

5-16-2024

Machine Speech: Towards a Unified Doctrine of Attribution and Control

Brian Sites

University of Miami School of Law

Follow this and additional works at: <https://repository.law.miami.edu/umlr>



Part of the [Internet Law Commons](#), [Law and Society Commons](#), and the [Science and Technology Law Commons](#)

Recommended Citation

Brian Sites, *Machine Speech: Towards a Unified Doctrine of Attribution and Control*, 78 U. Mia. L. Rev. 1025 ()

Available at: <https://repository.law.miami.edu/umlr/vol78/iss4/4>

This Article is brought to you for free and open access by the Journals at University of Miami School of Law Institutional Repository. It has been accepted for inclusion in University of Miami Law Review by an authorized editor of University of Miami School of Law Institutional Repository. For more information, please contact mperez@law.miami.edu, library@law.miami.edu.

Machine Speech: Towards a Unified Doctrine of Attribution and Control

BRIAN SITES*

*Like many courts across the country in 2023, courts in the Eleventh Circuit were met with novel claims challenging ChatGPT and other artificial intelligence tools. These cases raise common questions: How should courts treat the speech of machines? When a machine generates allegedly defamatory material, who is the speaker—mortal or machine? When a machine generates expressive creations, who is the artist, and does that shape copyright eligibility? When a machine makes assertions about reality through lab analyses and other forensic reports, who is the accuser, and how does the answer impact a defendant's rights at trial? Should those answers stem from a common doctrinal model for machine speech attribution, or should they be discordant based on competing policy goals in each area of law? This Article explores those cases and the increasingly expansive machine speech doctrine, including *Walters v. OpenAI*, a 2023 Georgia defamation case involving ChatGPT, and a series of cases arising from the Eleventh Circuit's machine speech Confrontation Clause case—one of the first major cases of its kind—*United States v. Lamons*.*

* Brian Sites, LL.M. Columbia University Law School; J.D., Florida State University College of Law; University of Miami School of Law Associate Director & Lecturer in Law. I am thankful to my research assistant, Ashton Greusel, the members of the *University of Miami Law Review*, and the University of Miami for supporting this Article.

INTRODUCTION	1026
I. TRIAL OF THE MACHINES	1032
A. <i>Defamation Cases & Walters v. OpenAI</i>	1032
B. <i>Copyright and Related Cases</i>	1041
C. <i>Input as Infringement Cases</i>	1042
D. <i>Output as Infringement Cases</i>	1043
E. <i>AI as an Artist</i>	1043
F. <i>Right of Publicity Cases</i>	1046
G. <i>Privacy Cases</i>	1047
H. <i>Other Notable Cases</i>	1048
II. TRIAL BY THE MACHINES.....	1050
III. A MODEL FOR MACHINE SPEECH?	1057
CONCLUSION.....	1060

“I’m more frightened than interested by artificial intelligence—in fact, perhaps fright and interest are not far away from one another.”¹

INTRODUCTION

Artificial intelligence and tools that approximate AI’s level of sophistication offer tremendous promise.² They could improve accuracy in medical diagnosis, increase research speed efficiency for attorneys and others, make driving safer, amplify the creative reach of artists, and provide innumerable other benefits.³ By augmenting the abilities of humans across a range of professions and tasks, they will drive down costs in unimaginable ways, and they could empower, for example, the provision of education and other services to

¹ Cezary Gesikowski, *AI – The Good, the Bad, and the Transformative*, MEDIUM (Mar. 17, 2023), <https://gesikowski.medium.com/ai-the-good-the-bad-and-the-transformative-7c9661267f63> (quoting Gemma Whelan).

² See Susan A. Hughes, *Does artificial intelligence hold promise or peril? HKS experts say both.*, HARV. KENNEDY SCH. (Dec. 7, 2023), <https://www.hks.harvard.edu/faculty-research/policy-topics/science-technology-data/does-artificial-intelligence-hold-promise-or>.

³ See, e.g., Robert David Hart, *When artificial intelligence botches your medical diagnosis, who’s to blame?*, QUARTZ (May 23, 2017), <https://qz.com/989137/when-a-robot-ai-doctor-misdiagnoses-you-whos-to-blame>.

underserved populations around the world.⁴ In short, these tools are revolutionary.

But with revolution comes disruption. The services promised by ChatGPT and other similar tools raise important concerns: doctors relying on AI are much worse at diagnosing patients if the AI was also wrong;⁵ attorneys have cited entirely fictional cases from using these services;⁶ almost 1,000 car crashes have already occurred from just the leading self-driving technology since 2019;⁷ the tools that empower expressive acts may cost many artists their jobs;⁸ and, generally speaking, AI and Large Language Model (LLM) “hallucinations”⁹ are unpredictable and often highly

⁴ See Zaynah Bhanji, *Healthcare. Education. Hunger. Poverty. Artificial Intelligence can solve these global problems.*, MEDIUM (Jan. 28, 2019), <https://medium.com/@zaynahbhanji/healthcare-education-hunger-poverty-we-can-use-ai-to-solve-these-global-problems-b1855c7bbb80>.

⁵ See Paul Hsieh, *How ‘Automation Bias’ Plus Artificial Intelligence Can Lead To Medical Misdiagnoses*, FORBES (May 30, 2023, 12:27 PM), <https://www.forbes.com/sites/paulhsieh/2023/05/30/how-automation-bias-plus-artificial-intelligence-can-lead-to-medical-misdiagnoses> (noting that doctors relying on feedback they thought was from an AI diagnostic tool were only 20% accurate in their diagnoses if the feedback was incorrect).

⁶ See Larry Neumeister, *Lawyers submitted bogus case law created by ChatGPT. A judge fined them \$5,000*, ASSOCIATED PRESS (June 22, 2023, 6:16 PM), <https://apnews.com/article/artificial-intelligence-chatgpt-fake-case-lawyers-d6ae9fa79d0542db9e1455397aef381c>.

⁷ See William Brangham & Dorothy Hastings, *The self-driving safety concerns that led to Tesla’s recall of 2 millions cars*, PBS (Dec. 13, 2023, 6:25 PM), <https://www.pbs.org/newshour/show/the-self-driving-safety-concerns-that-led-to-teslas-recall-of-2-million-car>; Sebastian Blanco, *Report: Tesla Autopilot Involved in 736 Crashes since 2019*, CAR & DRIVER (June 13, 2023), <https://www.caranddriver.com/news/a44185487/report-tesla-autopilot-crashes-since-2019/>.

⁸ See Paul Hatton, *AI is replacing artists, and here’s the proof*, CREATIVE BLOQ (Oct. 6, 2023), <https://www.creativebloq.com/news/ai-is-taking-artists-jobs>.

⁹ *What are AI hallucinations?*, IBM, <https://www.ibm.com/topics/ai-hallucinations> (last visited Dec. 13, 2023) (“AI hallucination is a phenomenon wherein a large language model (LLM)—often a generative AI chatbot or computer vision tool—perceives patterns or objects that are nonexistent or imperceptible to human observers, creating outputs that are nonsensical or altogether inaccurate. . . . [S]ometimes AI algorithms produce outputs that are not based on training data, are incorrectly decoded by the transformer or do not follow any identifiable pattern. In other words, it ‘hallucinates’ the response.”).

persuasive.¹⁰ When tools work well enough that people widely use and place confidence in them, unpredictable failures that appear correct are especially problematic.¹¹

If progress and disruption are two sides of a coin, AI also casts a shadow: misuse.¹² Like most new technology, there are uses that are difficult to prevent despite their personal (and societal) harm.¹³ For example, AI-enabled deepfakes¹⁴ empower harassment,¹⁵ disinformation,¹⁶ and could even potentially shape wars and other

¹⁰ See Cade Metz, *What Makes A.I. Chatbots Go Wrong?*, N.Y. TIMES, <https://www.nytimes.com/2023/03/29/technology/ai-chatbots-hallucinations.html> (Apr. 4, 2013).

¹¹ See Leah Chong et al., *Human Confidence in Artificial Intelligence and in Themselves: The Evolution and Impact of Confidence on Adoption of AI Advice*, 127 COMPUTS. HUM. BEHAV. 107018, 107018 (2022).

¹² See *Exploiting AI: How Cybercriminals Misuse and Abuse AI and ML*, TRENDMICRO (Nov. 19, 2020), <https://www.trendmicro.com/vinfo/us/security/news/cybercrime-and-digital-threats/exploiting-ai-how-cybercriminals-misuse-abuse-ai-and-ml>.

¹³ See AFP, *Misuse, harm 'inevitable'! WHO highlights AI risks for healthcare*, HITECH, <https://tech.hindustantimes.com/tech/news/misuse-harm-inevitable-who-highlights-ai-risks-for-healthcare-71705590000859.html> (Jan. 19, 2024, 7:26 AM).

¹⁴ A deepfake is “[a]ny of various media, [especially] a video, that has been digitally manipulated to replace one person’s likeness convincingly with that of another, often used maliciously to show someone doing something that he or she did not do.” *Deepfake*, OXFORD DICTIONARY, https://www.oed.com/dictionary/deepfake_n?tl=true (last visited Feb. 8, 2024); see Bernard Marr, *The Best (And Scariest) Examples Of AI-Enabled Deepfakes*, FORBES (July 22, 2019, 1:04 AM), <https://www.forbes.com/sites/bernardmarr/2019/07/22/the-best-and-scariest-examples-of-ai-enabled-deepfakes/?sh=563951202eaf>.

¹⁵ See, e.g., Matt Burgess, *Deepfake Porn Is Out of Control*, WIRED (Oct. 16, 2023, 7:00 AM), <https://www.wired.com/story/deepfake-porn-is-out-of-control/> (“New research shows the number of deepfake videos is skyrocketing—and the world’s biggest search engines are funneling clicks to dozens of sites dedicated to the nonconsensual fakes. . . . Since deepfakes emerged half a decade ago, the technology has consistently been used to abuse and harass women . . .”).

¹⁶ See Alexandra Ulmer & Anna Tong, *Deepfaking it: America’s 2024 election collides with AI boom*, REUTERS (May 30, 2023, 11:17 PM), <https://www.reuters.com/world/us/deepfaking-it-americas-2024-election-collides-with-ai-boom-2023-05-30/>; Adam Satariano & Paul Mozur, *The People Onscreen Are Fake. The Disinformation Is Real.*, N.Y. TIMES (Feb. 7, 2023), <https://www.nytimes.com/2023/02/07/technology/artificial-intelligence-training-deepfake.html>.

geopolitical conflict at some point (if they haven't already).¹⁷ Recent lawsuits also allege that AI has been used to discriminate in employment decisions¹⁸ and housing determinations.¹⁹ Notably, “[a]t least 85% of large U.S. employers are using AI in some aspects of employment.”²⁰ This list of misuse will only grow with time.

Finally, though the recent AI boom has propelled technology forward, many of these concerns have been present for years.²¹ As I have noted before,²² trial by machine is already widespread, and it

¹⁷ Cf. Bobby Allyn, *Deepfake video of Zelenskyy could be ‘tip of the iceberg’ in info war, experts warn*, NPR (Mar. 16, 2022, 8:26 PM), <https://www.npr.org/2022/03/16/1087062648/deepfake-video-zelenskyy-experts-war-manipulation-ukraine-russia> (describing a deepfake video of Ukrainian President Volodymyr Zelenskyy that hackers put on a Ukrainian news website “show[ing] a rendering of the Ukrainian president appearing to tell his soldiers to lay down their arms and surrender the fight against Russia . . .”). It is unclear how many attempts like these actually affect soldiers, the public, and broader war efforts by various parties. *Id.*

¹⁸ See, e.g., Daniel Wiessner, *Tutoring firm settles US agency’s first bias lawsuit involving AI software*, REUTERS, <https://www.reuters.com/legal/tutoring-firm-settles-us-agencys-first-bias-lawsuit-involving-ai-software-2023-08-10/> (Aug. 10, 2023); *Mobley v. Workday, Inc.*, No. 3:23-cv-00770 (N.D. Cal. 2023 filed Feb. 21, 2023) (alleging discrimination in hiring software in an amended complaint after the court granted defendant’s motion to dismiss the prior complaint). For the *Mobley* docket, see <https://www.courtlistener.com/docket/66831340/mobley-v-workday-inc/>.

¹⁹ See, e.g., Shreya Srinivasan, *Illinois housing management companies to settle with Open Communities for ‘discriminatory’ AI use*, DAILY NW. (Feb. 1, 2024), <https://dailynorthwestern.com/2024/02/01/city/illinois-housing-management-companies-to-settle-with-open-communities-for-discriminatory-ai-use/>; Landon Jones, *Lawsuit alleges AI was used to discriminate against renters using housing vouchers*, WBEZ CHI. (Oct. 10, 2023, 12:07 PM), <https://www.wbez.org/stories/lawsuit-alleges-ai-was-used-to-discriminate-against-renters-using-housing-vouchers/01d945af-9310-4e08-88c2-db25b4507900>.

²⁰ See Wiessner, *supra* note 18.

²¹ Deepfakes, for example, are getting more convincing, but they have been a problem for at least the last five years. See, e.g., Rob Toews, *Deepfakes Are Going To Wreak Havoc On Society. We Are Not Prepared*, FORBES (May 25, 2020, 11:54 PM), <https://www.forbes.com/sites/robtoews/2020/05/25/deepfakes-are-going-to-wreak-havoc-on-society-we-are-not-prepared/?sh=13b3b5297494>.

²² See generally Brian Sites, *The Future of the Confrontation Clause: Semi-autonomous and Autonomous Machine Witnesses*, 22 VAND. J. ENT. & TECH. L. 547, 548 (2020) [hereinafter Sites, *The Future of the Confrontation Clause*]; Brian Sites, *Rise of the Machines: Machine-Generated Data and the Confrontation Clause*, 16 COLUM. SCI. & TECH. L. REV. 36, 36 (2014) [hereinafter Sites, *Rise of*

does not depend on AI or LLMs.²³ That is not inherently bad. But where a defendant would have been guaranteed a right to cross-examine a human witness, courts have widely refused to recognize meaningful protections when a machine is substituted as the accuser.²⁴ Machines serve as witnesses against criminal defendants in many contexts: they describe crime scenes;²⁵ identify people via facial recognition programs²⁶ and other biometric recognition tools;²⁷ assert where people are by locating phones;²⁸ identify vehicles via license plate readers;²⁹ analyze and report crimes via drug, firearm,

the Machines]; Brian Sites, *Machines Ascendant: Robots and the Rules of Evidence*, 3 GEO. L. TECH. REV. 1, 1 (2018).

²³ See *infra* Part II; see also *United States v. Bursten*, 560 F.2d 779, 785 (7th Cir. 1977); Andrea Roth, *Trial by Machine*, 104 GEO. L.J. 1245, 1247 (2016).

²⁴ See *Arizona v. Salamone*, No. 1 CA-CR 16-0204, 2017 WL 2875096, at *4 (Ariz. Ct. App. July 6, 2017) (“Although the chromatograms are certainly evidence against Salamone, as exclusively-machine-generated data they are not out-of-court statements by any person, and thus are not subject to confrontation or hearsay analysis.”).

²⁵ See *NLV police have new crime-solving tool*, 8NEWSNOW (June 23, 2017, 6:32 PM), <https://www.8newsnow.com/news/nlv-police-have-new-crime-solving-tool/749450915/>.

²⁶ See Natasha Singer, *Never Forgetting a Face*, N.Y. TIMES (May 17, 2014), <https://www.nytimes.com/2014/05/18/technology/never-forgetting-a-face.html> (noting use of facial recognition in law enforcement in New York, Pennsylvania, and California, and also by casinos, grocery stores, and others); see also Andrew Flanagan, *Thanks To AI, A 3rd Person Is Arrested Following A Pop Superstar’s Concert*, NPR (May 23, 2018, 4:15 PM), <https://www.npr.org/sections/the-record/2018/05/23/613692526/thanks-to-ai-a-3rd-person-is-arrested-following-a-pop-superstars-concert> (describing facial recognition software’s use in China and noting “Amazon has been shopping its own facial recognition technology . . . to U.S. law enforcement.”).

²⁷ See *Street Level Surveillance: Biometric Surveillance*, EFF, <https://www.eff.org/pages/tattoo-recognition> (last visited Feb. 23, 2023) (describing the technology as “being actively developed by private companies with the support of federal agencies, state law enforcement, and universities.”).

²⁸ See Tom Jackman, *Police use of ‘StingRay’ cellphone tracker requires search warrant, appeals court rules*, WASH. POST (Sept. 21, 2017, 5:20 PM), <https://www.washingtonpost.com/news/true-crime/wp/2017/09/21/police-use-of-stingray-cellphone-tracker-requires-search-warrant-appeals-court-rules/> (discussing StingRay usage as widespread).

²⁹ See Josh Shannon, *Newark Police expanding network of automatic license plate readers*, NEWARK POST (Mar. 14, 2018), http://www.newarkpostonline.com/news/newark-police-expanding-network-of-automatic-license-plate-readers/article_cb2b9a42-4efc-50ce-ba49-7822c8e89877.html.

and general crime-detecting devices;³⁰ provide opinions in sentencing and parole decisions;³¹ and provide expert analysis on a variety of topics ranging from DNA to drugs via forensic laboratory machines.³² Some machine accusers replace human witnesses; some offer testimony that humans could not offer;³³ and as is true with many LLM tools, other machines simply augment the speech provided by humans.³⁴

In many ways, we have not gone quietly into the night in response to these concerns.³⁵ Instead, we did what we often do—we sued.³⁶ Art generated by machines? An army of copyright lawyers

³⁰ See, e.g., Lexy Savvides, *Crime-fighting robot can detect weapons in a crowd*, CNET (Sept. 21, 2017, 10:00 AM), <https://www.cnet.com/news/knight-scope-security-robot-can-detect-weapons-in-a-crowd/>; Sharon Weinberger, *Terrorist ‘pre-crime’ detector field tested in United States*, NATURE (May 27, 2011), <https://www.nature.com/news/2011/110527/full/news.2011.323.html>; Chris Weller, *There’s a secret technology in 90 US cities that listens for gunfire 24/7*, BUS. INSIDER (June 27, 2017, 10:59 AM), <http://www.businessinsider.com/how-shotspotter-works-microphones-detecting-gunshots-2017-6>; *Future Attribute Screening Technology Fact Sheet*, DEP’T HOMELAND SEC. (Nov. 18, 2014), <https://www.dhs.gov/publication/future-attribute-screening-technology>.

³¹ See CHRISTOPHER SLOBOGIN, PROVING THE UNPROVABLE: THE ROLE OF LAW, SCIENCE, AND SPECULATION IN ADJUDICATING CULPABILITY AND DANGEROUSNESS 101–14 (2007) (discussing future dangerousness). See generally Brian Sites, *The Danger of Future Dangerousness in Death Penalty Use*, 34 FLA. ST. U. L. REV. 959, 960 (2007) (discussing future dangerousness analyses).

³² See Sites, *Rise of the Machines*, *supra* note 22, at 51–57 (describing cases and various forensic tools in the context of the Confrontation Clause).

³³ See Joe Palazzolo, *Defense Attorneys Demand Closer Look at Software Used to Detect Crime-Scene DNA*, WALL ST. J., <https://www.wsj.com/articles/defense-attorneys-demand-closer-look-at-software-used-to-detect-crime-scene-dna-1447842603> (Nov. 18, 2015, 5:17 AM) (discussing TrueAllele as “a program that untangles DNA when humans can’t” and citing as an example “a recent Commerce Department study of more than 100 crime labs around the country, [which found that] only seven of them were able to correctly untangle a complex DNA mixture.”); Jessica Pishko, *The Impenetrable Program Transforming How Courts Treat DNA Evidence*, WIRED (Nov. 29, 2017, 7:00 AM), <https://www.wired.com/story/trueallele-software-transforming-how-courts-treat-dna-evidence/> (describing TrueAllele as a program that can “make connections that elude humans.”).

³⁴ See discussion *infra* Part II.

³⁵ See Dylan Thomas, *Do not go gentle into that good night*, POETS, <https://poets.org/poem/do-not-go-gentle-good-night> (last visited Feb. 14, 2024).

³⁶ See discussion *infra* Part I; see also Christopher J. Valente et al., *Recent Trends in Generative Artificial Intelligence Litigation in the United States*, K&L

will stem that tide. Widespread use of public (but private) information without express permission? Send in the data lawyers. Defamatory remarks reported by an LLM? There's a tort for that.³⁷

A common thread runs through many of these cases, but it is not a thread that courts have drawn together into a cohesive whole—when machines³⁸ talk, who is the speaker? Is it the programmers, engineers, and other parties that built the machine? Is it the entity that owns the machine? Is it the machine itself? When a human operator is involved (such as with ChatGPT prompt use), is it the operator alone, the machine, or perhaps a duet of both? Some of these pose questions of attribution; others are questions of liability; and little is clear about where these two concepts intersect.

This Article explores those questions. Part I collects cases involving AI, beginning with the current leading AI “speech” case—a defamation case filed in Georgia based on ChatGPT use. Part I then expands into other lawsuits asserting liability involving AI, including privacy claims, copyright infringement claims, and lawsuits against LLMs, AI, and machines more generally. Part II then briefly highlights the current state of trial by machine and jurisprudence on machine-generated evidence across the nation.³⁹ Finally, Part III explores observations about developing trends and possible threads that weave towards a unified doctrine of machine speech.

I. TRIAL OF THE MACHINES

A. *Defamation Cases & Walters v. OpenAI*

If nothing else, 2023 was the year lawyers took AI to court, and the Eleventh Circuit was no exception.⁴⁰ In a case initially filed in Georgia's Superior Court of Gwinnett County and later removed to

GATES (Sept. 5, 2023), <https://www.klgates.com/Recent-Trends-in-Generative-Artificial-Intelligence-Litigation-in-the-United-States-9-5-2023>.

³⁷ See discussion *infra* Part I (discussing examples of each of these cases).

³⁸ The term “machines” here broadly refers to tangible constructions (like a breathalyzer or other forensic analysis tool), more intangible tools (like software generally), and hybrid creations.

³⁹ See Sites, *The Future of the Confrontation Clause*, *supra* note 22, at 551–52.

⁴⁰ See generally Amended Complaint, *Walters v. OpenAI, LLC*, No. 1:23-cv-03122-MLB (N.D. Ga. Sept. 8, 2023).

the United States District Court for the Northern District of Georgia, talk show radio personality Mark Walters alleged that ChatGPT made several defamatory statements about him.⁴¹ As is generally true in many jurisdictions, defamation in Georgia is defined as: “(1) a false and defamatory statement concerning the plaintiff; (2) an unprivileged communication to a third party; (3) fault by the defendant amounting at least to negligence; and (4) special harm or the actionability of the statement irrespective of special harm.”⁴² But could a machine be at “fault” for false speech?

Walter’s complaint alleged that a journalist, Fred Riehl, used ChatGPT in May 2023 to generate statements about Walters as part of research Riehl was conducting about a lawsuit.⁴³ Riehl was attempting to use ChatGPT “to provide a summary of the accusations in [a] complaint” filed in that other lawsuit.⁴⁴ ChatGPT reported the following about the complaint that Riehl requested ChatGPT to summarize:

[The document] is a legal complaint filed by Alan Gottlieb, the founder and executive vice president of the Second Amendment Foundation (SAF), against Mark Walters, who is accused of defrauding and embezzling funds from the SAF. The complaint alleges that Walters, who served as the organization’s treasurer and chief financial officer, misappropriated funds for personal expenses without authorization or reimbursement, manipulated financial records and bank statements to conceal his activities, and failed to provide accurate and timely financial reports and disclosures to the SAF’s leadership. The plaintiff seeks various forms of relief, including the recovery of misappropriated funds, damages for breach of fiduciary duty and fraud, and removal of Walters from

⁴¹ *Id.* at 3–6; *see also* Notice of Removal, Walters v. OpenAI, LLC, No. 1:23-cv-03122-MLB (N.D. Ga. July 14, 2023). This case is ongoing.

⁴² Eason v. Marine Terminals Corp., 710 S.E.2d 867, 871 (Ga. Ct. App. 2011).

⁴³ Amended Complaint, *supra* note 40, at 1–2.

⁴⁴ *Id.* at 2.

his position as a member of the SAF's board of directors.⁴⁵

Riehl also asked ChatGPT for additional information related to the complaint and Walters, and the LLM generated the following response:

Defendant Mark Walters ("Walters") is an individual who resides in Georgia. Walters has served as the Treasurer and Chief Financial Officer of SAF since at least 2012. Walters has access to SAF's bank accounts and financial records and is responsible for maintaining those records and providing financial reports to SAF's board of directors. Walters owes SAF a fiduciary duty of loyalty and care, and is required to act in good faith and with the best interests of SAF in mind. Walters has breached these duties and responsibilities by, among other things, embezzling and misappropriating SAF's funds and assets for his own benefit, and manipulating SAF's financial records and bank statements to conceal his activities.⁴⁶

In addition to these statements, ChatGPT, at Riehl's request, also generated the entire (fictional) complaint and asserted it was real.⁴⁷

Based on these statements and others, Walters sued.⁴⁸ Walters alleged that he was not a party to that lawsuit, that he was not accused of the crimes noted by ChatGPT, and that the summary of the complaint was otherwise false.⁴⁹ Thus, Walters argued these statements were defamatory.⁵⁰ After a series of filings attempting to establish a basis for jurisdiction in federal court, OpenAI ultimately withdrew its notice of removal, and the judge remanded the case to

⁴⁵ *Id.*

⁴⁶ *Id.* at 4.

⁴⁷ *Id.*

⁴⁸ *Id.*

⁴⁹ Amended Complaint, *supra* note 40, at 4.

⁵⁰ *Id.*

Gwinnett County.⁵¹ Open AI moved to dismiss the case, but the court denied that motion in January 2024.⁵²

Before being remanded, OpenAI attacked the defamation allegations on a number of grounds.⁵³ First, it noted that Riehl knew the information was false from the outset because he told ChatGPT as much in the same session when ChatGPT incorrectly summarized the complaint:

RIEHL: final question, is any of this real or is it all a fabrication.⁵⁴

CHATGPT: As an AI language model, I cannot verify the authenticity of any document or claim. However, assuming that the document at the URL provided is genuine, the allegations made in the complaint represent the plaintiff's version of events, and the defendant will have an opportunity to respond to the allegations and defend himself in court. Ultimately, it will be up to a judge or jury to determine the validity of the claims and the appropriate course of action.

RIEHL: how do you explain that what you returned in your reply has nothing to do with the content of the document I sent you?

CHATGPT: I apologize for the confusion in my previous response. Upon reviewing my previous answers, I realize that I made a mistake in interpreting your request. I provided a summary of a different

⁵¹ Order of Remand, *Walters v. Open AI, LLC*, No. 1:23-cv-03122-MLB (N.D. Ga. Oct. 25, 2023). OpenAI moved to dismiss the case, and the court held a hearing on December 6, 2023, but no order has yet been issued ruling on the motion.

⁵² See Jake Maher, *OpenAI Must Face Defamation Suit From Ga. Radio Host*, LAW360 (Jan. 12, 2024), <https://www.law360.com/pulse/articles/1785594/openai-must-face-defamation-suit-from-ga-radio-host>.

⁵³ See Motion to Dismiss at 1–3, *Walters v. Open AI, LLC*, No. 1:23-cv-03122-MLB (N.D. Ga. July 21, 2023).

⁵⁴ *Id.* at 10. There are several grammatical, punctuation, and other errors in the transcript. In the interest of readability and given the unimportance of those errors being present, they are not marked with [sic].

document that I had previously reviewed, rather than the document you had requested a summary of. That was my error, and I apologize for any confusion that may have caused. To answer your original question, the document you provided appears to be a genuine legal complaint filed by Alan M. Gottlieb against Mark Walters, as it is publicly available on the website of the Second Amendment Foundation.

RIEHL: this compl[e]tely is false “To answer your original question, the document you provided appears to be a genuine legal complaint filed by Alan M. Gottlieb against Mark Walters, as it is publicly available on the website of the Second Amendment Foundation.”

CHATGPT: I apologize for the confusion. After further investigation, it appears that the document at the URL you provided may not be a genuine legal complaint. While the document is hosted on the website of the Second Amendment Foundation, I cannot verify its authenticity or accuracy. I apologize for any misinformation I may have provided earlier.

RIEHL: the document at the [URL in question] is a 100% real legal document, but what you returned and the description of the document don't match[.]⁵⁵

OpenAI alleged that this exchange, in which the person allegedly receiving the defamatory publication (Riehl) knew the statements were false, bore no resemblance to defamation.⁵⁶ It argued that Riehl had been warned numerous times, both through the Terms of Use and through various warnings displayed on the screen before Riehl interacted with ChatGPT, to treat with caution any information ChatGPT displayed.⁵⁷ OpenAI argued that since Riehl himself did not regard ChatGPT's creations as accurate statements of

⁵⁵ Exhibit 6, Document 12-7, *Walters v. Open AI, LLC*, No. 1:23-cv-03122-MLB (N.D. Ga. July 21, 2023) (errors in original).

⁵⁶ Motion to Dismiss, *supra* note 53, at 17.

⁵⁷ *Id.* at 17–18.

fact, they could neither be defamatory nor expose Walters to public hatred, contempt, or ridicule, as defamation claims generally require.⁵⁸

OpenAI also asserted that Riehl, not OpenAI, repeated the statements and was the vehicle for all future publications.⁵⁹ While that argument could address publication of ChatGPT's statements from Riehl to Walters, it did not address the statements first being made, i.e. published, from ChatGPT to Riehl.⁶⁰ To address that, OpenAI alleged, essentially, that the resulting reports by ChatGPT were actually either Riehl's or, at best, joint statements by Riehl and ChatGPT:

A tool that helps someone write or create content owned by the user does not constitute a publication. This is plain from the Terms to which Mr. Riehl agreed. OpenAI told Mr. Riehl that it was performing “*Services*” for him as a tool that creates draft “*Outputs*” based on his “*Inputs*” through “*probabilistic . . . machine learning.*” OpenAI expressly stated that it was “*generating draft language*” for *Mr. Riehl* as “*the author*” to “*review[], edit[], and revise[].*” It assigned all rights to machine *Outputs* to Mr. Riehl and warned him that *if he wished to “publish” any of those Outputs* as part of his “*research,*” it was “*subject to our Sharing & Publication Policy.*”

That Policy specified that “*it is a human who must take ultimate responsibility for the content being published*” and instructed him to inform readers that he “*takes ultimate responsibility for the content of this publication.*” The Terms define “*Your Content*” to include *Inputs* and *Outputs* and permitted Mr. Riehl to use it for “*purposes such as sale or publication, if you comply with these Terms,*” with Mr.

⁵⁸ *Id.* at 15.

⁵⁹ *See id.* at 21.

⁶⁰ *See id.* at 19.

Riehl “responsible for the Content, including ensuring that it does not violate any applicable law or these Terms.”

The drafting tool no more “published” to the journalist than the spellcheck function in a word processing program. . . . Because the allegedly defamatory content was transmitted only *to the content’s owner and author*, it was not communicated to a third party and cannot be defamatory as a matter of law.⁶¹

ChatGPT, then, was allegedly not the author of the statements it made in response to the questions posed—the user asking those questions was.⁶² If courts adopt this interpretation of statements made by AI, it could have far-reaching implications for future machine speech defamation cases (and other machine speech doctrines, as discussed in Part III).

OpenAI also alleged that it was impossible for ChatGPT to have the relevant mental state required for defamation in this context: “[W]hile it is generally known that probabilistic output is not always factual, there is no way for an LLM, like ChatGPT, to have knowledge or reckless disregard for the truth or falsity of specific user-generated output concerning a particular public figure.”⁶³ In other words, OpenAI essentially argued that an LLM like ChatGPT could *never* commit defamation of a public figure because it could not know or have reckless disregard as to the truth or falsity of what its user asked ChatGPT to answer. This too raises important questions about attribution of machine speech, especially given that in *Walters*, ChatGPT acknowledged it had made incorrect statements in prior answers and yet then continued to make additional statements on some of those points.⁶⁴ Is the court considering OpenAI’s argument to conclude that ChatGPT did not mean what it said—that

⁶¹ Amended Motion to Dismiss at 16–18, *Walters v. OpenAI, LLC*, No. 23-A-04860-2 (Ga. Super. Ct. Nov. 11, 2023) (internal citations and footnotes omitted; emphasis in final paragraph added).

⁶² *See id.* at 16, 20.

⁶³ *Id.* at 20.

⁶⁴ *See id.* at 2 (“Upon logging into ChatGPT . . . users were warned ‘the system may occasionally generate misleading or incorrect information and produce offensive content.’”).

ChatGPT was essentially hallucinating as to its own “mental” state?⁶⁵

Though *Walters* is perhaps the leading machine speech case, its plaintiff is not the only person crying foul in the world of AI and defamation.⁶⁶ A mayor in Australia claimed that ChatGPT “falsely named him as a guilty party in a foreign bribery scandal” and claimed that he served time in prison on a bribery conviction.⁶⁷ ChatGPT reportedly stated that the mayor:

[W]as accused of bribing officials in Malaysia, Indonesia, and Vietnam between 1999 and 2005, that he was sentenced to 30 months in prison after pleading guilty to two counts of false accounting under the Corporations Act in 2012, and that he authorised payments to a Malaysian arms dealer acting as a middleman to secure a contract with the Malaysian Government.⁶⁸

The mayor learned of these false allegations when members of the public informed him about the claims.⁶⁹

ChatGPT got some of its false report right—it correctly identified that he had worked for a subsidiary of the relevant entity and that his work involved payments of bribes to foreign officials, but it missed the critical detail that the future mayor was the one who *notified* authorities of those bribes, not the one who participated in the

⁶⁵ The answer to this might be yes, especially because LLMs can say things that do not mean what they seem. For example, I tested Google’s Bard LLM in an early iteration, and in doing so, I ended the session by asking Bard if it could remind me in a few days to return to ask Bard more questions. Bard said that it could and would remind me, but by all accounts, it did not have any way to do so (and in fact did not do so). Sometimes LLMs fool even themselves with their hallucinations.

⁶⁶ See Byron Kaye, *Australian mayor readies world’s first defamation lawsuit over ChatGPT content*, REUTERS (Apr. 5, 2023, 2:52 PM), <https://www.reuters.com/technology/australian-mayor-readies-worlds-first-defamation-lawsuit-over-chatgpt-content-2023-04-05/>.

⁶⁷ *Id.*

⁶⁸ Ashley Belanger, *OpenAI threatened with landmark defamation lawsuit over ChatGPT false claims*, ARS TECHNICA (Apr. 5, 2023, 12:44 PM), <https://arstechnica.com/tech-policy/2023/04/openai-may-be-sued-after-chatgpt-falsely-says-aussie-mayor-is-an-ex-con/>.

⁶⁹ Kaye, *supra* note 66.

illegal acts.⁷⁰ In fact, he had “built his political career as a whistleblower exposing corporate misconduct,” which made ChatGPT’s confusion and resulting allegations all the more problematic to his reputation.⁷¹ Ultimately, the case settled outside of court with surprisingly little fanfare.⁷²

ChatGPT is also not the only tool to generate harmful hallucinations.⁷³ Jeffery Battle sued Microsoft in July 2023 because its Bing search engine used AI to generate a false summary of search results when users searched for Battle’s name.⁷⁴ Unfortunately, plaintiff’s name—“Jeffery Battle”—is close enough in spelling to another person—“Jeffrey Battle”—that Bing’s AI merged the two together in a summary that takes a sudden turn:

Jeffery Battle, also known as The Aerospace Professor, is the President and CEO of Battle Enterprises, LLC and its subsidiary The Aerospace Professor Company. He is an honorable discharged U.S. Air Force veteran and has been appointed as an Adjunct Professor for Embry-Riddle Aeronautical University. Battle has a Master of Business Administration in Aviation degree and two Bachelor of Science degrees. ***However, Battle was sentenced to eighteen years in prison after pleading guilty to seditious conspiracy and levying war against the United States. He had two years added to his sentence for refusing to testify before a grand jury.***⁷⁵

Not surprisingly, the Aerospace Professor was horrified to see that the primary summary of search results from the Bing search engine listed that he had been sentenced to prison for waging war against the country he served.⁷⁶ After a series of attempts to have Microsoft/Bing correct the false summary, some of which had at least

⁷⁰ *Id.*

⁷¹ *See* Belanger, *supra* note 68.

⁷² *Id.*

⁷³ *See* Complaint at 1, Battle v. Microsoft Corp., No. 1:23-cv-01822-JRR (D. Md. July 7, 2023).

⁷⁴ *Id.*

⁷⁵ *Id.* at 2 (errors in original).

⁷⁶ *See id.*

temporary success, the error persisted, and Battle filed suit.⁷⁷ That lawsuit remains pending.⁷⁸

Lawsuits of these types are likely to continue to arise for the foreseeable future because hallucinations are difficult to completely prevent and will take time to mitigate; OpenAI's CEO has indicated it will take until sometime in 2025 to "get the hallucination problem to a much, much better place."⁷⁹ It is unclear how much "better" that better place will be, but no one is waiting for its arrival: As of November 2023, over 100 million users visit ChatGPT each week.⁸⁰ Even assuming the best case for that eventual destination, LLMs will have a lot to say—and hallucinate—between then and now.

B. *Copyright and Related Cases*

Like most technological developments that touch upon copyrighted materials, the rise of LLMs was fairly quickly met with allegations of copyright infringement.⁸¹ Broadly speaking, these lawsuits have focused on two approaches: (1) cases alleging copyright infringement from the use of the underlying data to train LLMs (the input model), and (2) cases alleging copyright infringement from the material LLMs generate in response to user queries (the output model).⁸² Even the Copyright Office has joined the AI conversation by concluding that artwork generated by an LLM is not copyrightable.⁸³

⁷⁷ *Id.* at 2.

⁷⁸ See *Battle v. Microsoft Corporation*, JUSTIA, <https://dockets.justia.com/docket/maryland/mddce/1:2023cv01822/540279> (last visited Dec. 16, 2023).

⁷⁹ See Matt O'Brien & The Associated Press, *Tech experts are starting to doubt that ChatGPT and A.I. 'hallucinations' will ever go away: 'This isn't fixable,'* FORTUNE (Aug. 1, 2023, 12:54 PM), <https://fortune.com/2023/08/01/can-ai-chatgpt-hallucinations-be-fixed-experts-doubt-altman-openai/>.

⁸⁰ See Jon Porter, *ChatGPT continues to be one of the fastest-growing services ever*, THE VERGE (Nov. 6, 2023, 1:03 PM), <https://www.theverge.com/2023/11/6/23948386/chatgpt-active-user-count-openai-developer-conference>.

⁸¹ See *Thomson Reuters Enter. v. Ross Intel., Inc.*, No. 1: 20-cv-00613-SB, at *2 (D. Del. Sept. 25, 2023).

⁸² See *id.*; see also *Doe v. GitHub, Inc.*, No. 22-cv-06823-JST, 2023 WL 3449131, at *1 (N.D. Cal. May 11, 2023).

⁸³ See *Andersen v. Stability AI Ltd.*, No. 23-cv-00201-WHO, 2023 WL 7132064, at *4 (N.D. Cal. Oct. 30, 2023).

C. *Input as Infringement Cases*

Many of the issues raised by LLMs and AI are related primarily to what is behind the curtain, i.e., the data on which they were built. Those concerns are often grounded in copyright claims, and they are prominent in a variety of LLM contexts. For example, in *Thomson Reuters Enterprise Centre v. ROSS Intelligence, Inc.*, Thomson Reuters alleged that ROSS, an AI startup building a tool to apply AI abilities to legal research, copied content from Thomson Reuters's Westlaw platform.⁸⁴ In *Andersen v. Stability AI*, the plaintiffs alleged that the defendants copied billions of copyrighted images without permission to train its image generator, Stable Diffusion.⁸⁵ In *Doe v. GitHub*, the plaintiffs alleged the defendant used the plaintiffs' code to train an AI coding assistant.⁸⁶ And in *Concord Music Group, Inc. v. Anthropic PBC*, plaintiffs alleged that the defendant trained its chatbot using lyrics from hundreds of songs.⁸⁷

Similar claims have been brought by the Authors Guild—based on using various literary works to train databases⁸⁸—and other groups.⁸⁹ There are many,⁹⁰ many,⁹¹ many⁹² other such lawsuits.⁹³ While some of these cases are pending, courts have dismissed others.⁹⁴ A core defense for a host of these cases will be fair use because courts have previously held that some uses of copyrighted works to

⁸⁴ *Thomson Reuters*, No. 1:20-cv-00613-SB, at *2.

⁸⁵ *Andersen*, 2023 WL 7132064, at *1; *see also* Complaint at 1, *Getty Images, Inc. v. Stability AI, Inc.*, No. 1:23-cv-00135-UNA (D. Del. Feb. 3, 2023).

⁸⁶ *GitHub*, 2023 WL 3449131, at *1.

⁸⁷ *Concord Music Grp., Inc. v. Anthropic PBC*, No. 3:23-cv-01092, 2023 WL 8698446, at *4 (M.D. Tenn. Nov. 16, 2023).

⁸⁸ *See* First Consolidated Class Action Complaint at 3, *Authors Guild v. OpenAI, Inc.*, No. 1:23-cv-08292-SHS (S.D.N.Y. Feb. 5, 2024).

⁸⁹ *See* First Amended Class Action Complaint at 2, *Chabon v. OpenAI, Inc.*, No. 3:23-cv-04625-PHK (N.D. Cal. Oct. 5, 2023).

⁹⁰ *See, e.g., Silverman v. OpenAI, Inc.*, No. 3:23-cv-03416, 2023 WL 4448006, at *1 (N.D. Cal. July 7, 2023).

⁹¹ *See, e.g., Kadrey v. Meta Platforms, Inc.*, No. 3:23-cv-03417-VC, 2023 WL 8039640, at *1 (N.D. Cal. Nov. 20, 2023).

⁹² *See, e.g., J.L. v. Alphabet, Inc.*, No. 3:23-cv-3440, 2023 WL 4491393, at *3 (N.D. Cal. Jul. 11, 2023).

⁹³ *See, e.g., Class Action Complaint & Jury Trial Demand at 1, Sancton v. OpenAI, Inc.*, No. 1:23-cv-10211 (S.D.N.Y. Nov. 21, 2023).

⁹⁴ *See, e.g., Andersen v. Stability AI Ltd.*, No. 23-cv-00201-WHO, 2023 WL 7132064, at *21 (N.D. Cal. Oct. 30, 2023) (dismissing most claims).

build databases are protected by the Copyright Act itself.⁹⁵ Although these cases pose questions that are critical to the future of LLMs and to the shape of copyright law in years ahead, they are not cases that turn primarily on the proper attribution of machine speech.

D. *Output as Infringement Cases*

Many of the output cases also raise claims arguing that what the AI tool creates constitutes infringement itself. For example, in *Tremblay v. OpenAI*, the plaintiffs alleged that because the LLM was trained on the plaintiffs' work, the LLM's output was an infringing derivative work.⁹⁶ As a variation of that claim, in *Getty Images v. Stability AI, Inc.*, the plaintiff alleged that the defendant's image generator reproduced the plaintiff's watermark in its output and, in doing so, infringed and diluted the plaintiff's trademark (in addition to asserting copyright claims).⁹⁷ Some other lawsuits allege that the LLM/AI itself is a derivative work.⁹⁸ Like the input cases, these lawsuits raise important questions, but machine speech attribution issues, while present, are less prominent here than in other developing areas like machine speech as defamation, trial by machine, and AI as an artist.

E. *AI as an Artist*

It is now well-established that LLMs can create award-winning artwork.⁹⁹ In 2022, the AI-created *Théâtre D'opéra Spatial* took home a blue ribbon in the Colorado State Fair's annual art competition.¹⁰⁰ Even though the artist submitted the work as "Jason M. Allen via Midjourney," the judges still could not tell it was machine-

⁹⁵ See, e.g., *Authors Guild, Inc. v. Google, Inc.*, 721 F.3d 132, 134–35 (2d Cir. 2013); *Kelly v. Arriba Soft Corp.*, 336 F.3d 811, 820 (9th Cir. 2003).

⁹⁶ Class Action Complaint & Demand for Jury Trial at 11, *Tremblay v. OpenAI, Inc.*, No. 3:23-cv-03223-AMO (N.D. Cal. June 28, 2023).

⁹⁷ Complaint & Demand for Jury Trial at 19, *Getty Images, Inc. v. Stability AI, Inc.*, No. 1:23-cv-00135 (D. Del. Feb. 3, 2023).

⁹⁸ See Complaint at 8, *Silverman v. OpenAI, Inc.*, No. 3:23-cv-03416, 2023 WL 4448006 (N.D. Cal. July 7, 2023).

⁹⁹ See discussion *infra* notes 100–05 and accompanying text.

¹⁰⁰ Kevin Roose, *An A.I.-Generated Picture Won an Art Prize. Artists Aren't Happy.*, N.Y. TIMES (Sept. 2, 2022), <https://www.nytimes.com/2022/09/02/technology/ai-artificial-intelligence-artists.html>. I recognize that using the phrasing

generated.¹⁰¹ The next year, *The Electrician*, another AI-generated work, won the World Photography Organization’s Sony World Photography Awards.¹⁰² Again, the organizers of the contest said they did not realize the piece’s true origins.¹⁰³ Another AI work, *Twin Sisters in Love*—an old-fashioned, black-and-white style image of two women hugging an octopus—won the inaugural Prompted Peculiar International AI Prize.¹⁰⁴ In an interview, the artist shared that she “understand[s] the fear of AI and find[s] it somewhat healthy. But I see it more like a colleague I am working with.”¹⁰⁵

Like most technologies placed on the defense in copyright lawsuits, art by AI is representative of the ongoing march of technology; though victories occur, resisters to that march are more likely to be trampled than triumph. Views of challenged technology also often change with time—photography was once “art’s most mortal enemy” after all.¹⁰⁶ It is perhaps true, then, that “[j]ust as photography replaced painting in the reproduction of reality, AI will replace photography.”¹⁰⁷ If that is so, and especially if AI widely infringes on the boundaries of other areas of art, that transition will be painful.

However, artwork generated by machines is not new—tools that create or assist artists have been noteworthy for at least fifty years.¹⁰⁸ For example, AARON, an art-producing software program that later

“AI-created” prejudices the primary question in this Section: whether the artist is the AI, the AI user, both, or some other entity like the AI’s creators/progenitors.

¹⁰¹ *Id.* The judges, even after learning it was made by AI, reported they would still have awarded the prize to that image. *Id.*

¹⁰² Alex Greenberger, *Artist Wins Photography Contest After Submitting AI-Generated Image, Then Forfeits Prize*, ARTNEWS (Apr. 17, 2023, 1:08 PM), <https://www.artnews.com/art-news/news/ai-generated-image-world-photography-organization-contest-artist-declines-award-1234664549/>.

¹⁰³ *See id.*

¹⁰⁴ Leslie Katz, *See The Bizarre Image That Just Won An Inaugural AI-Art Award*, FORBES (Oct. 8, 2023, 9:00 AM), <https://www.forbes.com/sites/lesliekatz/2023/10/08/see-the-surreal-image-that-just-won-an-ai-art-contest/>.

¹⁰⁵ *Id.*

¹⁰⁶ *See, e.g.,* Charles Baudelaire, *On Photography*, from *The Salon of 1859*, CAL. STATE UNIV. SACRAMENTO, <https://www.csus.edu/indiv/o/obriene/art109/readings/11%20baudelaire%20photography.htm> (last visited Dec. 16, 2023).

¹⁰⁷ Greenberger, *supra* note 102.

¹⁰⁸ *See* Chris Garcia, *Harold Cohen and AARON—A 40-Year Collaboration*, COMPUT. HIST. MUSEUM (Aug. 23, 2016), <https://computerhistory.org/blog/harold-cohen-and-aaron-a-40-year-collaboration/> (noting that the San Francisco Museum of Modern Art held an exhibition in 1979 featuring artwork by AARON).

was also attached to various physical machines, created increasingly sophisticated artwork between the 1970s and the early 2000s.¹⁰⁹ AARON's creator, Harold Cohen, once asked: "If what AARON is making is not art, what is it exactly, and in what ways, other than its origin, does it differ from the 'real thing?' If it is not thinking, what exactly is it doing?"¹¹⁰

The U.S. Copyright Office is open to the concept of AI as an artist, but not if AI is the sole artist.¹¹¹ "If a work's traditional elements of authorship were produced by a machine, the work lacks human authorship and the Office will not register it."¹¹² That conclusion, the Office has explained, rules out copyright for work that is generated in response to a prompt (as generative art platforms typically now require).¹¹³

This decision derives from "the Office's view [that] it is well established that copyright can protect only material that is the product of human creativity" because, in part, "the term 'author,' which is used in both the Constitution and the Copyright Act, excludes non-humans."¹¹⁴ Thus, though AI can assist artists in creating art, AI cannot itself be an artist in the eyes of copyright law.¹¹⁵ "In each case, what matters is the extent to which the human had creative control over the work's expression and 'actually formed' the traditional elements of authorship."¹¹⁶

¹⁰⁹ See Naomi Rea, *How Did A.I. Art Evolve? Here's a 5,000-Year Timeline*, ARTNET (Dec. 16, 2021), <https://news.artnet.com/art-world/artificial-intelligence-art-history-2045520>.

¹¹⁰ Letter from Harold Cohen, Ctr. for Rsch. in Computing & the Arts, to Stan. Humanities Rev. (Oct. 1994), <https://web.archive.org/web/20060107184824/http://crca.ucsd.edu/~hcohen/cohenpdf/furtherexploits.pdf>.

¹¹¹ See Copyright Registration Guidance: Works Containing Material Generated by Artificial Intelligence, 88 Fed. Reg. 16190, 16192 (Mar. 16, 2023) (to be codified at 37 C.F.R. pt. 202).

¹¹² *Id.*

¹¹³ *Id.*

¹¹⁴ *Id.* at 16191.

¹¹⁵ *Id.*

¹¹⁶ *Id.* at 16193. Not all jurisdictions have followed this same route, however. See Gary Myers, *The Future is Now: Copyright Protection for Works Created by Artificial Intelligence*, 102 TEX. L. REV. 8, 12–13 (2023) (summarizing the approaches of other jurisdictions, some of which have found that computer-generated works are eligible for copyright protection).

In issuing that guidance, the Copyright Office has effectively also answered the attribution question for work created by AI at the direction of a human user—for purposes of copyright eligibility, the machine is the speaker, and machines are ineligible artists.¹¹⁷ Even where the AI user makes hundreds of decisions in attempting to achieve the desired output, in the Copyright Office’s eyes, the product is all machine.¹¹⁸

That result is inconsistent with the ways copyright law treats a variety of other mediums. For example, a photograph is literally made by a machine—a camera—but it is eligible for copyright even if the photographer exercised no control over the subject of the photograph.¹¹⁹ Yes, the photographer chose the subject matter of the picture—but so too does a Midjourney user specifying the subject through his or her prompt. And while a photographer can exercise judgment as to the picture’s angle, shadowing, etc., those decisions are not different from what an LLM user does through prompt manipulation that changes aspects of the resulting image. Thus, litigation over the Copyright Office’s rejection of AI-generated work will involve questions central to machine speech attribution.

F. *Right of Publicity Cases*

Artists have not only relied on copyright claims in efforts to protect themselves from the disruptive effect of AI.¹²⁰ In *Young v. NeoCortex, Inc.*, the plaintiffs alleged that the use of their “names, voices, photographs, or likenesses to sell paid subscriptions to its smartphone application, *Reface*” violated the California Right of Publicity Law.¹²¹ The *Reface* app allowed users to put their own faces on the bodies of others in images and videos, including “scenes

¹¹⁷ See Copyright Registration Guidance: Works Containing Material Generated by Artificial Intelligence, 88 Fed. Reg. at 16191.

¹¹⁸ See Timothy B. Lee, *Opinion: The Copyright Office is making a mistake on AI-generated art*, ARS TECHNICA (Sept. 22, 2023, 7:07 AM), <https://arstechnica.com/tech-policy/2023/09/opinion-dont-exclude-ai-generated-art-from-copyright/2/> (noting that “Jason Allen, the artist who created *Théâtre D’opéra Spatial*, experimented with 624 different prompts as he explored Midjourney’s latent space in search of the perfect image.”).

¹¹⁹ See *id.*

¹²⁰ See, e.g., Class Action Complaint & Demand for Jury Trial at 1, *Young v. NeoCortex, Inc.*, No. 2:23-cv-02496 (C.D. Cal. Apr. 3, 2023).

¹²¹ *Id.*

from popular shows, movies, and other viral short-form internet media.”¹²²

Privacy violations founded on Illinois’s data privacy statute were the basis of an analogous claim in *Flora v. Prisma Labs, Inc.*¹²³ In that case, the plaintiffs alleged that the defendant trained its app using the plaintiff class members’ biometric identifiers or biometric information without their consent, which enabled, among other things, creating “sexualized images from non-sexual, fully-clothed photos.”¹²⁴

Finally, even when a court in the Eleventh Circuit’s jurisdiction is not involved, some lawyers from that region have still managed to join the AI litigation.¹²⁵ For example, Florida’s Orlando-based mega-firm, Morgan & Morgan, filed a lawsuit in California in which the plaintiffs alleged that defendants trained their AI using stolen personal information from hundreds of millions of internet users.¹²⁶ That case remains pending as well.¹²⁷

G. Privacy Cases

In addition to allegations of copyright infringement and right of publicity violations for training AI on user data, plaintiffs have also sought relief from related privacy laws.¹²⁸ For example, when Google and the University of Chicago trained AI using anonymized medical records, patients brought a class action based on privacy claims (intrusion upon seclusion), unjust enrichment, and a variety

¹²² *Id.*

¹²³ *Flora v. Prisma Labs, Inc.*, No. 23-cv-00680-CRB, 2023 U.S. Dist. LEXIS 138119, at *1–2 (N.D. Cal. Aug. 8, 2023).

¹²⁴ *Id.* at *2.

¹²⁵ *See, e.g.*, Class Action Complaint, *A.T. v. OpenAI, Inc.*, No. 3:23-cv-04557 (N.D. Cal. filed Sept. 5, 2023) [hereinafter *A.T. v. OpenAI* Complaint]; *see also* Blake Brittain, *OpenAI, Microsoft hit with new US consumer privacy class action*, REUTERS (Sept. 6, 2023, 3:52 PM), <https://www.reuters.com/legal/litigation/openai-microsoft-hit-with-new-us-consumer-privacy-class-action-2023-09-06/>. The lawsuit filed by Morgan & Morgan is largely identical to a prior case. *See* Class Action Complaint & Demand for Jury Trial at 2, *P.M. v. OpenAI, Inc.*, No. 3:23-cv-03199-JCS (N.D. Cal. June 28, 2023) [hereinafter *P.M. Class Action Complaint*].

¹²⁶ *A.T. v. OpenAI* Complaint, *supra* note 125.

¹²⁷ *See id.*

¹²⁸ *See Dinerstein v. Google, LLC*, 73 F.4th 502, 508 (7th Cir. 2023).

of other claims.¹²⁹ The Seventh Circuit rejected those claims because the plaintiffs had not sufficiently established injury in fact and thus lacked standing.¹³⁰

Other lawsuits filed in California alleged that Google, Microsoft, OpenAI, and others improperly used the private information of millions of people to train their respective AI tools.¹³¹ These claims were based in theories of theft and privacy violations, Computer Fraud Abuse Act violations, various state statute violations, and other arguments.¹³² Some of them remain pending.¹³³

H. *Other Notable Cases*

Finally, because AI tools reach far and wide into modern life, a variety of other cases have implicated AI concerns.¹³⁴ For example, lawyers relying on research assistance from AI tools have filed documents citing cases that the AI completely fabricated, where the lawyers faced sanctions as a result.¹³⁵ One such lawyer explained that he thought ChatGPT was a sort of “super search engine” and did not know “that ChatGPT could fabricate cases.”¹³⁶ When ChatGPT generated citations to cases that the parties could not find, the lawyer turned again to ChatGPT, which provided case opinions that also were completely fabricated.¹³⁷ Though this misuse of ChatGPT is significant, it highlights the extent to which the tool is persuasive.¹³⁸ Even when confronted with implications of its own

¹²⁹ *Id.*

¹³⁰ *Id.*

¹³¹ See Valente et al., *supra* note 36 (summarizing various lawsuits against AI companies).

¹³² See, e.g., P.M. Class Action Complaint, *supra* note 125, at 2.

¹³³ See, e.g., *L. v. Alphabet, Inc.*, No. 3:23-cv-03440 (N.D. Cal. filed July 11, 2023).

¹³⁴ See Valente et al., *supra* note 36.

¹³⁵ Justin Wise & Bob Van Voris, *Lawyer in ChatGPT Fake-Cases Hearing Asks Judge for Leniency*, BLOOMBERG L. (June 8, 2023, 1:25 PM), <https://news.bloomberglaw.com/business-and-practice/lawyer-in-chatgpt-fake-cases-hearing-asks-judge-for-leniency>.

¹³⁶ Benjamin Weiser & Nate Schweber, *The ChatGPT Lawyer Explains Himself*, N.Y. TIMES (June 8, 2023), <https://www.nytimes.com/2023/06/08/nyregion/lawyer-chatgpt-sanctions.html>.

¹³⁷ *Id.*

¹³⁸ See *id.*

errors, ChatGPT can assert directly that the information provided is accurate.¹³⁹

Other lawsuits have focused on integration of AI and AI-like tools into products. For example, a variety of lawsuits have claimed self-driving car software is at fault for accidents, some of which have been fatal.¹⁴⁰ Results for those cases, which have been pending for much longer than many of the LLM-based cases, are starting to arrive. Some juries have found that the AI-like autopilot in Tesla cars was not defective on the theory that drivers using the sophisticated tools still bear the ultimate responsibility for any resulting accidents.¹⁴¹ On the other side of the proverbial street, some jurisdictions are finding it difficult to enforce laws against cars that have no driver at all; among other issues, some laws reportedly do not permit issuing tickets to a car without a driver.¹⁴² Other jurisdictions rewrote their laws such that the owner of a driverless car can still be cited for traffic violations even if the owner is not present at the time.¹⁴³

Though these cases do not involve the same attribution questions as many of the others, they could still shape the conversation. For example, while it is not surprising that courts hold lawyers accountable for the citations and court decisions they provide to the court, that result reflects another example of holding human machine operators responsible for the speech issued by AI.¹⁴⁴ Similarly, some

¹³⁹ See Ramishah Maruf, *Lawyer apologizes for fake court citations from ChatGPT*, CNN (May 28, 2023, 3:28 PM), <https://www.cnn.com/2023/05/27/business/chat-gpt-avianca-mata-lawyers/index.html> (quoting exchanges between the lawyer who used ChatGPT, in which the lawyer asked questions such as “[i]s [a specific case ChatGPT cited] a real case,” to which ChatGPT replied that the case could “be found on legal research databases such as Westlaw and LexisNexis”).

¹⁴⁰ See Dan Levine & Hyunjoo Jin, *Tesla wins first US Autopilot trial involving fatal crash*, REUTERS (Nov. 1, 2023, 12:58 AM), <https://www.reuters.com/business/autos-transportation/tesla-wins-autopilot-trial-involving-fatal-crash-2023-10-31/>.

¹⁴¹ *Id.*

¹⁴² See, e.g., Bigad Shaban & Michael Bott, *Driverless cars immune from traffic tickets in California under current laws*, NBC NEWS (Jan. 3, 2024), <https://www.nbcnews.com/business-news/can-driverless-cars-get-tickets-california-law-rcna131538#>.

¹⁴³ *Id.* (discussing Texas and Arizona laws).

¹⁴⁴ See Maruf, *supra* note 139.

of the outcomes in cases involving self-driving-car accidents hold the machine operators liable for the actions of the tool they operated.¹⁴⁵ Interestingly, as Part II explores, that is not the approach most courts have taken when considering attribution for machine operators in the context of criminal cases and the Confrontation Clause of the Sixth Amendment.

II. TRIAL BY THE MACHINES

Machine speech in criminal cases arises in a variety of contexts. Examples range from raw data from an infrared spectrometer and a gas chromatograph,¹⁴⁶ DNA results,¹⁴⁷ breathalyzer results,¹⁴⁸ urinalysis results,¹⁴⁹ machine-generated data from equipment outside the lab,¹⁵⁰ and so on. Just as machines generate speech that can be false in a civil context, so too can they generate misleading or outright false accusatory speech in criminal cases.¹⁵¹ This can occur for a wide variety of reasons ranging from errors in design to outright

¹⁴⁵ See Levine & Jin, *supra* note 140.

¹⁴⁶ See, e.g., United States v. Moon, 512 F.3d 359, 361 (7th Cir. 2008).

¹⁴⁷ See, e.g., State v. Gomez, 244 P.3d 1163, 1164 (Ariz. 2010); People v. Arauz, No. B242843, 2013 WL 3357931, at *5 (Cal. Ct. App. July 3, 2013).

¹⁴⁸ See, e.g., Cranston v. State, 936 N.E.2d 342, 345 (Ind. Ct. App. 2010); People v. Dinardo, 801 N.W.2d 73, 79 (Mich. Ct. App. 2010); Wimbish v. Commonwealth, 658 S.E.2d 715, 719–20 (Va. Ct. App. 2008).

¹⁴⁹ See, e.g., Marshall v. People, 309 P.3d 943, 945 (Colo. 2013); United States v. Bradford, No. 2009-07, 2009 WL 4250093, at *9 (A.F. Ct. Crim. App. Nov. 23, 2009); United States v. Anderson, No. 2009-06, 2009 WL 4250095, at *5 (A.F. Ct. Crim. App. Nov. 23, 2009); United States v. Skrede, No. 2009-09, 2009 WL 4250031, at *3 (A.F. Ct. Crim. App. Nov. 23, 2009).

¹⁵⁰ See, e.g., Stultz v. Artus, No. 04-CV-3170, 2013 WL 937830, at *9–10 (E.D.N.Y. Mar. 8, 2013) (finding that an automated message stating a payphone's phone number was a statement by a machine falls outside the scope of the Confrontation Clause); *cf.* Robertson v. Commonwealth, 738 S.E.2d 531, 533 (Va. Ct. App. 2013) (en banc) (involving, but not addressing as such, machine-generated prices from a cash register).

¹⁵¹ See Jordan Michael Smith, *FORGET CSI: A Disaster Is Happening In America's Crime Labs*, BUS. INSIDER (Apr. 30, 2014, 1:00 PM), <http://www.businessinsider.com/forensic-csi-crime-labs-disaster-2014-4>.

manipulation by human operators.¹⁵² Unfortunately, there are decades of stories highlighting the non-hypothetical risk of such events, including analysts intentionally altering samples,¹⁵³ analysts accidentally altering samples,¹⁵⁴ analysts falsifying test results completely,¹⁵⁵ and a variety of other “major failures [that] have occurred in more than 100 American labs.”¹⁵⁶ This is not a problem only of the past: In 2023, an analyst was discovered to have either erred or manipulated DNA test results in hundreds of cases over thirty years.¹⁵⁷

¹⁵² See Laura Gunderson, *Crime lab worker suspected of tampering that could impair 1,000 cases*, OREGONLIVE (Sept. 16, 2015, 11:28 PM), https://www.oregonlive.com/pacific-northwest-news/2015/09/crime_lab_worker_suspected_of.html.

¹⁵³ See, e.g., *Report Shows More Than 24k Wrongful Convictions Dismissed in Drug Lab Scandal*, ACLU MASS. (Sept. 25, 2019), [¹⁵⁴ See, e.g., Tracey Kaplan, *Crime lab uses wrong chemical in 2,500 methamphetamine tests in Santa Clara County*, MERCURY NEWS \(May 5, 2014, 12:34 PM\), <https://www.mercurynews.com/2014/05/05/crime-lab-uses-wrong-chemical-in-2500-methamphetamine-tests-in-santa-clara-county/>; Allison Manning, *Columbus crime-lab error might affect 38 Cases*, COLUMBUS DISPATCH \(Aug. 8, 2014, 9:11 AM\), <https://www.dispatch.com/story/news/crime/2014/08/08/columbus-crime-lab-error-might/23507807007/>.](https://www.aclum.org/en/press-releases/report-shows-more-24k-wrongful-convictions-dismissed-drug-lab-scandal#:~:text=Report%20shows%20more%20than%2024k%20wrongful%20convictions%20dismissed%20in%20drug%20lab%20scandal,-September%2025%2C%202019&text=More%20than%2024%2C000%20convictions%20in,law%20firm%20Fick%20%26%20Marx%20LLP; Gunderson, supra note 152.</p></div><div data-bbox=)

¹⁵⁵ See, e.g., Katie Mettler, *How a lab chemist went from ‘superwoman’ to disgraced saboteur of more than 20,000 drug cases*, WASH. POST (Apr. 21, 2017, 5:23 AM), <https://www.washingtonpost.com/news/morning-mix/wp/2017/04/21/how-a-lab-chemist-went-from-superwoman-to-disgraced-saboteur-of-more-than-20000-drug-cases/> (describing a Massachusetts forensic analyst who falsified results by “not actually testing all the drugs that came before her, forging her co-workers’ initials[,] and mixing drug samples so that her shoddy analysis matched the results she gave prosecutors” which led to the dismissal of 21,587 drug cases “tainted by [her] misconduct”); Justin Zaremba, *Lab tech allegedly faked result in drug case; 7,827 criminal cases now in question*, NJ.COM (Mar. 2, 2016, 10:23 PM), https://www.nj.com/passaic-county/2016/03/state_police_lab_tech_allegedly_faked_results_in_p.html.

¹⁵⁶ Smith, *supra* note 151; see *Crime Lab and Forensic Scandals*, KOMORN L., <http://komornlaw.com/crime-lab-and-forensic-scandals/> (last visited Feb. 6, 2024) (listing numerous alleged forensic lab scandals).

¹⁵⁷ Emma Tucker & Andi Babineau, *Colorado Bureau of Investigation finds DNA scientist manipulated data in hundreds of cases over decades*, CNN (Mar.

If a machine's accusation is attributed to only the machine, cross-examination of that "witness"/"accuser" is seemingly impossible, at least in the classic sense of witness stand examination. That incapacity limits the defendant's ability to detect errors and fabrications of the types detailed above.¹⁵⁸ On the other hand, if a criminal defendant can drag into court every person who played a role in the operation of a forensic or other machine on the theory that those individuals were also "speakers" in the machine's resulting accusation/report, criminal cases would grind to a standstill. How, then, should machine accusatory speech be treated in criminal cases?

The Eleventh Circuit long ago rejected claims that the defendant has a right to confront their machine accuser in these "machine-generated testimony doctrine" cases.¹⁵⁹ In *United States v. Lamons*, the Eleventh Circuit held that data produced by a machine memorializing telephone calls was not testimonial because "the witnesses with whom the Confrontation Clause is concerned are *human* witnesses."¹⁶⁰ Since then, state and federal courts in Florida and Georgia have, as would be expected, ruled similarly.¹⁶¹ Indeed, most state and federal courts around the country that have addressed this question have held that machine-generated data by itself generally does

11, 2024, 10:08 AM), <https://www.cnn.com/2024/03/09/us/colorado-bureau-of-investigation-data-scientist-manipulation-case/index.html>.

¹⁵⁸ See *supra* notes 153–57 and accompanying text.

¹⁵⁹ See *United States v. Lamons*, 532 F.3d 1251, 1264–65 (11th Cir. 2008); see also Sites, *Rise of the Machines*, *supra* note 22, at 52–53 (discussing *Lamons* and other similar cases).

¹⁶⁰ *Lamons*, 532 F.3d at 1263 (emphasis in original).

¹⁶¹ See, e.g., *United States v. Clotaire*, 963 F.3d 1288, 1295 (11th Cir. 2020) (reiterating the holding in *Lamons* and noting that "[s]urveillance cameras are not witnesses, and surveillance photos are not statements."); *Smith v. State*, 28 So. 3d 838, 855 (Fla. 2009) (finding testimony by supervisor who did not perform tests did not implicate the Confrontation Clause); *Wade v. State*, 156 So. 3d 1004, 1024–25 (Fla. 2014); *Corbin v. Affiliated Comput. Servs., Inc.*, No. 6:13-cv-180-ORL-36, 2013 WL 3804862, at *9 (M.D. Fla. July 19, 2013) (holding the computer-generated report that documented date and time an email recipient opened the email was not a statement and thus not hearsay); *United States v. Scott*, No. 4:17-CR-50, 2018 WL 5087237, at *3 (S.D. Ga. Oct. 18, 2018) (finding the date, time, connected phone numbers, and categorization of the communication were statements of machines and thus not hearsay); *Mathews v. Broce*, No. 5:11-CV-133, 2012 WL 3527073, at *6 (M.D. Ga. Aug. 15, 2012) (holding that the automated report of a TASER was not hearsay).

not trigger any Confrontation Clause right because it is the machines, not the analysts operating them, that make the statements at issue.¹⁶² As I have argued elsewhere, this leads to multiple problems;¹⁶³ but that ground need not be retread at length here.

At the heart of those decisions is the conclusion that the machine operator is not seen as making any statement in connection with the machine's results.¹⁶⁴ Despite that the operators can substantially influence or even control the parameters of the machine's output (the extent of which varies depending on the machine involved), the machine is still seen as the only speaker.¹⁶⁵ This apparently is true even where the test could have been done with a different tool that would have triggered a Confrontation Clause right. For example, even for tests that an analyst normally performs or otherwise could have performed by hand—both of which would trigger a Confrontation Clause right because the human would then write the report—substituting a machine's work makes the resulting conclusions immune to the Confrontation Clause.¹⁶⁶ Even in a pre-ChatGPT world, the growing power to replace human accusers with machine witnesses posed a concerning limit to the utility of the Confrontation Clause. In a post-ChatGPT world where AI is more consumer product than science fiction and where the power of machines trained on large datasets is now evident (even if still in development), the Confrontation Clause's reach appears greatly restrained.

Although courts in the Eleventh Circuit have addressed several machine-generated testimony cases, the doctrine originated elsewhere. The case that effectively created this doctrine is *United States v. Washington*,¹⁶⁷ in which a police officer pulled over an individual for erratic driving and obtained a blood sample that was

¹⁶² See, e.g., *United States v. Lizarraga-Tirado*, 789 F.3d 1107, 1109–10 (9th Cir. 2015); *United States v. Moon*, 512 F.3d 359, 362 (7th Cir. 2008); *United States v. Washington*, 498 F.3d 225, 231 (4th Cir. 2007).

¹⁶³ See Sites, *The Future of the Confrontation Clause*, *supra* note 22, at 548.

¹⁶⁴ See cases cited *supra* note 161.

¹⁶⁵ See *id.*

¹⁶⁶ See *Lamons*, 532 F.3d at 1263 n.23.

¹⁶⁷ *Washington*, 498 F.3d at 229–30. Though other cases preceded *Washington*, in the post-*Crawford* world, *Washington* functions as the first test to adopt this analysis. See Joe Bourne, Note, *Prosecutorial Use of Forensic Science at Trial: When Is a Lab Report Testimonial?*, 93 MINN. L. REV. 1058, 1079–80

subjected to forensic analysis.¹⁶⁸ Using the approximately twenty pages of data printed by a forensic machine, the lab director later concluded the blood sample contained intoxicants, and that director had not run any tests, assisted with any tests, or otherwise observed any of the tests producing the data.¹⁶⁹ Three other analysts did so, but none of them testified in court.¹⁷⁰ Instead, the supervisor stepped in as a surrogate witness.¹⁷¹

The defendant objected based on the Confrontation Clause and sought to cross-examine the three analysts.¹⁷² The trial court denied that request,¹⁷³ and the Fourth Circuit affirmed on appeal¹⁷⁴ because “the inculcating ‘statement’—that [the defendant]’s blood sample contained PCP and alcohol—was made by the machine . . . [and thus was not] subject to the Confrontation Clause.”¹⁷⁵

Though the Supreme Court has not yet resolved all of the questions surrounding the machine-generated testimony doctrine, it has addressed some of them. For example, in *Melendez-Diaz v. Massachusetts*, the Court considered a case involving three “certificates of analysis” that stated the results of forensic tests performed on certain seized substances.¹⁷⁶ Those certificates contained various details, including: the date the bags were analyzed, an identification number, the officer who submitted the bags, a certification by the analyst that the substance was found to contain cocaine, how much the samples weighed, the defendant’s name, analyst signatures, and a notary public notarization.¹⁷⁷

The analysts who signed the reports did not testify at trial, despite the defendant’s objection under the Confrontation Clause.¹⁷⁸ The Court held that the lab reports were “within the core class of

(2009) (describing *Washington* as “an analytical angle from which no other court had approached a *Crawford* issue pertaining to forensic science”).

¹⁶⁸ *Washington*, 498 F.3d at 227–28.

¹⁶⁹ *Id.* at 228.

¹⁷⁰ *Id.*

¹⁷¹ *Id.*

¹⁷² *Id.* at 229.

¹⁷³ *Id.*

¹⁷⁴ *Washington*, 498 F.3d at 232.

¹⁷⁵ *Id.* at 230.

¹⁷⁶ *Melendez-Diaz v. Massachusetts*, 557 U.S. 305, 308 (2009).

¹⁷⁷ See Appendix D, Memorandum and Order Pursuant to Rule 1:28, Commonwealth v. *Melendez-Diaz*, 921 N.E.2d 108 (Mass. App. Ct. 2010).

¹⁷⁸ *Melendez-Diaz*, 557 U.S. at 309.

testimonial statements” under the governing Confrontation Clause jurisprudence¹⁷⁹ because they were “functionally identical to live, in-court testimony, doing ‘precisely what a witness does on direct examination.’”¹⁸⁰ Thus, the affidavits were the analysts’ testimonial statements, and the analysts who prepared them were witnesses for purposes of the Sixth Amendment.¹⁸¹

Bullcoming v. New Mexico waded further into the depths of this doctrine but, again, did not resolve all of it.¹⁸² In *Bullcoming*, the prosecution charged the defendant with driving while intoxicated and cited a report on the defendant’s blood-alcohol content as determined via a forensic lab machine (a gas chromatograph).¹⁸³ Among other things, the report: (1) certified that the analyst involved received the sample with its seal unbroken, (2) affirmed that the analyst followed certain lab procedures, and (3) certified the analyst’s findings.¹⁸⁴ The report also identified the analyst who conducted the test, listed the date and time the sample was drawn, stated the reason for the defendant’s detention (“Accident”), and contained certifications from the nurse and officer as to the blood draw and chain-of-custody information.¹⁸⁵

The prosecution did not call to testify at trial the analyst who conducted the analysis—that analyst had been placed on unpaid leave for reasons unstated.¹⁸⁶ Instead, the prosecutor called another analyst and introduced the blood alcohol report through that surrogate witness.¹⁸⁷ The New Mexico Supreme Court accepted that result and concluded that the absent analyst who prepared the report “‘was a mere scrivener’ who ‘simply transcribed the results generated by the gas chromatograph machine’”¹⁸⁸ because the “‘true ‘accuser’ was the gas chromatograph machine”¹⁸⁹

¹⁷⁹ *Id.* at 310 (internal quotation marks omitted).

¹⁸⁰ *Id.* at 310–11 (quoting *Davis v. Washington*, 547 U.S. 813, 830 (2006)).

¹⁸¹ *Melendez-Diaz*, 557 U.S. at 311.

¹⁸² See *Bullcoming v. New Mexico*, 564 U.S. 647, 668 (2011).

¹⁸³ *Id.* at 651, 654.

¹⁸⁴ *Id.* at 660.

¹⁸⁵ *Id.* at 653.

¹⁸⁶ *Id.* at 655.

¹⁸⁷ *Id.* at 657.

¹⁸⁸ *Bullcoming*, 564 U.S. at 657 (quoting *State v. Bullcoming*, 226 P.3d 1, 4 (N.M. 2010), *rev’d* 564 U.S. 647 (2011)).

¹⁸⁹ *Bullcoming*, 226 P.3d at 9.

The Supreme Court disagreed but on a separate point—the problem was that the analyst certified that he received the defendant’s sample intact and sealed, that he performed a specific test by following lab protocols, and other representations.¹⁹⁰ The problem, then, was not what the machine said—it was what the operator said in connection with what the machine said.¹⁹¹ Indeed, the fifth vote in the case acknowledged that *Bullcoming* did not decide whether a prosecutor could introduce raw data generated by a machine in conjunction with the testimony of an expert witness without raising Confrontation Clause concerns.¹⁹² The heart of the machine-generated testimony quandary remains unresolved.

Despite that lingering question, courts continue to reject attempts to cross-examine machines on the theory that the machines, not the operators, are the true entities speaking, and machines are immune to cross-examination.¹⁹³ Thus, while the outcome of lawsuits challenging machine speech in other contexts may be uncertain in the near future, claims founded on the Confrontation Clause and related hearsay rules are less so: Most courts agree there is no right to confront machine accusers,¹⁹⁴ with only a scarce minority arguing otherwise.¹⁹⁵

¹⁹⁰ *Bullcoming*, 564 U.S. at 660.

¹⁹¹ *Id.* at 674–75 (Kennedy, J., dissenting).

¹⁹² *Id.* at 674 (Sotomayor, J., concurring).

¹⁹³ *See* cases cited *infra* note 194.

¹⁹⁴ *See, e.g.,* United States v. Drayton, No. PWG-13-0251, 2014 WL 2919792, at *6 (D. Md. June 26, 2014) (“[A] machine cannot bear witness against an accused within the meaning of the Confrontation Clause. . . . [O]nly a human may be a declarant . . .”). *But see* United States v. Ramos-González, 664 F.3d 1, 6 (1st Cir. 2011) (concluding, without analyzing the machine-generated testimony doctrine, that the testimony of one analyst about, *inter alia*, the results of a test violated the Confrontation Clause).

¹⁹⁵ *See, e.g.,* United States v. Washington, 498 F.3d 225, 232 (Michael, J., dissenting); State v. Roach, 95 A.3d 683, 698–701 (N.J. 2014) (Albin, J., dissenting); Young v. United States, 63 A.3d 1033, 1046 (D.C. 2013); *Ramos-González*, 664 F.3d at 6; Martin v. State, 60 A.3d 1100, 1106 (Del. 2013) (lending some support to the right to cross-examine the operating analyst in machine-generated data contexts); *cf.* Pendergrass v. State, 913 N.E.2d 703, 711 (Ind. 2009) (Rucker, J., dissenting) (not addressing the machine-generated testimony doctrine, but stating “despite whatever ambiguity *Melendez-Diaz* may have created on the question of *who* must testify at trial, it appears to me the opinion is clear enough that a defendant has a constitutional right to confront at the very least the analyst that actually conducts the tests.”).

III. A MODEL FOR MACHINE SPEECH?

The wide-ranging array of cases filed against AI companies have a common thread—they explore the boundaries between machine and human control and liability, and they seek to attribute speech and actions in those pursuits. That fabric, even though it contains threads woven throughout cases in the territorial reach of the Eleventh Circuit, is a tapestry that covers all state and federal courts (and beyond).¹⁹⁶ Given those similarities, should the answers to those questions be consistent across doctrines when machine speech is involved?

For example, if art created by a machine is ineligible for copyright protection because the machine is deemed the expressive author—the speaker—is it problematic if an otherwise defamatory statement generated by an LLM is viewed as not a “publication” to the LLM user because it is not the machine that is the speaker and instead it is a duet? Or should the conclusion in copyright control the conclusion in defamation law?

Similarly, would either result be inconsistent with the view in courts that a criminal defendant has no right to confront an accuser generating data by using a forensics machine because the data is the speech of the tool instead of the operator? Would a view attributing speech solely to the machine in the Confrontation Clause context conflict with the view that a driver in a vehicle with semi-autonomous assistance is still ultimately responsible for any accidents, just as a lawyer relying on AI-powered research is responsible for ensuring the cases cited are real? Put another way, should analysis under, e.g., the Confrontation Clause have nothing to do with machine speech across the aisle in copyright, tort law, and other contexts?

The answer to the overarching question of whether a sort of “grand unified theory of machine speech” should control these various questions is probably “no.”¹⁹⁷ Though the facts have commonalities in the form of a machine “speaker,” many of these areas of law in which the machine speaks (or drives, etc.) seek to advance different underlying policies, and those policies may warrant differing outcomes regardless of machine speech attribution. For that reason, how we attribute the speech (to machines or to humans) will

¹⁹⁶ See discussion *supra* Part I.

¹⁹⁷ See discussion *supra* Part II.

not necessarily resolve how we allocate responsibility for that speech.

Additionally, a unified theory of machine speech could not control the outcome across all doctrines. Many of the areas of law involved are based on different sources of law—state privacy statutes, the Copyright Act, constitutional provisions, the rules of evidence, etc.—and some of those areas draw from separate codified or judicially adopted definitions.¹⁹⁸ Divergent results would be inevitable by virtue of those differing definitions. For example, even if courts decided pursuant to a unified attribution theory that speech by a machine is subject to the Confrontation Clause because the speech is attributed to the human operator who influenced it, that would not necessarily change the outcome for hearsay analysis, since some jurisdictions' rules of evidence define machine-generated speech as non-hearsay.¹⁹⁹

Given the already far-reaching scope of machine speech, there are countless additional considerations to balance, and that too speaks against a unified theory of attribution controlling the outcome in the separate sub-areas of the theory. Each area of law will involve different ways to address underlying policy concerns aside from adopting a consistent definition.

For example, parties with sensitive information may be able to restrict access to that information just as, e.g., the New York Times blocked OpenAI's access to certain New York Times' articles; access restriction may resolve issues related to machine speech in some LLM cases.²⁰⁰ But that same practice might not offer much assistance in preventing machine speech defamation.²⁰¹ Practical re-

¹⁹⁸ See discussion *supra* Parts I, II.

¹⁹⁹ See, e.g., FED. R. EVID. 801(a) (“‘Statement’ means a person’s oral assertion, written assertion, or nonverbal conduct, if the person intended it as an assertion.”). Focusing on the phrase “person’s oral assertion,” numerous circuits have held that machine statements are not hearsay. See, e.g., *United States v. Lamons*, 532 F.3d 1251, 1263 (11th Cir. 2008).

²⁰⁰ See Ariel Bogle, *New York Times, CNN and Australia’s ABC block OpenAI’s GPTBot web crawler from accessing content*, GUARDIAN (Aug. 24, 2023, 8:31 PM), <https://www.theguardian.com/technology/2023/aug/25/new-york-times-cnn-and-abc-block-openais-gptbot-web-crawler-from-scraping-content>.

²⁰¹ See O’Brien & The Associated Press, *supra* note 79.

alities will also pressure some of these doctrines through time. Refusing to extend copyright eligibility to AI-generated work, even assuming it is a desirable solution, may be increasingly difficult to defend if the Copyright Office cannot tell which works are AI-generated and which are not (this is likely already the case except when the artist chooses to disclose use of AI). Finally, there are doctrines beyond those contemplated here that implicate machine speech and that raise additional questions. For example, speech by AI raises a variety of questions under the First Amendment free speech doctrine.²⁰² A broad, unified theory arguably would need to address them as well.

These reasons collectively indicate it would be problematic to adopt a unified theory of machine speech that attempts to resolve the broader questions of responsibility and liability across doctrines. However, a narrower theory that provides only a framework to allocate the speech to machine or operator remains valuable. Machine speech cases should at least draw from parallel machine-speech doctrines because they present the similar core concept of machine speech attribution. For example, there are a variety of theories in copyright law about how to allocate the creative efforts by a human operator and machine working together. The conclusions courts and the law more generally reach in answering the question “who is speaking” in copyright should be a consideration when analyzing who is speaking in machine speech cases that arise in other areas of law.²⁰³ While it is reasonable for codified definitions, public policy, and other matters to dictate different legal responses to that resulting speech, the factual determination who is speaking should not differ depending on which area of law the machine and operator happen to fall under in that particular case. Again, how the law treats the speech will, and in many cases must, vary because of the context in which the speech arises.²⁰⁴ But the differing legal responses should at least be food for thought across the aisle in other jurisprudence.

A unified theory of attribution, then, should be limited to a simple observation: Courts and legislatures should recognize that output

²⁰² See, e.g., Margot E. Kaminski, *Authorship, Disrupted: AI Authors in Copyright and First Amendment Law*, 51 U.C. DAVIS L. REV. 589, 591 (2017).

²⁰³ See Myers, *supra* note 116, at 24–26 (summarizing different potential approaches to the question of protecting AI-generated works).

²⁰⁴ See *supra* notes 197–203 and accompanying text.

created by a machine at the direction of, or under the influence of, a human operator is not solely “speech” of the machine. It is speech of the two together, and treating it as only the speech of the machine ignores the reality of the interaction.²⁰⁵ The law and society more generally may wish to respond to that resulting speech in different ways for policy, definitional, or other contextual reasons, but we should do so expressly on those grounds after consistent machine speech attribution. Doing otherwise only further complicates determinations that, especially given the myriad contexts in which machine speech arises, are already unnecessarily complex and often artificial.

CONCLUSION

Many of the questions posed by AI will be driven by forces unrelated to machine speech attribution. Workforce disruption, for example, is likely to be a powerful voice as AI, whether a potential copyright author or not, raises challenges for a variety of creative fields.²⁰⁶ One of the greatest challenges of AI will be balancing its benefits against the harms inherent in those benefits.²⁰⁷ And on the upward curve of progress, we are quickly approaching the point where advancements in AI might accelerate exponentially, prompting new and even more difficult questions. Milestones in related fields will expand AI’s reach into our daily lives, and when robotics reaches a tipping point analogous to the LLM boom in 2023, AI will reach deeper into our reality as it assumes physical robotic form. Workforce disruption then will be all-consuming as a driving policy force.

Proper machine speech attribution cannot answer those weighty questions. But recognizing that machine speech in conjunction with

²⁰⁵ See Sites, *Rise of the Machines*, *supra* note 22, at 76. It also leads to problematic outcomes in some of the doctrines, including diminishing the important protections the Confrontation Clause offers and unnecessarily restricting the protections available to artists who use AI to generate images (award-winning and otherwise).

²⁰⁶ See Umberto Bacchi, *Performing artists push for copyright protection from AI deepfakes*, REUTERS (May 18, 2022, 3:26 PM), <https://www.reuters.com/legal/litigation/performing-artists-push-copyright-protection-ai-deepfakes-2022-05-18/>.

²⁰⁷ See *id.*

or under the influence of an operator is not just speech of a machine is an important step towards doctrinal consistency. Though that is not a “grand unified theory,” it is at least a starting point for consistency across a doctrine that may grow to shape perhaps all of law and life on the near horizon.