

UNITED STATES DISTRICT COURT
DISTRICT OF MASSACHUSETTS

OVERJET, INC.,

Plaintiff,

v.

VIDEAHEALTH, INC.,

Defendant.

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Civil Action No. 24-cv-10446-ADB

MEMORANDUM AND ORDER

BURROUGHS, D.J.

Plaintiff Overjet, Inc. (“Overjet” or “Plaintiff”) brings this action against its competitor VideHealth, Inc. (“Videa” or “Defendant”) for trademark infringement, copyright infringement, patent infringement, false advertising, and unfair competition. [ECF No. 1 (“Complaint” or “Compl.”) ¶ 1]. Presently before the Court is Videa’s motion to dismiss certain claims of the Complaint. [ECF No. 36]. For the reasons stated herein, the motion is **DENIED**.

I. BACKGROUND

The following facts are taken from Overjet’s Complaint, the factual allegations of which are assumed to be true when considering a motion to dismiss. See Ruivo v. Wells Fargo Bank, N.A., 766 F.3d 87, 90 (1st Cir. 2014). As it may on a motion to dismiss, the Court has also considered “documents incorporated by reference in [the complaint], matters of public record, and other matters susceptible to judicial notice.” Giragosian v. Ryan, 547 F.3d 59, 65 (1st Cir. 2008) (alteration in original) (quoting In re Colonial Mortg. Bankers Corp., 324 F.3d 12, 20 (1st Cir. 2003)).

A. Factual Background

Overjet is a dental artificial intelligence (“AI”) company formed in 2018 and headquartered in Boston, Massachusetts. [Compl. ¶¶ 8–10]. Overjet uses AI to scan dental radiographic X-rays and detect dental diseases. [Id. ¶ 9]. Specifically, Overjet uses an approach called “segmentation” to detect the exact border and extent of caries on the tooth.¹ [Id. ¶¶ 11, 13]. The segmentation approach allows Overjet “to outline exactly where pathologies exist.” [Id. ¶ 10]. This approach differs from the “bounded box” approach, which is a “‘detection’ approach that can localize and distinguish between objects with an [X]-ray image, and can place a ‘box’ around the area detected, such as an area on a specific tooth where caries were found.” [Id. ¶ 11]. For comparison, Image 1 below is an example of an annotated X-ray created by Overjet’s software using the segmentation approach, [id. ¶¶ 30, 45], and Image 2 represents the “bounded box” approach, [id. ¶ 64].

¹ “‘Caries’ refers to ‘a progressive destruction of bone or tooth,’ such as a cavity.” [Compl. at 4 n.1].

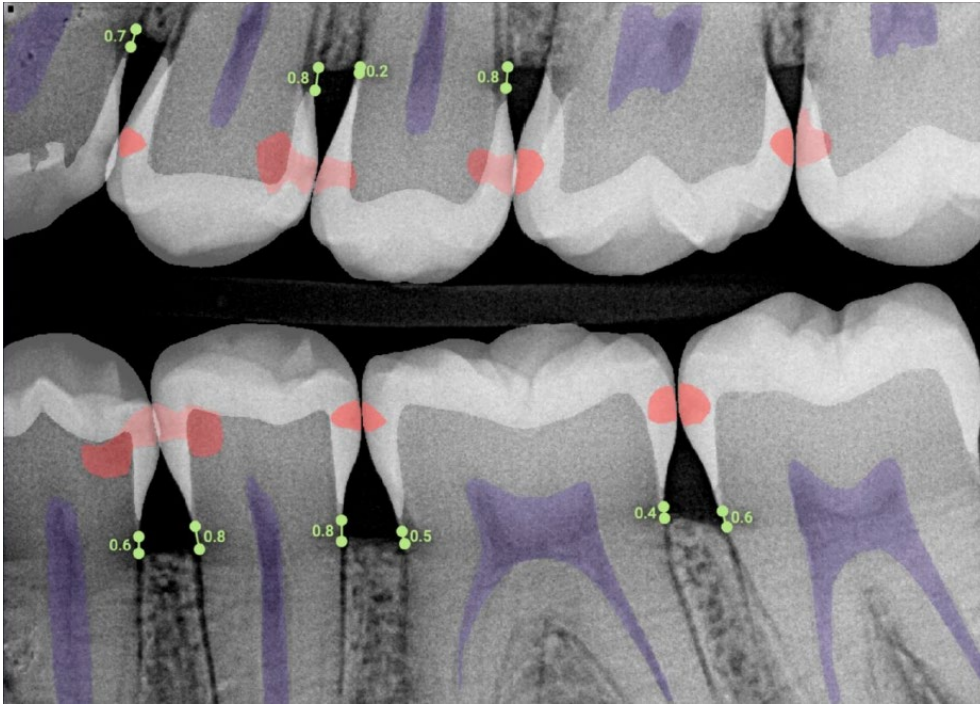


Image 1—Overjet's Segmentation Approach

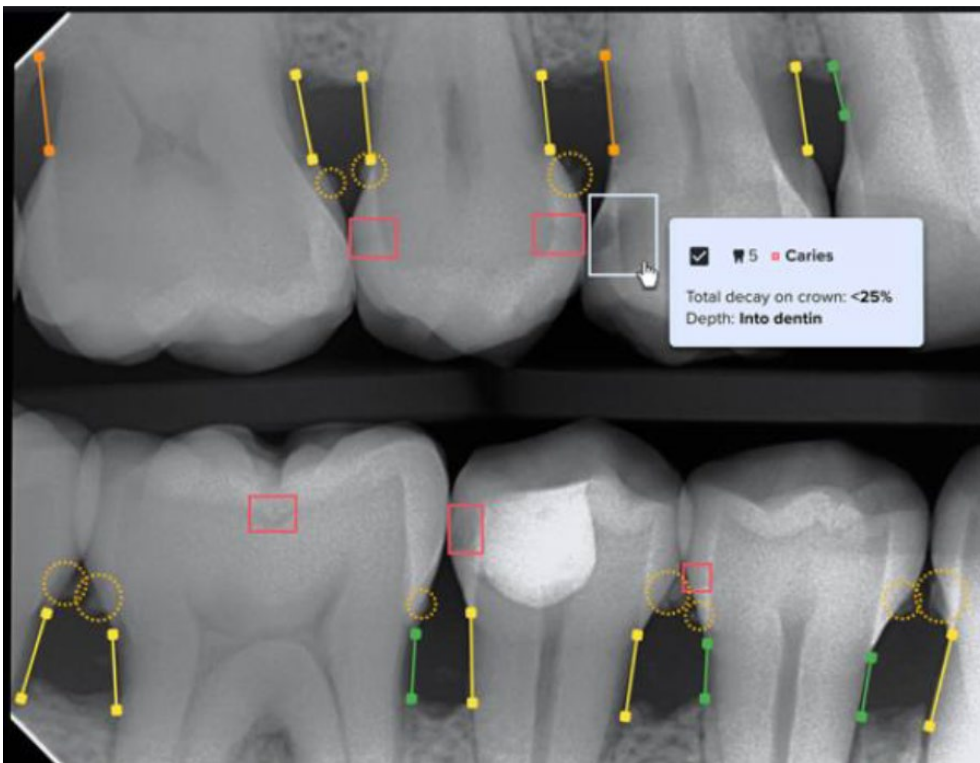


Image 2—Bounded-Box Approach

Overjet obtained U.S. Patent No. 11,158,046 titled “Estimating Measurements of Craniofacial Structures in Dental Radiography” on October 26, 2021. [Compl. ¶ 47]; [ECF No. 1-4 (the “’046 Patent”)]. Specifically, the ’046 Patent “discloses a novel system and method for providing segmentation and measurements of dental radiographic images.” [Compl. ¶ 49].

Overjet is “the only dental AI company with United States Food and Drug Administration (“FDA”) clearance for performing dental detection and segmentation to outline exactly where pathologies exist.” [Compl. ¶ 10]. Specifically, Overjet has applied for and obtained the following FDA pre-market clearances:

- Overjet Dental Assist: On January 25, 2021, Overjet applied for 510(k) Premarket clearance for “Overjet Dental Assist” (FDA 510(k) No. K210187), which “is a radiological semi-automated image processing software intended to aid dental professionals in the measurements of mesial and distal bone levels associated with each tooth from bitewing and periapical radiographs.” [Compl. ¶ 15]. The product received clearance on May 19, 2021. [Id.].
- Overjet Caries Assist: On August 10, 2021, Overjet applied for 510(k) Premarket clearance for “Overjet Caries Assist” (FDA 510(k) No. K212519), which allows for segmentation of caries on bitewing radiographs. [Compl. ¶ 16]. The Caries Assist was cleared on May 10, 2022, and indicated for use on patients at least 18 years of age. [Id.]. On September 12, 2022, Overjet applied for pre-clearance of another Caries Assist version (FDA 510(k) No. K222746), which was approved on March 27, 2023 and “expanded the age range and image type and improved model accuracy for caries,” allowing the software to be used on patients 12 years of age and older. [Id. ¶ 17].
- Overjet Calculus Assist: On March 31, 2022, Overjet applied for premarket clearance for “Overjet Calculus Assist” (FDA 510(k) No. K220928), “a radiological automated concurrent-read computer-assisted detection software” used to detect “interproximal calculus deposits on bitewing and periapical radiographs” for patients 18 years of age or older. [Compl. ¶ 18]. The product was cleared on December 16, 2022. [Id.].
- Periapical Radiolucency Assist: On June 9, 2023, Overjet applied for premarket clearance of Overjet’s Periapical Radiolucency (“PARL”) Assist software (FDA 510(k) No. K231678), “a radiological, automated, concurrent read computer-assisted detection software” to detect “periapical radiolucencies on permanent teeth captured on periapical radiographs.” [Compl. ¶ 19]. PARL was cleared on September 21, 2023, for use on patients 12 years of age or older. [Id.].

- Overjet Charting Assist: On February 23, 2024, the FDA cleared “Overjet Charting Assist.” [Compl. ¶ 20].

Overjet’s software, used by dental practices, dental services organizations (“DSOs”), and insurance companies, allows clinicians to better detect dental diseases and devise treatment plans. [Compl. ¶¶ 9, 33]. Obtaining FDA clearance for its software has “contribute[d] to Overjet’s success in the marketplace” and gives it a competitive advantage. [Id. ¶¶ 11, 13, 33].

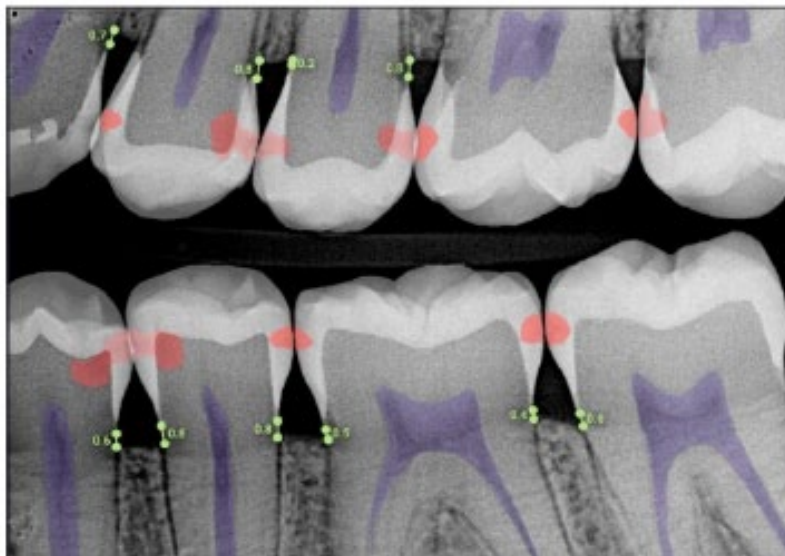
Since its inception in 2018, Overjet “has invested substantial resources creating and improving various iterations of its software.” [Compl. ¶ 14]. Adopting the naming convention “Overjet [X] Assist,” it has named its software products “Overjet Dental Assist,” “Overjet Caries Assist,” “Overjet Calculus Assist,” “Overjet Periapical Radiolucency Assist,” and “Overjet Charting Assistant.” [Id.]. To that end, “Overjet owns a United States federal trademark registration for the mark DENTAL ASSIST (Reg. No. 7,124,822) in connection with ‘Software as a medical device service (SAAS) [] featuring software used by dentists and hygienists to detect and measure dental disease’ in International Class 44.” [Id. ¶ 25]; see also [ECF No. 1-1]. Since May 2021, Overjet has been using the “DENTAL ASSIST” trademark to market and sell its software.² [Id. ¶ 22].

Overjet employs “color schemes, shapes, and designs” to help visualize the detection of diseases and other findings on dental X-rays, using its copyrighted computer programs. [Compl. ¶ 29]. Overjet owns two copyright registrations for its computer program: (i) U.S. Copyright Registration Number TX 9-344-133 for its computer program titled “Overjet Code 2022,” which was first published on April 26, 2022, and (ii) U.S. Copyright Registration Number TX 9-344-

² Overjet applied to register the DENTAL ASSIST Mark on April 22, 2022, and it was registered on August 1, 2023, with a first use of date in May 2021. [Compl. ¶ 25].

155 for its computer program titled “Overjet Code 2023” (collectively, the “Overjet code”), which was first published on September 21, 2023. [Id. ¶¶ 39–45]; see also [ECF Nos. 1-2, 1-3]. The Overjet code covers “the copyrightable expression in the program code and the copyrightable expression in screen displays that the program generates.” [Compl. ¶¶ 39, 42].

In the fall of 2023, Overjet launched its “Anatomical Structures Visualization Tool” (“Visualization Tool”) for Overjet Caries Assist, which introduced the coloring scheme and design at issue in the instant motion. [Compl. ¶¶ 29–30]. The tool annotates X-rays, using white to represent enamel, purple to denote the pulp of a tooth, bright green lines with circles at the ends to indicate measurements of bone levels, and red and translucency to mark areas of decay. [Id. ¶ 30]. Overjet chose these colors and shapes to create a “contrast with the gray scale” of the X-rays, with the ultimate goal of assisting with “patient assessment, diagnosis, and treatment planning.” [Id. ¶¶ 33–34]. It also selected the design and colors to help with brand identification; the purple, for example, complements Overjet’s purple brand color. [Id. ¶ 35]. Below is an example of an annotated X-ray created by the Overjet code, displaying the segmentation approach. [Id. ¶¶ 30, 45].



On November 15, 2023, Overjet introduced its new Anatomical Structures Visualization Tool to Heartland Dental (“Heartland”), the country’s largest DSO. [Compl. ¶¶ 31, 88].

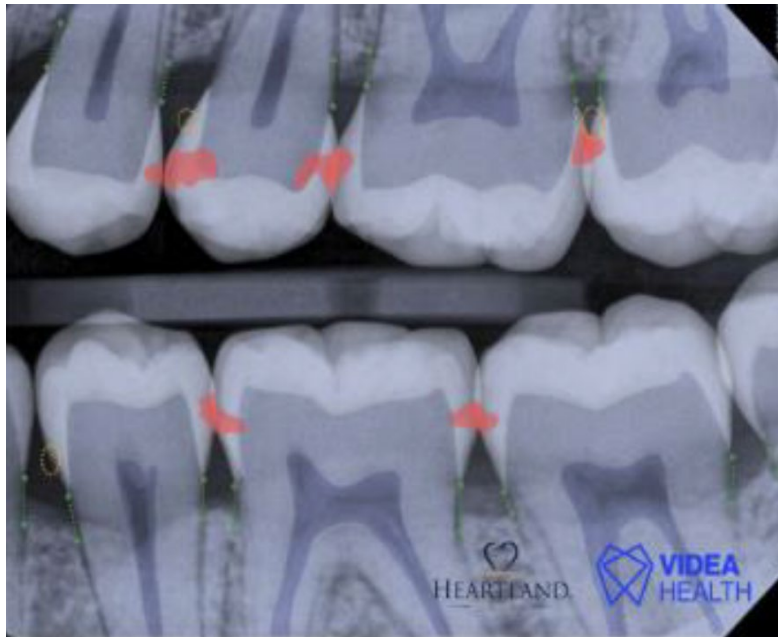
Videa is also a dental AI company that uses AI to scan X-rays and detect dental diseases. [Compl. ¶ 56]. Founded in 2018, Videa is Overjet’s direct competitor, and the two companies contend “for the same customers and market their product in the same forums, including at trade shows and dental conferences.” [Id. ¶¶ 55, 57–58].

Videa holds FDA clearance for various indications and adopted naming conventions such as “Videa Caries Assist,” “Videa Perio Assist,” and “Videa Dental Assist” for its software products. [Compl. ¶ 59]. Videa has obtained FDA clearance for the following software products:

- Videa Caries Assist: On December 6, 2021, Videa filed a 510(k) application with the FDA for “Videa Caries Assist,” which was cleared on April 21, 2022. [Compl. ¶ 60]. The FDA clearance states that Videa Caries Assist, when “[p]rovided proper authentication and a bitewing image, [] returns a set of bounding boxes representing the various lesions detected.” [Id. ¶ 62].
- Videa Perio Assist: On October 26, 2022, Videa filed a 510(k) application with the FDA for Videa Perio Assist, which was cleared on February 6, 2023. [Compl. ¶ 65].
- Videa Dental Assist:³ On August 8, 2023, Videa filed a 510(k) application for the “Videa Dental Assist” device, which the FDA granted on December 15, 2023. [Compl. ¶ 66]. The clearance states that for Videa Dental Assist, when “[p]rovided proper authentication and an eligible bitewing, periapical or panoramic image, the device returns a set of bounding boxes representing the suspect dental finding, historical treatment or normal anatomy detected.” [Id. ¶ 69].

³ During the preliminary injunction briefing, the Court learned that, in response to Overjet’s Complaint, VideaHealth changed “Videa Dental Assist” to “Videa Dental AI.” [ECF No. 22-1 ¶ 26]. For purposes of the instant motion, the Court continues to refer to the product as “Videa Dental Assist.”

Beginning in early December 2023, Videa “started to use and/or to advertise its ability to use segmentation instead of bounding boxes.” [Compl. ¶ 86]. Overjet alleges that Videa shifted away from its historical bounding approach “to a segmentation approach in a manner that directly copies the design and intellectual property of Overjet’s . . . Visualization Tool.” [Id. ¶ 87]. For example, during the Heartland Dental Winter Conference on December 9, 2023, Videa displayed the below image, which Overjet contends is a direct copy of its Visualization Tool.



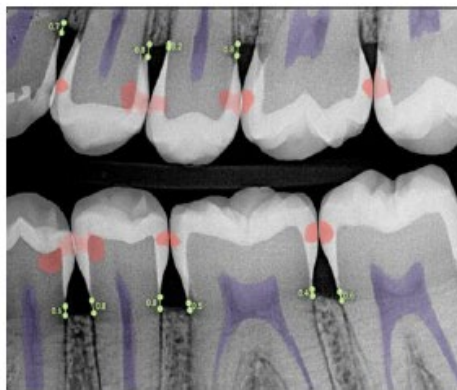
[Id. ¶ 91].⁴

At the same conference, Videa also displayed a purported infringing image at its booth, and Videa’s CEO, Florian Hillen, made a presentation discussing Videa’s segmentation capabilities. [Compl. ¶¶ 93–94]. Beginning in approximately January 2024, Videa began to advertise its segmentation capability on its website, in blog posts, and on YouTube, including using images such as the one below. [Id. ¶¶ 72–86, 95–101]; [ECF No. 1-6 at 15].

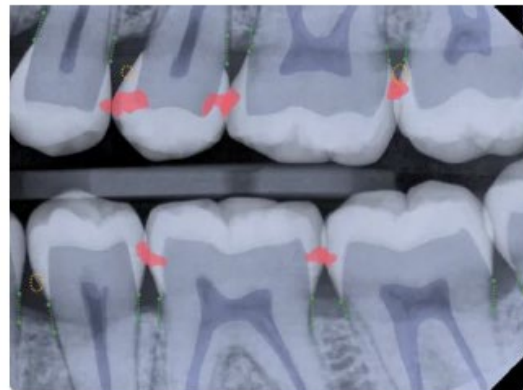
⁴ Overjet directs the Court to six infringing images. See [ECF No. 1-6 at 7–8, 11–15]; [Compl. ¶ 91].



By way of comparison, the image on the left below shows a display of Overjet's Visualization tool (the "Overjet Approach"), and the image on the right represents one of Videia's purported infringing images (the "Videa Approach"). [Compl. ¶ 103].



Overjet Image³⁷



VideaHealth Infringing Image 1³⁸

As noted above, the two companies are direct competitors in the dental AI space. As such, in the fall of 2023, both companies were considered for a lucrative partnership with

Heartland. [Compl. ¶ 88]. On December 5, 2023, Heartland announced that it had selected Videa as its dental AI partner. [Id. ¶ 90].⁵

B. Procedural History

On February 23, 2024, Overjet brought the following claims against Videa: federal trademark infringement, 15 U.S.C. § 1125(a) (Count I); Massachusetts common law trademark infringement (Count II); copyright infringement (Count III); false advertising under both federal, 15 U.S.C. § 1125(a) (Count IV), and Massachusetts law, Mass. Gen. Laws ch. 266, § 91 (Count V); federal unfair competition and false designation of origin under the Lanham Act, 15 U.S.C. § 1125(a) (Count VI); unfair competition under Massachusetts law, Mass. Gen. Laws ch. 93A, § 11 (Count VII), and common law (Count VIII); direct patent infringement, 35 U.S.C. § 271(a) (Count IX); and indirect patent infringement, 35 U.S.C. § 271(b)–(c) (Count X). Also on February 23, 2024, Overjet filed a motion for preliminary injunction on the trademark, copyright, and false advertising claims, [ECF No. 8], which, after holding oral argument on April 11, 2024, [ECF No. 40], the Court denied on July 19, 2024, [ECF No. 50].⁶ Videa filed the instant motion to dismiss Counts III, VI, VII, VIII, IX, and X on April 9, 2024, [ECF No. 36], and Overjet opposed on May 7, 2024, [ECF No. 43]. On May 29, 2024, Videa filed a reply, [ECF No. 46], and Overjet responded on June 5, 2024, [ECF No. 49].

⁵ Independent of this contract, Overjet currently works with over 150 Heartland Dental offices. [Compl. ¶ 88].

⁶ At oral argument, Videa assured the Court that it had cured the alleged trademark infringement allegations, and Overjet agreed to withdraw any allegations related to Videa's purported use of its trademark. See [ECF No. 38 at 4:4–5:24]. The Court accordingly did not rule on Overjet's trademark infringement claims in the preliminary injunction order.

II. LEGAL STANDARD

In evaluating a Rule 12(b)(6) motion to dismiss for failure to state a claim, the Court must accept as true all well-pled facts, analyze those facts in the light most hospitable to the plaintiff's theory, and draw all reasonable inferences from those facts in favor of the plaintiff. U.S. ex rel. Hutcheson v. Blackstone Med., Inc., 647 F.3d 377, 383 (1st Cir. 2011). To avoid dismissal, a complaint must set forth "factual allegations, either direct or inferential, respecting each material element necessary to sustain recovery under some actionable legal theory." Gagliardi v. Sullivan, 513 F.3d 301, 305 (1st Cir. 2008) (internal quotations and citation omitted). The plaintiff's obligation to articulate the basis of her claims "requires more than labels and conclusions." Bell Atl. Corp. v. Twombly, 550 U.S. 544, 555 (2007). The facts alleged, when taken together, must be sufficient to "state a claim to relief that is plausible on its face." A.G. ex rel. Maddox v. Elsevier, Inc., 732 F.3d 77, 80 (1st Cir. 2013) (quoting Twombly, 550 U.S. at 570). "A claim has facial plausibility when the plaintiff pleads factual content that allows the court to draw the reasonable inference that the defendant is liable for the misconduct alleged." Ashcroft v. Iqbal, 556 U.S. 662, 678 (2009) (citation omitted).

III. DISCUSSION

A. Copyright Infringement (Count III)

With regard to Count III, Overjet alleges that Videa incorporated all of the protected elements of Overjet's copyright, including the use of white to represent enamel, purple to denote pulp, reddish to represent areas of decay, and bright green lines with dots on the end to depict measurements of bone levels. [Compl. ¶ 102]; compare [Overjet Approach], with [Videa Approach].

To establish copyright infringement, Overjet must show: (1) ownership of a valid copyright in a work; and (2) a copying of constituent elements of the work that are original. Feist Publ'ns, Inc. v. Rural Tel. Serv. Co., 499 U.S. 340, 361 (1991). The second prong consists of a “bifurcated inquiry.” Coquico, Inc. v. Rodríguez-Miranda, 562 F.3d 62, 66 (1st Cir. 2009). Overjet must establish that (i) Videa “copied [its] copyrighted work as a factual matter” and (ii) “that the copying . . . was so extensive that it rendered the infringing and copyrighted works ‘substantially similar.’” Segrets, Inc. v. Gillman Knitwear Co., 207 F.3d 56, 60 (1st Cir. 2000) (citing Lotus Dev. Corp. v. Borland Int’l, Inc., 49 F.3d 807, 813 (1st Cir. 1995), aff’d, 516 U.S. 233 (1996)). “A plaintiff bears the burden of proving that the work, as a whole, is original and that it has ‘complied with the applicable statutory formalities.’” Soc’y of the Holy Transfiguration Monastery, Inc. v. Archbishop Gregory of Denver, 685 F. Supp. 2d 217, 225 (D. Mass. 2010) (quoting Lotus Dev. Corp., 49 F.3d at 813), aff’d sub nom. Soc’y of Holy Transfiguration Monastery, Inc. v. Gregory, 689 F.3d 29 (1st Cir. 2012). A certificate of copyright registration is “*prima facie* evidence of copyrightability and shifts the burden to the defendant” to establish the invalidity of the copyright. Id. (quoting Lotus Dev. Corp., 49 F.3d at 813).

Here, Videa challenges the second component, that is, the copying of original elements of the copyrighted work.⁷ [ECF No. 37 at 10]. Specifically, Videa argues that Overjet’s use of

⁷ The Court notes that Videa applies the so-called “abstraction-filtration-comparison” test when challenging Overjet’s copyright infringement claim. [ECF No. 37 at 10–13]. Videa is correct that computer programs such as the Overjet code may be literally copied, referring to a program’s source code, or, as here, non-literally copied, which encompasses a “program’s sequence, structure, organization and user interface.” McEnroe v. Mantissa Corp., No. 14-cv-12320, 2016 WL 7799636, at *9 n.6 (D. Mass. Feb. 29, 2016). When assessing non-literal

common colors and shapes is not entitled to copyright protection because they are not sufficiently original and only serve a functional purpose. [ECF No. 37 at 11–12]; [ECF No. 46 at 7–10]. Overjet replies that it does not claim that the underlying elements—that is, individual colors and shapes—are copyrightable, but rather that the combination and arrangement of color schemes, shapes, and translucencies are protected by copyright. [ECF No. 43 at 8 (citing Compl. ¶¶ 29–30)]. Overjet contends that it “selected specific, arbitrary color and highlighting schemes to present results generated by its software” and that such “expressive choices are protected by copyright.” [*Id.*]. Overjet further asserts that the combination of its design elements is not dictated by diagnostic necessity and does not just serve a functional purpose. [*Id.* at 11–13].

At this juncture, the Court is satisfied that Overjet has adequately pled that the combination of colors, shades, and shapes is original. “Original, as the term is used in copyright, means only that the work was independently created by the author (as opposed to copied from other works), and that it possesses at least some minimal degree of creativity.” Feist Publ’ns,

infringement claims, courts in this Circuit apply the “abstraction-filtration-comparison” test developed by Comput. Assocs. Int’l, Inc. v. Altai, Inc., 982 F.2d 693, 706 (2d Cir. 1992)). *Id.*; Lotus Dev. Corp., 49 F.3d at 814. The filtration step ordinarily requires a Court to “dissect the allegedly copied program’s structure and isolate each level of abstraction contained within it.” Altai, 982 F.2d at 707. Because Overjet, as Videa concedes, has already identified the alleged protectable “materials,” namely the shapes, colors, and shading used in the annotation of X-rays, [Compl. ¶ 102], “this Court need not engage in the abstraction process,” Real View, LLC v. 20-20 Techs., Inc., 683 F. Supp. 2d 147, 154 (D. Mass. 2010); [ECF No. 37 at 11]. The filtration step requires a court to determine whether the alleged protectable “materials” identified in the abstraction step are copyrightable; that is, whether they are, among other things, original or only serve a functional purpose. Torah Soft Ltd. v. Drosnin, 136 F. Supp. 2d 276, 284–85 (S.D.N.Y. 2001).

Here, Overjet does not formally refer to the “abstraction-filtration-comparison” test when responding to Videa’s motion to dismiss. [ECF No. 43]. That omission, however, is immaterial given that the crux of the parties’ dispute is whether Overjet’s design elements are original, the focus of the filtration analysis. Thus, although the Court does not refer to it as such, given the parties’ briefing, the Court’s analysis is firmly situated in the filtration step.

499 U.S. at 345. Although the Court agrees that the individual colors and geometric shapes are not by themselves copyrightable, see, e.g., Yankee Candle Co., Inc. v. Bridgewater Candle Co., LLC, 259 F.3d 25, 35 (1st Cir. 2001), the selection, arrangement, and coordination of individual non-copyrightable elements have been found deserving of copyright protection, see, e.g., Coquico, 562 F.3d at 68–69 (1st Cir. 2009); Feist Publ’ns, 499 U.S. at 358 (“[T]he principal focus should be on whether the selection, coordination, and arrangement are sufficiently original to merit protection.”); Wilson v. Brennan, 666 F. Supp. 2d 1242, 1254–55, 1267 (D.N.M. 2009), aff’d, 390 F. App’x 780 (10th Cir. 2010).

In Coquico, a case relied on by Overjet that concerned whether a stuffed-animal rendering of a coquí, a tree frog, was copyrightable, the First Circuit observed that neither a realistic depiction of a coquí nor qualities that are byproducts of the “stuffed-animal artistic medium” are protected by copyrights. 562 F.3d at 68. Nonetheless, the First Circuit explained that because creating a stuffed-animal depiction of the coquí included “countless artistic decisions . . . concerning the precise size, shape, posture, color, juxtaposition of features, stitching, and adornment of the toy,” plaintiff’s product was copyright protected, even though the individual components constituting the stuffed animal were not themselves copyrightable. Id. at 68–69. Likewise in Wilson, an out-of-circuit case where plaintiff created maps for a race course, the court found that although physical facts such as geographic locations, landmasses, or bodies of water are not copyrightable, plaintiff’s decisions on how to depict them on the map, that is, “what geographic features and roads to emphasize, what thickness of lines to use to delineate roads, how to indicate political boundaries, and many other details,” satisfied the originality requirement. 666 F. Supp. 2d at 1254–55. Similarly, here, Overjet made artistic choices as to how to depict features on a dental radiographic image, that is, it made decisions on how to

arrange and combine colors, shades, translucencies, and shapes. [Compl. ¶¶ 29–30]. These decisions meet the required modicum of creativity. Feist Publ’ns, 499 U.S. at 345 (observing that the “requisite level of creativity is extremely low” and that “even a slight amount will suffice”).

At this stage of the proceeding, the Court is also not persuaded that Overjet’s design choices serve a mere functional purpose or that Overjet was limited to only a few choices. [ECF No. 37 at 12–13]. 17 U.S.C. § 102(b) requires a court to distinguish between an annotated X-ray’s “expressive aspects,” which can be copyrightable, and its functional aspects, which are not copyrightable.⁸ See e-Steps, LLC v. Americas Leading Fin., LLC, No. 19-cv-01637, 2019 WL 9834429, at *2 (D.P.R. Sept. 25, 2019) (citing Oracle Am., Inc. v. Google Inc., 750 F.3d 1339, 1357 (Fed. Cir. 2014) (“[A]nything that performs a function is necessarily uncopyrightable.”)). Although the annotation of X-rays is in part a diagnostic tool, see [Compl. ¶¶ 33–34], it is not clear that Overjet’s decision to use its particular arrangements of colors, shapes, and translucencies was solely guided by functionality. In fact, one of the parties’ competitors, Pearl, uses a teal and magenta color scheme to highlight segmentation in X-rays, suggesting that Overjet had other options at its disposal and that diagnostic necessity did not determine its design choices. See [ECF No. 43 at 12]. Nor is it evident, at least without the benefit of discovery, that Overjet’s decision was limited to only a few choices, rendering its design decisions unprotectable. Cf. Morrissey v. Procter & Gamble Co., 379 F.2d 675, 678 (1st Cir. 1967)

⁸ “In no case does copyright protection for an original work of authorship extend to any idea, procedure, process, system, method of operation, concept, principle, or discovery, regardless of the form in which it is described, explained, illustrated, or embodied in such work.” 17 U.S.C. § 102(b).

(affirming summary judgment for defendant because the subject matter at issue was narrow and therefore only allowed for “a limited number” of expressions).^{9 10}

In sum, Overjet’s facts as pled suggest at least “some minimal degree of creativity,” Feist Publ’ns, 499 U.S. at 345, and that its design choices are not just functional.¹¹ As such, Count III survives the motion to dismiss. LovePop, Inc. v. PaperPopCards, Inc., 286 F. Supp. 3d 283, 288 (D. Mass. 2018) (“Because ‘the ultimate question of substantial similarity requires a factual judgment,’ it is often ‘a matter for the trier of fact’ and therefore ill-suited to resolution at a motion to dismiss.” (first quoting Harney v. Sony Pictures Television, Inc., 704 F.3d 173, 183 (1st Cir. 2013); then quoting Yankee Candle, 259 F.3d at 34 n.5)).

B. Unfair Competition and False Designation under the Lanham Act (Count VI)

Videa argues that Overjet’s unfair competition and false designation claim under the Lanham Act should be dismissed to the extent it is duplicative of the copyright and patent infringement claims. [ECF No. 37 at 13–14]. Overjet responds that Count VI is based on

⁹ Satava v. Lowry, a Ninth Circuit case cited by Videa for the proposition that “a combination of unprotectable elements is eligible for copyright protection only if those elements are numerous enough and their selection and arrangement original enough,” does not compel a different outcome. 323 F.3d 805, 811–12 (9th Cir. 2003). In affirming the district court’s grant of a preliminary injunction, the Ninth Circuit had the benefit of a record that contained “dozens of photographs” of the sculptures at issue. Id. at 812 n.5. Given the motion to dismiss posture here, the Court declines to find on the current record that Overjet’s arrangement of colors, shapes, and translucencies is based on only a few unprotectable elements.

¹⁰ Based on the facts alleged in the Complaint, see, e.g., [Compl. ¶¶ 28, 35], the Court understands that although the source code annotates the X-rays, the decision concerning the annotation design was made by humans rather than artificial intelligence. As such, the Court cannot find that Videa’s reliance on the Copyright Registration Guidance: Works Containing Material Generated by Artificial Intelligence is apt in the current context, and the Court need not consider it. See [ECF No. 46 at 9–10].

¹¹ Videa presented no argument as to the comparison prong of the “abstraction-filtration-comparison” test, and the Court accordingly does not address it. See [ECF No. 37].

Videa’s trademark infringement and false advertising and, as such, is not duplicative of its copyright infringement claim. [ECF No. 43 at 13–14].

“The Lanham Act prohibits unfair competition through false or misleading representations that could cause confusion with respect to the ‘origin, sponsorship, or approval’ of goods or services.” Ivymedia Corp. v. iLIKEBUS, Inc., No. 15-cv-11918, 2015 WL 4254387, at *5 (D. Mass. July 13, 2015) (quoting 15 U.S.C. § 1125(a)(1)(A)). Courts in this district have found that “[w]here a plaintiff’s Lanham Act claim merely alleges that the defendant made unauthorized use of a copyrighted work, the Lanham Act claim will be dismissed as duplicative of the copyright claim.” Mitchell Int’l, Inc. v. Fraticelli, No. 03-cv-01031, 2007 WL 4197583, at *12 (D.P.R. Nov. 26, 2007) (citing Ulloa v. Universal Music and Video Distrib. Corp., 303 F. Supp. 2d 409, 419 (S.D.N.Y. 2004)); Ivymedia Corp., 2015 WL 4254387, at *5; Applera Corp. v. Mich. Diagnostics, LLC, 594 F. Supp. 2d 150, 161 (D. Mass. 2009) (“[A] claim for patent infringement, without more, cannot be the basis for an unfair competition claim under Section 43(a) of the Lanham Act.”). In situations, however, where a Lanham Act claim is not only based on copyright infringement but also asserts claims of providing false or misleading representations, at least one court has declined to dismiss a Lanham Act claim on that basis. Timmins Software Corp. v. EMC Corp., 502 F. Supp. 3d 595, 600–01 (D. Mass. 2020); cf. Jalbert v. Grautski, 554 F. Supp. 2d 57, 74 (D. Mass. 2008) (because plaintiff did not present any “evidence or argument to support his false designation of origin claim that differs from that presented in support of his copyright claim,” the court dismissed the claim at summary judgment).

Here, Overjet’s Lanham Act claim (Count VI) is not based solely on copyright and patent infringement, [Compl. ¶¶ 191, 193], but rather additionally asserts that Videa “made several false

and misleading statements [about its segmentation capabilities] in advertising [Videa’s] products,” [id. ¶ 118], which are likely to “cause confusion . . . as to the origin, sponsorship, or approval of [Videa’s] goods, services, or commercial activities,” [id. ¶ 143–144, 194]. As such, the Court finds that, at this juncture, Overjet has adequately pled a cause of action under Count VI.¹²

C. Unfair Competition Mass. Gen. Laws ch. 93A, § 11 (Count VII) and Common Law Unfair Competition (Count VIII)

Videa next argues that to the extent Overjet’s claims of unfair competition under Massachusetts state law, namely Chapter 93A (Count VII) and common law (Count VIII), are premised on copyright or patent infringement, they are preempted by federal law. [ECF No. 37 at 15–16]; [ECF No. 46 at 10–11]. Overjet responds that Counts VII and VIII are not solely based on patent and copyright infringement, but rather on a “totality of circumstances” that includes “falsely advertising Videa’s products and causing harm to Overjet in the marketplace.” [ECF No. 43 at 15].

“Federal copyright law preempts rights under state law when they are the equivalent of those granted under the Copyright Act.” John G. Danielson, Inc. v. Winchester–Conant Props., Inc., 322 F.3d 26, 44 (1st Cir. 2003); see 17 U.S.C. § 301(a) (“[A]ll legal or equitable rights that are equivalent to any of the exclusive rights within the general scope of copyright . . . are governed exclusively by this title.”). The same applies to federal patent law. Rodime PLC v. Seagate Tech., Inc., 174 F.3d 1294, 1306 (Fed. Cir. 1999) (in situations where state law claims do not “include additional elements not found in the federal patent law cause of action,” they are

¹² Videa additionally argues that Overjet failed to plausibly plead a claim for trade dress infringement. [ECF No. 37 at 14–15]. Given that Overjet expressly rejects making a claim for trade dress infringement, [ECF No. 43 at 14–15], the Court does not consider Videa’s argument.

preempted); see also Ultra–Precision Mfg., Ltd. v. Ford Motor Co., 411 F.3d 1369, 1376 (Fed. Cir. 2005) (“Federal Circuit law governs whether federal patent law preempts a state law claim.”).

In the copyright context, a state law claim is preempted “if it does not require an element beyond ‘mere copying, preparation of derivative works, performance, distribution or display.’” Santa-Rosa v. Combo Records, 471 F.3d 224, 226 (1st Cir. 2006) (quoting Data Gen. Corp. v. Grumman Sys. Support Corp., 36 F.3d 1147, 1164 (1st Cir. 1994)). “The “‘extra element’ necessary to prove the state law claim must be such as to render that claim “qualitatively different” from a copyright claim in order to avoid preemption.” Timmins, 502 F. Supp. at 601 (quoting Patricia Kennedy & Co. v. Zam-Cul Enters., Inc., 830 F. Supp. 53, 56 (D. Mass. 1993)). Elements that “merely alter the scope of the action and not its nature” such as “awareness, intent or commercial misconduct” cannot save the claim from preemption, nor does an allegation of “failure to obtain permission for use or continued use.” Tingley Sys., Inc. v. CSC Consulting, Inc., 152 F. Supp. 2d 95, 105 (D. Mass. 2001) (citing Rubin v. Brooks/Cole Pub. Co., 836 F. Supp. 909, 923–24 (D. Mass. 1993)).

“Chapter 93A “is a statute of broad impact” that prohibits “unfair methods of competition” and “unfair or deceptive acts or practices in the conduct of any trade or commerce.””” Anoush Cab, Inc. v. Uber Techs., Inc., 8 F.4th 1, 15 (1st Cir. 2021) (quoting Exxon Mobil Corp. v. Att’y Gen., 94 N.E.3d 786, 791 (Mass. 2018) (quoting Slaney v. Westwood Auto, Inc., 322 N.E.2d 768, 772 (Mass. 1975))). Specifically, a successful Chapter 93A, § 11 claim must allege that “(1) the defendant engaged in an unfair method of competition or committed an unfair deceptive act or practice; (2) a loss of money or property was suffered; and (3) the defendant’s unfair or deceptive method, act or practice caused the loss suffered.” Id.

at 16. As a general matter, when unfair competition claims are based on the same allegations as a copyright claim, they are preempted. Feldman v. Twentieth Century Fox Film Corp., 723 F. Supp. 2d 357, 368 (D. Mass. 2010).

In the instant case, however, Overjet’s cause of action under Chapter 93A is not solely grounded on a copyright infringement claim. Rather, Overjet’s claim also encompasses allegations that Videa made false and misleading statements in advertising its products, including that it had received FDA clearance for its segmentation approach. See, e.g., [Compl. ¶¶ 89, 91, 128, 132, 194, 205]. These allegations—namely, that Videa falsely advertised certain capabilities that it did not possess to obtain a competitive market advantage—sufficiently plead an unfair method of competition and are qualitatively different from a straight copyright infringement claim. Cf. President & Fellows of Harvard Coll. v. Certplex, Ltd., No. 15-cv-11747, 2015 WL 10433612, at *2–3 (D. Mass. Nov. 25, 2015) (finding Chapter 93A claim preempted by copyright infringement claim where plaintiff failed to “present factual assertions that allege an unfair or deceptive act or practice”). The Court similarly cannot find that Overjet’s state law claims are wholly contingent on the federal patent infringement claim. Overjet has therefore adequately pled facts that suggest that its claim under Count VII seeks to protect an interest beyond what the Copyright Act or federal patent law already protect. Overjet’s Chapter 93A claim and, correspondingly, its common law unfair competition claim, which in large part mirrors the Chapter 93 claim, see [Compl. ¶¶ 200–18], are thus not preempted.

D. The Patent Claims (Counts IX and X)

1. The '046 Patent

The '046 Patent “relates generally to image processing, and, more particularly, to a method of and system for estimating measurements of craniofacial structures by analyzing

radiographic image from different imaging modalities.” [’046 Patent 1:7–10]. It includes eighteen claims, including two independent claims, Claims 1 and 10. Claim 1, the system claim, claims:

1. A data processing system comprising:
 a processor; and
 a memory in communication with the processor, the memory comprising executable instructions that, when executed by, the processor, cause the data processing system to perform functions of:
 receiving a dental radiographic image that includes an oral structure;
 selecting a segmenter and an object detector;
 predicting masks and points of the oral structure using the segmenter and the object detector;
 providing image metadata comprising the masks and points and the dental radiographic image to a selector;
 selecting by the selector at least one measurement method of a set of measurement methods according to the dental radiographic image and the Image metadata;
 calculating a sensor pixel to mm (millimeter) ratio using the measurement method; and
 calculating a calibrated measurement of the oral structure using the sensor pixel to mm ratio and the image metadata.

[Id. at 18:14–34].

Claim 10, the method claim, claims:

10. A method for providing a calibrated measurement of an oral structure in a dental radiograph image comprising:
 receiving a dental radiographic Image that includes the oral structure;
 selecting a segmenter and an object detector;
 predicting masks and points of the oral structure using the segmenter and the object detector;
 providing image metadata comprising the masks and points and the dental radiographic image to a selector;
 selecting by the selector at least one measurement method of a set of measurement methods according to the dental radiographic image and the image metadata;
 calculating a sensor pixel to mm (millimeter) ratio using the measurement method; and

calculating a calibrated measurement of the oral structure using the sensor pixel to mm ratio and the image metadata.

[Id. at 19:23–40].

2. The Two-Step Alice Test

The general standard for patentability is found in Section 101 of the Patent Act, which provides that “[w]hoever invents or discovers any new and useful process, machine, manufacture, or composition of matter, or any new and useful improvement thereof, may obtain a patent therefor.” 35 U.S.C. § 101. The Supreme Court has “long held that this provision contains an important implicit exception: Laws of nature, natural phenomena, and [, as relevant here,] abstract ideas are not patentable.” Alice Corp. Pty. Ltd. v. CLS Bank Int’l, 573 U.S. 208, 216 (2014) (internal quotations and citation omitted). Specifically, in Alice, the Supreme Court set forth a two-step test for determining patent-eligible subject matter. Id. at 217. “First,” the Court “determine[s] whether the claims at issue are directed to one of those patent-ineligible concepts,” in this case abstract ideas. Id. In making this determination, “the claims are considered in their entirety to ascertain whether their character as a whole is directed to excluded subject matter.” Internet Pats. Corp. v. Active Network, Inc., 790 F.3d 1343, 1346 (Fed. Cir. 2015). In the context of computer-related technology, the Federal Circuit has explained that Alice’s first step hinges on “whether the focus of the claims is on the specific asserted improvement in computer capabilities . . . or, instead, on a process that qualifies as an ‘abstract idea’ for which computers are invoked merely as a tool.” Enfish, LLC v. Microsoft Corp., 822 F.3d 1327, 1335–36 (Fed. Cir. 2016).

Second, if the Court finds that the claims at issue are in fact directed to an abstract concept, it must then ask, “[w]hat else is there in the claims before us?” To answer that

question, [the Court] consider[s] the elements of each claim both individually and ‘as an ordered combination’ to determine whether the additional elements ‘transform the nature of the claim’ into a patent-eligible application.” Alice, 573 U.S. at 217 (first alteration in original) (quoting Mayo Collaborative Servs. v. Prometheus Lab’ys, Inc., 566 U.S. 66, 78–79 (2012)). When conducting the second part of this analysis, the Court is searching for an “inventive concept,” i.e., “an element or combination of elements that is ‘sufficient to ensure that the patent in practice amounts to significantly more than a patent upon the ineligible concept itself.’” Id. at 217–18 (alterations adopted) (quoting Mayo, 566 U.S. at 72–73).

Videa claims that the ’046 Patent is directed to an abstract idea in that it “recites a system for processing digital images” and merely “acquir[es] and analyz[es] information obtained from an image and applies it using a set of generic and conventional or black box components.” [ECF No. 37 at 19; id. at 19–22]. Specifically, Videa argues that the claims do not amount to an improvement in computers as tools, but instead focus on high level functional language—such as, “receiving a dental radiographic image,” “selecting a segmenter . . . ,” “predicting masks and points . . . ,” or “providing image metadata”—that reflects the use of computers as tools. [Id. (citing SAP Am., Inc. v. InvestPic, LLC, 898 F.3d 1161, 1168 (Fed. Cir. 2018))]. Videa further contends that Claim 1 focuses on the end results, namely “receiving,” “selecting,” “predicting,” “providing,” and “calculating,” without explaining how the invention intends to achieve these results. [Id. at 20–21]. Overjet replies that Videa oversimplifies the technology at issue and ignores “the wording of the claims articulating specific technological improvements to the manner in which dental radiographs approximate the absolute and relative measurements of oral structures.” [ECF No. 43 at 17]. Overjet further contends that the claims “address problems that arose in the art (how to account for image distortion to accurately measure oral structures in 2D

dental radiographs) and solve them with improvements that enable use of conventional equipment in unconventional ways (using patients’ unique anatomical oral structures as calibration objects to make calibrated measurements).” [*id.* at 17]. The Court agrees with Overjet.

The ’046 Patent does not solely acquire and analyze information obtained from an image without identifying an improvement in computers as tools. Videa’s characterization of the claims, although quoting directly from them, is overly general in that it focuses on a few high-level phrases such as “receiving a dental radiographic image,” “selecting a segmenter . . . ,” “predicting masks and points . . . ,” or “providing image metadata.” [ECF No. 37 at 19]. In completing a § 101 analysis, however, the “Federal Circuit cautions that courts must be careful to avoid oversimplifying claims.” 3Shape A/S v. Carestream Dental, LLC, No. 22-cv-01829, 2023 WL 2908846, at *7 (N.D. Ga. Feb. 16, 2023) (quoting McRO, Inc. v. Bandai Namco Games Am. Inc., 837 F.3d 1299, 1313 (Fed. Cir. 2016)), report and recommendation adopted, No. 22-cv-01829, 2023 WL 2908847 (N.D. Ga. Mar. 14, 2023). Rather, a court must consider the claims “as a whole, in light of the specification,” Data Engine Techs. LLC v. Google LLC, 906 F.3d 999, 1011 (Fed. Cir. 2018), and determine whether “their character as a whole is directed to excluded subject matter,” Enfish, 822 F.3d at 1335.

The specification here explains that the ’046 Patent offers, among other things, “a technical solution to the technical problems of using a patient’s unique anatomical oral structures as calibration objects to make calibrated measurements without the need for an external calibration object.” [’046 Patent 4:2–5]. As such, the technical solution disclosed in the patent “optimize[s] the process of obtaining calibrated measurements of oral structures featured in 2D dental radiographs.” [*Id.* 4:5–8]. Claims 1 and 10, situated within the context of the patent’s

specification, capture this improvement. They describe how the need for an external calibration object is eliminated when the X-ray process uses a patient’s anatomical structures to calculate calibrated measurements by, for example, “receiving a dental radiographic image that includes an oral structure,” “selecting a segmenter and an object detector,” “selecting by the selector at least one measurement method of a set of measurement methods according to the dental radiographic image and the Image metadata,” and “calculating a calibrated measurement of the oral structure using the sensor pixel to mm ratio and the image metadata.” [*Id.* 18:14–34, 19:23–40]. The independent claims further outline additional requirements necessary to achieve these goals, including outlining measurement methods (Claims 3 and 12) and receiving data from a library that includes at least one of four databases (an x-ray sensor database, an implant database, a population based anatomical averages database, and a patient specific database) (Claims 4 and 13). [*Id.* 18:41–56, 20:5–18]. The claims, in other words, are directed to the patent’s concept—that is, using a patient’s unique anatomical oral structures as calibration objects—and not merely an abstract idea. *See 3Shape*, 2023 WL 2908846, at *10 (concluding that the claims at-issue were “directed to determining tooth shade using texture data and shape data of a 3D representation of the tooth for specific points of the tooth” and were therefore not abstract, but rather “reflect[ed] a specific means or method that improves upon, and differs from, the human-performed methods of detecting tooth shade described by the specification of the at-issue patents”).

The Court is further persuaded that the ’046 Patent focuses “on a specific means or method that improves the relevant technology.” *McRO, Inc.*, 837 F.3d at 1314. As explained in the specification, “[a]ccurately measuring oral structures present on a two-dimensional dental radiograph using currently available image processing methods is problematic.” [’046 Patent

3:36–38]. This is because current processing methods rely on external calibration objects in accounting for image distortion when measuring oral structures on a two-dimensional X-ray. [Id. 3:36–58]. At the heart of the ’046 Patent is the use of a patient’s anatomical oral structures as calibration objects without the need for an external object, which, in the court’s understanding of the patent, plainly qualifies as an improvement in the relevant technology. The Court is therefore “not convinced that the claims at-issue are merely using computers as tools to apply an abstract idea as opposed to improving the effectiveness or efficiency of computers that determine [a patient’s unique anatomical oral structures as calibration objects].” 3Shape, 2023 WL 2908846, at *8. Accordingly, the Court finds that the ’046 Patent satisfies the first prong of the Alice test and therefore declines to dismiss the patent claims.

IV. CONCLUSION

For the reasons set forth above, Defendant’s motion to dismiss, [ECF No. 36], is

DENIED.

SO ORDERED.

March 28, 2025

/s/ Allison D. Burroughs
ALLISON D. BURROUGHS
U.S. DISTRICT JUDGE