

***Metro-Goldwyn-Mayer Studios, Inc. v. Grokster, Ltd.* and
In re Aimster Copyright Litigation:
Who Will Decide *Sony* Doctrine's Next Step?**

For the last twenty years, the Supreme Court's decision in *Sony Corp. of America, Inc. v. Universal City Studios* has guided lower courts' analysis of the potential liability of technology providers whose products may be used to infringe copyrights.¹ The application of the *Sony* rule to digital technologies, however, has been less than straightforward. Two recent decisions regarding the legality of distributing peer-to-peer file sharing software, *Metro-Goldwyn-Mayer Studios, Inc. v. Grokster, Ltd.*² and *In re Aimster Copyright Litigation*,³ reached widely divergent outcomes and thus left open the question of the correct legal standard to apply in assessing secondary liability for copyright infringement over the Internet.⁴

Taken together, *Grokster* (a California district court case decided in April 2003 and pending appeal) and *Aimster* (a June 2003 decision by the Seventh Circuit) constitute a schism in secondary copyright infringement jurisprudence that invites further guidance from the Supreme Court, Congress or both. This Note tracks the development of secondary copyright infringement doctrine in the peer-to-peer context and proposes that the user-driven platform for information exchange the Internet affords is poorly suited to traditional conceptions of secondary liability.

¹ See *Sony Corp. of America, Inc. v. Universal City Studios, Inc.*, 464 U.S. 417 (1984).

² *Metro-Goldwyn-Mayer Studios, Inc. v. Grokster, Ltd.*, 259 F. Supp. 2d 1029 (C.D. Cal. 2003).

³ *In re Aimster Copyright Litigation*, 334 F.3d 643 (7th Cir. 2003), *aff'g* 252 F. Supp. 2d 634 (N.D. Ill. 2002), *petition for cert. filed*, 72 U.S.L.W. 3328 (U.S. Oct. 28, 2003) (No. 03-658).

⁴ See Jeffrey R. Armstrong, *Sony, Napster, and Aimster: An Analysis of Dissimilar Application of the Copyright Law to Similar Technologies*, 13 DEPAUL-LCA J. ART & ENT. L. 1 (2003).

The Note argues that *Grokster* offers the more faithful application of the contributory infringement principles articulated in *Sony*, which further important policy goals for technological development and First Amendment values. Nonetheless, analysis of the instant cases and their predecessors reveals crucial gaps and conflicts in the doctrine that make it difficult for courts to surmise the current legal rules and consistently apply them to digital technologies such as peer-to-peer software. Thus the *Sony* rule as it stands is inadequate to guide uniform adjudication among circuits, and it requires further, authoritative elaboration to fit the federal copyright scheme.

I. COPYRIGHT ADJUDICATION IN THE PEER-TO-PEER AGE: LEGAL AND TECHNICAL ISSUES

A. Secondary Liability and the *Sony* Shield

Secondary liability for copyright infringement is a judge-made doctrine, never codified by Congress,⁵ that holds a second party liable for direct infringement by others. Common law divides secondary copyright liability into contributory and vicarious infringement. The elements of contributory infringement, which derive from tort law, are (1) knowledge of and (2) causation,

⁵ Though the First Congress enacted the first copyright statute soon after the nation's birth (1790), Congress has never directly defined secondary liability, including for the nearly twenty years since the Supreme Court decided *Sony*. See Act of May 31, 1790, § 1, 1 Stat. 124. Legislative history does indicate that Congress added the phrase "to authorize" to the list of copyright holder's rights in the 1976 amendment to the Copyright Act to in some way endorse contributory liability. See 17 U.S.C. §106; H.R. Rep. No. 1476, 94th Cong., 2d Sess. 61 (1975), *reprinted in* 1976 U.S.C.C.A.N. 5659, 5674 ("Use of the phrase 'to authorize' is intended to avoid any questions as to the liability of contributory infringers. For example, a person who lawfully acquires an authorized copy of a motion picture would be an infringer if he or she engages in the business of renting it to others for purposes of unauthorized public performance."). Justice Blackmun argued in his dissent to *Sony* that the legislative history to the 1976 Act showed that Congress intended to retain contributory infringement, as did provisions exempting certain parties for secondary liability (libraries for infringing use of their photocopiers and agricultural fairs for infringing performances). 464 U.S. at 417 note 37, 486 (Blackmun, J., dissenting). The Digital Millennium Copyright Act, enacted in 1998, specifically preserved secondary liability in the safe harbor provision for Internet service providers, but in no way defined its elements or scope. See 17 U.S.C. § 1201 (c)(2) ("Nothing in this section shall enlarge or diminish vicarious or contributory liability for copyright infringement in connection with any technology, product, service, device, component or part thereof.").

inducement, or material involvement in the second party's infringing conduct.⁶ Vicarious infringement, rooted in *respondeat superior* doctrine that holds employers liable for the illegal conduct of their employees or agents, requires (1) the right and ability to supervise the infringing conduct, and (2) a direct financial interest therein.⁷ Vicarious liability differs from contributory infringement in that the defendant need not be directly aware of the infringement, but rather only hold an economic stake in the infringing conduct.⁸ Courts have extended vicarious liability for copyright infringement beyond the confines of strict employer-employee relationships to other arrangements that satisfy the two enumerated elements—for instance, franchise owner-concessionaire, dance hall-dance band, talent agency-concert promoter, and swap meet proprietor-vendor.⁹

Sony was the first and only Supreme Court case to apply secondary liability to technology—the capabilities of machines rather than the conduct of people.¹⁰ Decided in 1984 in a 5-4 vote, *Sony* represents a limitation on secondary liability that has governed adjudication of technology cases for the ensuing two decades. The case began in California district court

⁶ See, e.g., *Gershwin Publishing Corp. v. Columbia Artists Management, Inc.*, 443 F.2d 1159, 1162 (2d Cir. 1971) (“[O]ne who, with knowledge of the infringing activity, induces, causes, or materially contributes to the infringing conduct of another, may be held liable as a ‘contributory’ infringer.”); Neil Boorstyn, BOORSTYN ON COPYRIGHT § 10.06[2], at 10-21 (1994) (“In other words, the common law doctrine that one who knowingly participates in or furthers a tortious act is jointly and severally liable with the prime tortfeasor, is applicable under copyright law.”). For an early example, see *Harper v. Shoppel*, 28 F. 613 (S.D.N.Y. 1886) (holding defendant liable for selling the plaintiff newspaper’s printing plate to a third party knowing it would be used to illegally copy the plaintiff’s paper). The Supreme Court recognized contributory liability for copyright infringement in 1911 in *Kalem v. Harper Bros.*, 222 U.S. 55 (1911) (holding a defendant who made an unauthorized film of the book *Ben Hur* and sold it for exhibition liable for contributory copyright infringement); the *Sony* Court distinguished *Kalem* by noting that in that case the defendant supplied the infringing material itself. *Sony*, 464 U.S. 435-46.

⁷ See, e.g., *Shapiro, Bernstein and Co. v. H.L. Green Co.*, 316 F.2d 304 (2d Cir. 1963) (holding the owner of a department store chain liable for the sale of counterfeit recordings by a concessionaire). See also *Buck v. Jewell-LaSalle Realty Co.*, 283 U.S. 191, 198-99 (1931); *Dreamland Ball Room, Inc. v. Shapiro, Bernstein & Co.*, 36 F.2d 354, 255 (7th Cir. 1929) (holding dance hall proprietors liable for hiring bands that played infringing music). The hirer-hiree relationship in these cases presents the classic context for *respondeat superior* liability.

⁸ See *Shapiro*, 316 F.2d at 307.

⁹ E.g., *id.*; *Buck*, 283 U.S. 191; *Gershwin*, 443 F.2d at 1162 (holding talent agency that printed and sold programs of infringing musical works to be performed at concerts liable for the infringement by their musician clients); *Fonovisa v. Cherry Auction*, 76 F.3d 259 (9th Cir. 1996).

¹⁰ See *Sony*, 464 U.S. 417.

when two movie studios alleged that because Sony's Betamax videocassette recorder could be used to tape movies and television programs, Sony was liable for contributory copyright infringement. Faced with the then-novel proposition that a seller of technology should be held liable for the conduct of its users and absent any statutory guidance in the Copyright Act, the *Sony* Court drew on the "staple article of commerce" doctrine codified by Congress in patent law to direct its analysis.¹¹ This provision prevents patentees from extending their monopoly rights to articles that might be used to infringe a patent but have other legitimate uses by exempting such items from contributory liability.¹² The *Sony* Court went on to create a parallel exemption for contributory copyright infringement: "[T]he sale of copying equipment, like the sale of other articles of commerce, *does not constitute contributory infringement* if the product is widely used for legitimate, unobjectionable purposes. Indeed, it need merely be capable of substantial noninfringing uses."¹³

Applying this criterion, the Court concluded that the Betamax videocassette recorder was capable of the fair use of time shifting (recording a program for later viewing),¹⁴ a noninfringing application adequate to invoke the exemption from contributory liability even where the record

¹¹ See 35 U.S.C. § 271(c). For instance, though a flashlight can be used in a patented process for exercising a cat with a beam of light, the patentee does not gain the sole right to control distribution of flashlights. See U.S. Patent 5,443,036. The Court adopted the staple article of commerce analysis from the district court's decision below. See 480 F. Supp. 429, 461 (C.D. Cal. 1979).

¹² 35 U.S.C. § 271(c). "Whoever offers to sell or sells within the United States or imports into the United States a component of a patented machine, manufacture, combination or composition, or a material or apparatus for use in practicing a patented process, constituting a material part of the invention, knowing the same to be especially made or especially adapted for use in an infringement of such patent, and not a staple article or commodity of commerce suitable for substantial noninfringing use, shall be liable as a contributory infringer." *Id.* See also *Sony*, 464 U.S. at 440.

¹³ *Sony*, 464 U.S. at 440 (emphasis added). It remains a point of hot contention whether the *Sony* shield relies upon the "widely used for" standard of the first sentence or the "merely be capable of" language in the second.

¹⁴ 464 U.S. at 442. Though the Court initially requires that the suspect device "be capable of commercially significant noninfringing uses," the opinion goes on to assert that the adjudicator "need not explore all the different potential uses of the machine," but rather "consider whether on the basis of the facts... a significant number of them would be non-infringing." With regards to the Betamax, the Court said, "[I]n order to resolve this case we need not give precise content to the question of how much use is commercially significant. For one potential use of the Betamax plainly satisfies this standard, however it is understood: private, non-commercial time-shifting in the home." 464 U.S. at 442.

showed that infringing use of the Betamax was widespread.¹⁵ The analysis framed the secondary liability question entirely within the staple article of commerce doctrine, presenting the technical capability for noninfringing use as a complete shield against contributory liability.¹⁶ The machine's purpose and the proportion of infringing use were not relevant; in fact, the Court explicitly overturned the Ninth Circuit's ruling that Sony infringed because the record showed that the company sold VTRs for the "primary purpose" of copying protected works and that "virtually all" of the recorded material was copyrighted.¹⁷

The *Sony* decision is peppered with policy pronouncements on law and technology and framed by the Court's reluctance to extend the copyright grant without congressional approval. Noting that the movie industry's lawsuit was "an unprecedented attempt to impose copyright liability" on technology makers, Justice Stevens wrote that finding such liability "would enlarge the scope of respondents' statutory monopolies to encompass control over an article of commerce that is not the subject of copyright protection. Such an expansion of the copyright privilege is beyond the limits of the grants authorized by Congress."¹⁸ The Court evoked the classic economic incentive behind American intellectual property regimes in explaining that even where infringing use is possible or proven, "if an article is also adapted to other and lawful uses, it is not enough to make the seller a contributory infringer. Such a rule would block the wheels of commerce."¹⁹ The majority rejected the dissent's argument that copying technology had upset the balance in the traditional intellectual property bargain²⁰ and that a better test would

¹⁵ 464 U.S. at 428, 442. Infringing uses included accumulating libraries of tapes for repeat viewing. *Id.* at 423.

¹⁶ 464 U.S. at 442. Whether the *Sony* Court also intended the staple article of commerce rule to serve as a shield against vicarious liability is an open question, discussed *infra*.

¹⁷ 464 U.S. at 428.

¹⁸ 464 U.S. at 421. If affirmed, the Ninth Circuit's decision for plaintiffs *Id.*

¹⁹ *Sony*, 464 U.S. at 441; *see also* Bridges, *supra* note 77, at 2.

²⁰ 464 U.S. at 467.

look to technology's purpose and the proportion of noninfringing uses in assessing liability.²¹

Noting the plaintiffs' "fear that with any Betamax usage, invisible boundaries are passed: the copyright owner has lost control over his program,"²² the Court arguably set the boundary of the copyright monopoly at the staple article of commerce line.

B. Application of *Sony* to Peer-to-Peer Technologies

Until recently, courts faithfully and relatively uncontroversially applied *Sony* doctrine to a variety of new technologies.²³ More difficult, however, has been application of *Sony* and other traditional copyright principles to P2P systems. The problem stems in part from the special nature of P2P, which provides a decentralized, user-driven distribution platform that eradicates an important mechanism in copyright enforcement: copying and distribution control.²⁴

Pre-digital copyright law relied on the gatekeeping function that the physical limitations of analogue imposed; when only a few entities had access to copyrighted works on the one hand and distribution routes on the other, it was easy to hold them accountable.²⁵ In a gatekeeper regime, the law attaches liability not only to direct miscreants, but also to providers who can control distribution of the protected or suspect good—doctors dispensing prescription drugs, for example, or, in the case of traditional copyright, publishers, record companies, and film

²¹ 464 U.S. at 491 (Blackmun, J., dissenting).

²² 464 U.S. at 451 (internal quotations omitted).

²³ See, e.g., *Vault Corp. v. Quaid Software, Ltd.*, 847 F.2d 255, 262 (5th Cir. 1988) (finding no contributory liability to a computer program that defeated anti-copying software); *Lewis Galoob Toys, Inc. v. Nintendo of Am., Inc.*, 964 F.2d 965, 971 (9th Cir. 1992) (finding no "authorization" liability for manufacturing device that enabled alteration of a copyrighted video game display); *Recording Industry Ass'n of America v. Diamond Multimedia Systems, Inc.*, 180 F.3d 1072, 1079 (9th Cir. 1999) (finding that MP3 players enable the fair use of space shifting under *Sony* and thus do not infringe).

²⁴ See, e.g., Peter S. Menell, *Envisioning Copyright Law's Digital Future*, 46 N.Y.L. SCH. L. REV. 63, 98-103 (2002-03); NATIONAL ACADEMY OF SCIENCES, *THE DIGITAL DILEMMA: INTELLECTUAL PROPERTY IN THE INFORMATION AGE* (2000)

²⁵ See Tim Wu, *When Code Isn't Law*, 89 VA. L. REV. 679, 711-12 (describing the pivotal role of gatekeepers in enforcing pre-digital copyright law).

studios.²⁶ Gatekeeper liability was once primary; a book publisher that published a work without authorization was easy to tag as a direct infringer, and thus those with the capability to copy and distribute were motivated to obey the law. However, digitization, the Internet, and technology that avails both have opened the gate door wide.²⁷

Peer-to-peer technology involves individual computers communicating over the Internet on custom networks that route search requests and conduct direct file transfers among the network's users. Unlike the centralized architecture of a client-server relationship—for instance a Web site, where many users visit a single location to use the resources there—a peer-to-peer network connects many computers at the Internet's "edge," the end users that form the spokes to the servers' hubs, and uses search functions to direct requesters to the resources they seek.

To join a P2P network, users download software that, when launched, locates and connects to other users online at the time using an underlying network protocol. This software searches for files the user wants on other network members' computers, makes designated user files available to the network, and transfers files between users upon request.²⁸

P2P networks share the common ability to cut out the gate-keeping middleman exhibit, but they exhibit varying degrees of centralization. Designers consider trade-offs between "purity" and performance in deciding how much to centralize the network, with decentralization being the conceptual goal but some degree of centralization offering many performance advantages.²⁹ Increasingly, coders also consider legal liability in determining how many centralizing features to build into a P2P system.

²⁶ Wu, *supra* note 25, at 711-12.

²⁷ See Wu, *supra* note 25, at 716-17.

²⁸ Wu, *supra* note 25, at 717-18.

²⁹ The less centralized the network the more pure the peer-to-peer model, but generally the lower the performance level in terms of speed, control, and usability. Searching for files on each individual community on the network is inefficient and lacks the community features that encourage users to share and share alike, and abstain from anti-social behavior such as sending around "spoofs"—fake or misnamed files. By the same token, the more centralized

The first P2P system to be accused of copyright infringement was Napster, the brainchild of a young programmer that abruptly revolutionized the digital landscape.³⁰ Napster's network employed a mix of client-server and peer-to-peer architecture.³¹ The music files resided on peers—user computers—while a centralized server facilitated file searches and transfers by gathering the names and IP addresses of files available to be shared. By leaving copyrighted files on individual users' computers, the peer design enabled Napster to escape the liability for direct copyright infringement that brought down the centralized music file server My.MP3.³²

With no central site to sue for direct infringement, the record companies turned to secondary liability, alleging that Napster committed contributory and vicarious infringement by enabling the unauthorized sharing of copyrighted music.³³ The California district court and then the Ninth Circuit agreed under a new interpretation of *Sony*. The Ninth Circuit found that though the Napster *system* had substantial noninfringing uses, Napster's *conduct* placed it beyond the pale of the *Sony* rule. Interpreting *Sony* as a gloss on the knowledge prong of the contributory liability test rather than an absolute shield as in patent law, the court professed to follow *Sony* in declining to “impute the requisite level of knowledge to Napster merely because peer-to-peer file sharing technology may be used to infringe plaintiffs' copyrights,” but nonetheless observed that “Napster's actual, specific knowledge of direct infringement renders Sony's holding of limited

the network is via specialized servers and/or peer nodes, the better the system performance (file location and transfer) and the easier it is to create a sense of network community. Wu, *supra* note 25, at 717, 722.

³⁰ See JOSEPH MENN, *ALL THE RAVE: THE RISE AND FALL OF SHAWN FANNING'S NAPSTER* (2003).

³¹ Wu, *supra* note 25.

³² See *UMG Recordings v. MP3.com, Inc.*, 92 F. Supp. 2d 349 (S.D.N.Y. 2000) (holding that making copies of music files onto a central Internet server violated copyright even when the copies were only available to users who already owned the music).

³³ *A&M Records, Inc. v. Napster, Inc.*, 239 F.3d 1004, 1020-21 (9th Cir. 2001), *aff'g in part and vacating in part* 114 F. Supp. 2d 896, (N.D. Cal. 2000). See also Lisa M. Zepeda, *A&M Records, Inc. v. Napster, Inc.*, 17 BERKELEY TECH. L. J. 71 (2002).

assistance.”³⁴ The court proceeded to adopt an actual knowledge standard for online conduct from *Netcom*³⁵ to find that infringement notices from the plaintiffs and Napster’s centralized file index combined to provide actual knowledge of infringing conduct.³⁶ Endorsing the district court’s application of the rule in *Fonovisa v. Cherry Auctions* to find that material contribution was satisfied by Napster’s provision of the “site and facilities” for infringement and concomitant duty to police, the court found likely success for the plaintiffs’ contributory infringement claim to affirm the injunction on those grounds.³⁷

The *Napster* court further asserted that the Sony rule did not apply to vicarious copyright infringement,³⁸ and, following *Fonovisa* and other precedent, found the requisite likelihood of success to affirm the injunction on that count.³⁹

As *Napster* and now *Aimster* have shown, the more centralized a P2P network, the more legal liability is likely to accrue to the network providers for users’ copyright infringement due to the knowledge and control such centralization provides.⁴⁰ Thus in Napster’s wake, peer-to-peer coders designed systems they hoped would satisfy the Ninth Circuit and like-minded courts.⁴¹ These second-generation networks used decentralized networking protocols, such as temporary host caches of IP addresses on user “nodes”—select individual computers strategically located along the network—used to make connections. System servers supplied graphic interface and

³⁴ 239 F.2d at 1020-21.

³⁵ 239 F.3d at 1020 (citing *Religious Technology Center v. Netcom On-Line Communication Services, Inc.*, 907 F. Supp. 1361, 1371, “which suggests that in an online context, evidence of actual knowledge of specific acts of infringement is required to hold a computer system operator liable for contributory copyright infringement”). The actual knowledge standard the court applied was in contrast to suggestions throughout the opinion that constructive knowledge might generally suffice. *E.g.*, “Contributory liability requires that the secondary infringer ‘know or have reason to know’ of direct infringement,” 239 F.3d at 1020.

³⁶ 239 F.3d at 1021-22.

³⁷ 239 F.3d at 1022; *Fonovisa v. Cherry Auction*, 76 F.3d 259 (9th Cir. 1996).

³⁸ 239 F.3d at 1022-23. This remains a question of hot contention, discussed *infra*.

³⁹ 239 F.3d at 1024.

⁴⁰ See *Napster*, 239 F.3d 1004; *Aimster*.

⁴¹ *Napster* taught coders that copyright law loathes gatekeepers gone wrong, and that the way around the law was to instead simply give away the gate’s key. Peer-to-peer networks needed to look more like the copying technologies condoned by the *Sony* court: photocopiers and videocassette recorders. See *Sony*, 464 U.S. at ____.

monitored the number of users, but exerted no control over the software or how customers used it, and collected no information regarding what users shared. Among this new generation of P2P protocols were FastTrack (utilized by Grokster and KaZaA software) and StreamCast (the protocol run by Grokster co-defendant Morpheus). The *Grokster* case represents the first legal challenge to this sort of network.

Of the P2P protocols currently under scrutiny, Morpheus runs the least centralized network. The StreamCast protocol that underlies Morpheus is based on Gnutella, an open-source, “pure” peer-to-peer network that relays search requests from one user to the next until it makes a hit. FastTrack, on the other hand, was developed by programmers of the file sharing software KaZaA as an effort to improve upon the pure Gnutella model with “supernodes,” temporary gathering spots for network information on user computers self-selected by user software according to network needs.⁴² Centralized servers maintain user registration and logs and help users find peers upon logging on, but do not track file traffic.⁴³ FastTrack is not open source and charges a fee to access the network with other client applications; Grokster is one such subscriber.⁴⁴

The software at issue in *Aimster* is significantly different. The Aimster server creates a “network” by connecting to America Online’s Instant Messaging service (AOL IM, the “AIM” in Aimster).⁴⁵ Hosted by the Internet service provider, AOL IM connects users across its own servers to send messages and files in real time. Each user downloads IM software to her computer that searches for other users she has designated as “buddies,” maintains a list of buddies currently online, and provides the connection for instant messaging and file transfers.

⁴² Wu, *supra* note 25, at 735.

⁴³ Wu, *supra* note 25, at 735.

⁴⁴ Wu, *supra* note 25, at 734-35. Morpheus was also a FastCast customer before switching to StreamCast.

⁴⁵ 252 F. Supp. 2d at 642. Aimster changes its name to Madster following legal pressure from America Online regarding use of the AIM moniker.

The AOL IM software also allows the user to designate files on her hard drive to make available for transfer to any buddy who asks. Using the client-server connections provided by AOL IM, Aimster's software searches the shared files all Aimster users online to fulfill the user's request. Upon locating the file, the software again uses the AOL IM connection to send an encrypted e-mail to the requester with the requested file attached. In essence, Aimster adds encryption, which protects the anonymity of users and what they transfer, and the capability to search and transfer files between all other Aimster users (not just designated buddies), to the existing AOL IM architecture.⁴⁶

As with other P2P systems, the Aimster network does not centralize files, but rather leaves them on users' computers in their shared directories. It remains unclear, however, whether Aimster's architecture also includes a centralized file directory similar to the one that spelled the legal demise of Napster.⁴⁷ At issue is a feature called Club Aimster, which enables subscribers to download the network's most shared songs for a small monthly fee. A paying club member need only visit Aimster's Web site, view the "Aimster Top 40" list, and click on a title to initiate a search of the network to locate and transmit the file.

II. THE *GROKSTER* AND *AIMSTER* CASES

A. *Metro-Goldwyn-Mayer, Inc. v. Grokster, Ltd.*

In *Grokster*, numerous plaintiffs from the recording industry sued peer-to-peer software distributors Grokster, StreamCast Networks (also known as Morpheus), and KaZaA (since purchased by the Australian company Sharman Networks and removed from the case by a

⁴⁶ 252 F. Supp. 2d at 640-41. It appears that users can conduct the very same infringing file transfers with AOL Im that they can with Aimster; the advantages of the Aimster system are anonymity and the ability to connect with people the user does not personally know, thus yielding a larger pool of available files. *See id.* at 640, 656.

⁴⁷ The district court declined to rule on this issue, citing insufficient evidence and stating that its decision rested on other grounds. 252 F. Supp. 2d at 642.

default judgment) for contributory and vicarious copyright infringement based on defendants' distribution of such software.⁴⁸ The California district court granted the defendants' motions for partial summary judgment. The matter is currently on appeal.⁴⁹

The *Grokster* court first held that the end users of the defendants' system were engaged in direct copyright infringement, an uncontested matter in light of the Ninth Circuit's identical holding in *Napster*.⁵⁰ Nonetheless, relying extensively on both *Sony* and *Napster*, the district court found that the *Grokster* defendants were not liable for either contributory or vicarious infringement.

In assessing contributory infringement, the *Grokster* court applied the *Sony* rule under the knowledge inquiry.⁵¹ Citing *Napster*, the court quickly narrowed the knowledge requirement from a constructive to an actual standard,⁵² then proceeded to find a number of current and potential future noninfringing uses for the defendants' software.⁵³ Apparently thus deploying the *Sony* rule as a focusing force on the knowledge prong rather than a shield against liability, the court announced its interpretation of the knowledge rule in *Napster*: “[D]efendants are liable for contributory infringement only if they (1) have specific knowledge of infringement at a time at which they contribute to the infringement, and (2) fail to act upon that information.”⁵⁴ The court likewise followed *Napster*'s material contribution rule, echoing the site and facilities test from

⁴⁸ 252 F. Supp. 2d 1029.

⁴⁹ The appeal briefs are available at http://www.eff.org/IP/P2P/MGM_v_Grokster/ (last visited Dec. 17, 2003).

⁵⁰ 259 F. Supp. 2d at 1034-35.

⁵¹ 259 F. Supp. at 1035-36. This conflation of the substantial noninfringing use standard and the knowledge requirement is discussed further *infra*.

⁵² “In order to be held liable for contributory infringement, the secondary infringer must know or have reason to know of the direct infringement. See *Napster*, 239 F.3d at 1020. Evidence of actual knowledge of *specific acts* of infringement is required for contributory infringement liability. *Id.* at 1021.” 259 F. Supp. at 1035 (emphasis in original).

⁵³ These included “distributing movie trailers, free songs or other non-copyrighted works; using the software in countries where it is legal; or sharing the works of Shakespeare” as well as facilitating and searching for “public domain materials, government documents, media content for which distribution is authorized, media content as to which the rights owners do not object to distribution, and computer software for which distribution is permitted.” *Grokster*, 259 F. Supp. 2d at 1035.

⁵⁴ 259 F. Supp. 2d at 1036 (citing *Napster*, 239 F.3d at 1021).

Fonovisa. Analyzing knowledge and material contribution together, the court examined the technology at issue in detail to not only distinguish Grokster's and Streamcast's products and services from Napster's in that they provided no centralized file-sharing index and received no information regarding file transfers, but also to find that the defendants could in fact close their doors and deactivate their computers and yet let file sharing continue unabated. Echoing the *Sony* Court's enumeration of copying technologies protected by the staple article of commerce doctrine, the district court concluded that "Grokster and StreamCast are not significantly different from companies that sell home video recorders or copy machines, both of which can be and are used to infringe copyrights."⁵⁵ Thus, "[a]bsent evidence of active and substantial contribution to the infringement itself, defendants cannot be liable."⁵⁶ In short, once a user's download of the defendant's software was complete, the legal relationship was severed.

As to vicarious infringement, the court found that though the defendants did benefit financially from distribution of their products, they did not have the requisite right or ability to supervise infringing conduct. Comparing peer-to-peer technology with the counterfeit swap meet at issue in *Fonovisa*, the court found that without the centralized search index and mandatory registration at issue in *Napster*, the defendants did not control access to or patrol the space its product created, and thus could not be held vicariously liable for copyright infringement that took place there.⁵⁷ The *Grokster* court did not opine on whether *Sony* provides a vicarious liability defense nor apply the rule in its analysis.

The *Grokster* court concluded with a call for legislative guidance on whether and how the state should regulate the design of software susceptible to unlawful use, and like the *Sony*

⁵⁵ 259 F. Supp. 2d at 1043. *See Sony*, 464 U.S. at 1043.

⁵⁶ 259 F. Supp. 2d at 1043.

⁵⁷ 259 F. Supp. 2d at 1045.

Court, specifically declined to “expand existing copyright law beyond its well-drawn boundaries.”⁵⁸

B. *In re Aimster Copyright Litigation*

In *Aimster*, the Seventh Circuit upheld an injunction issued by the district court against the defendant Johnny Deep and his companies, concluding that Aimster was likely to be found liable for contributory infringement for distributing P2P software and running a related service.⁵⁹ In doing so, the court destabilized a good deal more of existing *Sony* and *Napster* doctrine than did *Grokster*.

Framing his discussion in the *Sony* rule, Judge Posner threw his first glove in the ring by asserting that the Ninth Circuit erred in *Napster* “in suggesting that actual knowledge of specific infringing uses is a sufficient condition for deeming a facilitator a contributory infringer.”⁶⁰ The court proceeded to reject substantial noninfringing use as a shield to contributory liability, proposing instead an entirely new balancing test that focuses on infringing use and cost of reducing it: “If the infringing uses are substantial then to avoid liability as a contributory infringer the provider of the service must show that it would have been disproportionately costly for him to eliminate or at least reduce substantially the infringing uses.”⁶¹ Describing Aimster as a service, not a product, the court agreed with the record industry briefs that “the ability of a service provider to prevent its customers from infringing is a factor to be considered in

⁵⁸ 259 F. Supp. 2d at 1046.

⁵⁹ 334 F.3d 643.

⁶⁰ 334 F.3d at 648. Presumably Judge Posner was aware of *Napster*'s analysis of the material contribution prong, *see* 239 F.3d at 1022, and meant to suggest that a more specific knowledge standard should apply along with the contribution requirement. The court did not elaborate on the proper knowledge standard or further requirements for finding contributory infringement.

⁶¹ 334 F.3d at 653.

determining whether the provider is a contributory infringer.”⁶² To posit immunity on the mere capability of noninfringing use, the court argued, is to prevent liability for a seller of a product or service used solely to facilitate copyright infringement, and “such an extreme result” was “not envisaged by the *Sony* majority.”⁶³

Though the *Aimster* decision proposed this new rule it did not apply it, as the court found that Aimster failed to show any non-infringing uses of its software; thus under the court’s interpretation of burden of production Aimster was not entitled to invoke the *Sony* defense.⁶⁴ The court accordingly found Aimster liable for contributory infringement. In a twist on the material contribution prong, Judge Posner called contributory infringement the [civil] counterpart to criminal aiding and abetting.⁶⁵ Under this analysis, the court found that Aimster’s software tutorial aided and abetted infringing use because it listed only copyrighted songs in its examples: “The tutorial is the invitation to infringement that the Supreme Court found missing in *Sony*.”⁶⁶ The court likewise found material contribution (or aiding and abetting) in Club Aimster. The songs listed in the Aimster Top 40 are invariably copyrighted and big popular hits, making each click on the Club Aimster list the first step in infringement on very valuable copyrights; as an expert testified at trial, Club Aimster “takes the search out of searching.”⁶⁷ Furthermore, the court found that Aimster willfully blinded itself to infringing activity—conduct that the company could have observed and controlled but for an encryption process apparently designed primarily to exculpate the proprietor from the knowledge requirement. Thus Aimster may not claim lack of knowledge. Given contributory liability, Judge Posner deemed the question of vicarious liability

⁶² 334 F.3d at 648.

⁶³ 334 F.3d at 650.

⁶⁴ Whether *Sony* represents a defense or plays some other procedural role in assessing secondary liability is further addressed *infra*.

⁶⁵ 334 F.3d at 651 (analogizing Sony to a retailer who sells slinky dresses knowing his customers are prostitutes, while comparing Aimster’s conduct to that of a massage parlor owner who knows his employees sell sex).

⁶⁶ 334 F.3d at 651.

⁶⁷ 252 F. Supp. 2d at 645.

“academic” and affirmed the district court without specifically addressing the latter charge in detail.⁶⁸

The *Aimster* opinion raised two interesting side propositions about copyright law: that under *Sony*, using a VCR to skip commercials creates an infringing derivative work,⁶⁹ and that despite the holding in *MP3.com*, space-shifting across the Internet may constitute a fair use of digital music files.⁷⁰ Unlike its predecessors, *Aimster* did not conclude with a call for congressional action.

III. DISCUSSION: THE CURRENT STATE OF *SONY* AND THE FUTURE OF SECONDARY LIABILITY DOCTRINE

In the nearly twenty years since *Sony*, the lower courts have struggled to adopt the doctrine the Supreme Court announced there to new technologies and fact patterns. Indeed,

⁶⁸ *Aimster*, 334 F.3d at 654. Judge Posner postulated that the *Sony* Court used vicarious and contributory infringement interchangeably and thus the legal question was a single inquiry into secondary liability. He also expressed doubt that *Aimster* would be held vicariously liable. *Id.*

⁶⁹ Reviewing the uses of the Betamax the *Sony* court considered, Judge Posner reported that the Court concluded time shifting was fair use, building a library of taped television programs generally was not, and “[t]he third use, commercial-skipping, amounted to creating an unauthorized derivative work.” 334 F.3d at 647. To support the latter proposal, Posner’s opinion cites three circuit court opinions but not the *Sony* decision itself. *Id.* Compare with *Huntsman v. Soderbergh*, Civil Action No. 02-M-1662 (MJW) (D. Colo., filed Sept. 9, 2002), available at <http://news.findlaw.com/hdocs/docs/copyright/cflixstud102802cmp.pdf> (a declaratory judgment action filed by Clearplay and others against various movie industry defendants and the Directors Guild of America asking the court, in Clearplay’s case, to find that technology that enables consumers to create real-time, content-based edits of DVDs during private viewing does not violate copyright law by creating an infringing derivative work). See also James M. Burger and Kathleen E. Fuller, *The Last (Unaltered) Picture Show? A Discussion of Copyright Issues in Huntsman v. Soderbergh*, COPYRIGHT COLLOQUIUM, at <http://www.mediainstitute.org/colloquium/articles/2003/article16/article.html> (last visited Nov. 17, 2003).

⁷⁰ 334 F.3d at 652-53. See also *UMG Recordings v. MP3.com, Inc.*, 92 F. Supp. 2d 349 (S.D.N.Y. 2000) (holding that downloading music files from a central server on the Internet after proof of having purchased the songs on CD—“space-shifting”—was not fair use). But see *Recording Industry Ass’n of America v. Diamond Multimedia Systems, Inc.*, 180F.3d 1072, 1079 (9th Cir. 1999) (holding home space-shifting of music files to be fair use). Posner argues that space-shifting across the Internet via P2P might be fair use “by analogy to the time shifting approved as fair use in the *Sony* case,” suggesting that the *MP3.com* court’s decision would have been better grounded on a finding that the service’s system for proving ownership was too lax. 334 F.3d at 652-53.

Grokster and *Aimster* represent two apparently irreconcilable outcomes⁷¹—and if the Ninth Circuit affirms *Grokster*, a circuit split is imminent. The following discussion tracks *Sony* doctrine through *Napster*, *Grokster*, *Aimster*, and the propositions on the table in the *Grokster* appeal in an attempt to elucidate the evolution and current state of the rules for secondary copyright infringement. This effort may in turn suggest analytical paradigms for considering what the future might or should hold in this contentious area of the law. To what degree should producers of technology products or systems be secondarily liable for infringing conduct by their users, and what tests strike the proper balance between technological innovation and copyright holders' rights?

The peer-to-peer cases have applied three sets of interrelated rules: the substantial noninfringing uses standard of *Sony*, and the common law doctrines of contributory and vicarious liability. Table 1 summarizes how the courts have enunciated and applied these rules and the results they reached under each, along with current proposals from technologists, the content industries, and public interest groups for developing the rules in the future.

⁷¹ See Armstrong, *supra* note 4, at 16 (“The logical and legal distinctions that have been made thus far in this line of cases are sharply inconsistent and can therefore be criticized as arbitrary.”).

TABLE 1: Current and Proposed Rules for Secondary Copyright Infringement Liability

Element	<i>Sony</i>	<i>Napster</i>	<i>Grokster</i>	<i>Aimster</i>	Proposed
Substantial noninfringing use(s)	<p>Sale of staple articles of commerce capable of substantial noninfringing uses “does not constitute contributory infringement.”</p> <p>Result: Not liable. Noninfringing use was private, noncommercial time-shifting.⁷²</p>	<p>Substantial noninfringing use invokes the <i>Sony</i> defense.</p> <p>Result: Issue was not the technology’s structure, but rather Napster’s conduct.⁷³ Moved to knowledge.</p>	<p>Substantial noninfringing use, current or future, invokes the Sony defense.</p> <p>Result: Not liable here; court moved to knowledge.⁷⁴</p>	<p>A balancing test is required. Where noninfringing uses are possible, the court must weigh whether “the detection and prevention of the infringing uses would be highly burdensome.”⁷⁵</p> <p>Result: Liable. Burden is on defendant to show substantial noninfringing uses and Aimster failed to do so.⁷⁶</p>	<p>Technologists: <i>Sony</i> doctrine represents congressional intent and fulfills the constitutional mandate; courts may not substitute a cost-benefit or producer’s intent test for the technical capability one.⁷⁷</p> <p>Copyright holders: The <i>Sony</i> rule does not apply to P2P due to defendants’ knowledge of infringing conduct; technologists must</p>

⁷² 464 U.S. at 442.

⁷³ 239 F.3d at 1020-21.

⁷⁴ 259 F. Supp. 2d at 1035.

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⁷⁶ 334 F.3d at 652-53.

⁷⁷ See Appellee Streamcast Networks, Inc.’s Opening Brief, 259 F Supp. 2d 1029 (C.D. Cal. 2003) (No. 03-55894 and 03-55901); Brief Amici Curiae of 40 Intellectual Property and Technology Law Professors Supporting Affirmance, Samuelson Law, Technology and Public Policy Clinic, 259 F Supp. 2d 1029 (C.D. Cal. 2003) (No. 03-55894 and 03-55901); Brief of Amici Curiae American Civil Liberties Union, American Civil Liberties Union of Northern Cal., American Library Association, Association of Research Libraries, American Ass’n of Law Libraries, Med. Library Ass’n, Special Libraries Ass’n, Internet Archive, and Project Gutenberg in Support of Defendants-Appellees and Urging Affirmance of the District Court’s Grant of Partial Summary Judgment, 259 F Supp. 2d 1029 (C.D. Cal. 2003) (No. 03-55894 and 03-55901); Andrew Bridges, *Contributory Infringement Liability in Recent U.S. Peer-to-Peer Copyright Cases*, paper presented at Copyright and the Music Industry: Digital Dilemmas, University of Amsterdam Institute for Information Law and Buma-Sterma, Amsterdam, the Netherlands (July 2003), available at <http://www.wsgroup.com/common/wsgprg.asp?sub=/library/index.asp§ion=1..>

					design to reduce or prevent infringement. ⁷⁸
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Contributory Liability (common law)					
Element	<i>Sony</i>	<i>Napster</i>	<i>Grokster</i>	<i>Aimster</i>	Proposed
(1) Knowledge	<p>Rejected constructive knowledge of infringement as basis for secondary liability.</p> <p>Result: Not liable. No actual knowledge even though copying was “the most conspicuous” or “the major” use of the product.⁷⁹</p>	<p>Required actual knowledge—(1) specific knowledge at time of the infringement, and (2) failure to act upon that knowledge.</p> <p>Result: Liable. Napster’s centralized file index satisfied the knowledge test and rendered the <i>Sony</i> rule irrelevant.⁸⁰</p>	<p>Required actual knowledge of specific infringement when defendant materially contributed to and could prevent such infringement (echoing <i>Napster</i> test).</p> <p>Result: Not liable. Network’s structure did not provide actual, specific knowledge.</p>	<p>Rejected Napster’s holding that actual knowledge establishes secondary liability. Still, willful blindness is knowledge.</p> <p>Result: Liable. Encryption designed to shield Aimster from infringing activity did not also shield it from liability.⁸¹</p>	<p>Technologists: Liability should not rely on subsequent relationship between producer and user; “[t]he character of the product itself should be the touchstone.”⁸²</p> <p>Copyright holders: The law does not require knowledge at a time when defendants can prevent infringing conduct.⁸³</p>
(2) Material involvement/control	<p>Required control and authorization of infringing conduct to impose liability.</p> <p>Result: Not liable because only contact between Sony and users was at the moment of sale.⁸⁴</p>	<p>“Site and facilities test” from <i>Fonovisa</i>.</p> <p>Result: Liable. Napster’s integrated service provided site and facilities for infringement; duty to police.⁸⁵</p>	<p>A close-the-doors test for providing the site and facilities.</p> <p>Result: Not liable. Users could continue to infringe after defendants ceased operations.⁸⁶</p>	<p>Borrows aiding and abetting test from criminal law.</p> <p>Result: Liable. Software tutorial and Club Aimster encourage the downloading of copyrighted songs—“the invitation to</p>	

⁷⁸ See MGM Plaintiffs-Appellants’ Opening Brief, 259 F Supp. 2d 1029 (C.D. Cal. 2003) (No. 03-55894 and 03-55901); Brief in Support of Reversal by Amici Curiae Law Professors and Treatise Authors Neil Boorstyn, Jay Dougherty, James Gibson, Robert Gorman, Hugh Hansen, Douglas Lichtman, Roger Milgrim, Arthur Miller and Eric Schwartz, 259 F Supp. 2d 1029 (C.D. Cal. 2003) (No. 03-55894 and 03-55901).

⁷⁹ 464 U.S. at 439.

⁸⁰ 239 F.3d at 1020-21.

⁸¹ 334 F.3d at 649-50.

⁸² Bridges, *supra* note 77, at 7.

⁸³ MGM Br. at 32.

⁸⁴ Sony, 464 U.S. at 437-38.

				infringement that the Supreme Court found missing in Sony. ⁸⁷	
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Vicarious Liability (common law)

Elements	<i>Sony</i>	<i>Napster</i>	<i>Grokster</i>	<i>Aimster</i>	Proposed
(1) Right and ability to supervise infringing conduct (2) Direct financial interest in infringing conduct	Notes that “ the lines between direct infringement, and vicarious liability are not clearly drawn ” and that the plaintiffs made no vicarious liability claim. ⁸⁸ Result: Addresses contributory infringement only and finds Sony not liable.	<i>Sony doctrine does not shield against vicarious liability.</i> Result: Liable. Napster satisfied both prongs of the test.	Implicitly echoes <i>Napster</i> : no <i>Sony</i> shield against vicarious liability. Result: Not liable: Though defendants derived a financial benefit from infringement, they did not have the right and ability to supervise infringing conduct. ⁸⁹	Follows the <i>Sony Court</i> in joining vicarious and contributory liability into a single question. Result: None. Held <i>Aimster</i> liable on the basis of contributory infringement alone. ⁹⁰	Technologists: The <i>Sony</i> decision provides a shield against contributory and vicarious liability, affirmed by Congress in the DMCA’s general safe harbor against all secondary liability. ⁹¹ Copyright holders: Technologists can design to gain the right and ability to prevent infringing conduct. ⁹²

⁸⁵ 239 F.3d at 1022.

⁸⁶ 259 F. Supp. at 1041.

⁸⁷ 334 F.3d at 651.

⁸⁸ Sony, 464 U.S. at 435.

⁸⁹ 259 F. Supp. at 1043-46.

⁹⁰ 334 F.3d at 654

⁹¹ Br. Amici Curiae of 40 Intellectual Property and Technology Law Professors at 5, note 5.

⁹² MGM Br. at 58-63.

A. *Sony*: Substantial Noninfringing Use

Sony presents a fairly liberal standard for technology producers, which the Court explicitly crafted to maintain the constitutional limits on the copyright monopoly: A technology's capability for any substantial noninfringing use serves to shield its providers from contributory liability, without regard to the technology's purpose or the proportion of actual infringing use. However, four justices joined the dissent in *Sony* to question whether this patent-derived principle provided an appropriate standard for copyright liability,⁹³ worrying that its application "essentially eviscerates the concept of contributory infringement" because any imaginative producer could demonstrate such capability.⁹⁴

This doctrinal split has become central to current debates about what role the noninfringing use inquiry should play in assessing secondary copyright infringement. *Napster* and *Grokster* closely followed *Sony*'s refusal to examine the ratio between infringing and noninfringing uses. The *Napster* court noted that a single non-infringing use invoked the *Sony* shield against liability in terms of the technology's architecture. However, the court went on to say that the technology was not the issue; rather the question was of Napster's conduct under the common law standards for contributory and vicarious liability.⁹⁵ Whether *Sony* governs not only technology but conduct—services as

⁹³ "I do not agree that this technical judge-made doctrine of patent law, based in part on considerations irrelevant to the field of copyright law, should be imported wholesale into copyright law." 464 U.S. at 491 (Blackmun, J., dissenting). Justice Blackmun appears to propose that Congress' codification of the doctrine in the Patent Act does not render it less "technical" or "judge-made."

⁹⁴ 464 U.S. at 498 (Blackmun, J., dissenting).

⁹⁵ At first the Ninth Circuit appeared to collapse the question of substantial non-infringing uses under *Sony* and knowledge under common-law contributory infringement into one: "The *Sony* Court declined to impute the requisite level of knowledge where the defendants made and sold equipment capable of both infringing and 'substantial noninfringing uses.' We are bound to follow *Sony*, and will not impute the requisite level of knowledge to Napster merely because peer-to-peer file sharing technology may be used to infringe plaintiffs' copyrights....To enjoin simply because a computer network allows for infringing use

well as products—is difficult to discern from existing precedent; whether it should in an era where ongoing communication over the Internet turns many software “products” into services, conduct, and/or relationships is the question at hand.

The *Grokster* court followed *Napster* in finding substantial noninfringing use for the Grokster and StreamCast software but nonetheless proceeding to evaluate the defendants’ conduct under contributory and vicarious liability analyses.⁹⁶ The court did not predicate this second step analysis on “conduct” by the defendants, but did exert considerable effort in explaining that while the products’ architecture enabled on ongoing arm’s-length service with no information exchange between providers and users, the architecture also allowed the service to shut down without impinging on product use. One reading of this analysis is that Grokster and StreamCast escaped liability by being like the Betamax; for legal purposes, the relationship ended upon download of the software or sale of the VCR. Thus perhaps the court proceeded past the substantial noninfringing use test to prove the software fell within it as an article of commerce rather than a service relationship.

In deciding *Aimster*, the Second Circuit was not nearly as solicitous to *Sony* doctrine as was the Ninth in *Napster* or the California district court in *Grokster*, arguably departing from traditional judicial deference altogether. The *Aimster* opinion framed the issue as how much the Supreme Court decided in *Sony* and proceeded to propose a

would, in our opinion, violate *Sony* and potentially restrict activity unrelated to infringing use.” 239 F.3d at 1020-21 (citations omitted) (check order of these quotes). However, the court went on to take up the knowledge question separately based on Napster’s conduct in maintaining the index of files. “Napster’s actual, specific knowledge of direct infringement renders *Sony*’s holding of limited assistance to Napster. We are compelled to make a clear distinction between the architecture of the Napster system and Napster’s conduct in relation to the operational capacity of the system.” 239 F.3d at 1020.

⁹⁶ The *Grokster* court pointed out that the substantial noninfringing use question “turns not only on the product’s *current* uses, but also on potential *future* noninfringing uses,” thus explicitly applying the *Sony* Court’s pronouncement on this principle to the P2P context. 259 F. Supp. 2d at 1035 (emphasis in the original).

balancing test not elucidated there.⁹⁷ Acknowledging that *Sony* established that “the producer of a product that has substantial noninfringing uses is not a contributory infringer merely because some of the uses actually made of the product . . . are infringing,” Posner continued, “How much more the Court held is the principal issue that divides the parties; and let us try to resolve it, recognizing of course that the Court must have the last word.”⁹⁸

Judge Posner’s treatment of *Sony* departed from previous case law in both procedure and substance. First, and fatally to *Aimster*, he proposed that the burden to show substantial noninfringing uses falls on the defendant.⁹⁹ This placement of the burden is not articulated in *Sony*, and in fact may directly contravene language there suggesting that it was the plaintiff’s burden to show that there was no noninfringing use.¹⁰⁰ Applying such reasoning may, as a procedural matter, have precluded Judge Posner from affirming the injunction against *Aimster* without a trial on the merits. Judge Posner did not think so. Finding the evidence sufficient to shift the burden of production, he concluded that “[b]ecause *Aimster* failed to show that its service is ever used for any purpose other than to infringe the plaintiffs’ copyrights,” there was no need to balance the harms in deciding to issue the injunction.¹⁰¹

⁹⁷ 334 F.3d at 653. Posner set himself apart from his peers in calling for intervention not from Congress but the Court.

⁹⁸ *Aimster*, 334 F.3d at 647.

⁹⁹ *Aimster*, 334 F.3d at 652-53.

¹⁰⁰ “[R]espondents failed to demonstrate that time-shifting would cause any likelihood of nonminimal harm to the potential market for, or the value of, the copyrighted works. The *Betamax* is, therefore, capable of substantial noninfringing uses. *Sony*’s sale of such equipment to the general public does not constitute contributory infringement of respondent’s copyrights.” 464 U.S. at 456. *See also* *Bridges*, *supra* note 77, at 3 (former *Morpheus* lawyer contending that *Sony* places the burden on the plaintiff to show that the suspect technology is not capable of substantial noninfringing use).

¹⁰¹ 334 F.3d at 652-53.

On the substantive side, Judge Posner proposed a significant reworking of the Sony rule in his balancing test, which would require producers of technology with substantial infringing uses to detect and prevent infringement until such policing becomes highly burdensome.¹⁰² It is unclear whether Judge Posner calls for technology producers to anticipate infringing use and engineer around it in advance, or for service providers to police their premises as called for by Napster. Since the court didn't apply the rule to reach its decision, that question awaits adjudication. What is clear is that in the Second Circuit, improbable noninfringing uses do not satisfy the *Sony* rule,¹⁰³ a departure from the "current or future use" test set forth in *Sony* and *Grokster*.¹⁰⁴

Stakeholders in this issue are staging a lively debate on how the *Sony* rule applies and ought to apply to providers of P2P technology and services, with the two sides well illustrated by the opinions in *Grokster* and *Aimster*. While technologists seek to preserve Sony's broad ruling and, as the *Grokster* court did, apply it to all new technologies including P2P, copyright holders argue that the *Sony* court could not have foreseen the challenges of digital media in general and P2P technology in particular, and like Judge Posner in *Aimster*, call for further elaboration of the test that may place affirmative duties on technology providers to prevent infringement by users.

¹⁰² 334 F.3d at 648, 653.

¹⁰³ The court reviewed and dismissed five such uses: downloading uncopyrighted music from start-up bands or those whose copyright has expired; distributing music for promotion; exchanging information among fans; exchanging off-color information among Aimster users who desire privacy; and space shifting for CD owners who wanted to listen to the music they owned while away from their collection. 334 F.3d at 652. Judge Posner suggested that peer-to-peer technology might enable this last proposition despite the decision in *MP3.com*, where the court rejected space shifting as a fair use because the defendant made unauthorized copies of protected works on its servers, see *UMG Recordings v. MP3.com, Inc.*, 92 F. Supp. 2d 349 (S.D.N.Y. 2000); peer-to-peer technology obviates the need for intermediary copying. 334 F.3d at 652-53.

¹⁰⁴ Get pages.

Technology proponents argue that *Sony* doctrine expresses congressional intent, as embodied in patent law and affirmed in nearly two decades of inaction against the decision, to prevent misuse of intellectual property monopolies and fulfill the constitutional mandate in the copyright clause.¹⁰⁵ According to this argument, the substantial noninfringing use standard trumps the common law tests for secondary liability.¹⁰⁶ Courts should look only for the technical capability for noninfringing use, leaving aside any consideration of the purpose of a product or service or the intent of its provider.¹⁰⁷

Librarians and archivists have also joined with civil liberties groups to urge that P2P's ability to promote information exchange and free speech not be abridged. One major Internet-based archive of public domain material already uses P2P to store and distribute materials, and libraries laud the significant cost savings and bandwidth efficiency P2P can provide.¹⁰⁸

¹⁰⁵ See 35 U.S.C. § 271(c) (exempting from secondary liability inventions "suitable for noninfringing uses"); 2 Paul Goldstein, Copyright § 6.1.2 (2d ed. 2002) ("Congress passed section 271(c) for the specific purpose of clarifying the long-troubled boundary between actions for contributory infringement and patent misuse"); U.S. Const., art. I, cl. 8 (granting limited monopolies "to Promote the Progress of Science and useful Arts"); Br. Amici Curiae of 40 Intellectual Property and Technology Law Professors at 6-7 ("The Sony test... is consistent with the contributory infringement rule of patent law... [and] similarly clarifies the boundary between contributory infringement and copyright misuse, which limits the power of copyright owners to obtain an unjustified monopoly over technologies").

¹⁰⁶ "To the extent the Ninth Circuit subordinated the substantial noninfringing use requirement to the knowledge requirement, the Napster court necessarily undermined the object of the doctrine: to ensure that consumers not be required to pay monopoly tribute for unpatented or otherwise unprotected goods or equipment." Br. Amici Curiae of 40 Intellectual Property and Technology Law Professors at 13, citing Goldstein, *supra* note __, Supplement, § 6.1.2 (internal quotations omitted). Despite this view that finding substantial noninfringing uses should end the inquiry, no court considering P2P technology has completely subsumed common law liability to the *Sony* rule.

¹⁰⁷ Patent law does assign liability where a product is "especially adapted" for infringing use (cite), but the test of such special adaptation is the substantial noninfringing use capability. See *Sony*, 464 U.S. at 441; Bridges, *supra* note 77, at 7.

¹⁰⁸ Br. of Amici Curiae American Civil Liberties Union, American Civil Liberties Union of Northern California, American Library Association, Association of Research Libraries, American Association of Law Libraries, Medical Library Association, Special Libraries Association, Internet Archive, and Project Gutenberg, *Grokster*, ___, at 10-11.

Copyright holders, on the other hand, have proposed a number of alterations to the *Sony* rule, claiming that it is in essence a technological loophole that allows coders to design products that “skirt responsibility for causing infringement” and thus defeat the purpose of secondary liability.¹⁰⁹ One proposal is to apply a “no infringing use” standard that would require technology producers to take all possible steps to prevent infringement by users.¹¹⁰ Such a requirement would be unprecedented in copyright law and seemed unimaginable the last time the Act was amended. In testimony before Congress preceding passage of the 1976 Act, the Copyright Office said of the VCR: “[S]ooner or later there is going to be a crunch here. But that is not what this legislation is addressed to, and I do not see the crunch coming in the immediate future I do not see anybody ... forcing legislation that would engineer a piece of equipment not to allow home taping.”¹¹¹ The crunch has arguably come, and some believe that such engineering laws are the best solution.

Another approach, which parallels the district court’s reasoning in *Napster*, would require that the product’s primary use be non-infringing to avoid liability to producers.¹¹²

¹⁰⁹ Br. in Support of Reversal by Boorstyn et al., *Grokster*, ___, at 2-3, 9-11. Amici for the *Grokster* plaintiffs assert that “[b]y misjudging the elements of contributory and vicarious liability, [the *Grokster* court] has created a gaping technological loophole that jeopardizes the ability of long-standing copyright principles to redress viral infringement online.” *Id.* at 3.

¹¹⁰ Bridges at 10; plaintiffs’ briefs, Samuelson brief. Andrew Bridges argues that this standard would allow copyright holders to control product architecture and thus expand the scope of copyright in the way specifically deemed impermissible by the *Sony* Court. Bridges at 10.

¹¹¹ Hearings on S. 646 and H.R. 6927 before Subcommittee No. 3 of the House Committee on the Judiciary, 92d Cong., 1st Sess., 22-23 (1971) (1971 House Hearings) (cited in *Sony*, 464 U.S. at 471).

¹¹² Bridges at 10, plaintiffs’ briefs, Samuelson brief; Wu, *supra* note 25, at 739 ([T]he ratio of infringing to non-infringing uses must be at the forefront of the ultimate policy judgment in this area.”). This fact-finding approach has been critiqued as indeterminate and chilling to technology development, as the results in each instance would depend on the time of the inquiry and how primary use is defined. Bridges at 10; Samuelson and Quilter at 7-8 (“Uses of a technology may evolve significantly over time....Peer-to-peer technologies, which promise significant benefit, e.g. relieving network congestion and increasing security and fault tolerance...will not evolve over time if progress in the field is stymied by expansive secondary liability”). This approach arguably contradicts the *Sony* Court’s holding in the face of a clear factual record showing that *Sony* sold Betamax for the “primary purpose” of copying protected works and that “virtually all” material copied by Betamax was copyrighted. *See* 464 U.S. at 428. However, the *Sony*

At the arguable extreme of the content industry's proposals to augment *Sony* is the intent test, which would examine whether the technology producer intended for users to infringe copyright with the product.¹¹³ Critics point to the difficulty of identifying intent to begin with—especially where the intent must lie with a corporation—and potential resulting due process hurdles, as well as to the fact that consumers often use technology for unintended purposes—for instance, VCRs to play prerecorded tapes.¹¹⁴

These three proposed tests contravene the plain language of the *Sony* holding, in which the Court required only “one” “potential” noninfringing use of the Betamax to find it eligible for the liability shield.¹¹⁵ Nonetheless, the Court went on to note that the primary purpose of the Betamax for “most owners” was the fair use of time-shifting, and that this activity served First Amendment values, so the language leaves open whether the Court actually applied the rule it announced. A comprehensive reading of *Sony*, which is rife with explanations of how home taping with the Betamax failed to harm the content owners' interest and furthered the public good, may suggest that the substantial noninfringing use standard did not do the essential work in shaping the Court's decision.

Court went on to find that these otherwise infringing uses were protected under the fair use defense for time-shifting, and thus it remains unclear that *Sony* doctrine precludes any factual inquiry into technology uses. Still, the idea that Xerox could be held liable for producing photocopiers in a future trial under this test points to the problems of notice, repose, and neutral application inherent in such a rule.

¹¹³ Bridges at 10, plaintiffs' briefs, Samuelson brief. This proposal seems to rest on a deterrent and punitive model of punishing technology producers for profiting on infringing activity, and along with the previous test echoes the test Justice Blackmun proposed in his *Sony* dissent: “[I]f a significant portion of the product's use is noninfringing, the manufacturers and sellers cannot be held contributorily liable for the product's uses,” but “if no one would buy the product for noninfringing purposes alone, it is clear that the manufacturer is purposely profiting from the infringement, and that liability is appropriately imposed.” 464 U.S. at 491 (Blackmun, J., dissenting). One might question the presumption that either a majority of a product's use would be noninfringing or it would have no takers for noninfringing use alone and wonder how such a complex measure could be calibrated.

¹¹⁴ See LARDNER, *supra* note 155, at 297-300 (1987) (noting that the Betamax inadvertently enabled a market for prerecorded videos that became a leading source of revenue for the movie industry); VOGEL, *supra* note 155, at 62.

¹¹⁵ “One potential use of the Betamax clearly satisfies this standard” of commercially significant infringing use. 464 U.S. at 442.

Nonetheless, a remaining concern regarding the copyright holders' proposed tests is for judicial efficiency. Such evaluations require extensive fact-finding and/or subjective inquiries into the defendant's state of mind that would preclude deciding secondary infringement cases on summary judgment—as, for instance, *Grokster* was, in contrast with the five-week District Court trial in *Sony*.¹¹⁶

B. Contributory Liability: (1) Knowledge

The *Sony* decision rejected constructive knowledge of infringement as a basis for secondary liability.¹¹⁷ In the proceedings below, the Ninth Circuit held Sony liable for secondary infringement because the trial court's findings of fact showed that copying was “the most conspicuous” or “the major” use of the product. The Supreme Court reversed on this point, refusing to thus extend the copyright monopoly to distribution of technology products¹¹⁸ and instead applying the standard from patent law in which “[t]he prohibition against contributory infringement is confined to the knowing sale of a component especially made” to infringe.¹¹⁹ In essence, *Sony* said that courts may assume

¹¹⁶ 464 U.S. at 459 (Blackmun, J., dissenting). The *Sony* Court characterized the district court trial as “lengthy,” seeming to underscore this point throughout the opinion. See 464 U.S. at 425 et. seq. This may have been to emphasize the thorough review of the facts underlying the decision, to portray the potential complexity of such cases, and/or to suggest that the streamlined criteria of the *Sony* rule may lead to greater judicial efficiency and consistency.

¹¹⁷ *Sony*, 464 U.S. at 439. “If vicarious liability is to be imposed on petitioners in this case, it must rest upon the fact that they have sold equipment with constructive knowledge of the fact that their customers may use that equipment to make unauthorized copies of copyrighted material. There is no precedent in the law of copyright for the imposition of vicarious liability on such a theory.” *Id.* Though the Court wrote of “vicarious” liability, it proceeded to immediately discuss contributory liability as a continuation of the same thought. *Id.* at 439-440.

¹¹⁸ 464 U.S. at 439. “The Court of Appeals’ holding that respondents are entitled to enjoin the distribution of VTRs, to collect royalties on the sale of such equipment, or to obtain other relief, if affirmed, would enlarge the scope of . . . statutory monopolies to encompass control over an article of commerce that is not the subject of copyright protection. Such an expansion of the copyright protection is beyond the limits of the grants authorized by Congress.” 464 U.S. at 421.

¹¹⁹ 464 U.S. at 440. “[T]he Act expressly provides that the sale of a ‘staple article or commodity of commerce suitable for substantial noninfringing use’ is not contributory infringement.” *Id.*

that technology producers know the most conspicuous uses of their products, but such knowledge does not lead to legal liability.

The *Sony* Court's rejection of constructive knowledge as a basis for secondary liability has survived P2P adjudication. The *Napster* court required and found actual, specific knowledge. Architecturally, the Napster network maintained a database of files that the plaintiffs had notified Napster infringed. However, the court considered the question to be not just of mere system capability, but also of knowing conduct: "Napster, by its conduct, knowingly encourages and assists the infringement of plaintiffs' copyrights....[I]f a computer system operator learns of specific infringing material available on his system and fails to purge such material from the system, the operator knows of and contributes to direct infringement."¹²⁰

Grokster developed *Napster*'s holding into a two-part test for specific knowledge,¹²¹ but with a different result. The crucial difference, according to the *Grokster* court, was the absence of any central hub where the defendants could monitor the exchange of copyrighted content.¹²² Echoing *Sony*, the court stated that knowledge "that [Defendants'] products will be used illegally by some (or even many) users" did not itself lead to contributory liability.¹²³ Because users could share files with no involvement from the defendants' computers, the defendants had no actual knowledge

¹²⁰ 239 F.3d at 1020-21. By contrast, "a computer system operator cannot be liable for contributory infringement merely because the structure of the system allows for the exchange of copyrighted material." *Id.* at 1021 (citing *Sony*, 464 U.S. at 436). 239 F.3d at 1020.

¹²¹ (1) Specific knowledge at the time of the infringement, and (2) failure to act upon that knowledge. *Grokster*, 259 F. Supp. 2d at 1036, citing *Napster*, 239 F.3d at 1021.

¹²² The court noted that the defendants were clearly generally aware of user infringement. "The question, however, is whether *actual knowledge of specific infringement* accrues at a time when either Defendant materially contributes to the alleged infringement, and can therefore do something about it." *Grokster*, 259 F. Supp. 2d at 1038.

¹²³ 259 F. Supp. at 1043.

under this test.¹²⁴ Furthermore, knowledge by notification from the plaintiffs after infringement took place did not render the defendants liable.¹²⁵ In short, the decentralized architecture of FastTrack and StreamCast spared the defendants knowledge of illegal conduct.

Perhaps surprisingly, *Aimster* presents the most exacting knowledge requirement of the three P2P cases. Judge Posner noted that in *Sony*, though the technology provider had ample knowledge of infringing conduct, “[t]he Court was unwilling to allow copyright holders to prevent infringement effectuated by means of a new technology at the price of possibly denying noninfringing consumers the benefit of the technology,” and went on to say that the *Napster* court erred in applying an actual, specific knowledge standard for contributory infringement.¹²⁶ However, this statement may represent less a move to lift the knowledge burden from defendants’ backs than to further the case for the cost-benefit analysis proposed soon thereafter.¹²⁷ Indeed, the court proceeded to hold that *Aimster* failed the knowledge test no matter how articulated, as the software’s encryption feature did not save the defendant from information such as encryption blocked. “Willful blindness is knowledge,” and “a contributory infringer does

¹²⁴ 259 F. Supp. at 1042.

¹²⁵ “Plaintiffs’ notice of infringing conduct are irrelevant if they arrive when Defendants do nothing to facilitate, and cannot do anything to stop, the alleged infringement.”

¹²⁶ 334 F.3d at 649 (agreeing with Professor Goldstein, 2 Paul Goldstein, COPYRIGHT § 6.1.2, p. 6:12-1 (2d ed. 2003)). Posner’s decision on this point represented an about-face from the district court’s finding that the *Napster* knowledge requirement was too liberal: “[T]here is absolutely no indication in the precedential authority that such specificity of knowledge is required in the contributory infringement context.” 252 F. Supp. 2d 634, 651 (N.D. Ill. 2002).

¹²⁷ 334 F.3d at 649. Nonetheless, plaintiffs need not show any financial damage to assert contributory infringement. 334 F.3d at 649 (noting that the market harm analysis in *Sony* pertained to fair use, not contributory infringement).

not obtain immunity by using encryption to shield itself from actual knowledge of the unlawful purposes for which the service is being used.”¹²⁸

C. Contributory Liability: (2) Material Contribution or Involvement

The second prong of common law contributory liability calls for the court to assess the defendant’s degree of involvement in infringing conduct. The decision in *Sony* offers little guidance on this element. The California district court held that Sony’s advertising of the product’s infringing uses could not serve as a basis for liability, and the Supreme Court did not dispute the finding.¹²⁹ By implication, such a standard may preclude aspects of proposed balancing tests that look to a provider’s intent or representations.

The Internet platform on which P2P operates presents quite a different question regarding material contribution. Because the P2P providers at issue were or are present on the Internet and thus connected to the network and its users, they may well materially contribute to copyright infringement in a way Sony could not by simply selling VCRs. Indeed, the Ninth Circuit found that Napster did so, applying the *Fonovisa* site and facilities test to find that just as the proprietors of a swap meet materially contributed to copyright infringement when vendors used the swap meet’s site and facilities to sell pirated goods, so Napster’s integrated service provided the site and facilities for infringement.¹³⁰ In both cases the Ninth Circuit found that with providing premises comes the duty to police them. Since Napster had only to look at the file names on its

¹²⁸ 334 F.3d at 650-51.

¹²⁹ *Universal City Studios v. Sony Corp. of America*, 480 F. Supp. 429, 436 (C.D. Cal. 1979).

¹³⁰ 239 F.3d at 1022.

own server to see that its users were exchanging copyrighted works, its failure to prevent such activity constituted a contribution to its consummation.

By contrast, the *Grokster* court found no material involvement of the defendants in direct infringement by its users.¹³¹ Under its close-the-doors test, the court concluded that since users could continue to infringe after the defendants (hypothetically) ceased operations, the defendants did not provide the site and facilities for infringement.¹³² The court deemed this close-the-doors quality “a seminal distinction” between the *Grokster* and *Streamcast* technologies and *Napster*, likening the *Grokster* defendants to *Xerox* and *Sony*—mere providers of products that may be used to infringe. The court continued that providing “support services and refinements that indirectly support such [infringing] use” did not change the calculus; an ongoing customer service relationship does not independently establish material contribution.¹³³

In *Aimster*, by contrast, Judge Posner emphasized the ongoing relationship between *Aimster* and its users throughout his opinion to seemingly imply resulting liability, but never making such a finding explicit. He also leaves unaddressed the question of a centralized file index. *Club Aimster*, by compiling shared file titles and providing one-click searches to subscribers on an *Aimster* server, seems quite similar to

¹³¹ 259 F. Supp. 2d at 1041.

¹³² “Neither *Streamcast* nor *Grokster* facilitates the exchange of files between users in the way *Napster* did. Users connect to the respective networks, select which files to share, send and receive searches, and download files, all with no material involvement of Defendants. If either Defendants closed their doors and deactivated all computers within their control, users of their products could continue sharing files with little or no interruption.” 259 F. Supp. 2d at 1041.

¹³³ 259 F. Supp. 2d at 1041. “Defendants distribute and support software, the users of which can and do choose to employ it for both lawful and unlawful ends. *Grokster* and *Streamcast* are not significantly different from companies that sell home video recorders or copy machines, both of which can be and are used to infringe copyrights. While Defendants, like *Sony* or *Xerox*, may know that their products will be used illegally by some (or even many) users, and may provide support services and refinements that indirectly support such use, liability for contributory infringement does not lie merely because peer-to-peer file-sharing technology may be used to infringe plaintiffs’ copyrights. Absent evidence of active and substantial contribution to the infringement itself, Defendants cannot be liable.” *Id.* at 1043.

the fatal element in Napster's case. Judge Posner, however, drew no such comparison, arguing instead that since the monthly club fee was Aimster's sole revenue source, the very provision of the software was implicated in this infringing conduct.¹³⁴ This conclusion further unsettles the rules by calling into question the role central file indices play in knowledge and material contribution, and creating an economic standard for contributory liability that has previously been reserved for vicarious liability.

Peer-to-peer networks pose an important question regarding what role an ongoing relationship might play in contributory infringement over the Internet. Does a relationship weigh toward material contribution? If so, what constitutes a relationship? The *Sony* Court noted that lower court cases had only applied contributory infringement to "cases involving an ongoing relationship between the direct infringer and the contributory infringer at the time the infringing conduct occurred," and that this relationship provided the lynchpin of control and authorization required for liability.¹³⁵ Noting that "[t]he only contact between Sony and the users of the Betamax disclosed by this record occurred at the moment of sale," the Court found no such relationship between Sony and its customers.¹³⁶

The issue is complicated where the Internet provides a platform for ongoing contact between software producers and their users. The current cases present opposite opinions on whether the technology in question created a relationship (without any reference to the dicta in *Sony*). *Grokster* held that customer service and product

¹³⁴ "Because Aimster's software is made available free of charge and Aimster does not sell paid advertising on its Web site, Club Aimster's monthly fee is the only means by which Aimster is financed and so the club cannot be separated from the provision of the free software." 334 F.3d at 652. The opinion offers no further explanation of this point.

¹³⁵ 464 U.S. at 437. "In such cases, as in other situations in which the imposition of vicarious liability is manifestly just, the 'contributory' infringer was in a position to control the use of copyrighted works by others and had authorized the use without permission from the copyright owner." *Id.*

¹³⁶ 464 U.S. at 438.

refinements did not, while *Aimster* implied that monthly club fees from select users created a relationship with all. Could distribution of pop-up ads to users or utilization of their computing resources via the P2P network, both of which generate revenue to the provider, constitute a relationship?¹³⁷ Proponents of “pure” *Sony* doctrine argue against assessing any subsequent relationship between a provider and user when gauging liability for provision of the product: “The character of the product itself should be the touchstone.”¹³⁸

D. Vicarious Liability: (1) Right and Ability to Supervise and (2) Direct Financial Interest

Whether vicarious liability has a separate role to play in assessing secondary copyright infringement remains a subject of debate. Though the *Sony* Court acknowledged both contributory and vicarious liability, commentators have noted that its analysis conflated them into a single theory of secondary liability for infringement committed by others.¹³⁹ Noting that “the lines between direct infringement, contributory infringement, and vicarious liability are not clearly drawn,” the Court termed contributory liability as a subset of vicarious liability and focused on contributory

¹³⁷ *KaZaA*, which currently derives its sole income from pop-up ads, has noted that advertising does not supply adequate revenue and plans to augment its income by selling the computing resources of network users. Erick Schonfeld, *The True Cost of Free Music*, BUSINESS 2.0 (May 24, 2002), at <http://www.business2.com/articles/web/print/0,1650,40816,00.html>, cited in Wu, *supra* note 25, at 749.

¹³⁸ Bridges, *supra* note 77, at 7.

¹³⁹ See *Sony*, 464 U.S. at 434-35; see also *Aimster* at __; Br. Amici Curiae of 40 Intellectual Property and Technology Law Professors at __. Even the dissent in *Sony* noted that “[t]he doctrine of contributory copyright infringement . . . is not well defined,” causing the District Court and Ninth Circuit to reach opposite results in applying the *Gershwin* rule; Justice Blackmun then went on to discuss contributory and vicarious liability cases interchangeably. See 464 U.S. at 487-89 (Blackmun, J., dissenting).

liability as the only claim raised by the plaintiffs.¹⁴⁰ However, the Court did not dispute the District Court's holding that Sony was not liable under direct or vicarious infringement theories, noting that these theories were not alleged. Under a structural reading, this omission may suggest that *Sony* shields defendants from vicarious liability as well.¹⁴¹

The *Napster* court asserted that it did not, citing *Nimmer on Copyright*, a law review article, and the *Sony* language cited above, but not providing any particular rationale for the distinction.¹⁴² Applying both contributory and vicarious liability analysis to reach the same conclusion in that case may have appeared to be legal overkill; however, a court willing to grant a *Sony* defense to contributory liability must still confront this ambiguity in the rule for vicarious liability, especially for Internet technologies where an ongoing relationship between users and producers and some economic benefit, however slight or theoretical, may invoke the vicarious liability inquiry.

Aimster noted that the *Sony* Court could have used vicarious liability to find Sony liable for failing to reduce the likelihood of infringement through a design change, presumably based on right and ability to supervise prong: Through design, technology producers conceivably could create the right and ability to supervise future user conduct. Such a finding of course would gut the *Sony* holding, as Judge Posner acknowledged in

¹⁴⁰ 464 U.S. at 435, note 17. “[V]icarious liability is imposed in virtually all areas of the law, and the concept of contributory infringement is merely a species of the broader problem of identifying the circumstances in which it is just to hold one individual accountable for the actions of another.” 464 U.S. at 435.

¹⁴¹ See Br. Amici Curiae of 40 Intellectual Property and Technology Law Professors at ____.

¹⁴² *Napster*, 239 F.3d at 1022 (citing generally 3 Melville B. Nimmer and David Nimmer, NIMMER ON COPYRIGHT §§ 12.04[A][2] and [A][2][b] (2000); Anne Haring, *Copyright Infringement Issues on the Internet*, 617 PLI/Pat 455, 528 Sept. 2, 2000)). Some have critiqued this conclusion as lacking support. See, e.g., Br. Amici Curiae of 40 Intellectual Property and Technology Law Professors at 3, note 2.

stating that the Court treated the two doctrines “interchangeably” and thus absolved Sony of vicarious liability.¹⁴³ Without ruling on the question, he went on to propose that any attempt to hold Aimster vicariously liable for failing to better prevent infringement through system design and policing would be “notwithstanding the outcome in *Sony*.”¹⁴⁴

An argument against vicarious liability falling outside the scope of *Sony* is found in the § 512 safe harbor provision of the Digital Millennium Copyright Act (DMCA).¹⁴⁵ The DMCA, which postdated *Sony* by fourteen years, provides a general safe harbor to Internet service providers against secondary liability for copyright infringement.¹⁴⁶ Proponents of this view argue that Congress thus recognized contributory and vicarious liability as a single question and specifically declined to exempt vicarious liability from the *Sony* ruling.¹⁴⁷ Though § 512 does not appear to shelter P2P providers from secondary liability because of the repeating nature of the infringing conduct on their networks,¹⁴⁸ it is the congressional conflation of contributory and vicarious liability that supports the argument for placing vicarious liability beneath the *Sony* shield. The counter

¹⁴³ “The Court, treating vicarious and contributory infringement interchangeably, ... held that Sony was not a vicarious infringer either.” Aimster, 334 F.3d at 654.

¹⁴⁴ 334 F.3d at 654-55. “By eliminating the encryption feature and monitoring the use being made of its system, Aimster could like Sony have limited the amount of infringement. Whether failing to do so made it a vicarious infringer notwithstanding the outcome in *Sony* is academic, however; its ostrich-like refusal to discover the extent to which its system was being used to infringe copyright is merely another piece of evidence that it was a contributory infringer.” *Id.*

¹⁴⁵ 17 U.S.C. § 512.

¹⁴⁶ See 17 U.S.C. § 512.

¹⁴⁷ See Br. Amici Curiae of 40 Intellectual Property and Technology Law Professors at 5, note 5. See also Napster, 239 F.3d at 1025, citing S. Rep. 105-190 at 40 (1998) (“The limitations in subsections (a) through (d) protect qualifying service providers from liability for all monetary relief for direct, vicarious, and contributory infringement.”), reprinted in Melville B. Nimmer and David Nimmer, NIMMER ON COPYRIGHT: CONGRESSIONAL COMMITTEE REPORTS ON THE DIGITAL MILLENNIUM COPYRIGHT ACT AND CONCURRENT AMENDMENTS (2000); Charles W. Wright, *Actual Versus Legal Control: Reading Vicarious Liability for Copyright Infringement Into the Digital Millennium Copyright Act of 1998*, 75 WASH. L. REV. 1005, 1028-31 (2000) (“The committee reports leave no doubt that Congress intended to provide some relief from vicarious liability”).

¹⁴⁸ See 17 U.S.C. § 512(i)(1)(A); Aimster, 334 F.3d at 655.

to this argument is that Congress did not make the *Sony* rule and has never commented on it, making the connection between its scope and the DMCA attenuated at best.

E. Who Acts Now and How?

The *Sony* decision is nearly twenty years old. In the rapidly changing context of technology law, does this pedigree render the rule time-tested or outmoded?

There are reasons to think *Sony* inapplicable to present realities. Arguably, the VCR and P2P systems are significantly different technologies calling for different legal rules. In *Sony*, the district court found and the Supreme Court agreed that many copyright holders wished to allow private time-shifting and believed this use of the technology would enhance the value of the copyrighted works.¹⁴⁹ Furthermore, the Court found that time-shifting did not harm the market for television shows.¹⁵⁰ While these findings went to the fair use (time-shifting) that constituted the substantial noninfringing use rather than the rationale for the doctrine itself, they may have shaped the holding. No court addressing P2P today would find that the content industries condone the most common use of the technology (infringing on recorded music copyrights), or that file sharing poses no threat to the market for recorded music.

Estimates of actual harm to music sales resulting from file sharing vary, with a number of factors confounding efforts to give such statistics meaning.¹⁵¹ The content

¹⁴⁹ 464 U.S. at __ (IVA).

¹⁵⁰ 464 U.S. at __ (IVB).

¹⁵¹ CD sales have indeed been falling since 2001 (Napster launched in 1999). Menell, *supra* note 24, at 119; Brad King, *Slagging Over Sagging CD Sales* (Apr. 17, 2002), at <http://www.wired.com/news/mp3/0,1285,51880,00.html> (reporting a record industry trade association's announcement of a 5% decline worldwide in 2001); COMPARE with Netanel. Yet it is unclear how courts could expect to assess the harm done to record sales from music file sharing, as other variables include economic conditions, the match between industry releases and consumer tastes, rising CD prices, consolidation in the radio industry, traditional "hard copy" piracy, competition from other forms of

industries' concern with future trends is understandable nonetheless; recent studies suggest that most Americans have few moral qualms about sharing copyrighted files online,¹⁵² and consumers may even see using peer-to-peer technology as a form of protest over a copyright law they had no role in shaping.¹⁵³ However, others perceive less of a crisis in how digital technology might alter the parameters of copyright protection than in how potential countervailing measures might chill technological innovation and/or shrink the public domain.¹⁵⁴ Critics of current alarmist statements by copyright holders often point to copyright law's long history of surviving technological challenges despite predictions of doom.¹⁵⁵

entertainment. See Netanel?; James K. Willcox, *Where Have All the CDs Gone?*, SOUND & VISION (Oct. 26, 2003), at http://soundandvisionmag.com/article.asp?section_id=2&article_id=453&page_number=1&preview=. The data on what percentage of file sharers purchase less or more music is conflicting. See Edison Media Research, National Record Buyers Study II, at <http://www.edisonresearch.com/R&RRecordBuyersII.htm> (last visited October 26, 2003) (study sponsored by music industry trade publication finding that 41-51% of downloaders are buying less music). Compare with Noah Shachtman, *Report Refutes Anti-Trade Debate*, WIRED NEWS (May 3, 2003), at <http://www.wired.com/news/business/0,1367,52305.00.html> (reporting a study from Jupiter Research finding that experienced file traders were 75% more likely to purchase music than average online music fans).

¹⁵² See *infra* note **Error! Bookmark not defined.**

¹⁵³ Wu, *supra* note 25, at 747-48 (suggesting that heavy lobbying of Congress by the content industries has stirred consumer antipathy toward the law). Indeed, such protests are evident in user postings on Aimster bulletin boards, such as "Let's all fuck over the music industry" and "I am not going to buy CDs anymore!" 252 F. Supp. 2d at 644.

¹⁵⁴ See, e.g., LAWRENCE LESSIG, *THE FUTURE OF IDEAS* (2001); JESSICA LITMAN, *DIGITAL COPYRIGHT* (2001); SIVA VAIDHYANATHAN, *COPYRIGHTS AND COPYWRONGS: THE RISE OF INTELLECTUAL PROPERTY AND HOW IT THREATENS CREATIVITY* (2001); Raymond Shih Ray Ku, *The Creative Destruction of Copyright: Napster and the New Economics of Digital Technology*, 69 U. CHI. L. REV. 263 (2002); ADD Tragedy of the Commons article.

¹⁵⁵ For instance, copyright has survived the advent of the player piano, radio broadcast, and audio cassette tapes. Menell, *supra* note 24, at 101-03. This survival has been due both to small tweaks in the law and simple failure of the expected harm to materialize; consumers' use of cassette tapes, for instance, for "space shifting"—copying music they owned to play in the car or on portable devices—did not harm the recorded music market. United States Office of Technology Assessment, *Copyright and Home Copying Technology Challenges Law* (Oct. 1989); Menell, *supra* note 24, at 108. In the case of the Betamax, despite the infamous congressional testimony of Motion Picture Association of America president Jack Valenti in 1982 that "the VCR is to the American film producer and the American public as the Boston strangler is to a woman home alone," the film industry instead reaped rich revenues from the new market for prerecorded video tapes." See Menell, *supra* note 24, at 102, note 134; JAMES LARDNER, *FAST FORWARD: A MACHINE AND THE COMMOTION IT CAUSES* 297-300 (1987); HAROLD L. VOGEL, *ENTERTAINMENT INDUSTRY ECONOMICS: A GUIDE FOR FINANCIAL ANALYSIS* 62 (5th ed.. 2001).

Another potentially significant difference between the VCR and P2P systems is that P2P (arguably) implicates another exclusive right under copyright law: the right of distribution. Because *Sony* involved only unauthorized copying, its protections might not extend beyond that context. This was in fact the approach the district court took in *Aimster*—end users who made copies of copyrighted works available for download acted as distributors and thus rendered *Sony* inapplicable.

Technologists dispute this approach, arguing that it turns *Sony* on its head; the question is whether there are substantial noninfringing uses, not whether another infringing use can be found.¹⁵⁶ Furthermore, it is not clear that uploading music files violates the distribution right in the Copyright Act. Under the statute’s plain language, this right is “to distribute copies or phonorecords of the copyrighted work to the public by sale or other transfer of ownership, or by rental, lease, or lending.”¹⁵⁷ There is no sale, rental, lease, or loan of copies in making a file available on a P2P network. “Other transfer of ownership” is as yet a legal wild card; does delivery of electronic bytes constitute the transfer Congress contemplated in 1976?

Many argue that Congress is the appropriate body to weigh the competing interests involved in regulating peer-to-peer technology—or perhaps any technology at all.¹⁵⁸ The *Sony* Court noted that the “difficult balance” between stakeholder interests has required numerous amendments to the patent and copyright statutes.¹⁵⁹ “From its

¹⁵⁶ Bridges at 7.

¹⁵⁷ 17 U.S.C. § 106(3).

¹⁵⁸ Br. Amici Curiae of 40 Intellectual Property and Technology Law Professors at 2 (stating that “this [the *Grokster*] Court is not the appropriate forum in which to change the *Sony* rule....Congress...alone has the institutional competence necessary for a broad inquiry into the benefits and detriments of these technologies”). See also Wu, *supra* note 25, at 739-40 (proposing that affirmance of the *Grokster* case would be in the tradition of “settlement-forcing” decisions, from the piano roll to cable broadcasting, in which courts have prompted Congress to settle disputes raised by new technology).

¹⁵⁹ 464 U.S. at 429.

beginning, the law of copyright has developed in response to significant changes in technology,” and Congress is charged with this task; it has long been “settled that the protection given to copyrights is wholly statutory.”¹⁶⁰ Noting that Congress may well “take a fresh look at this new technology, just as it so often has examined other innovations in the past,” the court reasoned that nothing in the Copyright Act showed that the elected representatives of potential Betamax users wished to make it illegal.¹⁶¹

Congress has addressed Internet copyright issues in limited capacities by enacting the No Electronic Theft Act in 1997¹⁶² and the Digital Millennium Copyright Act in 1998.¹⁶³ However, these and other recently proposed bills¹⁶⁴ have many observers concerned that if the question is left to Congress, lobbying pressures from the content industry and essential misunderstanding of the nature of technological development will combine to reach an unfortunate result.

¹⁶⁰ 464 U.S. at 430-31. “The judiciary’s reluctance to expand the protections afforded by copyright without explicit legislative guidance is a recurring theme.” *Id.* at 431 (citing cases, such as the player piano, in which the Court declined to change copyright). “Sound policy, as well as history, supports our consistent deference to Congress when major technological innovations alter the market for copyrighted materials. Congress has the constitutional authority and the institutional ability to accommodate fully the varied permutations of competing interests that are inevitably implicated by new technology.” *Id.*

¹⁶¹ 464 U.S. at 456.

¹⁶² 17 U.S.C. §§ 101-803 (2000). The “NET” Act provides criminal penalties for copyright infringements that yield “private financial gain,” which may include “receipt, or expectation of receipt, of anything of value, including the receipt of other copyrighted works”—potentially most music file sharing. *See* Wu, *supra* note 25, at 742.

¹⁶³ 17 U.S.C. §§ 512, 1201. The anti-circumvention provision in Section 1201 of the DMCA “can be understood as an effort to restore an eroding gatekeeper system” by “return[ing] content owners to the 1970s, when they were free to sit back and police the few intermediaries licensed to access the copy-protected content.” Wu, *supra* note 25, at 741. Section 512 et. seq. holds ISPs liable for copyright infringement taking place across their portals subject to a safe harbor takedown period. CHECK.

¹⁶⁴ *See, e.g.*, Consumer Broadband and Digital Television Promotion Act, at <http://thomas.loc.gov/cgi-bin/query/D?c107:1:./temp/~c107HYEVYC::> (introduced in March, 2002 by Senator Fritz Hollings and requiring copy-protection mechanisms in all digital media technology); To amend Title 17, United States Code, to limit the liability of copyright owners for protecting their works on peer-to-peer networks: Hearing on H.R. 5211 Before the House, 107th Cong. (2002) (the “Berman Bill”) (proposing legal endorsement of technological self-help measures by copyright holders to disrupt P2P networks). *Compare with* the Consumers, Schools, and Libraries Digital Rights Management (DRM) Awareness Act of 2003, at <http://thomas.loc.gov/cgi-bin/query/D?c108:1:./temp/~c108g56bn4::> (introduced by Senator Sam Brownback in September, 2003 and prohibiting government technology mandates while protecting the identity of Internet users and certain fair uses of digital media).

For its part, Congress appears less than eager to step into the fray. A group of legislators recently issued a call to P2P providers to regulate themselves,¹⁶⁵ an effort arguably already underway in the form of P2P United. This alliance of P2P providers, including Grokster and Morpheus, has adopted a “code of conduct” requiring members to provide information regarding copyright law, protect user privacy, and prevent inadvertent file sharing.¹⁶⁶ Meanwhile, those who oppose the *Sony* rule chasten courts who apply it in defendants’ favor in the name of awaiting congressional guidance.¹⁶⁷ As the dissent in *Sony* said, even while the Court chafed under an “ill-fitting” copyright regime, “in the absence of a congressional solution, courts cannot avoid difficult problems by refusing to apply the law.”¹⁶⁸

In response to concerns about what form congressional guidance might take, a number of legal scholars and practitioners have put forth propositions for alternative compensation schemes to make P2P music file sharing legal, following existing, new, or hybrid models for compulsory or collective licensing, levies, subscriptions, and so on.¹⁶⁹ Proponents of this approach note parallels to solutions to previous crises arising between

¹⁶⁵ John Borland, *Senators Ask P2P Companies to Police Themselves*, CNET NEWS.COM (Nov. 21, 2003), at http://news.com.com/2100-1028_3-5110785.html. Lindsey Graham (R-N.C.) Dianne Feinstein (D-Calif.), and four other senators wrote a letter to the leading P2P companies (including Grokster and Streamcast) requesting that they (1) provide clear, conspicuous warning regarding the legal risks of using their products, (2) install filters in their software to help prevent the transmission of files containing copyrighted materials or pornography, and (3) set the software’s default to share no user files with the network unless the user actively chooses to do so.

¹⁶⁶ P2P United, *Member Code of Conduct* (Sept. 29, 2003), at <http://www.p2punitied.org/modules.php?op=modload&name=News&file=index&catid=&topic=9&allstories=1>.

¹⁶⁷ See, e.g., Br. in Support of Reversal by Boorstyn et al., *Grokster*, ___, at 3 (saying of the *Grokster* court’s unwillingness to expand the boundaries of copyright without more legislative guidance, “Such an abdication was not justified.”).

¹⁶⁸ 464 U.S. at 499. “It is no answer, or course, to say and stress, as the Court does, this Court’s consistent deference to Congress whenever major technological innovations appear. Perhaps a better and more accurate description is that the Court has tended to evade the hard issues when they arise in the area of copyright law.” *Id.* at 457 (internal quotations and citations omitted).

¹⁶⁹ Fisher, Netanel, Nadel, Ku, Eckersley.

technology and content, which date back to the turn of the twentieth century. Indeed this idea was seeded in *Sony*, in which the Ninth Circuit suggested a judicially created compulsory license as a solution to the problem below,¹⁷⁰ and the plaintiffs/respondents proceeded to propose compulsories as an acceptable remedy to the Court.¹⁷¹

While others debate the future of secondary liability law and new statutes that might address the latest dilemma, the recording industry has moved to enforce existing law. In the wake of the *Grokster* district court loss, the RIAA instituted a campaign to subpoena peer-to-peer user names from Internet service providers and sue those it accuses of uploading copyrighted music files for direct infringement.¹⁷² As a result, many in the field expect a new round of peer-to-peer technology that masks users' identity. Indeed, P2P coders have already exhibited great ingenuity in designing around developments in the law.¹⁷³ Repeated adaptation of technology to exploit ambiguities in the law may require a much deeper solution to the digital copyright dilemma than legislation or judicial pronouncements, as the gap between law and social norms drives demand for technology that enables consumers to do follow the version of the law they believe is right.¹⁷⁴ Some commentators predict that copyright law will never triumph over

¹⁷⁰ 659 F.2d at 976.

¹⁷¹ 464 U.S. at 441, note 21. The *Sony* dissent also voiced approval for considering a royalty scheme or other alternative remedy, 464 U.S. at 493 (Blackmun, J., dissenting), noting that such a solution may pose less of a threat to commerce than an injunctive standoff. *Id.* at 499.

¹⁷² As recently as June 2003, commentators noted that copyright owners have declined to sue consumers of infringing copyrighted works because such a move would be "costly and unpopular," especially in light of the traditionally small scale of such infringement. *See, e.g.,* Wu, *supra* note 25, at 713. Or as Judge Posner said in *Aimster*, the recording industry opted to sue the technology producers instead, "recognizing the impracticability or futility of a copyright owner's suing a multitude of individual infringers." *Aimster*, 334 F.3d at 645. This view became obsolete in August of 2003 when the RIAA filed its first lawsuits against music file sharers, turning former customers into legal adversaries.

¹⁷³ Some argue that coders shape or even make law with such efforts. *See, e.g.,* Wu, *supra* note 25, at 680-81; Lawrence Lessig, *CODE AND OTHER LAWS OF CYBERSPACE* 89 (1999).

¹⁷⁴ *See* Wu, *supra* note 25, at 725-26. So-called "charismatic code" enables illegal activity while tapping social norms of reciprocity to create an impression of cooperative community to users. Lior Jacob Strahilevitz, *Charismatic Code, Social Norms, and the Emergence of Cooperation on the File-Swapping*

conflicting social norms, and propose that copyright holders should turn their attention from legal reform and enforcement to normative change.¹⁷⁵

IV. CONCLUSION

The outcome of the *Grokster* appeal and the adjudication following the *Aimster* decision will have significant effects on the legal landscape regarding secondary copyright liability for peer-to-peer and other technology providers. Whether addressed by the Supreme Court, Congress, or extra-legal forces, the fate of the *Sony* doctrine in the near future is likely to reveal much about how the legal system can and should respond to emerging technologies and the novel issues they raise.

Networks, 89 VA. L. REV. 505, 507-08 (2003). As digital commentator John Perry Barlow said of P2P and copyright, “No law can be successfully imposed on a huge population that does not morally support it and possesses easy means for its invisible evasion.” John Perry Barlow, *The Next Economy of Ideas*, WIRED 8.10 (Oct. 2000), available at http://www.wired.com/wired/archive/8.10/download_pr.html. Three years later, however, there is little evidence to support Barlow’s prediction that there will be no property in cyberspace. See *id.*

¹⁷⁵ E.g. Strahilevitz, *supra* note 174, at 595 (“[A] wiser strategy for the RIAA and its allies might be to think about ways in which they could weaken the cooperative norms that have arisen among users of these networks.”).