See supra Part I.C.2.c.

\(^{231}\) See supra Part I.C.2.c.

\(^{232}\) See supra note 71 and accompanying text; see also Greater Iowa Corp. v. McLendon, 378 F.2d 783, 795–96 (8th Cir. 1967) (“From our position it seems that defendants may be attempting to do indirectly what they would be clearly prohibited by law from doing directly . . . . Courts should hesitate to sanction a result which thwarts established legislative purposes, or allows a skirting of the law merely on the basis of form” because “[t]o permit such a ‘loophole’ to exist would be to invite any group of dissatisfied shareholders to avoid the restraints of . . . rules simply by organizing along the lines of a voting trust.”).

\(^{233}\) See supra note 67 and accompanying text.

\(^{234}\) See supra note 61 and accompanying text.
described as “an inefficient process of using thousands of individual antennas rather than one central antenna to take advantage of a perceived loophole” in the copyright law.\textsuperscript{235} Doing so would frustrate copyright’s purpose, as discussed in Part III.B.

The \textit{Aereo II} Court also declined to address that Congress actually contemplated applying the public performance doctrine to the future technologies on which it tried to avoid commenting. While the House Report addressed the streaming of programs from one source to many people, as the spread of cable television and the transmission of content from one antenna to many users spurred the amendments to the Copyright Act and thus provided the fodder for the House, it did not foreclose the application of the Transmit Clause to future technologies. In fact, the House Report further clarified that the Transmit Clause applied to “all conceivable forms and combinations of wired or wireless communications media,” and that when “[a] transmission reaches the public in any form, the case comes within the scope of clauses (4) or (5) of section 106.”\textsuperscript{236} Thus, the Court had the opportunity to provide a standard for future technologies and simply declined to seize it.

Perhaps more important than the arguments the Court left out is the fact that it did not explicitly address whether Aereo was a cable company.\textsuperscript{237} A necessary corollary of ruling that Aereo publicly performed like a cable company—after all, “for all practical purposes \textit{[Aereo operates as] a traditional cable system}”\textsuperscript{238}—should mean that Aereo is similarly entitled to the compulsory license available to those cable companies under § 111. While the Second Circuit has previously held that a similar system did not qualify as a cable system under the statute,\textsuperscript{239} it was within the Court’s discretion to examine Aereo’s system more closely in \textit{Aereo II}.

The \textit{Aereo II} Court should have stated that Aereo’s system qualifies as a cable system because it fits within the definition under § 111. Section 111 provides that a cable system is:

1. a facility, located in any State, territory, trust territory, or possession of the United States, that
2. in whole or in part receives signals transmitted or programs broadcast by one or more television broadcast stations licensed by the Federal Communications Commission, and
3. makes secondary transmissions of such signals or programs by wires, cables, microwave, or other communications channels to
4. subscribing members of the public who pay for such service.\textsuperscript{240}

Aereo fulfills each criterion and, like cable systems in the 1970s, transmits only locally available content.\textsuperscript{241} In addition to falling within the cable

\begin{footnotesize}
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\item \textsuperscript{235} See supra note 165 and accompanying text.
\item \textsuperscript{236} See supra notes 83, 93 and accompanying text.
\item \textsuperscript{237} See supra note 169 and accompanying text.
\item \textsuperscript{238} See \textit{Aereo II}, 134 S. Ct. 2498, 2507 (2014).
\item \textsuperscript{239} See \textit{generally} WPIX, Inc. v. Ivi, Inc., 691 F.3d 275, 281 (2d Cir. 2012).
\item \textsuperscript{240} 17 U.S.C. § 111(f)(3) (2012).
\item \textsuperscript{241} See Jim Edwards, \textit{Why It’s a Disaster That the Supreme Court Banned Aereo}, BUSINESS INSIDER (June 25, 2014, 10:26 AM), http://www.businessinsider.com/a-disaster-if-the-supreme-court-bans-aereo-2014-6 (“Aereo is one of those devices that’s so simple it’s
company definition, Aereo, like cable companies, has the same concerns with negotiating for individual licenses that cable companies did before the adoption of § 111.242 By not explicitly labeling Aereo as a cable system, the Court effectively hammered a nail in its coffin: if Aereo is outside the purview of § 111, it will have to negotiate for individual licenses—undoubtedly an inefficient, if not impossible, endeavor.

B. The Supreme Court’s Interpretation of the Transmit Clause Will Help to Effectuate Copyright’s Dual Purposes

While the Aereo II decision did falter on some levels, its holding will help to advance copyright’s purposes to an extent. As discussed in Part I, copyrights serve two purposes: to benefit the public and to reward artists for their work.243 Because providing reasonable access to television is a public interest, it is important that courts consider the repercussions of allowing companies like Aereo and AereoKiller to retransmit content without paying fees, unlike cable companies, which pay statutory licensing and retransmission content fees for the content they retransmit, or broadcasters, which pay licensing fees.244 Copyright’s purposes of benefiting the public and protecting the copyright holder will be frustrated if (1) copyright holders withhold their works or (2) parties who fund these programs stop investing in them.

One major concern of permitting Aereo and similar companies to transmit content without paying for it is that copyright holders will withhold their works if they are not compensated fully for them.245 Copyright holders threatened as much in the 1960s when their copyrights were being misappropriated by cable companies, and they began to withhold their products after feeling that copyright law favored cable operators over copyright holders.246 One study observes that copyright owners resorted to regaining control of their product by withdrawing their programs from over-the-air broadcast stations to prevent cable providers from carrying them, and even paid cable systems not to carry their programs.247 The same concern presents itself here, where copyright holders might similarly withhold their content if they are being denied protection.248 Moreover, copyright holders might seek redress not only from companies like Aereo
and AereoKiller, which made the particular transmissions, but also for the underlying copying that facilitated the transmission.\textsuperscript{249} Those entities might stop engaging in what are actually lawful activities if they are discouraged by the prospect of lawsuits. In either case, the public will surely lose.

While protection of a creator’s work is not the primary goal of copyright,\textsuperscript{250} declining to protect copyright holders may cause them to withhold valuable material at the public’s expense.\textsuperscript{251} By contrast, enforcing copyright protection encourages people to continue to act as artists and creators by allowing them to personally gain from their labor.\textsuperscript{252} As the \textit{BarryDriller} court explained, “[i]t is virtually axiomatic that the public interest can only be served by upholding copyright protections and correspondingly, preventing the misappropriation of skills, creative energies, and resources which are invested in the protected work.”\textsuperscript{253}

Another concern is that broadcasters might decline to keep as many programs available if they are losing viewers to Aereo and AereoKiller, which can charge small fees for accessing content because they are not required to account for licensing fees in their subscription costs.\textsuperscript{254} The public might also be adversely affected if companies can freely engage in activities that cost cable providers licensing fees, because such behavior might decrease the incentive that media companies have to invest in future works or advertising companies to invest in commercials.\textsuperscript{255} As the court noted in \textit{WPIX, Inc. v. Ivi, Inc.},\textsuperscript{256} “the quantity and quality of efforts put into creating television programming, retransmission and advertising revenues, distribution models and schedules—all would be adversely affected.”\textsuperscript{257} These concerns could be exacerbated, as Judge Chin describes, if other companies see Aereo and AereoKiller as “a blueprint” on how to avoid the Copyright Act’s licensing regime.\textsuperscript{258} These harms would not only be detrimental to the copyright holders themselves but could destabilize the entire cable industry at the expense of the public. At the same time, however, a murky decision that does not put Aereo in a position to pay compulsory licenses threatens the public’s ability to access certain information. Perhaps more importantly, it fails to provide a standard that other companies can follow and sends the message that companies should err on the side of caution, lest they be punished for possibly infringing innovation.

\begin{itemize}
\item \textsuperscript{249} See \textit{supra} note 159 and accompanying text.
\item \textsuperscript{250} See Moohr, \textit{supra} note 51 and accompanying text.
\item \textsuperscript{251} See \textit{supra} note 92 and accompanying text.
\item \textsuperscript{252} See \textit{supra} note 47 and accompanying text.
\item \textsuperscript{253} See \textit{supra} note 165 and accompanying text (discussing the policy reasons for copyright protection in \textit{Warner Bros. Entm’t Inc. v. WTV Sys., Inc.}, 824 F. Supp. 2d 1003, 1014 (C.D. Cal. 2011)).
\item \textsuperscript{254} See \textit{supra} note 247 and accompanying text.
\item \textsuperscript{255} See \textit{supra} note 159 and accompanying text.
\item \textsuperscript{256} See 691 F. 3d 275 (2012).
\item \textsuperscript{257} See \textit{id.} at 286; \textit{supra} notes 158–59 and accompanying text.
\item \textsuperscript{258} See \textit{supra} note 159 and accompanying text.
\end{itemize}
In addition to its own interpretation of the Copyright Act and the policy reasons for adopting the amendments to the 1976 Copyright Act, the Aereo II Court should have more thoroughly examined the implications of concluding that cloud-based service providers publicly performed without also providing a clearer categorization of these companies. The Court should have labeled Aereo as a cable company, until Congress decides otherwise. Ultimately, the Copyright Act should be revised again to more clearly capture cloud-based service technology. In particular, Congress should also adopt a new compulsory licensing scheme specific to cloud-based service providers and their technology.

C. The Adoption of a Compulsory Licensing Scheme for Cloud-Service Providers Is an Effective Way to Reconcile Advances in Technology with Fundamental Copyright Protections

Adopting a compulsory licensing scheme akin to the one developed in the 1976 Copyright Act would allow technology to continue to develop and simultaneously protect copyright holders.259 As in the case of the compulsory licensing scheme which was adopted almost forty years ago to address the concerns of copyright holders and broadcasters,260 a compulsory licensing scheme specific to cloud-based service providers or similar technology providers would still be favorable to them. First, a compulsory licensing scheme would be cost effective and efficient for cloud-based service providers.261 Second, the compulsory licensing scheme could be developed in a way to balance the interests of the copyright holders and the cloud-based service providers in a way that would not frustrate technological innovation.

In deciding how to address concerns in the cable industry, Congress examined two issues that were ameliorated by the compulsory licensing scheme.262 First, requiring cable operators to engage in free market negotiations might result in unfairly costly copyright licenses or perhaps no licenses at all, given that “big television networks, big television stations and big television program producers” had the upper hand.263 Second, Congress noted that the other alternative would require individual cable systems to bargain on a signal-by-signal basis; “given the numerous cable systems, channels, distant signals and programs,” these individual negotiations otherwise would have been cost and time prohibitive.264 These issues could resurface if cloud-based service providers were required to negotiate individually for the rights to stream every program that they make

259. This Comment’s discussion of the proposed compulsory licensing scheme is limited to preliminary ideas that would solve the main concerns that copyright holders have in the face of expanding technology. For a further discussion of the reasons that compulsory licensing schemes pose an effective solution for copyright holders and innovators alike, see generally Cate, supra note 86.
260. See supra note 61 and accompanying text.
261. See supra note 86 and accompanying text.
262. See supra notes 92–94 and accompanying text.
263. See supra note 92 and accompanying text.
264. See supra note 92 and accompanying text.
available. By contrast, paying a fee through a new compulsory licensing scheme would be relatively inexpensive when compared to the full cost of ad hoc copyright licenses combined with the negotiation costs for those licenses. In addition, a compulsory licensing scheme is the more efficient option for cloud-service providers, who would otherwise have to obtain negotiated licenses from each copyright holder.

Though the proposed compulsory licensing scheme for cloud-based service providers might have to encompass other types of technology, it should still operate in a way that does not unduly burden technologically innovative companies. Similar to the current compulsory licensing scheme, the retransmission of certain content should be exempt from the new scheme to account for the fact that Aereo and AereoKiller provide content that could be accessed by subscribers through their own personal rooftop antennas. Adopting this system would strike a fair balance: it would not treat copyright holders unfairly, as they are already being compensated for the content broadcasted, but cloud-based service providers would still be subject to licensing fees when streaming nonexempt materials. One proposed way to distinguish between exempt and nonexempt programs is geographically; such a method would require cloud-based service providers to freely access content available within a certain geographic area to be able to stream it to customers. Another proposed way is based on viewership; such a method would require cloud-based service providers to pay more for streaming 50,000 “performances” of the Super Bowl but less for 100 performances of the local nightly news.

While the current compulsory licensing scheme applicable to cable television broadcasts has been criticized lately, these criticisms are not applicable to the situation of cloud-based service providers and copyright holders. For instance, since the compulsory licensing scheme was adopted in 1976, the cable television industry has seen the spread of large individual cable systems and, as a result of this growth, the increased ability to bargain. Thus, critics argue that the current need for a system that favors now-large and capable cable systems is inconsistent with the original need to provide an efficient way for small companies to negotiate with parties that had more power. However, as cloud-based service providers have yet to take over the viewership market and undoubtedly do not have the platform that cable companies do, the cloud-based service providers are more like the cable companies of 1976. Moreover, the compulsory licensing scheme has been criticized as slow and inefficient. However, the often-critiqued Copyright Royalty Tribunal, which originally administered the compulsory licensing system, was phased out by the

265. See supra note 86 and accompanying text.
266. See supra note 86 and accompanying text.
267. See supra notes 88–91 and accompanying text.
268. See supra note 92 and accompanying text.
270. See supra note 86 and accompanying text.
271. See Greenman, Jr. & Deutsch, supra note 95, at 37.
272. See supra note 86 and accompanying text.
Copyright Arbitration Royalty Panel, which was then replaced with the Copyright Royalty and Distribution Reform Act of 2004. This Act, which has come under less criticism than its predecessors, determines the rates and terms for statutory licenses and provides a framework for a new compulsory licensing scheme. In considering how to administer a new compulsory licensing scheme, Congress could look to the current framework, as well as to private schemes like those between companies like Broadcast Music, Inc. and music publishers, which seemingly have come under less scrutiny than the compulsory licensing act that governs cable television.

CONCLUSION

Cloud-based service providers like Aereo and AereoKiller provide their subscribers relatively inexpensive and easy access to content. However, they provide their services to the chagrin of local programmers.

Until Congress clarifies the statutory language, the Supreme Court should continue to consider the legislative history and policy reasons for adopting the Transmit Clause to protect copyright holders in the face of different technologies. Doing so would further copyright’s dual purposes of benefiting the public and spurring innovation. A new compulsory licensing scheme could alleviate the current concerns of copyright holders and cloud-based service providers, and Congress has the benefit of being able to build on its current compulsory licensing scheme for the cable television industry. Even so, amending the statute will not be an everlasting panacea. Amidst all of this “cloudiness,” one thing remains clear: evolving technology will continue to complicate the relationship between copyright holders and innovative companies. Stay tuned.

273. See Dicola & Sag, supra note 62 and accompanying text.
274. See supra note 86 and accompanying text.
275. See supra note 86 and accompanying text.