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12	JUUL Labs, Inc. and VMR Products LLC			
13		CTDICT COURT		
14	UNITED STATES DISTRICT COURT			
15	DISTRICT OF ARIZONA			
16	JUUL Labs, Inc. and VMR Products LLC,	No.		
17	Plaintiffs,	COMPLAINT FOR PATENT INFRINGEMENT		
18	v.	INFRINGEMENT		
19	NJOY, LLC, NJOY Holdings, Inc., Altria	JURY TRIAL DEMAND		
20	Group, Inc., Altria Group Distribution			
21	Company, and Altria Client Services LLC,			
	Defendants.			
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I. INTRODUCTION

- 1. Plaintiffs JUUL Labs, Inc. and VMR Products LLC¹ (collectively "JLI" or "Plaintiffs"), by and through their undersigned counsel, respectfully file this civil action for infringement of U.S. Patent No. RE49,114, U.S. Patent No. 10,130,123, U.S. Patent No. 10,709,173, U.S. Patent No. 11,134,722, and U.S. Patent No. 11,606,981 (collectively the "Asserted Patents") arising under the patent laws of the United States, 35 U.S.C. §§ 1 *et seq*.
- 2. As discussed in Section II of this Complaint, JLI was founded in 2007 with the goal of developing a less harmful alternative to traditional combustible cigarettes. After years of effort across product design, engineering, and scientific research, and over a billion dollars invested domestically, JLI accomplished that goal by developing technology that revolutionized a category of vaporizing products known as electronic nicotine delivery system ("ENDS") products. JLI is now a global leader in the ENDS industry, where it is known for numerous, meaningful technological advancements. JLI continues to invest heavily in innovation to sustain existing products and develop new ones. Unfortunately, JLI's innovation and resulting success has bred numerous entities who unlawfully use JLI's patented technology.
- 3. The defendants are NJOY, LLC and NJOY Holdings, Inc. (collectively "NJOY"); and Altria Group, Inc., Altria Group Distribution Company, and Altria Client Services LLC (collectively "Altria") (all collectively "Defendants").
- 4. This Complaint is based on Defendants' unlawful infringement of the Asserted Patents, including one or more of at least the following claims:

¹ VMR Products LLC is a wholly owned subsidiary of JUUL Labs, Inc.

Asserted Patent	Claims Asserted Against Defendants (independent claims in bold)
U.S. Patent No. RE49,114	1 , 5-7, 29, 30, 36, 43 , 44 , 76, 77, 80, 81, 86, 89, 93
U.S. Patent No. 10,130,123	14 , 16, 18, 27 , 29, 31, 32
U.S. Patent No. 10,709,173	1 , 2-4, 6-7, 15, 16, 18, 19, 20 , 21-25, 28, 30
U.S. Patent No. 11,134,722	1 , 3, 5, 7-9, 10 , 11-14, 15 , 16-21
U.S. Patent No. 11,606,981	1 , 2, 5, 6, 8, 9 , 10, 11, 13 , 14-16, 17 , 18

II. PLAINTIFFS

- 5. JUUL Labs, Inc. is a privately held corporation organized and existing under the laws of the State of Delaware, with its principal place of business as of the date of the initiation of this proceeding at 1000 F Street NW, Washington, D.C. 20004.
- 6. VMR Products LLC is a privately held corporation organized and existing under the laws of the State of Florida, with its principal place of business as of the date of the initiation of this proceeding at 560 20th Street, San Francisco, California 94107. VMR Products LLC is a wholly owned subsidiary of JUUL Labs, Inc.
- 7. After years of research and over a billion dollars invested domestically, JLI has become one of the world's leading ENDS companies.

A. JLI's History

8. JLI was founded and incorporated in 2007 with the goal of transitioning the world's billion adult smokers away from combustible cigarettes.² Use of combustible cigarettes remains the leading cause of preventable death in the world and cigarettes are widely acknowledged to kill up to or more than 50% of their long-time users.³

² As described more fully in the remaining paragraphs in this Section, JLI began as a company called "Ploom, Inc." Ploom, Inc. was later renamed to "PAX Labs, Inc.," and PAX Labs, Inc. was later renamed to "JUUL Labs, Inc."

³ See Tobacco: Key Facts, World Health Organization (May 24, 2023), https://www.who.int/news-room/fact-sheets/detail/tobacco ("Tobacco kills up to half of its users.").

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- 9. When JLI was founded, the health hazards of smoking combustible cigarettes were well understood. Smoking was and still is the number one cause of preventable death in the United States. See Health Risks of Smoking Tobacco, American Cancer Society (May 25, 2023), https://www.cancer.org/cancer/cancer-causes/tobacco-and-cancer/healthrisks-of-smoking-tobacco.html. Smoking not only steals valuable years of life but also has a significant economic cost. The Centers for Disease Control and Prevention estimates that "[c]igarette smoking cost the United States more than \$600 billion in 2018," including "[m]ore than \$240 billion in healthcare spending, [n]early \$185 billion in lost productivity from smoking-related illnesses and health conditions in lost productivity, [and] [n]early \$180 billion in lost productivity from smoking-related premature death " See Smoking & Tobacco Use: Economic Trends in Tobacco," Centers for Disease Control and Prevention (May 25, 2023), https://www.cdc.gov/tobacco/data statistics/fact sheets/economics/econ facts/index.htm.
- 10. After studying Product Design in graduate school at Stanford University, JLI's founders, James Monsees and Adam Bowen, applied their knowledge of design and engineering to the challenge of developing an alternative to combustible cigarettes through ENDS products. Both smokers at the time, they experienced a lack of compelling alternatives to smoking for adults who wanted to enjoy nicotine but wanted to move away from traditional combustible cigarettes.
- 11. ENDS technology represented a potential alternative for reducing the exposure of adult smokers—and those around them—to the toxic compounds released by use of combustible cigarettes. ENDS products deliver nicotine, but do so without burning tobacco and are thus noncombustible tobacco products. Studies have shown that switching from cigarettes to ENDS products can reduce exposure to certain toxic byproducts of smoking traditional cigarettes by up to 95% or more. Former FDA Commissioner Scott Gottlieb, M.D., explained that "it's primarily the combustion, which releases thousands of

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harmful constituents into the body at dangerous levels, that kills people." *See* Statement from FDA Commissioner Scott Gottlieb, M.D., FDA Newsroom (Sept. 11, 2018), https://www.fda.gov/news-events/press-announcements/statement-fda-commissioner-scott-gottlieb-md-new-steps-address-epidemic-youth-e-cigarette-use.

- 12. While promising, initial ENDS products showed challenges to durably switching the adult smoker's consumption of combustible cigarettes. Several factors contributed to low switching rates with early non-combustible devices, including poor nicotine delivery, unreliability, poor device quality, form factor issues, complexity, and maintenance required for some devices. Early generation "cig-a-like" products, typically cylindrical in design like a cigarette, failed to break from traditional cigarette iconography, often had poor nicotine delivery that failed to match the experience of consuming a combustible cigarette, and were either not rechargeable or suffered from inconvenient cartridge coupling mechanisms, inconsistent operation, etc. Tank systems, including cartomizers and "mods," were bulky, complicated, and impractical—requiring user modifications and refilling with nicotine e-liquids. Such cartomizers and mods were difficult to use, troublesome to refill with e-liquid, leaky, bulky, and inconvenient.
- 13. Most early alternatives, including early e-cigarettes, continued the combustible cigarette iconography in that they were "either small and round, designed to

⁴ See Jean-Francois Etter, Electronic Cigarettes: A Survey of Users, 10 BMC Pub. Health 231 (2010); see also Carla J. Berg, et. al., Attitudes Toward E-Cigarettes, Reasons for Initiating E-Cigarette Use and Changes in Smoking Behavior After Initiation: A Pilot Longitudinal Study of Regular Cigarette Smokers, 4 Open J. Preventive Med. 789 (2014).

⁵ See Neil McKeganey & Tiffany Dickson, Why Don't More Smokers Switch to Using E-Cigarettes: The Views of Confirmed Smokers, 14 Int'l J. Envtl. Res. Pub. Health 647 (2017); Amy McQueen, Stephanie Tower & Walton Sumner, Interviews with "Vapers": Implications for Future Research with Electronic Cigarettes, 13 Nicotine Tobacco Res. 860 (2011); Jean-Francois Etter & Chris Bullen, Electronic Cigarette: Users Profile, Utilization, Satisfaction and Perceived Efficacy, 106 Addiction 2017 (2011).

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look and feel as much as possible like a cigarette," or were inaccessible to many as they were "huge, assembled from many parts, and spectacularly complicated." See David Pierce, This Might Just Be the First Great ECIG, Wired (Apr. 21, 2015), https://www.wired.com/2015/04/pax-juul-ecig/. During the course of their Master's thesis project in product design, James and Adam developed prototypes of a non-combustible nicotine delivery system to address these shortcomings.

- 14. After graduate school, James and Adam started a company called Ploom, Inc. ("Ploom") to continue developing and commercializing tobacco-alternative devices. The original Ploom device was a butane-powered vaporizer that heated solid tobacco material sufficiently to create a nicotine-containing inhalable aerosol while using a sufficiently low temperature to avoid igniting the tobacco material, a type of system referred to as "heat-The Ploom device included a button-actuated heater and removable not-burn." mouthpiece. In 2015, Ploom changed its name to PAX Labs, Inc. ("Pax"). James and Adam, through Pax, continued to innovate new and better designs for non-combustible nicotine delivery products.
- 15. In 2015, Pax revolutionized the market for ENDS products with the release of its signature product, the JUUL electronic nicotine delivery system (the "JUUL System"). Through its many innovations in industrial design, technical engineering, and chemistry, the JUUL System disrupted the stagnant and failing category of noncombustible alternatives to combustible cigarettes. Adult smokers had experimented with predecessor e-cigarette and electronic smoking alternative products, going back at least to the 1980s. However, none of those products ever gained significant traction. JLI's deliberate departure from early-generation technology changed that pattern, and the JUUL System's arrival gave adult smokers the first viable alternative to traditional cigarettes.
- 16. On June 30, 2017, Pax was renamed JUUL Labs, Inc. JLI then spun off nonnicotine products (i.e., not including the JUUL System), as well as related personnel and

resources, into a new, distinct corporate entity named Pax Labs (Deux), Inc., which was later renamed to Pax Labs, Inc. ("New Pax"). New Pax focuses on other vaporization fields that do not involve nicotine.

B. The JUUL System

- 17. The JUUL System is a closed, cartridge-based product that uses precision heating technology to aerosolize and deliver nicotine without combustion. It was designed to break away from the "round white stick" iconography associated with smoking and used a simple interface requiring no buttons, switches, or complex manipulation, coupled with an e-liquid formulation and carefully engineered internal architecture to deliver a combustible cigarette-like experience. The transformative design and operation of the JUUL System were unique advancements over previous, much less successful ENDS products that were difficult to use, unsatisfying, and/or inconsistent in their delivery of aerosolized nicotine. As a result of its ease of use and satisfying and reliable performance, the JUUL System quickly gained recognition among adult smokers. It has been and continues to be one of the best-selling ENDS products in the United States.
- 18. The JUUL System comprises three primary and proprietary components: (i) a device body containing a rechargeable battery, control circuitry, and a receptacle for a cartridge ("JUUL Device"); (ii) a non-refillable cartridge (branded as a "JUULpod") that is specifically designed to be inserted into the cartridge receptacle on the device body, has a resistive heater-based atomizer, and is pre-filled with a proprietary nicotine e-liquid formulation; and (iii) a charger that is specifically designed for charging the device body. When a user inhales through the mouthpiece of a JUULpod that has been inserted into the cartridge receptacle of the JUUL Device body, the device rapidly heats to vaporize the nicotine e-liquid, which recondenses to generate an aerosol that is ultimately inhaled by the user.

19. By way of illustration, the JUUL System is generally shown in the renderings below:



20. The JUUL System looks simple, yet distinctive. It employs a unique form factor that represents a stark departure from prior conventional thinking about ENDS product design and from contemporary industry norms, abandoning traditional cigarette designs altogether, including the cylindrical shape. Its innovative design distinguishes it from the "round white stick" iconography found in both traditional combustible cigarettes and from previous alternative e-cigarettes. JLI was immediately praised for "strong design savvy" and for creating a "beautiful" product. See David Pierce, This Might Just Be the

First Great ECIG, Wired (Apr. 21, 2015), https://www.wired.com/2015/04/pax-juul-ecig/; Tom Miller, Powen and James Monsees, Time Magazine (Sept. 16, 2019), https://time.com/collection/100-most-influential-people-2019/5567701/adam-bowen-james-monsees/.

21. A JUULpod cartridge consists of two basic parts: a cartridge and a cap, which is removed from the cartridge prior to use. As shown in the example JUULpod renderings below, the JUULpod cartridge has an overall rectangular shape—a deliberate departure from the cylinder-shaped cartridges that came before it.



22. Moreover, looking at the JUULpod cartridge with the cap removed (as shown in the rendering below), more than one-half of the cartridge is light transmissive to allow a user to view the nicotine e-liquid remaining in the tank as well as other internal components. Older cartridge designs were typically opaque at the distal end, which connected to the device body, and were often made of metal.



- 23. The JUUL System has attained tremendous commercial success and acclaim, reportedly garnering around 60-70% of the overall tracked e-cigarette market in the U.S. in the years following its launch.
- 24. JLI has since further innovated and created the JUUL2 System. Like the JUUL System, the JUUL2 System is comprised of three primary and proprietary components: (i) a device body containing a rechargeable battery, control circuitry, and a receptacle for a cartridge; (ii) a non-refillable cartridge (branded as a "JUUL2 pod") that is specifically designed to be inserted into the cartridge receptacle on the device body, has a resistive heater-based atomizer, and is pre-filled with a proprietary nicotine e-liquid formulation; and (iii) a charger that is specifically designed for charging the device body. The JUUL 2 System is designed, developed, and assembled in the United States, and exported and sold outside of the United States
- 25. JLI is committed to providing quality products that perform consistently to JLI's specifications. JLI continues to invest in creating and maintaining strict manufacturing and quality standards for its products and relies on multiple safeguards, testing standards, and quality controls.

III. DEFENDANTS

- 26. On information and belief, NJOY, LLC is limited liability company organized under the laws of Delaware, with its principal place of business located at 8825 N. 23rd Avenue, Suite 100, Phoenix, Arizona 85021. On information and belief, NJOY, LLC was acquired by Altria Group, Inc. on June 1, 2023, and is now a wholly owned subsidiary of Altria Group, Inc. *See* https://investor.altria.com/press-releases/news-details/2023/Altria-Completes-Acquisition-of-NJOY-Holdings-Inc.-Updates-2023-Full-Year-Earnings-Guidance/default.aspx.
- 27. On information and belief, NJOY Holdings, Inc. is a corporation organized under the laws of Delaware, with its principal place of business located at 9449 N. 90th Street, Suite 201, Scottsdale, Arizona 85258. On information and belief, NJOY Holdings, Inc. is the holding company for NJOY, LLC, the operating company. On information and belief, NJOY Holdings, Inc. was acquired by Altria Group, Inc. on June 1, 2023, and is now a wholly owned subsidiary of Altria Group, Inc. *See* https://investor.altria.com/press-releases/news-details/2023/Altria-Completes-Acquisition-of-NJOY-Holdings-Inc.-Updates-2023-Full-Year-Earnings-Guidance/default.aspx.
- 28. On information and belief, Altria Group, Inc. is a corporation organized under the laws of the Commonwealth of Virginia, with its principal place of business located at 6601 West Broad Street, Richmond, Virginia 23230.
- 29. On information and belief, Altria Group Distribution Company is a corporation organized under the laws of the Commonwealth of Virginia, with its principal place of business located at 6601 West Broad Street, Richmond, Virginia 23230. On information and belief, Altria Group Distribution Company is a wholly owned subsidiary of Altria Group, Inc., and provides sales and distribution services to Altria Group, Inc.'s operating subsidiaries, such as NJOY. *See* <a href="https://investor.altria.com/press-releases/news-details/2023/Altria-Completes-Acquisition-of-NJOY-Holdings-Inc.-Updates-2023-Full-part of the Commonwealth of Virginia, with its principal place of business located at 6601 West Broad Street, Richmond, Virginia 23230. On information and belief, Altria Group Distribution Company is a wholly owned subsidiary of Altria Group, Inc., and provides sales and distribution services to Altria Group, Inc.'s operating subsidiaries, such as NJOY. *See* https://investor.altria.com/press-releases/news-details/2023/Altria-Completes-Acquisition-of-NJOY-Holdings-Inc.-Updates-2023-Full-

<u>Year-Earnings-Guidance/default.aspx</u> ("NJOY's products will be distributed by Altria Group Distribution Company.").

- 30. On information and belief, Altria Client Services LLC is a limited liability company organized under the laws of the Commonwealth of Virginia, with its principal place of business located at 6601 West Broad Street, Richmond, Virginia 23230. On information and belief, Altria Client Services LLC is a wholly owned subsidiary of Altria Group, Inc.
- 31. As set forth below, on information and belief, Defendants use in the United States, import into the United States, sell for importation into the United States, and/or offer to sell and sell within the United States after importation vaporizer devices, cartridges used therewith, and components thereof that infringe the Asserted Patents.

IV. JURISDICTION AND VENUE

- 32. This Court has jurisdiction over the subject matter of this action under 28 U.S.C. §§ 1331 and 1338(a).
- 33. Venue is proper in this district with respect to Defendants under 28 U.S.C. § 1391 and 28 U.S.C. § 1400(b). On information and belief, Defendants have committed acts of infringement in this District, directly and/or through intermediaries, by, among other things, making, using, offering to sell, selling, and/or importing products and/or services that infringe the Asserted Patents, as alleged herein. On information and belief, Defendants have a regular and established place of business in this District. On information and belief, NJOY is headquartered in Arizona. On information and belief, Altria employs numerous sales and account managers based in Arizona, and Altria Group Distribution Company has a registered agent located in Phoenix, Arizona. On information and belief, NJOY was acquired by Altria Group, Inc. on June 1, 2023, and is now a wholly owned subsidiary of Altria Group, Inc. See https://investor.altria.com/press-releases/news-details/2023/Altria-

Completes-Acquisition-of-NJOY-Holdings-Inc.-Updates-2023-Full-Year-Earnings-Guidance/default.aspx.

34. This Court has personal jurisdiction over Defendants. On information and belief, Defendants have conducted and continue to conduct business in the State of Arizona and this District. Further, Defendants, directly and/or through subsidiaries and/or intermediaries (including distributors, retailers, franchisees, and others), have committed and continue to commit acts of patent infringement and/or have contributed to or induced acts of patent infringement by others in this District and elsewhere in the United States. As such, Defendants have purposefully availed themselves of the privilege of conducting business within this District; have established sufficient minimum contacts with this District such that they should reasonably and fairly anticipate being haled into court in this District; and have purposefully directed activities at residents of this State. At least a portion of the patent infringement claims alleged herein arise out of or are related to one or more of the foregoing activities.

V. THE TECHNOLOGY AND PRODUCTS AT ISSUE

A. Background of the Technology

- 35. The technology at issue generally relates to the design and operation of vaporizer devices, such as ENDS devices, and cartridges used therewith.
- 36. ENDS products generally vaporize a liquid solution containing nicotine (also called e-liquid) and permit the user to inhale recondensed droplets of that solution as an aerosol. An e-liquid based ENDS product typically includes a storage compartment that holds the liquid nicotine solution, a heating element that vaporizes the liquid to generate an aerosol, and a battery and circuitry to power and operate the heating element.

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B. **Products at Issue**

37. The Accused Products are vaporizer devices (such as ENDS devices), cartridges used therewith, and components thereof (e.g., cartridge housings, atomizers, atomizer subassemblies, device subassemblies, etc.).

VI. THE ASSERTED PATENTS AND NON-TECHNICAL DESCRIPTIONS OF THE INVENTIONS⁶

38. JLI asserts five patents in this Complaint: U.S. Patent No. RE49114 ("the RE49114 patent"); U.S. Patent No. 10,130,123 ("the '123 patent"); U.S. Patent No. 10,709,173 ("the '173 patent"); U.S. Patent No. 11,134,722 ("the '722 patent"); and U.S. Patent No. 11,606,981 ("the '981 patent"). These patents are briefly discussed below.

The RE49114 Patent

Identification and Ownership of the RE49114 Patent

- 39. U.S. Patent No. RE49114 was duly and lawfully reissued by the United States Patent and Trademark Office on June 28, 2022 to JUUL Labs, Inc.
- 40. The RE49114 patent is titled "Electronic Cigarette With Liquid Reservoir," names Kyle D. Newton as the sole inventor, and issued from U.S. Patent Application No. 16/359,938, which was filed on March 20, 2019.
- JUUL Labs, Inc. is the sole owner by assignment of all right, title, and 41. ownership interest in the RE49114 Patent.
 - 42. A true and correct copy of the RE49114 patent is attached as Exhibit 1.

⁶ All non-technical descriptions of the patents herein are presented to give a general background of those patents. These statements are not intended to be used nor should they be used for purposes of patent claim construction. JLI presents these statements subject to and without waiver of its right to argue that no claim construction is necessary, or that claim terms should be construed in a particular way under claim interpretation jurisprudence and the relevant evidence.

2. Non-Technical Description of the RE49114 Patent

43. The RE49114 patent describes an electronic cigarette cartridge apparatus that includes, for example, a mouthpiece having an aerosol outlet, a liquid reservoir (storing a liquid), an atomizing chamber, and an atomizer. The atomizer selectively generates an aerosol of the liquid, with the liquid reservoir sealably separated from the atomizing chamber, in response to electric current flowing through the atomizer. The wick is in contact with the liquid in the liquid reservoir through wick apertures, and transfers the liquid by capillarity from the liquid reservoir to the atomizer.

B. The '123 Patent

1. Identification and Ownership of the '123 Patent

- 44. U.S. Patent No. 10,130,123 was duly and lawfully issued by the United States Patent and Trademark Office on November 20, 2018 to JUUL Labs, Inc.
- 45. The '123 patent is titled "Vaporizer Devices With Blow Discrimination"; names Nicholas Jay Hatton and Steven Christensen as co-inventors; and issued from U.S. Patent Application No. 15/430,317, which was filed on February 10, 2017.
- 46. JUUL Labs, Inc. is the sole owner by assignment of all right, title, and ownership interest in the '123 Patent.
 - 47. A true and correct copy of the '123 patent is attached as Exhibit 2.

2. Non-Technical Description of the '123 Patent

48. The '123 patent describes vaporizer devices, such as ENDS devices, including for example a pressure sensor, a gasket, and a cartridge receptacle for insertably receiving a cartridge containing vaporizable material. The pressure sensor can include a first side exposed to a sealed air flow path and a second side exposed to a device air path open to ambient pressure. The sealed air flow path can include a channel formed between surfaces of the cartridge and the cartridge receptacle, and pass from an air inlet, through the channel and to a heater and outlet of the cartridge. The gasket can be included around

the pressure sensor to seal the device air path from the sealed air flow path.

C. The '173 Patent

ownership interest in the '173 Patent.

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1. Identification and Ownership of the '173 Patent

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49. U.S. Patent No. 10,709,173 was duly and lawfully issued by the United States Patent and Trademark Office on July 14, 2020 to JUUL Labs, Inc.

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50. The '173 patent is titled "Vaporizer Apparatus"; names James Monsees, Adam Bowen, Steven Christensen, Joshua Morenstein, and Christopher Nicholas HibmaCronan as co-inventors; and issued from U.S. Patent Application No. 16/032,009, which was filed on July 10, 2018.

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51. JUUL Labs, Inc. is the sole owner by assignment of all right, title, and

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52. A true and correct copy of the '173 patent is attached as Exhibit 3.

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2. Non-Technical Description of the '173 Patent

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53. The '173 patent describes vaporizer apparatuses, such as ENDS. For example, the patent describes a vaporizer apparatus with a cartridge and a body. The cartridge can comprise a mouthpiece, a storage compartment, and a heater chamber with a resistive heating element configured to generate an aerosol comprising vaporizable material and air passing along an airflow path. The body can comprise a receptacle

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configured to insertably receive the cartridge with the heater chamber disposed within the receptacle. The airflow path can comprise an air inlet passage and a fluid connection in

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the cartridge, connecting the heater chamber and the mouthpiece. The air inlet passage can

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have, for example, a first side formed by an exterior surface of the cartridge and a second side formed by an internal surface of the receptacle when the receptacle insertably receives

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The '722 Patent

1. **Identification and Ownership of the '722 Patent**

- 54. U.S. Patent No. 11,134,722 was duly and lawfully issued by the United States Patent and Trademark Office on October 5, 2021 to VMR Products LLC.
- 55. The '722 patent is titled "Vaporizer"; names Jan Andries Verleur, Dan Recio, Yifeng Lu, Yinjun Zhang, Arturo Fajardo, and Hans Verleur as co-inventors; and issued from U.S. Patent Application No. 16/119,359, which was filed on August 31, 2018.
- 56. VMR Products LLC is the sole owner by assignment of all right, title, and ownership interest in the '722 Patent.
 - 57. A true and correct copy of the '722 patent is attached as Exhibit 4.

Non-Technical Description of the '722 Patent

58. The '722 patent describes vaporizers, such as an ENDS, that, for example, have a battery portion that includes a cartomizer receiving segment, a battery housing segment, and charger electrical contacts, with an outer shell of the battery portion commonly shared by the battery housing segment and cartomizer receiving segment. An insertion end of a chamber in the cartomizer receiving segment, which is configured to receive an inserted cartomizer, is at an opposite end of the battery portion from the charger electrical contacts. A cartomizer configured for insertion into the chamber includes a structure for holding a vaporizable liquid, as well as wicking and heating elements.

Ε. The '981 Patent

1. **Identification and Ownership of the '981 Patent**

- 59. U.S. Patent No. 11,606,981 was duly and lawfully issued by the United States Patent and Trademark Office on March 21, 2023 to VMR Products LLC.
- 60. The '981 patent is titled "Vaporizer"; names Jan Andries Verleur, Dan Recio, Yifeng Lu, Yinjun Zhang, Arturo Fajardo, and Hans Verleur as co-inventors; and issued from U.S. Patent Application No. 17/095,567, which was filed on November 11, 2020.

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- 61. VMR Products LLC is the sole owner by assignment of all right, title, and ownership interest in the '981 Patent.
 - 62. A true and correct copy of the '981 patent is attached as Exhibit 5.

2. Non-Technical Description of the '981 Patent

63. The '981 patent describes vaporizers, such as ENDS, that, for example, include a battery portion having a chamber and a cartomizer having a mouthpiece end and an insertion end disposed opposite the mouthpiece end. The cartomizer can include, for example, a cartomizer body having a volume holding a fluid vaporizable substance, with at least a portion of the cartomizer body including a material that allows viewing of the fluid vaporizable substance; a heating element and a wicking element within the cartomizer body; an inhalation tube in fluid communication with the heating element and the wicking element; a mouthpiece at or proximate to the mouthpiece end and in fluid communication with the inhalation tube; and a plurality of cartomizer electrical contacts on an exterior of the insertion end. The plurality of cartomizer electrical contacts is positioned to contact a plurality of battery electrical contacts at a base end of the chamber when the cartomizer body is inserted into the chamber.

VII. DEFENDANTS' INFRINGEMENT OF THE ASSERTED PATENTS

- As discussed above, the Accused Products are certain vaporizer devices, cartridges used therewith, and components thereof that infringe one or more claims of the Asserted Patents.
- 65. All conditions precedent to JLI's right to recover have been performed, waived, or otherwise satisfied.

Α. COUNT I – Infringement of U.S. Patent No. RE49114

66. JLI hereby incorporates the allegations of the foregoing paragraphs as fully set forth herein.

- 67. Upon information and belief, Defendants have infringed and continue to directly infringe, either literally or under the doctrine of equivalents, at least claims 1, 5-7, 29, 30, 36, 43, 44, 76, 77, 80, 81, 86, 89, and 93 of the RE49114 patent by making, using, selling, offering for sale in, and/or importing into the United States Accused Products, such as the NJOY ACE Device and ACE Pods (collectively "ACE System").
- 68. An exemplary claim chart comparing independent claims 1, 43, and 44 of the RE49114 patent to a representative Accused Product (the NJOY ACE System) is attached as Exhibit 6.
- 69. On information and belief, Defendants also indirectly infringe the RE49114 patent by inducing and/or contributing to infringement. On information and belief, Defendants have had actual knowledge of the RE49114 patent, including through at least the filing of JLI's action in the International Trade Commission alleging infringement of the Asserted Patents against Defendants, and also have actual knowledge through the filing of this Complaint.
- 70. On information and belief, Defendants induce infringement of the RE49114 patent under 35 U.S.C. § 271(b) by knowingly and intentionally inducing others to directly infringe, literally or under the doctrine of equivalents, the RE49114 patent. On information and belief, the Accused Products are specially designed to contain features that infringe the RE49114 patent, and the Accused Products have no substantial uses other than ones that infringe the RE49114 patent. For example, on information and belief, Defendants sell the accused ACE Device and the accused ACE Pods separately, but provide instructions with both the ACE Device and ACE Pods explaining how to use the system by placing the pods into the device. On information and belief, Defendants also actively promote the sale, use, and importation of the Accused Products in marketing materials, technical specifications, data sheets, webpages, press releases, and user manuals, as well as through their sales and distribution channels that encourage infringing sales, offers to sell, and importation of the

Accused Products. Through these actions, Defendants have had the specific intent to induce, or were willfully blind to inducing infringement of the RE49114 patent. On information and belief, Defendants continue to engage in these activities with knowledge of the RE49114 patent and knowledge that the induced acts constitute infringement.

- 71. On information and belief, Defendants also contribute to infringement of the RE49114 patent under 35 U.S.C. § 271(c) by providing or selling the Accused Products (even if separately sold as the ACE Device and ACE Pods) to others. The Accused Products are specially designed and made for use in an infringing manner and are not staple articles of commerce suitable for any substantial non-infringing use. On information and belief, Defendants continue to engage in these activities with knowledge of the RE49114 patent and knowledge that their acts contribute to infringement.
- 72. On information and belief, Defendants' infringement is willful. For example, on information and belief, Defendants have been on notice of the RE49114 patent and their infringement of it since at least the filing of JLI's action in the International Trade Commission alleging infringement of the Asserted Patents against Defendants, as well as the filing of this Complaint, but continue their infringing activities.
- 73. JLI has suffered, and will continue to suffer, irreparable harm as a result of Defendants' infringement of the RE49114 patent for which there is no adequate remedy at law, unless Defendants' infringement is enjoined by this Court. Accordingly, JLI seeks a permanent injunction enjoining Defendants from making, using, selling, offering to sell, and/or importing the Accused Products, and/or otherwise infringing, or inducing or contributing to the infringement of, the RE49114 patent.

B. COUNT II – Infringement of U.S. Patent No. 10,130,123

- 74. JLI hereby incorporates the allegations of the foregoing paragraphs as fully set forth herein.
 - 75. Upon information and belief, Defendants have infringed and continue to

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and ACE Pods.

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directly infringe, either literally or under the doctrine of equivalents, at least claims 14, 16, 18, 27, 29, 31, and 32 of the '123 patent by making, using, selling, offering for sale in, and/or importing into the United States Accused Products, such as the NJOY ACE Device

76. An exemplary claim chart comparing independent claims 14 and 27 of the '123 patent to a representative Accused Product (the NJOY ACE System) is attached as Exhibit 7.

77. On information and belief, Defendants also indirectly infringe the '123 patent by inducing and/or contributing to infringement. On information and belief, Defendants have had actual knowledge of the '123 patent, including through at least the filing of JLI's action in the International Trade Commission alleging infringement of the Asserted Patents against Defendants, and also have actual knowledge through the filing of this Complaint.

78. On information and belief, Defendants induce infringement of the '123 patent under 35 U.S.C. § 271(b) by knowingly and intentionally inducing others to directly infringe, literally or under the doctrine of equivalents, the '123 patent. On information and belief, the Accused Products are specially designed to contain features that infringe the '123 patent, and the Accused Products have no substantial uses other than ones that infringe the '123 patent. For example, on information and belief, Defendants sell the accused ACE Device and the accused ACE Pods separately, but provide instructions with both the ACE Device and ACE Pods explaining how to use the system by placing the pods into the device. On information and belief, Defendants also actively promote the sale, use, and importation of the Accused Products in marketing materials, technical specifications, data sheets, webpages, press releases, and user manuals, as well as through their sales and distribution channels that encourage infringing sales, offers to sell, and importation of the Accused Products. Through these actions, Defendants have had the specific intent to induce, or were willfully blind to inducing infringement of the '123 patent. On information and

belief, Defendants continue to engage in these activities with knowledge of the '123 patent and knowledge that the induced acts constitute infringement.

- 79. On information and belief, Defendants also contribute to infringement of the '123 patent under 35 U.S.C. § 271(c) by providing or selling the Accused Products (even if separately sold as the ACE Device and ACE Pods) to others. The Accused Products are specially designed and made for use in an infringing manner and are not staple articles of commerce suitable for any substantial non-infringing use. On information and belief, Defendants continue to engage in these activities with knowledge of the '123 patent and knowledge that their acts contribute to infringement.
- 80. On information and belief, Defendants' infringement is willful. For example, on information and belief, Defendants have been on notice of the '123 patent and their infringement of it since at least the filing of JLI's action in the International Trade Commission alleging infringement of the Asserted Patents against Defendants, as well as the filing of this Complaint, but continue their infringing activities.
- 81. JLI has suffered, and will continue to suffer, irreparable harm as a result of Defendants' infringement of the '123 patent for which there is no adequate remedy at law, unless Defendants' infringement is enjoined by this Court. Accordingly, JLI seeks a permanent injunction enjoining Defendants from making, using, selling, offering to sell, and/or importing the Accused Products, and/or otherwise infringing, or inducing or contributing to the infringement of, the '123 patent.

C. COUNT III – Infringement of U.S. Patent No. 10,709,173

- 82. JLI hereby incorporates the allegations of the foregoing paragraphs as fully set forth herein.
- 83. Upon information and belief, Defendants have infringed and continue to directly infringe, either literally or under the doctrine of equivalents, at least claims 1, 2-4, 6-7, 15, 16, 18, 19, 20, 21-25, 28, and 30 of the '173 patent by making, using, selling,

NJOY ACE Device and ACE Pods.

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84. An exemplary claim chart comparing independent claims 1 and 20 of the '173 patent to a representative Accused Product (the NJOY ACE System) is attached as Exhibit 8.

offering for sale in, and/or importing into the United States Accused Products, such as the

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85. On information and belief, Defendants also indirectly infringe the '173 patent by inducing and/or contributing to infringement. On information and belief, Defendants have had actual knowledge of the '173 patent, including through at least the filing of JLI's action in the International Trade Commission alleging infringement of the Asserted Patents against Defendants, and also have actual knowledge through the filing of this Complaint.

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86. On information and belief, Defendants induce infringement of the '173 patent under 35 U.S.C. § 271(b) by knowingly and intentionally inducing others to directly infringe, literally or under the doctrine of equivalents, the '173 patent. On information and belief, the Accused Products are specially designed to contain features that infringe the '173 patent, and the Accused Products have no substantial uses other than ones that infringe the '173 patent. For example, on information and belief, Defendants sell the accused ACE Device and the accused ACE Pods separately, but provide instructions with both the ACE Device and ACE Pods explaining how to use the system by placing the pods into the device. On information and belief, Defendants also actively promote the sale, use, and importation of the Accused Products in marketing materials, technical specifications, data sheets, webpages, press releases, and user manuals, as well as through their sales and distribution channels that encourage infringing sales, offers to sell, and importation of the Accused Products. Through these actions, Defendants have had the specific intent to induce, or were willfully blind to inducing infringement of the '173 patent. On information and belief, Defendants continue to engage in these activities with knowledge of the '173 patent and knowledge that the induced acts constitute infringement.

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- 87. On information and belief, Defendants also contribute to infringement of the '173 patent under 35 U.S.C. § 271(c) by providing or selling the Accused Products (even if separately sold as the ACE Device and ACE Pods) to others. The Accused Products are specially designed and made for use in an infringing manner and are not staple articles of commerce suitable for any substantial non-infringing use. On information and belief, Defendants continue to engage in these activities with knowledge of the '173 patent and knowledge that their acts contribute to infringement.
- 88. On information and belief, Defendants' infringement is willful. For example, on information and belief, Defendants have been on notice of the '173 patent and their infringement of it since at least the filing of JLI's action in the International Trade Commission alleging infringement of the Asserted Patents against Defendants, as well as the filing of this Complaint, but continue their infringing activities.
- 89. JLI has suffered, and will continue to suffer, irreparable harm as a result of Defendants' infringement of the '173 patent for which there is no adequate remedy at law, unless Defendants' infringement is enjoined by this Court. Accordingly, JLI seeks a permanent injunction enjoining Defendants from making, using, selling, offering to sell, and/or importing the Accused Products, and/or otherwise infringing, or inducing or contributing to the infringement of, the '173 patent.

D. COUNT IV – Infringement of U.S. Patent No. 11,134,722

- 90. JLI hereby incorporates the allegations of the foregoing paragraphs as fully set forth herein.
- 91. Upon information and belief, Defendants have infringed and continue to directly infringe, either literally or under the doctrine of equivalents, at least claims 1, 3, 5, 7-9, 10, 11-14, 15, and 16-21 of the '722 patent by making, using, selling, offering for sale in, and/or importing into the United States Accused Products, such as the NJOY ACE Device and ACE Pods.

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- 92. An exemplary claim chart comparing independent claims 1, 10, and 15 of the '722 patent to a representative Accused Product (the NJOY ACE System) is attached as Exhibit 9.
- 93. On information and belief, Defendants also indirectly infringe the '722 patent by inducing and/or contributing to infringement. On information and belief, Defendants have had actual knowledge of the '722 patent, including through at least the filing of JLI's action in the International Trade Commission alleging infringement of the Asserted Patents against Defendants, and also have actual knowledge through the filing of this Complaint.
- 94. On information and belief, Defendants induce infringement of the '722 patent under 35 U.S.C. § 271(b) by knowingly and intentionally inducing others to directly infringe, literally or under the doctrine of equivalents, the '722 patent. On information and belief, the Accused Products are specially designed to contain features that infringe the '722 patent, and the Accused Products have no substantial uses other than ones that infringe the '722 patent. For example, on information and belief, Defendants sell the accused ACE Device and the accused ACE Pods separately, but provide instructions with both the ACE Device and ACE Pods explaining how to use the system by placing the pods into the device. On information and belief, Defendants also actively promote the sale, use, and importation of the Accused Products in marketing materials, technical specifications, data sheets, webpages, press releases, and user manuals, as well as through their sales and distribution channels that encourage infringing sales, offers to sell, and importation of the Accused Products. Through these actions, Defendants have had the specific intent to induce, or were willfully blind to inducing infringement of the '722 patent. On information and belief, Defendants continue to engage in these activities with knowledge of the '722 patent and knowledge that the induced acts constitute infringement.
- 95. On information and belief, Defendants also contribute to infringement of the '722 patent under 35 U.S.C. § 271(c) by providing or selling the Accused Products (even

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if separately sold as the ACE Device and ACE Pods) to others. The Accused Products are specially designed and made for use in an infringing manner and are not staple articles of commerce suitable for any substantial non-infringing use. On information and belief, Defendants continue to engage in these activities with knowledge of the '722 patent and knowledge that their acts contribute to infringement.

- 96. On information and belief, Defendants' infringement is willful. For example, on information and belief, Defendants have been on notice of the '722 patent and their infringement of it since at least the filing of JLI's action in the International Trade Commission alleging infringement of the Asserted Patents against Defendants, as well as the filing of this Complaint, but continue their infringing activities.
- 97. JLI has suffered, and will continue to suffer, irreparable harm as a result of Defendants' infringement of the '722 patent for which there is no adequate remedy at law, unless Defendants' infringement is enjoined by this Court. Accordingly, JLI seeks a permanent injunction enjoining Defendants from making, using, selling, offering to sell, and/or importing the Accused Products, and/or otherwise infringing, or inducing or contributing to the infringement of, the '722 patent.

Ε. COUNT V – Infringement of U.S. Patent No. 11,606,981

- 98. JLI hereby incorporates the allegations of the foregoing paragraphs as fully set forth herein.
- 99. Upon information and belief, Defendants have infringed and continue to directly infringe, either literally or under the doctrine of equivalents, at least claims 1, 2, 5, 6, 8, 9, 10, 11, 13, 14-16, 17, and 18 of the '981 patent by making, using, selling, offering for sale in, and/or importing into the United States Accused Products, such as the NJOY ACE Device and ACE Pods.

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100. An exemplary claim chart comparing independent claims 1, 9, 13, and 17 of the '981 patent to a representative Accused Product (the NJOY ACE System) is attached as Exhibit 10.

- 101. On information and belief, Defendants also indirectly infringe the '981 patent by inducing and/or contributing to infringement. On information and belief, Defendants have had actual knowledge of the '981 patent, including through at least the filing of JLI's action in the International Trade Commission alleging infringement of the Asserted Patents against Defendants, and also have actual knowledge through the filing of this Complaint.
- 102. On information and belief, Defendants induce infringement of the '981 patent under 35 U.S.C. § 271(b) by knowingly and intentionally inducing others to directly infringe, literally or under the doctrine of equivalents, the '981 patent. On information and belief, the Accused Products are specially designed to contain features that infringe the '981 patent, and the Accused Products have no substantial uses other than ones that infringe the '981 patent. For example, on information and belief, Defendants sell the accused ACE Device and the accused ACE Pods separately, but provide instructions with both the ACE Device and ACE Pods explaining how to use the system by placing the pods into the device. On information and belief, Defendants also actively promote the sale, use, and importation of the Accused Products in marketing materials, technical specifications, data sheets, webpages, press releases, and user manuals, as well as through their sales and distribution channels that encourage infringing sales, offers to sell, and importation of the Accused Products. Through these actions, Defendants have had the specific intent to induce, or were willfully blind to inducing infringement of the '981 patent. On information and belief, Defendants continue to engage in these activities with knowledge of the '981 patent and knowledge that the induced acts constitute infringement.
- 103. On information and belief, Defendants also contribute to infringement of the '981 patent under 35 U.S.C. § 271(c) by providing or selling the Accused Products (even

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if separately sold as the ACE Device and ACE Pods) to others. The Accused Products are specially designed and made for use in an infringing manner and are not staple articles of commerce suitable for any substantial non-infringing use. On information and belief, Defendants continue to engage in these activities with knowledge of the '981 patent and knowledge that their acts contribute to infringement.

104. On information and belief, Defendants' infringement is willful. For example, on information and belief, Defendants have been on notice of the '981 patent and their infringement of it since at least the filing of JLI's action in the International Trade Commission alleging infringement of the Asserted Patents against Defendants, as well as the filing of this Complaint, but continue their infringing activities.

105. JLI has suffered, and will continue to suffer, irreparable harm as a result of Defendants' infringement of the '981 patent for which there is no adequate remedy at law, unless Defendants' infringement is enjoined by this Court. Accordingly, JLI seeks a permanent injunction enjoining Defendants from making, using, selling, offering to sell, and/or importing the Accused Products, and/or otherwise infringing, or inducing or contributing to the infringement of, the '981 patent.

VIII. DEMAND FOR JURY TRIAL

Pursuant to Rule 38 of the Federal Rules of Civil Procedure, Plaintiffs hereby demand a trial by jury as to all issues so triable.

IX. PRAYER FOR RELIEF

WHEREFORE, Plaintiffs respectfully pray for the following relief:

- A judgment that Defendants have infringed each and every one of the (a) Asserted Patents:
- A judgment that Defendants' infringement of each and every one of the (b) Asserted Patents is willful;
 - Damages adequate to compensate JLI for the Defendants' infringement of (c)

1	the Asserted Patents pursuant to 35 U.S.C. § 284;		
2	(d)	(d) Entry of a permanent injunction enjoining Defendants from making, using	
3	selling, offering to sell, and/or importing the Accused Products, and/or otherwise		
4	infringing, or inducing or contributing to the infringement of, any of the Asserted Patents;		
5	(e)	Pre-judgment interest;	
6	(f)	Post-judgment interest;	
7	(g) A declaration that this action is exceptional pursuant to 35 U.S.C. § 285, and		
8	an award to JLI of its attorneys' fees, costs, and expenses incurred in connection with this		
9	action; and		
10	(h)	(h) Such other relief as the Court deems just and equitable.	
11	RESPECTFULLY SUBMITTED: June 30, 2023.		
12		COPPERSMITH BROCKELMAN PLC	
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14		/s/ Nathan J. Kunz	
15		Nathan J. Kunz Malvika A. Sinha	
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19		Victoria F. Maroulis (pro hac vice forthcoming)	
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