

NOTE: This disposition is nonprecedential.

**United States Court of Appeals
for the Federal Circuit**

SHOPIFY INC., SHOPIFY (USA) INC.,
Plaintiffs-Appellees

v.

EXPRESS MOBILE, INC.,
Defendant-Appellant

2024-1977

Appeal from the United States District Court for the
District of Delaware in No. 1:19-cv-00439-RGA, Judge
Richard G. Andrews.

Decided: December 8, 2025

THOMAS SAUNDERS, Wilmer Cutler Pickering Hale and
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Before DYK, REYNA, and STOLL, *Circuit Judges*.

DYK, *Circuit Judge*.

Shopify, Inc. (“Shopify”) brought a declaratory judgment action against Express Mobile, Inc. (“Express Mobile”) in the District of Delaware, seeking a declaration of noninfringement of the claims of U.S. Patent Nos. 9,063,755 (“’755 patent”), 9,471,287 (“’287 patent”), 6,546,397 (“’397 patent”), and 7,594,168 (“’168 patent”). Express Mobile counterclaimed for infringement of the claims of the asserted patents, as well as for infringement of the claims of U.S. Patent No. 9,928,044 (“’044 patent”). The district court granted Shopify’s motion for summary judgment of noninfringement as to the asserted claims of the ’397 and ’168 patents. After the trial, the district court granted Shopify judgment as a matter of law (“JMOL”) as to the asserted claims of the ’755, ’287, and ’044 patents. Express Mobile appeals. We *dismiss-in-part and affirm-in-part*.

BACKGROUND

The ’397 patent and ’168 patent relate to browser-based systems for webpage design. These patents have a common specification in all relevant respects. The patents describe a “run time generation procedure that creates a compressed web site specific customized run time engine program file.” ’397 patent col. 2 ll. 11–13; accord ’168 patent, col. 2 ll. 19–21. This procedure allows for different colors, fonts, images, audio clips, video clips, text areas, URLs, and thread objects to be included in webpages that, “with a reasonable web site design, . . . should load quickly.” ’397 patent, col. 2 ll. 5–10, 64–66; accord ’168 patent, col. 2 ll. 13–18, col. 3 ll. 3–5.

Claim 1 of the '397 patent, which is representative of the asserted claims in the '397 patent, recites:

A method to allow users to produce Internet websites on and for computers having a browser and a virtual machine capable of generating displays, said method comprising:

- (a) presenting a viewable menu having a user selectable panel of settings describing elements on a website, said panel of settings being presented through a browser on a computer adapted to accept one or more of said selectable settings in said panel as inputs therefrom, and where at least one of said user selectable settings in said panel corresponds to commands to said virtual machine;
- (b) generating a display in accordance with one or more user selected settings substantially contemporaneously with the selection thereof;
- (c) storing information representative of said one or more user selected settings in a database;
- (d) generating a website at least in part by retrieving said information representative of said one or more user selected settings stored in said database; and
- (e) building one or more web pages to generate said website from at least a portion of said database and at least one run time file, where said at least one run time file utilizes information stored in said database to generate virtual machine commands for the display of at least a portion of said one or more web pages.

'397 patent, claim 1 (emphases added).

All claims of the '168 patent derive from independent claim 1, which recites:

A system for assembling a web site comprising:

a server comprising a build engine configured to:

accept user input to create a web site, the web site comprising a plurality of web pages, each web page comprising a plurality of objects,

accept user input to associate a style with objects of the plurality of web pages, wherein each web page comprises at least one button object or at least one image object, and wherein the at least one button object or at least one image object is associated with a style that includes values defining transformations and time lines for the at least one button object or at least one image object; and wherein each web page is defined entirely by each of the plurality of objects comprising that web page and the style associated with the object,

produce a database with a multidimensional array comprising the objects that comprise the web site including data defining, for each object, the object style, an object number, and an indication of the web page that each object is part of, and

provide the database to a server accessible to web browser;

wherein the database is produced such that a web browser with access to a runtime engine is configured to generate the web-site from the objects and style data extracted from the provided database.

'168 patent, claim 1 (emphasis added).

The '755 patent, '287 patent, and '044 patent relate to systems for generating code to provide content on a display of a device. The patents have a common specification in all relevant respects. Generally, the claimed systems allow for efficient programming on a large number of types of devices. Such programming enables “defined UI objects” (user interface objects) such as “buttons, text fields, images, and videos,” to be presented for display. J.A. 1019.¹

Claim 1 of the '755 patent, which is representative, recites:

A system for generating code to provide content on a display of a device, said system comprising:

computer memory storing a registry of:

a) symbolic names required for evoking one or more web components each related to a set of inputs and outputs of a web service obtainable over a network, where the symbolic names are character strings that do not contain either a persistent address or pointer to an

¹ Citations to the J.A. refer to the Corrected Confidential Appendix filed by the parties in No. 24–1977, Dkt. No. 36.

output value accessible to the web service, and

b) the address of the web service;

an authoring tool configured to:

define a user interface (UI) object for presentation on the display, where said UI object corresponds to the web component included in said registry selected from the group consisting of an input of the web service and an output of the web service,

access said computer memory to select the symbolic name corresponding to the web component of the defined UI object,

associate the selected symbolic name with the defined UI object,

produce an Application including the selected symbolic name of the defined UI object, where said Application is a device-independent code, and

produce a Player, where said Player is a device-dependent code;

such that, when the Application and Player are provided to the device and executed on the device, and when a user of the device provides one or more input values associated with an input symbolic name to an input of defined UI object,

- 1) the device provides the user provided one or more input values and corresponding input symbolic name to the web service,
- 2) the web service utilizes the input symbolic name and the user provided one or more input values for generating one or more output values having an associated output symbolic name,
- 3) said Player receives the output symbolic name and corresponding one or more output values and provides instructions for a display of the device to present an output value in the defined UI object.

'755 patent, claim 1 (emphases added).

Shopify markets a web design program that includes the Shopify Theme Editor, which uses so-called Liquid template files to generate webpages. On March 1, 2019, Shopify sued Express Mobile, seeking a declaration of non-infringement of the claims of the '755, '287, '397, and '168 patents. Express Mobile then brought infringement counterclaims against Shopify, accusing the Shopify Theme Editor of infringing the claims of these patents. It also alleged infringement of the '044 patent.

With respect to the '397 and '168 patents, the district court construed the terms “one or more run time files” and “at least one run time file” in the '397 patent to mean “one or more files, including a run time engine, that are downloaded or created when a browser is pointed to a web page

or website.”² J.A. 18. This construction is not disputed on appeal. As the parties agree that the “run time engine” claimed in the ’168 patent is part of the run time file, Appellant’s Br. 55 (citing J.A. 1655), it is also the case that “the claimed ‘run time engine’ must be downloaded or created at run time.” J.A. 34. Following claim construction, Shopify moved for summary judgment of noninfringement on the asserted claims of the ’397 and ’168 patents. The district court granted summary judgment in Shopify’s favor on the “at least one run time file” and “run time engine” limitations as these were not present in the Shopify system, among other grounds.³ The district court concluded Shopify’s Liquid template files—which Express Mobile claims are the “run time files” in the ’397 patent and contain the “run time engine” in the ’168 patent—are not “downloaded” or “created” when a browser is pointed to a webpage or website,” and thus the Liquid template files could not satisfy these claim limitations. J.A. 39, 42.

The case proceeded to trial on the ’755 patent family (the ’755, ’287, and ’044 patents). The jury found that Shopify infringed the asserted claims of each patent in the ’755 patent family and awarded Express Mobile \$40 million

² Under the district court’s construction, the run time engine also needed to “read[] information from the database.” J.A. 17. We have since held in a related case, *Express Mobile, Inc. v. GoDaddy.com, LLC*, No. 2023-2265, 2025 WL 1013386, at *9 (Fed. Cir. Apr. 2, 2025), that this construction was erroneous. The district court’s conclusion as to the “downloaded or created” limitation is distinct from—and does not rely upon—this erroneous construction.

³ Because we affirm the district court’s ruling as to the “downloaded or created” limitation, we do not address the district court’s alternative grounds for summary judgment.

in damages. Shopify filed a posttrial motion for JMOL or, in the alternative, for new trial. In its posttrial motion, Shopify argued that “[t]he reference to ‘the defined UI object’ in the claims makes it clear that the same UI object must receive input and display output values,” and because there was no evidence that Shopify’s system uses a single “defined UI object” for both input and output values, no reasonable jury could find that Shopify infringed. J.A. 19531 (emphasis removed). The district court agreed with Shopify and granted JMOL. The district court’s ruling applied to all asserted system and method claims.⁴

Express Mobile timely appeals. We have jurisdiction under 28 U.S.C. § 1295(a)(1).

DISCUSSION

I

In inter partes review proceedings, the Patent Trial and Appeal Board (“Board”) determined that claims 1–2, 5–7, and 11 of the ’755 patent, claims 1–2, 5–7, and 11–12 of the ’287 patent, and claims 1–2, 5–7, and 11–12 of the ’044 patent were unpatentable as obvious. Today, we affirm these determinations. *Express Mobile, Inc. v. Meta Platforms, Inc.*, No. 24-1190 (Fed. Cir. Dec. 4, 2025). In a separate ex parte reexamination proceeding, the Board determined claim 1 of the ’397 patent was unpatentable as obvious. We also affirmed this determination. *In re Express Mobile Inc.*, No. 23-1076, 2024 WL 2747287 (Fed. Cir. May 29, 2024). Therefore, with respect to these claims, we dismiss Express Mobile’s appeal as moot. *XY, LLC v. Trans Ova Genetics*, 890 F.3d 1282, 1295 (Fed. Cir.

⁴ The district court also, on alternative grounds, granted JMOL as to the method claims and conditionally granted a new trial. Given our affirmance of the district court’s ruling as to the “defined UI object” limitation, we do not reach these issues.

2018). However, this case is not moot as to each asserted patent because asserted claims 12 and 22 of the '755 patent, claim 13 of the '287 patent, claims 17 and 19 of the '044 patent, claims 2, 3, 11, and 37 of the '397 patent, and claims 1, 2, and 3 of the '168 patent have not been determined to be unpatentable. We therefore address the merits of Express Mobile's arguments as to these asserted claims.

II

We first address the summary judgment ruling as to the '397 and '168 patents. Here, the question is whether the Shopify system includes run time files "that are downloaded or created when a browser is pointed to a web page or website," J.A. 18, that "generate virtual machine commands." '397 patent, claim 1. Although the Liquid template files in the Shopify system generate such commands, Express Mobile's expert, Dr. Almeroth, conceded that the Liquid template files as they exist on Shopify's servers are not downloaded onto a user's browser when the user visits a webpage or website. As such, the Liquid template files themselves cannot satisfy the "run time files" or "run time engine" limitations. However, Express Mobile offered testimony that the Liquid template files generate virtual machine commands through an "instantiation" process where a "copy" of the Liquid template file is created and downloaded to a user's browser each time a user points her browser to a Shopify website.

As the district court noted, "the content of the two files [the preexisting Liquid template file and the newly created file] is not the same, because the Liquid template file on the server has lines of code that the 'Liquid Template Downloaded in Browser' does not have." J.A. 38. Dr. Almeroth's conclusory testimony that "to me, those are both the same file," J.A. 35, is not sufficient to support infringement, as "conclusory expert assertions do not give rise to a genuine issue of material fact." *Streck, Inc. v. Rsch. &*

Diagnostic Sys., Inc., 665 F.3d 1269, 1290 (Fed. Cir. 2012).⁵ We see no error in the district court’s conclusion that Express Mobile did not raise a genuine issue of material fact regarding whether the Liquid template file on Shopify’s server and the “copy” of the Liquid template file are the same file.

Nor do the newly created files themselves generate virtual machine commands. The ’397 patent requires that the “run time file utilizes information stored in [a] database to generate virtual machine commands.” ’397 patent, claim 1. Dr. Almeroth opined that the “virtual machine commands” generated by the “run time file” were HTML, JS, and CSS code. At his deposition, Dr. Almeroth admitted that this same HTML, JS, and CSS code is “filled into” the files that were the instantiated “copy” of the liquid template file. He argued this “copy” satisfied the “at least one run time file” limitation. As the district court noted, “[u]nder Express Mobile’s view, the HTML, JS, and CSS runtime files would be generating those same HTML, JS, and CSS virtual machine commands, which does not make sense as the files would then be generating themselves.” J.A. 37–38. We conclude there is no genuine issue of material fact whether the “copy” of the Liquid template file is the claimed “run time file” nor the “run time engine,” and affirm the district court’s summary judgment grant as to claims 2, 3, 11, and 37 of the ’397 patent and claims 1, 2, and 3 of the ’168 patent.

⁵ Express Mobile also relies on an open-source document to support its “instantiation” theory. Appellant’s Br. 62–63 (citing J.A. 11954). However, neither Dr. Almeroth nor any other witness relied on or interpreted this document, and so the district court did not err in concluding that “Express Mobile has not met its burden of proof that the open-source document means anything at all.” J.A. 39.

III

As to the '755 patent family, we see no error in the district court's decision to grant JMOL as to the "defined UI object" limitation. At the JMOL hearing, Express Mobile admitted that, by the claims' plain language, the defined UI object "has to receive an input and display an output." J.A. 19786. Throughout its pleadings, expert report, and trial testimony, Express Mobile consistently referred to the "defined UI object" as individual user interface objects such as "buttons, text fields, images, and videos." *E.g.*, J.A. 1019; *see also* J.A. 5156–57 (Dr. Almeroth's expert report) (opining that some examples of the "defined UI objects" are the video section div, video-control button, iframe, product form, selection list for product id, text field for quantity, add to cart button, and GooglePay-button); J.A. 18714 (Dr. Almeroth trial testimony describing "the product form, the product form name, [and] the product" as symbolic names for defined UI objects).⁶

In its JMOL briefing, Shopify agreed that Express Mobile presented evidence of specific "defined UI objects" that received inputs and separate "defined UI objects" that displayed outputs. For example, Express Mobile's expert, Dr. Almeroth, testified that users may enter an input into a "quantity" textbox user interface object to indicate the number of items the user would like to purchase, and, as a result, a separate user interface object displays an output value adjusted by the number of items that the user entered the "quantity" textbox. J.A. 19532 (citing J.A. 18730–32). But Shopify argued that Express Mobile did not present evidence of objects that both received

⁶ The district court was not asked to construe "defined UI object," and expressly declined to do so in its JMOL order. J.A. 138. We agree with the district court that any claim construction argument related to "defined UI object" by either party was forfeited. *Id.*

inputs and displayed outputs. Shopify's expert, Mr. Schmandt, pointed out that Dr. Almeroth did not identify "any UI object that both receives an input and displays an output that is claimed by Express Mobile." J.A. 19158–59. On JMOL, Express Mobile abandoned its reliance on the earlier claimed UI objects and contended that the "defined UI objects" were the display for the "product pages with embedded add-to-cart functionality" and the display for the "YouTube Video widgets." J.A. 19569. But the district court found that, at trial, Dr. Almeroth, and Mr. Schmandt did not testify that the display for the product page or the YouTube Video widget were the "defined UI object," and thus there was no evidence for the jury to conclude "that in Shopify's system the whole display is a defined UI object." J.A. 138–39. As a result, the Shopify system was not shown to satisfy the "defined UI object" limitations, and thus the district court granted JMOL of non-infringement on each of the claims asserted at trial.

On appeal, Express Mobile contends "a reasonable jury could have readily concluded from Dr. Almeroth's testimony that the product pages are the 'defined UI object,' not that the product pages simply have UI objects in them." Appellant's Br. 29. We have carefully reviewed the record, including each citation identified in Express Mobile's briefing, and come to the same conclusion as the district court: There was no evidence at trial showing the "defined UI object" was the display for the product page or the display page for the YouTube functionality.⁷ Dr. Almeroth never

⁷ Express Mobile also contends that it presented "similar evidence for Shopify's pages that display YouTube functionality." Appellant's Br. 21–22. The YouTube video functionality may appear on the product page or on a separate page. See Appellant's Br. 18 (discussing YouTube functionality on the "product page"); Appellant's Br. 21

used the words “product page” in his testimony. And Express Mobile’s counsel properly conceded at oral argument that Dr. Almeroth “never explicitly [said] that the page is the UI object.” Oral Arg. at 4:18–40.

Express Mobile argues that even if no testimony at trial suggested the product page was the “defined UI object,” we should still reverse because “[t]he jury did not need expert testimony to understand the disputed fact that they needed to decide” and could rely on the product pages themselves. Appellant’s Br. 30. We disagree. As Dr. Almeroth told the jury, the claims are “very technical,” and “[t]here’s a lot of parts that you may not understand what they do or how those requirements are being—are to be met. The claims are not intended to be written to a layperson” J.A. 18689. “[W]hen the art is complex,” we have recognized that “where the accused infringer offers expert testimony negating infringement, the patentee cannot satisfy its burden of proof by relying only on testimony from those who are admittedly not expert in the field.” *Centricut, LLC v. Esab Grp., Inc.*, 390 F.3d 1361, 1370 (Fed. Cir. 2004).

Finally, Express Mobile relies on attorney argument as establishing that the product page is the “defined UI object.” Appellant’s Br. 33 (quoting attorney argument in closing). Although Express Mobile’s counsel argued in closing that the display for the product page could be the “defined UI object,” “[a]ttorney argument is not evidence.”

(discussing “Shopify’s pages that display YouTube video functionality” more generally). Dr. Almeroth discussed how the “play button” user interface object receives an input when a user clicks on the button, and that the result is that “the video will be played on the screen,” J.A. 18733–34, but this testimony does not suggest that the *webpage* containing the “play button” and the YouTube video is the “defined UI object.”

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Icon Health & Fitness, Inc. v. Strava, Inc., 849 F.3d 1034, 1043 (Fed. Cir. 2017). The verdict cannot rest on a new infringement theory—not supported by testimony—that was raised for the first time in closing argument.

Express Mobile did not meet its burden of proof as to the “defined UI object” limitation, and thus the district court did not err in granting JMOL on claims 12 and 22 of the ’755 patent, claim 13 of the ’287 patent, and claims 17 and 19 of the ’044 patent.

CONCLUSION

We conclude that this case is moot as to the claims determined to be unpatentable in proceedings before the Board (affirmed by this court) and that the district court did not err in granting summary judgment of noninfringement as to claims 2, 3, 11, and 37 of the ’397 patent and claims 1, 2, and 3 of the ’168 patent or JMOL of noninfringement as to claims 12 and 22 of the ’755 patent, claim 13 of the ’287 patent, and claims 17 and 19 of the ’044 patent. We have considered Express Mobile’s remaining arguments and find them unpersuasive. We thus *dismiss-in-part and affirm-in-part*.

DISMISSED IN PART AND AFFIRMED IN PART.

COSTS

Costs to Shopify.